



- |     |  |                |
|-----|--|----------------|
| 6.  | <b>ANNEXURE P/3 (COLLY.)</b><br>A copy of Form-I along with relevant documents thereto.  | <b>76-258</b>  |
| 7.  | <b>ANNEXURE P/4</b><br>A copy of the Minutes of Meeting held on 28.09.2022.  | <b>259-307</b> |
| 8.  | <b>ANNEXURE P/5</b><br>A copy of the Gazette Notification dated 13.01.2023 issued by MoP, GoI.   | <b>308-319</b> |
| 9.  | <b>ANNEXURE P/6 (COLLY.)</b><br>A copy of the RfP dated 02.03.2023 along with Global Invitation issued by PFCCL.   | <b>320-469</b> |
| 10. | <b>ANNEXURE P/7</b><br>A copy of the Draft SPA issued by PFCCL along with the RfP.   | <b>470-486</b> |
| 11. | <b>ANNEXURE P/8</b><br>A copy of the Invoice dated 24.03.2023 issued by PFCCL.   | <b>487-488</b> |
| 12. | <b>ANNEXURE P/9</b><br>A copy of the letter dated 04.05.2023 issued by PFCCL to TPCL along with the Survey Report.   | <b>489-542</b> |
| 13. | <b>ANNEXURE P/10 (COLLY.)</b><br>Copies of the Time extension Notices dated 04.05.2023, 10.07.2023, 31.07.2023, 18.08.2023, 04.09.2023, 18.09.2023 and 27.09.2023.                 | <b>543-549</b> |
| 14. | <b>ANNEXURE P/11</b><br>A copy of the letter and clarification dated 06.06.2023 issued by PFCCL to TPCL.   | <b>550-599</b> |
| 15. | <b>ANNEXURE P/12 (COLLY.)</b><br>A copy of the letter dated 10.07.2023 issued by PFCCL to TPCL along with Additional Clarification and Amendment No.1 dated 10.07.2023 to the RfP. | <b>600-604</b> |
| 16. | <b>ANNEXURE P/13</b><br>A copy of the letter dated 31.07.2023 issued by PFCCL to TPCL along with the Revised Survey Report.  | <b>605-660</b> |

<b>17.</b>	<b>ANNEXURE P/14 (COLLY.)</b> A copy of the letter dated 11.08.2023 issued by PFCCL to TPCL along with Additional Clarifications to the RfP.	<b>661-666</b>
<b>18.</b>	<b>ANNEXURE P/15</b> A copy of the letter dated 20.09.2023 issued by PFCCL to TPCL along with finalised TSA.	<b>667-794</b>
<b>19.</b>	<b>ANNEXURE P/16</b> A copy of the Qualification Notice dated 03.11.2023 issued by PFCCL.	<b>795</b>
<b>20.</b>	<b>ANNEXURE P/17</b> A copy of the letter dated 08.11.2023 issued by PFCCL to TPCL.	<b>796</b>
<b>21.</b>	<b>ANNEXURE P/18</b> A copy of the letter dated 08.11.2023 issued by TPCL to PFCCL.	<b>797</b>
<b>22.</b>	<b>ANNEXURE P/19 (COLLY.)</b> A copy of the BEC Certificate dated 24.11.2023 and Letter of Intent dated 29.11.2023 issued by PFCCL to TPCL.	<b>798-802</b>
<b>23.</b>	<b>ANNEXURE P/20</b> A copy of the letter dated 29.11.2023 issued by TPCL to PFCCL.	<b>803-806</b>
<b>24.</b>	<b>ANNEXURE P/21</b> A copy of the letter dated 27.12.2023 issued by PFCCL to TPCL.	<b>807</b>
<b>25.</b>	<b>ANNEXURE P/22</b> A copy of the Contract Performance Guarantee dated 22.12.2023 and proof of payment of acquisition price.	<b>808-813</b>
<b>26.</b>	<b>ANNEXURE P/23</b> A copy of the signed TSA.	<b>804-941</b>
<b>27.</b>	<b>ANNEXURE P/24</b> A copy of the signed Share Purchase Agreement.	<b>942-957</b>
<b>28.</b>	Vakalatnama along with Board Resolution.	<b>958-960</b>

- |     |                  |         |
|-----|------------------|---------|
| 29. | Form-1           | 961-962 |
| 30. | Proof of Service | 963-964 |

**FILED BY**



**SKV LAW OFFICES**

Advocates for the Petitioner/Applicant  
B-50, Defence Colony, New Delhi-110024  
Phone: 011-47099999  
Email: [lawyers@skvlawoffices.com](mailto:lawyers@skvlawoffices.com)

Place: New Delhi  
Date: 29.12.2023

**BEFORE THE HON'BLE CENTRAL ELECTRICITY REGULATORY COMMISSION,  
NEW DELHI**

**PETITION NO. \_\_\_\_\_/TL/2023**

**IN THE MATTER OF:**

Bikaner III Neemrana II Transmission Limited ...Petitioner/Applicant

*Versus*

Central Transmission Utility of India Ltd. & Anr. ...Respondents

**MEMO OF PARTIES**

Bikaner III Neemrana II Transmission Limited  
Through its Authorized Representative,  
Flat No. 94, 3rd Floor, Pocket-4, LIG Flats, Sector-11,  
Dwarka, New Delhi-110075 ...Petitioner/Applicant

*Versus*

1. Central Transmission Utility of India Ltd.  
Through its Authorized Representative  
First Floor, Saudamini, Plot No. 2, Sector-29,  
Near IFFCO Chowk Metro Station,  
Gurgaon, Haryana-122 001
2. PFC Consulting Limited  
Through its Authorized Representative  
1<sup>st</sup> Floor, "Urjanidhi", 1, Barakhamba Lane,  
Connaught Place, New Delhi-110001 ...Respondents

**FILED BY**



**SKV LAW OFFICES**

Advocates for the Petitioner/Applicant  
B-50, Defence Colony, New Delhi-110024

Phone: 011-47099999

Email: [lawyers@skvlawoffices.com](mailto:lawyers@skvlawoffices.com)

Place: New Delhi  
Date: 29.12.2023



Section 14, 15 and 79(1)(e) of the Electricity Act, 2003 (“**Act**”) read with the relevant provisions of the Central Electricity Regulatory Commission (Procedure, Terms and Conditions for Grant of Transmission License and other related matters) Regulations, 2009 (“**Transmission License Regulations**”) or its subsequent Clarification and Replacement, if any, for grant of Inter-State Transmission License to the Applicant for establishment of the “*Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C*” (“**Project**”), on build, own, operate and transfer basis, consisting of the following elements:

Sr. No.	Name of Transmission Element	SCOD in months from Effective Date
1.	Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end <ul style="list-style-type: none"> <li>• 765 kV, 330 MVAR Switchable line reactors at Bikaner- III PS – 2 nos.</li> <li>• 765 kV, 330 MVAR Switchable line reactors at Neemrana-II – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Neemrana-II S/s – 2 nos.</li> </ul>	24 months
2.	2 no. of 765 kV line bays each at Bikaner-III PS & Neemrana- II S/S	

	<ul style="list-style-type: none"> <li>• 765kV line bays - 4 nos. (2 nos. each at Bikaner-III PS &amp; Neemrana-II S/S)</li> </ul>	
--	--	--

*Note:*

(i) *Developer of Bikaner-III PS & Neemrana-II S/s shall provide space for 2 nos. of 765 kV line bays along with space for Switchable line reactor each at Bikaner-III PS & Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2nd).*

2. The need for implementation of the Project was discussed in the 9<sup>th</sup> Meeting of the National Commission on Transmission (“NCT”) (as held on 28.09.2022), wherein construction of New Transmission Schemes was submitted by CTUIL for consideration of the 9<sup>th</sup> NCT which *inter-alia* included the present Project.
3. Subsequently, the Ministry of Power, Government of India (“MoP”) vide its Gazette Notification dated 13.01.2023 appointed PFC Consulting Ltd. (“Respondent No. 2” / “PFCCL”) as the Bid Process Coordinator (“BPC”), for the purpose of selection of Bidder as a Transmission Service Provider (“TSP”) to establish the Inter-State Transmission System for the Project in accordance with the “Tariff Based Competitive Bidding Guidelines for Transmission Service” (“TBCB Guidelines”) and “Guidelines for Encouraging Competition in Development of Transmission Projects” issued by Ministry of Power, Government of India (“MoP”) under Section 63 of the Act and as amended from time to time.
4. In view thereof, PFCCL issued the Request for Proposal dated 02.03.2023 (“RfP”) for selection of a Transmission Service Provider (“TSP”) for the

establishment of the Project on a build, own, operate & transfer (“**BOOT**”) basis in terms of Clause 2 of the RfP read with its subsequent amendments issued by PFCCL from time to time.

5. The Applicant was incorporated on 13.06.2023 by PFCCL as its wholly owned subsidiary to initiate the activities for execution of the Project and subsequently to act as a TSP after being acquired by the successful bidder selected through TBCB process. A copy of the Certificate of Incorporation of the Applicant company is annexed herewith and marked as **ANNEXURE P/1**, and a copy of the Memorandum of Association & Articles of Association of the Petitioner Company are annexed herewith and marked as **ANNEXURE P/2 (COLLY.)**.
6. Notably, the Tata Power Company Limited (“**TPCL**”), the current holding company of the Petitioner participated in the aforesaid bidding process and subsequently, on 07.11.2023, TPCL was declared as the successful bidder by PFCCL, in pursuance to the e-reverse auction (as held on 07.11.2023), pursuant to the TBCB process conducted in terms of the RfP and the TBCB Guidelines issued by the MoP under Section 63 of the Act. Accordingly, a letter of intent dated 29.11.2023 (“**LoI**”) was issued by PFCCL to TPCL.
7. It is relevant to note that Clause 2.15.4 of the RfP mandates the TSP to apply to this Hon’ble Commission for grant of Transmission License, within five (5) working days of acquisition of the Petitioner (previously a wholly owned subsidiary of PFCCL before its acquisition by TPCL) and which was incorporated as a Special Purpose Vehicle (“**SPV**”) for implementation of

the Project.

8. It is pertinent to note that as per Regulation 6 of the Transmission Licensee Regulations, a person selected through the process under the TBCB Guidelines is eligible for grant of License. The word '*person*' has been defined in Section 2(49) of the Act to include any company or body corporate or association or body of individuals, whether incorporated or not, or artificial juridical person. Therefore, the Applicant is eligible to prefer the present Application.
9. Furthermore, Section 15(1) of the Act provides that every application under Section 14 shall be made in such a manner and in such form as may be specified by the Appropriate Commission and shall be accompanied with such fees as may be prescribed. The relevant extract of Section 14 and Section 15 of the Act is reproduced below:
 

*"14. Grant of license- The Appropriate Commission may, on an application made to it under section 15, grant a license to any person*

-

*(a) to transmit electricity as a transmission licensee; or*

*(b) to distribute electricity as a distribution licensee; or*

*(c) to undertake trading in electricity as an electricity trader, in any area which may be specified in the licence:*

...

*15. Procedure for grant of licence.-(1) Every application under section 14 shall be made in such form and in such manner as may be specified by the Appropriate Commission and shall be accompanied by such fee as may be prescribed.*

..."
10. In this respect, Regulation 7 of the Transmission Licence Regulations provides the procedure for grant of a licence. This Hon'ble Commission, in exercise of its Powers to Relax under Regulation 24 of the said regulations,

has modified/amended the procedure laid down under Regulation 7 of the said Regulations, *vide* its Suo-Moto Order dated 22.01.2022, in Petition No. 1/SM/2022. It is, therefore, submitted that the Applicant is filing the present application in accordance with the procedure established under Regulation 7 of the Transmission Licence Regulations read with the said Suo-moto Order passed by this Hon'ble Commission and the relevant provisions of the Act.

11. Further, as per Regulation 7 (1) of the Transmission License Regulations, the licensee approaching the Commission for grant of license has to append Form-I along with relevant documents provided therein along with such fee as prescribed by the Central Government from time to time. In view of the same, the Petitioner is attaching the Form-I along with relevant documents thereto are annexed herewith and marked as **ANNEXURE P/3 (COLLY.)**.
12. In view thereof, the present Application is being preferred by the Applicant seeking grant of the transmission license in accordance with Section 14, 15 and 79(1)(e) of the Act read with Regulation 7 of the Transmission Licence Regulations.

## **II. DESCRIPTION OF THE PARTIES**

13. The Petitioner i.e., Bikaner III Neemrana II Transmission Limited (**"B III N II TL"**) was a wholly owned subsidiary of PFCCL and was incorporated as an SPV for implementation of the Project. The Petitioner was acquired by TPCL (on 27.12.2023) after being declared as a successful (i.e., L1) bidder

in the bidding process conducted by PFCCL for selection of a TSP for establishment of the Project.

- 13.1. Respondent No. 1 i.e., Central Transmission Utility of India Limited (“**CTUIL**”) is notified to undertake the functions of Central Transmission Utility as provided under Section 38 of the Act and discharging, *inter-alia*, functions of planning and co-ordination pertaining to ISTS with all concerned authorities.
- 13.2. Respondent No. 2 i.e., PFCCL is a wholly owned subsidiary of Power Finance Corporation Ltd., and a company incorporated under the Companies Act, 1956. On 13.01.2023, MoP notified PFCCL as the BPC for the purpose of selection of Bidder as TSP to establish Inter-State Transmission System for construction of the Project through tariff based competitive bidding process.

### **III. JURISDICTION**

14. This Hon’ble Commission has the jurisdiction to adjudicate upon the present Petition, since the present Project which has to be constructed by the Petitioner is a part of the Inter-State transmission system which is regulated by this Hon’ble Commission under Section 79 (1) (c) of the Act.
15. Further, as explained above, in terms of Section 14, 15 and 79 (1) (e) of the Act, this Hon’ble Commission has the power to adjudicate upon the present Petition and grant Transmission License to the Applicant.

### **IV. FACTUAL BACKGROUND AND SUBMISSIONS**

16. The relevant facts and issues for the kind consideration of this Hon’ble

Commission are as follows:

- 16.1. On 28.09.2022, the 9<sup>th</sup> Meeting of the NCT was held, wherein construction of New Transmission Schemes was submitted by CTUIL for consideration of the 9<sup>th</sup> NCT, and the said Schemes *inter-alia* included the present Project. A copy of the Minutes of Meeting held on 28.09.2022 is annexed hereto and marked as **ANNEXURE P/4**.
- 16.2. On 13.01.2023, MoP *vide* its Gazette Notification No. CG-DL-E-14012023-241990 notified PFCCL to be the BPC for the purpose of selection of Bidder as a TSP to establish Inter-State transmission system for construction of the Project in accordance with the TBCB Guidelines dated 10.08.2021, issued by MoP under Section 63 of the Act (Refer Sr. No. 3 of the Gazette Notification). A copy of the Gazette Notification dated 13.01.2023 issued by MoP, GoI is annexed hereto and marked as **ANNEXURE P/5**.  
  
On 02.03.2023, PFCCL issued the RfP along with Global Invitation for selection of Bidder as a TSP through TBCB process in order to establish Inter-State Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C. One of the main objectives of the bidding process was to select a successful bidder pursuant to the RfP, who shall acquire one hundred percent (100%) of the equity shares of the Petitioner for construction of the Project. A copy of the RfP dated 02.03.2023 along with Global Invitation issued by PFCCL are annexed herewith and marked as **ANNEXURE P/6 (COLLY)**.
- 16.3. It is also relevant to note that PFCCL, in addition to the RfP, issued the Draft Share Purchase Agreement ("**SPA**"), which is a tripartite agreement

between the Petitioner, PFCCL and the Successful Bidder i.e., TPCL. A copy of the Draft SPA issued by PFCCL along with the RfP is annexed herewith and marked as **ANNEXURE P/7**.

16.4. As per the requirements stated in the RfP and the Global Invitation issued by PFCCL, the Petitioner on 17.03.2023, paid an amount to the tune of Rs. 5,90,000.00 (Rupees Five Lakh Ninety Thousand only) (inclusive of 18% GST) to PFCCL, as the said amount was mandatory to be paid in order to request for the issuance of the RfP and other relevant documents. PFCCL issued its Invoice dated 24.03.2023 regarding payment of aforesaid fees. A copy of the Invoice dated 24.03.2023 issued by PFCCL is annexed herewith and marked as **ANNEXURE P/8**.

16.5. On 04.05.2023, PFCCL issued its letter to TPCL, wherein as per the requirement of Clause 1.6.2.1 (1) of the RfP, PFCCL prepared and attached a Survey Report of the Project for the bidders participating in the Bid process. A copy of the letter dated 04.05.2023 issued by PFCCL to TPCL along with the Survey Report is annexed herewith and marked as **ANNEXURE P/9**.

16.6. It is relevant to note that PFCCL issued various Notices dated 04.05.2023, 10.07.2023, 31.07.2023, 18.08.2023, 04.09.2023, 18.09.2023 and 27.09.2023, for extension of the RfP bid submission for the Project. As per the final Notice dated 27.09.2023, the due date for submission of online RfP bids (Technical & Financial) through the electronic bidding platform for the Project was 10.10.2023. Also, the RfP (Technical) Bids were supposed to be opened on the same date i.e., 10.10.2023. Copies of the Time extension

Notices dated 04.05.2023, 10.07.2023, 31.07.2023, 18.08.2023, 04.09.2023, 18.09.2023 and 27.09.2023 are annexed herewith and marked as **ANNEXURE P/10 (COLLY.)**.

- 16.7. On 06.06.2023, PFCCL *vide* its letter to TPCL, informed and provided the Clarifications dated 06.06.2023 to the RfP documents (as raised by the bidders). A copy of the letter and clarification dated 06.06.2023 issued by PFCCL to TPCL is annexed herewith and marked as **ANNEXURE P/11**.
- 16.8. Thereafter, on 13.06.2023, the Petitioner was incorporated under the provisions of the Companies Act, 2013 by PFCCL as its 100% wholly owned subsidiary to initiate the activities for undertaking pre-bid obligations in relation to the execution of the Project and subsequently to act as the TSP.
- 16.9. On 10.07.2023, PFCCL issued its letter to TPCL thereby informing that in view of the Additional queries raised by the bidders on RfP documents, PFCCL has issued Additional Clarification along with Amendment No.1 to the RfP, thereby *inter-alia* informing the bidders about the incorporation of the Petitioner, which was under incorporation at the time of issuance of the RfP. A copy of the letter dated 10.07.2023 issued by PFCCL to TPCL along with Additional Clarification and Amendment No.1 dated 10.07.2023 to the RfP are annexed herewith and marked as **ANNEXURE P/12 (COLLY.)**.
- 16.10. On 31.07.2023, PFCCL issued another letter to TPCL, wherein PFCCL prepared and attached a Revised Survey Report of the Project in line with the requirement of Clause 1.6.2.1 (1) of the RfP for the bidders participating in the Bid process. A copy of the letter dated 31.07.2023

issued by PFCCL to TPCL along with the Revised Survey Report is annexed herewith and marked as **ANNEXURE P/13**.

16.11. On 11.08.2023, PFCCL issued its letter to TPCL thereby informing about the Additional Clarifications to the RfP issued by PFCCL. A copy of the letter dated 11.08.2023 issued by PFCCL to TPCL along with Additional Clarifications to the RfP are annexed herewith and marked as **ANNEXURE P/14 (COLLY)**.

16.12. On 20.09.2023, PFCCL *vide* its letter to TPCL issued the copy of the finalised Transmission Service Agreement (“**TSA**”) (which is an agreement between the CTUIL and the Petitioner) in terms of Clause 1.6.2.1 (6) of the RfP after incorporating amendments issued by PFCCL. A copy of the letter dated 20.09.2023 issued by PFCCL to TPCL along with finalised TSA is annexed herewith and marked as **ANNEXURE P/15**.

16.13. On 03.11.2023, PFCCL issued its Qualification Notice for the Bidders who were declared as Qualified Bidders for opening of Initial Offer of the Project, which *inter-alia* included TPCL. A copy of the Qualification Notice dated 03.11.2023 issued by PFCCL is annexed herewith and marked as **ANNEXURE P/16**.

16.14. On 07.11.2023, the e-Reverse Auction was held by PFCCL.

16.15. On 08.11.2023, PFCCL issued its letter to TPCL thereby requesting TPCL to submit original hard copies of the documents as required under Clause 2.5.2 of the RfP latest by 10.11.2023. The relevant extract of Clause 2.5.2 of the RfP is reproduced as under:

*“In addition to the on line submission of above formats through the*

*electronic platform, the Bidder with lowest Final Offer will be required to submit original hard copies of Annexure 3, Annexure 4 (if applicable), Annexure 6 (if applicable) and Annexure 14 before issuance of LoI. In case, there is a discrepancy between the online submission and physical documents, the bid would be out rightly rejected and the bidder shall be construed to have engaged in the fraudulent practice as defined in Clause 2.19.3 with consequences as mentioned in Clause 2.19.2”*

A copy of the letter dated 08.11.2023 issued by PFCCL to TPCL is annexed herewith and marked as **ANNEXURE P/17**.

16.16. In response to the aforesaid, on 08.11.2023, TPCL issued its letter to PFCCL wherein TPCL informed that Annexures 4 and 6 of the RfP are not applicable for TPCL and the other relevant documents shall be submitted by TPCL in the required timeline i.e., before 10.11.2023. A copy of the letter dated 08.11.2023 issued by TPCL to PFCCL is annexed herewith and marked as **ANNEXURE P/18**.

16.17. Subsequently, the Bid Evaluation Committee (“**BEC**”) held its meeting for evaluation of the bids placed by the bidders wherein TPCL was declared as the L1 bidder at the quoted Transmission tariff of Rs. 1626.59 million per annum. Accordingly, a Certificate was issued by BEC on 24.11.2023 in terms of TBCB Guidelines dated 10.08.2021 and on 29.11.2023, PFCCL issued the LoI to TPCL. The relevant extract of the BEC Certificate dated 24.11.2023 is reproduced as under:

**“Subject: Selection of Successful Bidder as Transmission Service Provider to establish “Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): PART- C”.**

*It is hereby certified that:*

1. *The entire bid process has been carried out in accordance with*

*the "Tariff based Competitive Bidding development Guidelines of the for Transmission Transmission Projects" Service" issued and "Guidelines by Ministry for of encouraging competition in Power, Govt. of India under Section 63 of the Electricity Act, 2003 and as amended from time to time.*

2. ***The Tata Power Company Limited*** emerged as the Successful Bidder after the conclusion of e-reverse bidding process with the lowest Quoted Transmission Charges of **Rs. 1626.59 million per annum.**
3. *The quoted tariff is lower than the Levelised Tariff calculated based on CERC norms considering the Capital Cost for the Project "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): PART-C as assessed by Cost Committee. The quoted tariff discovered through e-reverse bidding process is acceptable."*

A copy of the BEC Certificate dated 24.11.2023 and Letter of Intent dated 29.11.2023 issued by PFCCL to TPCL are annexed herewith and marked as **ANNEXURE P/19 (COLLY.)**.

16.18. In terms of the LoI, TPCL was required to unconditionally accept the terms of the LoI within seven (7) days of the issuance of the LoI. Accordingly, TPCL *vide* its letter dated 29.11.2023 to PFCCL, issued the unconditional acceptance copy of the LoI. A copy of the letter dated 29.11.2023 issued by TPCL to PFCCL is annexed herewith and marked as **ANNEXURE P/20**.

16.19. It is pertinent to note that Clauses 2.15.2, 2.15.3 and 2.15.4 of the RfP provide for a timeline after issuance of the LoI, which requires the successful bidder to *inter alia* acquire the SPV i.e., the Petitioner within 10 days from issuance of LoI and further mandates the Petitioner to file relevant petitions before this Hon'ble Commission seeking adoption of tariff and grant of transmission licence, within 5 days of the acquisition of the SPV by the successful bidder i.e., TPCL.

- 16.20. Further, as per Clause 2.15.2 of the RfP and the LoI issued to TPCL, the Successful Bidder is also required to *inter-alia* provide the Contract Performance Guarantee ("**CPG**"), within 10 days of issuance of LoI and execute the SPA and the TSA before acquiring the Petitioner/SPV.
- 16.21. On 30.11.2023, PFCCL issued its letter to TPCL regarding the submission of CPG for the Project and further communicated that the details with respect to Acquisition Price and schedule of signing the SPA will be communicated shortly once all the information and approvals are in place. Thereafter, PFCCL invited TPCL to complete the process of due diligence by 08.12.2023.
- 16.22. The said Due Diligence was completed by TPCL on 19.12.2023. Further, on 19.12.2023, PFCCL communicated the details of Acquisition price and schedule of signing the SPA which shall be held on 27.12.2023. Thereafter, PFCCL on 27.12.2023 communicated to TPCL that the last date for completion of activities required under clause 2.15.2 of the RfP stand extended to 27.12.2023. A copy of the letter dated 27.12.2023 issued by PFCCL to TPCL is annexed herewith and marked as **ANNEXURE P/21**.
- 16.23. In view thereof, TPCL furnished a CPG dated 22.12.2023, for an amount to the tune of Rs. 42 Crore (Rupees Forty-Two Crore only) (as per Clause 2.12.1 of the RfP), with an expiry date being 27.03.2026, in favour of the Nodal Agency i.e., Respondent No. 1 and acquired the Petitioner/SPV after executing the Share Purchase Agreement on 27.12.2023, on payment of the Acquisition Price to the tune of Rs. 18,60,53,101 (Rs. Eighteen Crores Sixty Lakhs Fifty-Three Thousand One Hundred One Only) (post deduction of

TDS as applicable) on 26.12.2023, along with the execution of the Transmission Service Agreement with Respondent No. 1 on 27.12.2023.

A copy of the Contract Performance Guarantee dated 22.12.2023 and proof of payment of acquisition price is annexed herewith and marked as **ANNEXURE P/22**. A copy of the signed TSA is annexed herewith as **ANNEXURE P/23** and a copy of the signed Share Purchase Agreement is annexed herewith as **ANNEXURE P/24**.

17. It is humbly submitted that in terms of Clause 2.15.4 of the RfP jointly read with the PFCCL letter dated 27.12.2023, the present Petition is being filed by the Petitioner within 5 working days from the acquisition of the Petitioner/SPV by TPCL i.e., on 27.12.2023.
18. Further, in view of the requirements under the relevant Regulations, the Applicant has marked Nodal Agency i.e., CTUIL as a Respondent on the e-portal of this Hon'ble Commission. The Applicant is also sending a copy of present Petition to CTUIL *via* e-mail and a hard copy is also being forwarded to the CTUIL in accordance with requirement under Section 15 (3) of the Act and Regulation 7 (6) of Transmission License Regulations for its recommendation under Section 15 (4) of the Act and Regulation 7 (11) of Transmission License Regulations.
19. A copy of the present Application has also been marked to the BPC in order to enable submission of the requisite documents/ information by the BPC before this Hon'ble Commission regarding the Bidding process undertaken and thereby ensure processing of application.
20. Further, in compliance with Regulation 7(4) of Transmission License

Regulations, the present Application has also been posted on the website and is accessible to all at the following webpage address- <https://www.tatapower.com/investors/regulatory/regulatory-tbcb-projects.aspx>. It is undertaken that notice of the Application as per Form II of the Transmission License Regulations, shall also be posted on the e-filing portal of this Hon'ble Commission and also on TPCL's website, as mandated by the Order dated 22.01.2022 passed by this Hon'ble Commission in Petition No. 1/SM/2022.

21. It is submitted that as per Regulation 7(5) of the Transmission Licence Regulations, the present Petition shall remain on the Petitioner's website till the time the licence is issued to the Petitioner or this Petition is rejected by this Hon'ble Commission.
22. It is further submitted that the Project is governed by the TSA signed between the Applicant and CTUIL and all the terms of which shall be binding on the signatories to the TSA. Further, the Applicant would implement the Project as per the terms and conditions provided in the TSA and the time over run and cost overrun, if applicable, shall be claimed by the Applicant in accordance with the applicable provisions of the TSA read with the provisions of the Act, the bidding documents, the regulations of this Hon'ble Commission and the exercise of power by this Hon'ble Commission under the Act and the Regulations.
23. In view the aforesaid, the Applicant fulfils the eligibility criteria for grant of transmission licence as stipulated in the Transmission License Regulations and therefore this Hon'ble Commission may grant the prayer

as prayed for.

24. The Applicant shall also comply with all the other requirements as provided in the Transmission License Regulation including publication of notices in newspapers etc. The Applicant shall place the compliance report on record before this Hon'ble Commission.
25. Simultaneously, with the present Petition, the Petitioner is also filing a Petition for adoption of the transmission charges with respect to the Project under Section 63 of the Act before this Hon'ble Commission separately, *inter alia*, in accordance with the provisions of Article 2.15.4 of the RFP.
26. In view of the above, the Applicant humbly prays that the prayers sought in the present Application be allowed. The present Application is filed *bona fide* and is in the interest of justice.

#### **PRAYER**

The Applicant hereby humbly prays before the Hon'ble Commission to:

- (a) Issue the Transmission Licence to the Applicant for establishing, operating and maintaining the "*Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C*" as provided for in the Transmission Service Agreement and the Request for Proposal;
- (b) Allow the sharing and recovery of Transmission charges for Inter-State Transmission System for Project as per sharing of Inter-State Transmission and Losses CERC Regulations, 2020 and any other

amendment thereon issued from time to time by the Hon'ble Commission, AND/OR,

- (c) Condone any inadvertent errors omissions/errors shortcomings and permit the Applicant to add/change/modify/alter these filings and make further submissions as may be required at a future date, AND/OR
- (d) Pass any such other order orders, as may be deemed fit and proper in the facts and circumstances of the case.

**FILED BY**



**SKV LAW OFFICES**

Advocates for the Petitioner/Applicant  
B-50, Defence Colony, New Delhi-110024

Phone: 011-47099999

Email: [lawyers@skvlawoffices.com](mailto:lawyers@skvlawoffices.com)

Place: New Delhi

Date: 29.12.2023

**BEFORE THE HON'BLE CENTRAL ELECTRICITY REGULATORY COMMISSION,  
AT NEW DELHI**

**PETITION NO.\_\_\_\_\_/TL/2024**

**IN THE MATTER OF:**

Bikaner III Neemrana II Transmission Limited ...Petitioner

Versus

Central Transmission Utility of India Ltd & Ors. ...Respondents

**AFFIDAVIT**

I, Tarun Katiyar, S/o. Suresh Chandra Katiyar, aged about 53 years, R/o. EB-145, Maya Enclave, Hari Nagar, South West, Delhi-110064, do hereby solemnly affirm and state on oath as under:

1. That I am the Authorized Signatory of Bikaner III Neemrana II Transmission Limited, the Petitioner in the above-mentioned matter and am fully conversant with the facts and circumstances of the present case and as such I am competent and authorized to swear and depose the present affidavit on behalf of Petitioner.
2. That I have read the accompanying Petition being submitted on behalf of Petitioner and have understood the contents thereof and that the contents therein are true and correct to the best of my knowledge and belief as derived from official records and information.
3. That the Annexures filed along with the accompanying Petition are true copies of their respective originals.



4. That the facts stated above are true and correct to my knowledge as derived from official records and information. No part of the same is false and nothing material has been concealed therefrom.

 *Tkatiya*  
DEPONENT

**VERIFICATION**

I, the above-named deponent do hereby verify that the contents of this affidavit are true and correct to the best of my knowledge and belief, no part of it is false and nothing material has been concealed therefrom.

Verified at New Delhi 9 DEC 2023, on this 29<sup>th</sup> day of December, 2023

 *Tkatiya*  
DEPONENT

*29/12/2023*  
I Identify the Executant/Deponent  
Who has Signed in my presence



29 DEC 2023

ATTESTED  
  
Notary Public, Delhi

**ANNEXURE P/1****GOVERNMENT OF INDIA  
MINISTRY OF CORPORATE AFFAIRS**

Central Registration Centre

**Certificate of Incorporation**

[Pursuant to sub-section (2) of section 7 and sub-section (1) of section 8 of the Companies Act, 2013 (18 of 2013) and rule 18 of the Companies (Incorporation) Rules, 2014]

I hereby certify that BIKANER III NEEMRANA II TRANSMISSION LIMITED is incorporated on this THIRTEENTH day of JUNE TWO THOUSAND TWENTY THREE under the Companies Act, 2013 (18 of 2013) and that the company is Company limited by shares

The Corporate Identity Number of the company is **U42201DL2023GOI415740**

The Permanent Account Number (PAN) of the company is **AALCB7105R\***

The Tax Deduction and Collection Account Number (TAN) of the company is **DELB27018F\***

Given under my hand at Manesar this THIRTEENTH day of JUNE TWO THOUSAND TWENTY THREE

Certification signature by DS MINISTRY OF CORPORATE  
AFFAIRS 10 <roc.crc@mca.gov.in> Validity Unknown

Digitally signed by  
DS MINISTRY OF CORPORATE  
AFFAIRS 10  
Date: 2023.07.03 15:15:39 IST

Vairamuthu Nagarajan

Assistant Registrar of Companies/ Deputy Registrar of Companies/ Registrar of Companies

For and on behalf of the Jurisdictional Registrar of Companies

Registrar of Companies

Central Registration Centre

Disclaimer: This certificate only evidences incorporation of the company on the basis of documents and declarations of the applicant(s). This certificate is neither a license nor permission to conduct business or solicit deposits or funds from public. Permission of sector regulator is necessary wherever required. Registration status and other details of the company can be verified on [mca.gov.in](http://mca.gov.in)

Mailing Address as per record available in Registrar of Companies office:

BIKANER III NEEMRANA II TRANSMISSION LIMITED

Urjanidhi, First Floor, 1,Barakhamba Lane,Connaught Place,New Delhi,Central Delhi-110001,Delhi

\*as issued by Income tax Department



## Form No. INC-33

## e-MOA (e-Memorandum of Association)

[Pursuant to Schedule I (see Sections 4 and 5) to the Companies Act, 2013]



Form language

English  Hindi

Refer instruction kit for filing the form

All fields marked in \* are mandatory

## \* Table applicable to company as notified under schedule I of the Companies Act, 2013

(A - MEMORANDUM OF ASSOCIATION OF A COMPANY LIMITED BY SHARES  
B - MEMORANDUM OF ASSOCIATION OF A COMPANY LIMITED BY GUARANTEE AND NOT HAVING A SHARE CAPITAL  
C - MEMORANDUM OF ASSOCIATION OF A COMPANY LIMITED BY GUARANTEE AND HAVING A SHARE CAPITAL  
D - MEMORANDUM OF ASSOCIATION OF AN UNLIMITED COMPANY AND NOT HAVING SHARE CAPITAL  
E - MEMORANDUM OF ASSOCIATION OF AN UNLIMITED COMPANY AND HAVING SHARE CAPITAL)

A - MEMORANDUM OF ASSOCIATION OF A COMPANY LIMITED BY SHARES

## Table A/B/C/D/E

1 The name of the company is

BIKANER III NEEMRANA II  
TRANSMISSION LIMITED

2 The registered office of the company will be situated in the State of

Delhi

3 (a) The objects to be pursued by the company on its incorporation are:

1. To develop Power System Network  
To plan, promote and develop an integrated and efficient power transmission system network in all its aspects including planning, investigation, research, design and engineering, preparation of preliminary, feasibility and definite project reports, construction, operation and maintenance of transmission lines, sub-stations, load dispatch stations and communication facilities and appurtenant works, coordination of integrated operation of state, regional and national grid system, execution of turn-key jobs for other utilities/organizations and wheeling of power in accordance with the policies, guidelines and objectives laid down by the Central Government from time to time.

2. To study, investigate, collect information and data

To study, investigate, collect information and data, review operation, plan, research, design

and prepare Report, diagnose operational difficulties and weaknesses and advise on the remedial measures to improve, undertake development of new and innovative product connected with business of the Company as well as modernize existing EHV, HV lines and Sub-Stations.

3. To act as Consultants/ Technical Advisers of public/ private sector enterprises etc.

To act as consultants, technical advisors, surveyors and providers of technical and other services to Public or Private Sector enterprises engaged in the planning, investigation, research, design and preparations of preliminary, feasibility and definite project reports, manufacture of power plant and equipment, construction, generation, operation and maintenance of power transmission system from power generating stations and projects, transmission, distribution and sale of power.

(b) \*Matters which are necessary for furtherance of the objects specified in clause 3(a) are

1. To obtain authority etc. to carry out its objects

To obtain license, approvals and authorization from Governmental Statutory and Regulatory Authorities, as may be necessary to carry out and achieve the Objects of the Company and connected matters which may seem expedient to develop the business interests of the Company in India and abroad.

2. To obtain charters, concession etc.

To enter into any arrangement with the Government of India or with any State Government or with other authorities/ commissions, local bodies or public sector or private sector undertakings, Power Utilities, Financial Institutions, Banks,

International Funding Agencies and obtain such charters, subsidies, loans, advances or other money, grants, contracts, rights, sanctions, privileges, licenses or concessions whatsoever (whether statutory or otherwise) which the Company may think it desirable to obtain for carrying its activities in furthering the interests of the Company or its members.

3.To enter into Implementation/ Construction Agreement

To enter into any agreement, contract or any arrangement for the implementation of the power generation, evacuation, transmission and distribution system and network with Power/ Transmission Utilities, State Electricity Boards, Vidyut Boards, Transmission Companies, Generation Companies, Licensees, Statutory bodies, other organizations (whether in Private, Public or Joint Sector Undertaking) and bulk consumers of power etc.

4.To carry on the business or purchasing, importing, exporting and trading power

To carry on the business or purchasing, importing, exporting and trading of power subject to the provisions of Electricity Act, 2003 and to supply electric power generated by other plants to distribution companies, trading companies, other generation companies and other Persons, and in this regard execute agreements with Central and State generating authorities, departments or companies, Independent Power Producers and other Persons.

5. To enter into Agreements; etc.

To secure the payments of money, receivables on transmission and distribution of electricity and sale of fuel, as the case may be, to the State Electricity Boards, Vidyut Boards,

Transmission Utilities, Generating Companies, Transmission Companies, Distribution Companies, State Governments, Licensees, statutory bodies, other organizations (whether in Private, Public or Joint Sector Undertaking) and bulk consumers of power etc. through Letter of Credits/ESCROW and other security documents.

6. To execute transmission service Agreements

To execute Transmission Service Agreements or other agreements for transmission of power to distribution, trading, and other companies, State Electricity Boards, State Utilities and any other organization and Persons.

7. To co-ordinate with Central Transmission Utility

To coordinate with the Central Transmission Utility for transmission of electricity under the provisions of Electricity Act 2003.

8. To borrow money

Subject to provisions of Sections 73, 179, 180 and other applicable provisions of the Companies Act, 2013 and subject to other laws or directives, if any, of SEBI/RBI, to borrow money in Indian rupees or foreign currencies and obtain foreign lines of credits/ grants/ aids etc. or to receive money or deposits from public for the purpose of the Company's business in such manner and on such terms and with such rights, privileges and obligations as the Company may think fit. The Company may issue bonds/ debentures whether secured or unsecured; bills of exchange, promissory notes or other securities, mortgage or charge on all or any of the immovable and movable properties, present or future and all or any of the uncalled capital for the time being of the Company as the Company may deem fit and to repay, redeem or pay off any

such securities or charges.

9. To lend money

To lend money on property or on mortgage of immovable properties or against Bank guarantee and to make advances of money against future supply of goods and services on such terms as the Directors may consider necessary and to invest money of the Company in such manner as the Directors may think fit and to sell, transfer or to deal with the same.

10 To acquire, own, lease or dispose off the property

To own, possess, acquire by purchase, lease or otherwise rights, title and interests in and to, exchange or hire real estate, equipment, Transmission lines, lands, buildings, apartments, plants, equipment, machinery, fuel blocks and hereditaments of any tenure or descriptions situated in India or abroad or any estate or interest therein and any right over or connected with land so situated and turn the same to account in any manner as may seem necessary or convenient for the purpose of business of the Company and to hold, improve, exploit, re-organize, manage, lease, sell, exchange or otherwise dispose of the whole or any part thereof.

11. To deal in Scrips/Govt. Securities

Subject to applicable provisions of law, to subscribe for, underwrite, or otherwise acquire, hold, dispose of and deal with the shares, stocks, debentures or other securities and titles of indebtedness or the right to participate in profits or other similar documents issued by any Government authority, Corporation or body or by any company or body of persons and any option or right in respect thereof.

12. To create funds and appropriate profits

To create any depreciation fund, reserve fund, sinking fund, insurance fund, gratuity, provident fund or any other fund, for depreciation or for repairing, improving extending or maintaining any of the properties of the Company or for any other purposes whatsoever conducive to the interests of the Company.

13. To purchase or otherwise acquire companies

To acquire shares, stocks, debentures or securities of any company carrying on any business which this Company is entitled to carry on or acquisition of undertaking itself which may seem likely or calculated to promote or advance the interests of the Company and to sell or dispose of or transfer any such shares, stocks or securities and the acquired undertaking.

14. To enter into partnership Agreement or Merge / amalgamate

To enter into partnership or into any agreement for joint working, sharing or pooling profits, joint venture, amalgamation, union of interests, co-operation, reciprocal concessions or otherwise or amalgamate with any person or company carrying on or engaged in or about to carry on or engaged in any business or transaction in India or abroad which the Company is authorized to carry on or engage in any business undertaking having objects identical or similar to, as are being carried on by this Company.

15. To have agencies and branch offices in India and abroad

To establish and maintain agencies, branch offices and local agencies, to procure business in

any part of India and world and to take such steps as may be necessary to give the Company such rights and privileges in any part of the world as deemed proper in the interest of the Company.

16. To promote institutions or other companies  
To promote and undertake the formation of any institution or Company or subsidiary company or for any aforesaid objects intended to benefit the Company directly or indirectly and to coordinate, control and guide their activities.

17(a) To acquire know how and import-export of machinery and tools etc.

To negotiate and enter into agreements and contracts with domestic and foreign companies, persons or other organizations, banks and financial institutions, in relation to the business of the Company including that of technical know-how, import, export, purchase or sale of plant, machinery, equipment, tools, accessories and consumables, financial assistance and for carrying out all or any of the objects of the Company.

17(b) To negotiate and enter into agreements etc.

To negotiate and enter into agreements and contracts for execution of turnkey jobs, works, supplies and export of plant, machinery, tools and accessories etc.

18. To enter into contracts/arrangements in connection with issue of shares/securities. Upon and for the purpose of any issue of shares, debentures or any other securities of the Company, to enter into agreement with intermediaries including brokers, managers of issue/commission agents and underwriters and to provide for the remuneration of such

persons for their services by way of payment in cash or issue of shares, debentures or other securities of the Company or by granting options to take the same or in any other manner as permissible under the law.

19. To enter into contracts of indemnity and/or guarantee

To enter into contracts of indemnity and get guarantee and allocations for the business of the Company.

20. To arrange for Training and Development

To make arrangements for training of all categories of employees and to employ or otherwise engage experts, advisors, consultants etc. in the interest of achieving the Company's objects.

21. To promote conservation, protect environment, theft etc.

To promote conservation and protection of electricity from theft, safety of life and to protect environments including air, land and water etc.

22. To provide for welfare of employees

To pay and provide for the remuneration, amelioration and welfare of persons employed or formerly employed by the Company and their families providing for pension, allowances, bonuses, other payments or by creating for the purpose from time to time the Provident Fund, Gratuity and other Funds or Trusts. Further to undertake building or contributing to the building or houses, dwellings or chawls by grants of money, or by helping persons employed by the Company to effect or maintain insurance on their lives by contributing to the payment of premium or otherwise and by

providing or subscribing or contributing towards educational institutions, recreation, hospitals and dispensaries, medical and other assistance as the Company may deem fit.

23. To take Insurance

To ensure any rights, properties, undertakings, contracts, guarantees or obligations or profits of the Company of every nature and kind in any manner with any person, firm, association, institution or company.

24. To share the profits pay, dividends and provide bonus etc

To distribute among members of the Company dividend including bonus shares out of profits, accumulated profits or funds and resources of the Company in any manner permissible under law.

25. To institute and defend the legal proceedings

To institute, conduct, defend, compound or abandon any legal proceedings by or against the Company or its officers or otherwise concerning the affairs of the Company and also to compound and to allow time for payment or satisfaction of any debts or recovery due, claims or demands by or against the Company and to refer any claims or demands by or against the Company or any differences arising in execution of contracts to conciliation and arbitration and to observe, comply with and/or challenge any awards preliminary, interim or final made in any such arbitration.

26. To pay and subsequently write off preliminary expenses

To pay out of the funds of the Company all costs, charges, expenses and preliminary and incidental to the promotion, formation, establishment and registration of the Company or

other expenses incurred in this regard.

27. To contribute and make donations

Subject to provisions of Companies Act, 2013 to contribute money or otherwise assist to charitable, benevolent, religious, scientific national, defense, public or other institutions or objects or purposes.

28. To open accounts in Banks

To open an account or accounts with any individual, firm or company or with any bank bankers or shrofs and to pay into and withdraw money from such account or accounts.

29. To accept gifts, donations etc.

To accept gifts, bequests, devises and donations from members and others and to make gifts to members and others of money, assets and properties of any kind.

30. To pursue the objects of the Company as principal, agents, trustee or in any other capacity

To carry out all or any of the objects of the company and do all or any of the above things in any part of the world and either as principal, agent, contractor or trustee or otherwise and either alone or in conjunction with others.

31. To enter into Contracts

To negotiate and/or enter into agreement and contract with individuals, companies, corporations, foreign or Indian, for obtaining or providing technical, financial or any other assistance for carrying on all or any of the objects of the Company and also for the purpose of activating, research, development of projects on the

basis of know-how and/or financial participation and for technical collaboration, and to acquire or provide necessary formulate and patent rights for furthering the objects of the company.

32. To contribute towards promotion of trade and industry

To aid pecuniary or otherwise, any association, body or movement having for its object the solution, settlement or surmounting of industrial or labour problems or trouble or the promotion of industry or trade.

33. To take all necessary steps for winding up of the company

Subject to the provisions of Companies Act, 2013 or any amendment or re-enactment thereof in the event of winding up to distribute among the members in specie any property of the Company or any proceeds of sale on disposal of any property in accordance with the provisions of the Act.

34. To do and perform all coincidental and ancillary acts for the attainment of its objects

To do all such other things as may be deemed incidental or conducive to the attainment of the above Objects or any of them and to carry on any business which may seem to the Company capable of being conveniently carried in connection with any of the Company's Objects or calculated directly or indirectly to enhance the value of or render profitable any of the Company's property or rights.

35. To take up studies and research experiments.

To establish, provide, maintain and conduct or otherwise subsidies research laboratories and experimental workshops for

scientific, technical or researches, experiments and to undertake and carry on directly or in collaboration with other agencies scientific and technical research experiments and tests of all kinds and to process, improve and invent new products and their techniques of manufacture and to promote, encourage, reward in every manner studies and research, scientific and technical investigations and inventions of any kind that may be considered likely to assist, encourage and promote rapid advances in technology, economies, import substitution or any business which the Company is authorized to carry on.

36. To evolve scheme for restructuring or arrangement.

Subject to provisions of the Companies Act,2013, to evolve scheme for restructuring or arrangement, to amalgamate or merge or to enter into partnership or into any consortium or arrangement for sharing of profits, union of interests, co-operation, joint venture with any Person or Persons, partnership firm/firms, or company or companies carrying on or engaged in any operation capable of being conducted so conveniently in co-operation with the business of the Company or to benefit the Company or to the activities for which the Company has been established.

37. To apply for purchase, or otherwise acquire.

To apply for purchase, or otherwise acquire any trademarks, patents, brevets, inventions, licenses, concessions and the like, conferring any exclusive or nonexclusive or limited rights to use, or any secret or other information as to any invention which may be capable of being used for any of the purposes of the Company, or

the acquisition of which may benefit the Company and to use, exercise, develop or grant licenses in respect of or otherwise turn to account the property, rights or information so acquired.

38. To sell, dispose or hive off an undertaking of the Company  
To sell, dispose or hive off an undertaking of the Company or any part thereof for such consideration as the Company may think fit and in particular for shares, debentures or securities of any other association, corporation or company.

39. To sell, improve, manage, develop

To sell, improve, manage, develop, exchange, loan, lease or let, under-lease, sub - let, mortgage, dispose of, deal with in any manner, turn to account or otherwise deal with any rights or property of the Company.

40. To outsource parts of its activities

To outsource parts of its activities to achieve higher efficiencies and throughputs in the achievement of its business goals.

4 The liability of the member(s) is limited, and this liability is limited to the amount unpaid if any, on the shares held by them.

The liability of the member(s) is limited

The liability of the member(s) is Unlimited

5 Every member of the company undertakes to contribute:

(i) to the assets of the company in the event of its being wound up while he is a member, or within one year after he ceases to be a member, for payment of the debts and liabilities of the company or of such debts and liabilities as may have been contracted before he ceases to be a member; and

(ii) to the costs, charges and expenses of winding up (and for the adjustment of the rights of the contributories among

themselves), such amount as may be required, not exceeding \*  rupees.

(iii) The share capital of the company is  rupees, divided into

Equity Share	Shares of	10	Rupees each		10000
--------------	-----------	----	-------------	--	-------

6

- We, the several persons, whose names and address are subscribed, are desirous of being formed into a company in pursuance of this memorandum of association, and we respectively agree to take the number of shares in the capital of the company set against our respective names:
- I, whose name and address is given below, am desirous of forming a company in pursuance of this memorandum of association and agree to take all the shares in the capital of the company:
- We, the several persons, whose names and addresses are subscribed, are desirous of being formed into a company in pursuance of this memorandum of association:

Subscriber Details					
S. No.	*Name, Address, Description and Occupation	DIN / PAN / Passport number	No. of shares taken	DSC	Dated
1	SACHIN SHUKLA, S/o Sh. RAJ KUMAR SHUKLA, Address: 4TH FLOOR, HOUSE NO. 6, H 1 BLOCK, GOOD EARTH CITY CENTER, SOUTH CITY II Gurgaon Haryana 122018 South City Gurgaon India Description: (As a Nominee of PFC CONSULTING LIMITED) Occupation: Service	08613963	100 Equity,0 Preference		08/06/2023
2	MILIND MADHUSUDAN DAFADE, S/o Sh. MADHUSUDAN GURINATH DAFADE, Address: C-31, AISHWARYA M APPTT DWARKA, PLOT NO. 17, SECTOR 4 DELHI-110078 India Description:(As a Nominee of PFC CONSULTING LIMITED Occupation: Service	09587967	100 Equity,0 Preference		08/06/2023
3	NEERAJ SINGH, S/o Sh. DAYASHANKAR SINGH, Address: C-703, F-2, THE CRESCENT APPARTMENT SEC-50 GAUTAM BUDDHA NAGAR NOIDA Uttar Pradesh 201301 India Description:(As a Nominee of PFC CONSULTING LIMITED Occupation: Service	08613892	100 Equity,0 Preference		08/06/2023
4	PFC CONSULTING LIMITED having its Registered Office at FIRST FLOOR, "URJANIDHI", 1, BARAKHAMBHA LANE CONNAUGHT PLACE, New Delhi-110001 through Sh. SACHIN ARORA, S/o Sh. Prem Lal Arora, Address: F-5, 1903, SUPERTECH, ECO VILLAGE, 1, NEAR PARK, GREATER NOIDA, Uttar Pradesh-201301 (as Authorised Si	AKGPA1434J	9400 Equity,0 Preference		08/06/2023

5	MANOJ KUMAR RANA, S/o Sh. SUBE SINGH, Address: A-32-E, DDA FLATS MUNIRKA NEW DELHI 110067 India Description:(As a Nominee of PFC CONSULTING LIMITED Occupation: Service	02263302	100 Equity,0 Preference	08/06/2023
6	DHARUMAN MANAVALAN, S/o Sh. PAMANDI CHINNAN DHARUMAN, Address A-703, SAHETA APARTMENT, PLOT NO. 30, DWARKA, SECTOR-4, SOUTH WEST DELHI 110078 India Description:(As a Nominee of PFC CONSULTING LIMITED Occupation: Service	08102722	100 Equity,0 Preference	08/06/2023
7	SANJAY KUMAR NAYAK, S/o Sh. JAGABANDHU NAYAK, Address: K 713, JALVAYU TOWER, SECTOR 56 GURGAON Haryana 122011 India Description: (As a Nominee of PFC CONSULTING LIMITED Occupation: Service	08197193	100 Equity,0 Preference	08/06/2023
<b>Total shares taken</b>			10000 Equity,0 Preference	

## Signed before me

Membership type of the witness (ACA/FCA/ACS/FCS/ACMA/FCMA)	*Name of the witness	*Address, Description and Occupation	DIN / PAN / Passport number / Membership number	DSC	Dated
ACS	Anjali	D-427, 2nd Floor, Ramphal Chowk, (Backside of Goyalsons) Palam Extn, Sector 7, Dwarka, New Delhi-110075 Occupation: Practicing Company Secretary	65330		08/06/2023

7 Shri / Smt

Of

resident of

aged

years shall be the nominee in the event of death of the sole member.

**Form No. INC-34****e-AOA (e-Articles of Association)**

[Pursuant to Section 5 of the Companies Act, 2013 and rules made thereunder read with Schedule I]



Form language

 English  Hindi

Refer instruction kit for filing the form.

All fields marked in \* are mandatory

Table applicable to company as notified under schedule I of the Companies Act, 2013  
(F, G, H)

F

Table F / G / H (basis on the selection of above-mentioned field) as notified under schedule I of the companies Act, 2013 is applicable to

F - A COMPANY LIMITED BY SHARES

(F – a company limited by shares

G– a company limited by guarantee and having a share capital

H – a company limited by guarantee and not having share capital)

The name of the company is

BIKANER III NEEMRANA II TRANSMISSION LIMITED

Check if not applicable	Check if altered	Article No.	Description
			<b>Interpretation</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	I	
			<b>Share Capital and Variation of rights</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	II 1	<ul style="list-style-type: none"> <li>1.1 SHARE CAPITAL AND VARIATION OF RIGHTS 1.1 Share Capital / Increase of capital by the Company and how carried into effect ? The Authorized Share Capital of the Company is as mentioned in clause V of the Memorandum of Association of the Company. The Company in General Meeting may from time to time, by resolution, increase its authorized share capital by creation of new shares, such increase to be of such aggregate amount and to be divided into shares of such respective amounts as may be determined by the General Meeting subject to the provisions of the Act. ? 1.2 New Capital same as existing capital ? Any capital raised by the creation of new shares shall be considered as part of the original capital, and shall be subject to the same provisions herein contained, with reference to the payment of calls and installments, forfeiture, lien, surrender, transfer and transmission, voting and otherwise. ? 1.3 Reduction of Capital ? The Company may, from time to time, by special resolution reduce its capital, which may be paid off either with or without extinguishing or reducing? liability on shares, which is in excess of the wants of the company or canceling such share capital which has been lost or is unrepresented by available</li> </ul>

			assets. ? 1.4 Subdivision and consolidation of shares ? The Company in general meeting may, from time to time, sub-divide or consolidate its shares or any of them and exercise any of the other powers conferred by Section 61 of the Act and shall file with the Registrar such notice of exercise of any such powers as may be required by the Act. ?
<input type="checkbox"/>	<input checked="" type="checkbox"/>	2	<ul style="list-style-type: none"> <li>2.1 Register and Index of Members/ Beneficial owners ? The Company shall cause to be kept a Register and also an Index of Members and Debenture-holders in accordance with Sections 88 of the Act. Further, as permissible under Section 88 of the Act, the register and Index of beneficial owners maintained by a ? Depository? shall be deemed to be the corresponding Register and Index for the purpose of this Act. 2.2 Foreign Register of members ? ? The Company shall be entitled to keep in any country outside India a Foreign Register of members resident in that country, subject to compliance with the provisions of Section 88 of the Act. 2.3 Shares to be numbered distinctively ? The shares in the capital held otherwise than in the depository mode shall be numbered progressively in sequence and given distinctive number, Except and in the manner herein mentioned, no share shall be forfeited or surrendered and shall continue to bear the number which it had originally borne. 2.4 Share Application Money ? The Company shall ensure that the share application money paid is held by it in an account with a Scheduled Commercial Bank (in the name of the Company)</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	3	<ul style="list-style-type: none"> <li>3.1 Further Issue of Capital ? (a)Where at any time the Company wishes to raise its subscribed share capital by issue of further shares, it shall first offer such shares to its existing shareholders in proportion to their existing shareholdings on the date of such issue. Such offer to the existing shareholders shall be in accordance with the provisions of Section 62 of the Act. ? (b) The Company shall subject to applicable provisions of the Act and Articles of Association, make uniform calls from time to time upon all the Shareholders in respect of the moneys remaining unpaid on the issued share capital within 30 days or such time, as the Board may deem fit and appropriate.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	4	<ul style="list-style-type: none"> <li>4.1 Shares under control of Directors ? Subject to the provisions of these Articles and of the Act, the shares including any shares forming part of any increased capital of the Company shall be under the control of the Directors, who may allot or otherwise dispose off the shares to such persons in such proportion, on such terms and conditions and at such times as the Directors may think fit and subject to the sanction of the Company in General Meeting, subject to the provisions of Sections 52 and section 54 of the Act at a premium or par and such option being exercisable for such time and for such consideration as the Directors think fit. The Board shall cause to be filed the returns as to allotment provided for in Section 39(4) of the Act.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	5	
<input type="checkbox"/>	<input checked="" type="checkbox"/>	6	
			<ul style="list-style-type: none"> <li>7.1 Share Certificates ? A certificate, issued under the common seal</li> </ul>

<input type="checkbox"/>	<input checked="" type="checkbox"/>	7	<p>of the company, specifying the shares held by any person, shall be?prima facie?evidence of the title of the person to such shares. ?</p> <p>(a) Every Member or allottee of shares who is holding such shares in the physical form shall be entitled, without payment, to receive certificate specifying the name of the person in whose favour it is issued, the shares to which it relates and the amount paid-up thereof. Such certificates shall be issued only in pursuance of a resolution passed by the Board and on surrender to the Company of the letter of allotment or the fractional coupons of requisite value, save in case of issues against letters of acceptance or of renunciation or in cases of issue of bonus shares. Every such certificate shall be issued under the seal of the Company, which shall be affixed in the presence of two Directors and the Secretary or some other person appointed by the Board for the purpose, and the two directors and the Secretary or other persons as authorized by the Board shall sign the share certificate.? Provided, if the composition of the Board permits of it, at least one of the aforesaid two directors shall be a person other than a Managing or a Whole Time Director. Particulars of every share certificate issued shall be entered in the Register of Members against the name of the person, to whom it has been issued, indicating the date of issue. For issue of any further duplicate certificate, the Board shall be entitled to charge such amount which shall not exceed fifty Rupees per Certificate. ? (b) A Director may sign a share certificate by affixing his signature thereon by means of any machine, equipment or other mechanical means such as engraving in metal or lithography, but not by means of a rubber stamp. PROVIDED that the Director shall be personally responsible for the safe custody of such machine equipment or other material used for the purpose. 7.2 Renewal of Share Certificates ? (a) No certificate of any share or shares shall be issued either in exchange for those which are sub-divided or consolidated or in replacement of those which are defaced, mutilated, torn or old, decrepit, destroyed or where the pages on the reverse for recording transfers have been duly utilized, unless the certificate in lieu of which it is issued is surrendered to the Company and for issuing such share certificate the company may charge such fee as the Board thinks fit,? not exceeding twenty rupees per certificate. ? (b) When a new share certificate has been issued in pursuance of clause (a) of this Article, it shall state on the face of it and against the stub or counterfoil to the effect that it is ? Issued in lieu of share certificate No _____ sub-divided/ replaced/on consolidation.?? (c) If a share certificate is lost or destroyed a new certificate in lieu thereof shall be issued only with the prior consent of the Board and on such reasonable terms, such as furnishing supporting evidence and indemnity and? the payment of out-of-pocket expenses incurred by the Company in investigating evidence produced, as the Board thinks fit. ? (d) When a new share certificate has been issued in pursuance of clause (c) of this Article, it shall state on the face of it and against the stub or counterfoil to the effect that it is ?duplicate issued in lieu of share certificate No._____? and the word ?duplicate? shall be stamped or printed prominently on the face of the share certificate. ? (e) Where a new share certificate has been issued in pursuance of clause (a) and/ or clause (c) of this Article, particulars of every such share certificate shall be entered in a Register of Renewed and Duplicate Share Certificates indicating against the name(s) of the person(s) to whom the certificate is issued, the number and date of issue of the share certificate in lieu of which the new certificate is issued and the necessary changes indicated in the Register of</p>
--------------------------	-------------------------------------	---	---

		<p>Members by suitable cross reference in the "Remarks" column. (f) All blank forms to be used for issue of share certificates shall be printed and the printing shall be done only on the authority of a resolution of the Board and the blank forms shall be consecutively machine-numbered and the forms and the blocks, engravings, facsimiles relating to the printing of such forms shall be kept in the custody of the Secretary or of such other person as the Board may appoint for the purpose; and the Secretary or the other person aforesaid shall be responsible for rendering an account of these forms to the Board. (g) The Committee of the Board, Company Secretary of the Company or a Director specifically authorized by the Board for such purpose shall be responsible for the maintenance, preservation and safe custody of all books and documents relating to the issue of share certificates including the blank forms of share certificates referred to in clause (f). (h) All books referred to in clause (g) shall be preserved in good order for not less than thirty years and in disputed cases shall be preserved permanently. 7.3 Joint holders (a) Where two or more persons are registered as the holders of any share, they shall be treated as a single shareholder and shall be deemed to hold the same as joint holders with benefits of survivorship subject to the following and other provisions contained in these Articles. (b) The Company shall be entitled to decline to register more than four persons as the holders of any share. (c) The Joint holders of any share shall be liable, severally as well as jointly, for and in respect of all calls and other payments which ought to be made in respect of such shares. (d) On the death of any such joint holder, the survivor or survivors shall be the only person or persons recognized by the Company as having any title to the share, but the Directors may require such evidence of death as they may deem fit and nothing herein contained shall be taken to release the estate of the deceased joint holder from any liability on shares held by him jointly with any other person. (e) Delivery of share certificate to any one of such joint holders shall be deemed to be delivery to all of them and any one of such joint holders may give effectual discharge and receipts for any dividends or other moneys payable in respect of such shares and/or in respect of any other obligation of the Company towards them. (f) Only the person whose name stands in the Register of Members as the first of the joint holders of any shares shall be entitled to delivery of the certificate relating to such share or to receive notices from the Company, and any notice given to such person shall be deemed proper notice to all joint holders. (g) Any one of two or more joint holders may vote at any meeting either personally or by proxy in respect of such share as if he were solely entitled thereto, and if more than one of such joint holders be present at any meeting personally or by proxy, the holder whose name stands first or higher (as the case may be) on the Register of Members in respect of such share shall alone be entitled to vote in respect thereof. PROVIDED always that a member present at any meeting personally shall be entitled to vote in preference to a person present by proxy although the name of such person present by proxy stands first on the Register of Members in respect of such shares.</p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<ul style="list-style-type: none"> <li>8 Terms and Conditions of Preference Shares Subject to the provisions of section 55, any preference shares may, with the sanction of an ordinary resolution, be issued on the terms that they</li> </ul>

		8	are to be redeemed on such terms and in such manner as the company before the issue of the shares may, by special resolution, determine. ?
			<b>Lien</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	9	<ul style="list-style-type: none"> <li>9 Company to have lien on shares ? The Company shall have a first and paramount lien upon all shares (other than fully paid up shares) registered in the name of each member (whether solely or jointly with others) and upon the sale proceeds thereof, for all moneys (whether presently payable or not) called or payable at a fixed time in respect of all such shares (not being fully paid up) for all moneys presently payable by him or his estate to the Company. Any such lien shall extend to all dividends payable and bonuses declared from time to time declared in respect of such shares.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	10	<ul style="list-style-type: none"> <li>10 Enforcing lien by sale ? For the purpose of enforcing such lien, the Board may sell the shares subject thereto in such manner as they shall think fit, and for that purpose it may cause to be issued a duplicate certificate in respect of such shares and may authorize one of their Directors to execute a transfer thereof on behalf of and in the name of the Board. No sale shall be made until notice period for making call as aforesaid have expired and until notice in writing of the intention to sell shall have been made known to the shareholder for default in payment and default has been made by him in the payment of money called in respect of such shares for thirty days after the date of such notice. Upon issue of a duplicate certificate or certificates in lieu of the original share, the certificate or certificates originally issued shall stand cancelled and become null and void and the same shall have no effect.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	11	<ul style="list-style-type: none"> <li>11 .1 Application of proceeds of sale ?? The net proceeds of any such sale shall be received by the Company and applied in or towards payment of such part of the amount as is presently payable and the residue, if any, shall (subject to a like lien for sums not presently payable as existed upon the shares before sale) be paid to the person entitled to the shares, at the date of the sale.</li> </ul>
<input checked="" type="checkbox"/>	<input type="checkbox"/>	12	<ol style="list-style-type: none"> <li>The proceeds of the sale shall be received by the company and applied in payment of such part of the amount in respect of which the lien exists as is presently payable.</li> <li>The residue, if any, shall, subject to a like lien for sums not presently payable as existed upon the shares before the sale, be paid to the person entitled to the shares at the date of the sale.</li> </ol>
			<b>Calls on shares</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	13	<ul style="list-style-type: none"> <li>13.1 Directors may make calls ? The Board may, from time to time, subject to the terms on which any shares may have been issued and subject to the conditions of allotment, by a resolution passed at a meeting of the Board (and not by resolution by circulation) make such call as it thinks fit upon the Members in respect of all moneys unpaid on the shares held by them respectively and each member shall pay the amount of every call so made on him to the person or persons and at the times and places appointed by the board. A call may be made payable by installments. 13.2 Notice of calls ? Not less</li> </ul>

		<p>than thirty days? notice in writing of any call shall be given by the Company specifying the time and place of payment, and the person or persons to whom such call shall be paid. 13.3 When call made ? A call shall be deemed to have been made at the time when the resolution of the Board authorizing such call was passed at a meeting of the Board and demand notice is issued. 13.4 Calls may be revoked or postponed ? A call may be revoked or postponed at the discretion of the Board.</p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>14</p> <ul style="list-style-type: none"> <li>14.1 Directors may extend time The Board may, from time to time at its discretion, extend the time fixed for the payment of any call, and may extend such time as to all or any of the Members for reasons which the Board may consider satisfactory, but no Member shall be entitled to such extension save as a matter of grace.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>15</p> <ul style="list-style-type: none"> <li>15 Calls to carry interest ? If any Member fails to pay any call due from him on the day appointed for payment thereof, or any such extension thereof as aforesaid, he shall be liable to pay interest on the same from the day appointed for the payment thereof to the time of actual payment at rate not exceeding 10 per cent per annum as maybe decided by the Board, but the Board may in its absolute discretion and in special circumstances waive or reduce the levy of interest as deemed appropriate.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>16</p> <ul style="list-style-type: none"> <li>16.1 Sums deemed to be call ?? Any sum, which by the terms of issue of a share becomes payable on allotment or at any fixed date, whether on account of the nominal value of the share or by way of premium, shall, for the purposes of these Articles be deemed to be a call duly made and payable on the date on which by the terms of issue the same becomes payable, and in case of non-payment all the relevant provisions of these Articles as to payment of interest and expenses, forfeiture or otherwise shall apply as if such sum had become payable by virtue of a call duly made and notified.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>17</p> <ul style="list-style-type: none"> <li>17.1 Partial payment not to preclude Forfeiture ? Neither the receipt by the Company of a portion of any money which shall from time to time be due from any Member to the Company in respect of his shares, either by way of principal or interest nor any indulgence granted by the Company in respect of the payment of any such money, shall preclude the Company from thereafter proceeding to enforce a forfeiture of such shares as hereinafter provided. 17.2 Payment in anticipation of calls may carry interest ? The Board may, if it thinks fit, agree to and in anticipation receive from any Member willing to advance the same, all of calls money or any part of the amounts of his respective shares beyond the sums actually called up, and upon the moneys so paid in advance, or upon so much thereof, from time to time, and at any time thereafter as exceeds the amount of the calls then made upon and due in respect of the shares on account of which such advances are made, the Board may pay or allow interest, at such rate as the Member paying the sum in advance and the Board agree upon. The Board may agree to repay at any time any amount so advanced or may at any time repay the same upon giving to the Member three months? notice in writing. ? PROVIDED that moneys paid in advance of calls on any shares may carry interest but shall not confer a right to dividend or to participate in profits. ? (b) No Member paying any such sum in advance shall be entitled to voting rights in respect of the moneys</li> </ul>

			so paid by him until the same would but for such payment become presently payable.
<input checked="" type="checkbox"/>	<input type="checkbox"/>	18	<ul style="list-style-type: none"> <li>The Board -</li> <li>a. may, if it thinks fit, receive from any member willing to advance the same, all or any part of the monies uncalled and unpaid upon any shares held by him and</li> <li>b. upon all or any of the monies so advanced, may (until the same would, but for such advance, become presently payable) pay interest at such rate not exceeding, unless the company in general meeting shall otherwise direct, twelve per cent per annum, as may be agreed upon between the Board and the member paying the sum in advance.</li> </ul>
			<b>Transfer of shares</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	19	<ul style="list-style-type: none"> <li>19.1 Register of Transfers ? The Company shall maintain a Register of Transfers and therein shall be fairly and distinctively enter the particulars of every transfer or transmission of any share in the physical form. ? 19.2 Form of transfer The instrument of transfer shall be in writing and in such form as prescribed under the Act. All the provisions of Section 56 of the Act shall be duly complied with in respect of all transfers and of the registration thereof. The Company shall not charge any fee for registration of a transfer of shares or debentures. ? 19.3 Instrument of Transfer to be completed and presented to the Company ? The Instrument of Transfer duly stamped and executed by the transferor and the transferee shall be delivered to the Company in accordance with the provisions of the Act. The instrument of transfer shall be accompanied by the Share Certificate or such evidences the Board may require to prove the title of transferor and his right to transfer the shares and every registered Instrument of Transfer shall remain in the custody of the Company until destroyed by order of the Board. Any instrument of transfer which the Directors may decline to register shall be returned to the person depositing the same. 19.4 Transferor deemed to be holder ?? The transferor shall be deemed to be the holder of such shares until the name of the transferee shall have entered in the Register of Members in respect thereof. Before the registration of a transfer, the certificate or certificates of the shares must be delivered to the Company along with Transfer Deed. 19.5 No transfer to insolvent etc. ? No transfer shall be made to a person of unsound mind or to an insolvent.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	20	<ul style="list-style-type: none"> <li>20 Closure of Register of Members/Debenture holders ? The Directors shall have power, on giving not less than seven days? previous notice as required by Section 91 of the Act, to close the Register of Transfer, Register of Members or Register of Debenture holders or the register of other security holders of the Company for any period or periods not exceeding in the aggregate forty-five days in each year (but not exceeding thirty days at any one time) as they may determine.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	21	<ul style="list-style-type: none"> <li>21. Nomination by shareholder ? Every share-holder or debenture holder may at any time, nominate in the prescribed manner, a person to whom his shares or debenture shall vest in the event of his death, as provided in Section 72 of the Act.</li> </ul>

<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>22</p>	<ul style="list-style-type: none"> <li>• 22 Title to shares of deceased holder ?????????????????? In the event there is no nomination, the executors or administrators of a deceased Member or the holder of a Succession Certificate in respect of the shares of a deceased Member (not being one of two or more joint holders) shall be the only persons whom the Company will be bound to recognize as having any title to the shares registered in the name of such Member, and the Company shall not be bound to recognize such executors or administrators or holders unless such executors, administrators or holders shall have first obtained probate or Letters of Administration or Succession Certificate as the case may be, from a duly constituted Court in India. PROVIDED that the Directors may, at their absolute discretion dispense with production of Probate, Letters of Administration or Succession Certificate upon such terms as to indemnity or otherwise as they think fit and may enter the name of the person who claims to be absolutely entitled to the shares standing in the name of a deceased Member, as a Member</li> </ul>
			<p><b>Transmission of shares</b></p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>23</p>	<ul style="list-style-type: none"> <li>• 23 Transmission of Shares ?? Subject to the provisions of the Act, any person becoming entitled to any share in consequence of the death, lunacy or insolvency of any Member or by any lawful means other than by a transfer in accordance with these Articles, may, with the consent of the Directors (which they shall be under no obligation to give) and upon producing such evidence that he sustains the character in respect of which he proposes to act under this. Article or of his title as the Directors may require, and upon such indemnity as the Directors may require, either be registered as a Member in respect of such shares or elect to have some person nominated by him and approved by the Directors registered as a Member in respect of such shares. PROVIDED that if such persons shall elect to have his nominee registered, he shall testify his election by executing in favor of his nominee an instrument of transfer in accordance with these Articles, and until he does so he shall not be freed from any liability in respect of such shares.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>24</p>	<ul style="list-style-type: none"> <li>• 24 Right of Board to decline or suspend registration (i) Any person becoming entitled to a share in consequence of the death or insolvency of a member may, upon such evidence being produced as may from time to time properly be required by the Board and subject as hereinafter provided, elect, either -- (a) to be registered himself as holder of the share; or (b) to make such transfer of the share as the deceased or insolvent member could have made. (ii) The Board shall, in either case, have the same right to decline or suspend registration as it would have had, if the deceased or insolvent member had transferred the share before his death or insolvency.?????</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>		<ul style="list-style-type: none"> <li>• 25 The Company not liable for disregard of notice prohibiting registration of transfer ? The Company shall incur no liability or responsibility whatever in consequence of its registering or giving effect to any transfer of shares made or purported to be made by any apparent legal owner thereof (as shown or appearing in register of Members) to the prejudice of persons having or claiming any equitable right, title or interest to or in the same shares, notwithstanding that the Company may have had notice of such</li> </ul>

		25	equitable right, title or interest or notice prohibiting registration of such transfer, and may have entered such notice or referred to it in any book, or attended or given effect to any notice which may have been given to it of any equitable right, title or interest or be under any liability whatsoever for refusing or neglecting so to do though it may have been entered or referred to in some book of the Company, but the Company shall nevertheless be at liberty to regard and attend to any such notice and give effect thereto, if the Directors shall so think fit.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	26	<ul style="list-style-type: none"> <li>26 Rights of successors ? A person becoming entitled to a share by reason of the death or insolvency of the holder shall be entitled to the same dividends and other advantages to which he would have been entitled if he were the registered holder of the shares, except that he shall not, before being registered as a Member in respect of the shares, be entitled to exercise any right conferred by membership in relation to meetings of the Company. PROVIDED that the Directors shall, at any time, give notice requiring any such person to elect to be registered himself or to transfer the shares, and if the notice is not complied within ninety days from the date of issue of the notice, the Directors may thereafter withhold payment of all dividends, bonuses or other moneys payable in respect of the shares until the requirements of the notice have been complied with.</li> </ul>
<input checked="" type="checkbox"/>	<input type="checkbox"/>	27	In case of a One Person Company?
			<b>Forfeiture of shares</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	28	<ul style="list-style-type: none"> <li>28.1 If money payable on shares not paid notice to be given to members If any Member fails to pay any call, or installment of a call, on or before the day appointed for the payment of the same or any such extension thereof as aforesaid, the Board may, at any time thereafter, during such time as any part of the call or installment remains unpaid, serve a notice on him requiring him to pay the same together with any interest which may have accrued and all expenses that may have been incurred by the Company by reason of such non-payment. 28.2 Contents of Notice The notice shall name a further day (not being less than fourteen days from the date of the service of notice) and a place or places on and at which such call or installment and such interest thereon at such rate as the Directors shall determine from the day on which such call or installment ought to have been paid and expenses as aforesaid are to be paid. The notice shall also state that in the event of the non-payment on or before the day, at or before the time and at the place appointed, the shares in respect of which the call was made or installment is payable, shall be liable to be forfeited.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	29	<ul style="list-style-type: none"> <li>29.1 In default of payment, shares to be Forfeited If the requirement of any such notice as aforesaid are not complied with, every or any share in respect of which such notice has been given may, at any time thereafter, but before payment of all calls or installments, interest and expenses due in respect thereof, be forfeited by a resolution of the Board to that effect. Such forfeiture shall include all dividends declared or any other moneys payable in respect of the aforesaid share and not actually paid before the</li> </ul>

			forfeiture. In default of payment, shares to be Forfeited
<input type="checkbox"/>	<input checked="" type="checkbox"/>	30	<ul style="list-style-type: none"> <li>30 Notice of forfeiture to a Member When any share shall have been so forfeited, notice of the forfeiture shall be given to the Member in whose name it stood immediately prior to the forfeiture, and an entry of the forfeiture, with the date thereof, shall forthwith be made in the Register of Members, but no forfeiture shall be in any manner invalid by any omission or neglect to make any such entry as aforesaid in the Register.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	31	<ul style="list-style-type: none"> <li>31 Forfeited share to be property of the Company and may be sold etc. Any share so forfeited shall be deemed to be the property of the Company, and may be sold, re-allotted, or otherwise disposed of, either to the original holder thereof or to any person, upon such terms and in such manner as the Board shall think fit.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	32	<ul style="list-style-type: none"> <li>32.1 Member still liable to pay calls owing at the time of forfeiture and interest Any members whose shares have been forfeited shall notwithstanding the forfeiture be liable to pay and shall forthwith pay to the Company, on demand, all calls, installment, interest and expenses owing upon or in respect of such shares at the time of the forfeiture together with interest accrued thereon at the time of the forfeiture at such rate as the Board may determine, and the Board may enforce the payment thereof, if it thinks fit.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	33	<ul style="list-style-type: none"> <li>33.1 Effect of forfeiture The forfeiture of a share shall involve extinction, at the time of the forfeiture, of all interest in and all claims and demands against the Company, in respect of the share and all other rights incidental to the share, except only such of those rights as by these Articles are expressly saved. 33.2 Evidence of forfeiture A declaration in writing by Chairman or Managing Director of the Company or by any person duly authorised in this regard that certain shares in the Company have been duly forfeited on a date stated in the declaration, shall be conclusive evidence of the facts therein stated as against all persons claiming to be entitled to the shares and such declaration, and the receipt of the Company for the consideration, if any, given for the shares on the sale or disposition thereof shall constitute a good title to such shares and the person to whom the shares are sold shall be registered as the holder of such shares and shall not be bound to see as to the application of the purchase money nor shall his title to such shares be affected by any irregularity or invalidity in the proceedings in reference to such forfeiture, sale or disposition. 33.3 Validity of sale under Articles of forfeited shares Upon any sale after forfeiture or for enforcing a lien in purported exercise of the powers herein before given, the board may appoint some person to execute an instrument of transfer of the shares sold and cause the purchaser's name to be entered in the Register of Members in respect of the shares sold, and the purchaser shall not be bound to see the regularity of the proceedings, or to the application of the purchase money, and after his name has been entered in the Register in respect of such shares the validity of the sale shall not be impeached by any person and the remedy of any person aggrieved by the sale shall be in damages only and against the Company exclusively. 33.4 Cancellation of Share Certificates in respect of forfeited shares Upon any sale, re-allotment or other disposal under the provisions of the preceding Articles, the certificate or</li> </ul>

			certificates originally issued in respect of the relative shares shall (unless the same shall on demand by the Company have been (previously) surrendered to it by the defaulting member) stand cancelled and become null and void and of no effect, and the Directors shall be entitled to issue a duplicate certificate or certificates in respect of the said shares to the person or persons entitled thereto. ?
<input type="checkbox"/>	<input checked="" type="checkbox"/>	34	<ul style="list-style-type: none"> <li>• 34 Power to annul forfeiture The Board may at any time before any share so forfeited, shall have been sold, re-allotted or otherwise disposed of, annul the forfeiture thereof upon such terms and conditions as it thinks fit.</li> </ul>
			<b>Alteration of capital</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	35	<ul style="list-style-type: none"> <li>• 35.1 Alteration of Share Capital The company may, from time to time, by ordinary resolution increase the share capital by such sum, to be divided into shares of such amount, as may be specified in the resolution. ? Subject to the provisions of section 61, the company may, by ordinary resolution, the Company may from time to time:-- ? (a) consolidate and divide all or any of its share capital into shares of larger amount than its existing shares; ? (b) convert all or any of its fully paid-up shares into stock, and reconvert that stock into fully paid-up shares of any denomination; ? (c) Sub-divide its shares, or any of them into shares of smaller amount than is fixed by the memorandum, so, however, that in the sub-division the proportion between the amount paid and the amount, if any, unpaid on each reduced share shall be the same as it was in the case of the share from which the reduced share is derived.; ? (d) Cancel any shares which as the date of the passing of the resolution, have not been taken or agreed to be taken by any person and diminish the amount of its share capital by the amount of the shares so cancelled. ? The resolution whereby any share is sub-divided may determine that, as between the holders of the shares resulting from such sub-division, one or more of such shares shall have some preference or special advantage as regards dividend, capital, voting or otherwise over or as compared with the others or other, subject, to the provisions of the Act. ? Subject to the provisions of Sections 66 of the Act, the Board may accept from any member the surrender on such terms and conditions as shall be agreed of all or any of his shares. ? The company may, by special resolution, reduce in any manner and with, and subject to, any incident authorised and consent required by law, -- (a) its share capital; (b) any capital redemption reserve account; or (c) any share premium account.</li> </ul>
<input checked="" type="checkbox"/>	<input type="checkbox"/>	36	<ul style="list-style-type: none"> <li>• Subject to the provisions of section 61, the company may, by ordinary resolution,?</li> <li>• consolidate and divide all or any of its share capital into shares of larger amount than its existing shares;</li> <li>• convert all or any of its fully paid-up shares into stock, and reconvert that stock into fully paid-up shares of any denomination;</li> <li>• sub-divide its existing shares or any of them into shares of smaller amount than is fixed by the memorandum;</li> <li>• cancel any shares which, at the date of the passing of the resolution, have not been taken or agreed to be taken by any person.</li> </ul>

<input checked="" type="checkbox"/>	<input type="checkbox"/>	37	<ul style="list-style-type: none"> <li>• Where shares are converted into stock,?</li> <li>• the holders of stock may transfer the same or any part thereof in the same manner as, and subject to the same regulations under which, the shares from which the stock arose might before the conversion have been transferred, or as near thereto as circumstances admit:</li> <li>• Provided that the Board may, from time to time, fix the minimum amount of stock transferable, so, however, that such minimum shall not exceed the nominal amount of the shares from which the stock arose.</li> <li>• the holders of stock shall, according to the amount of stock held by them, have the same rights, privileges and advantages as regards dividends, voting at meetings of the company, and other matters, as if they held the shares from which the stock arose; but no such privilege or advantage (except participation in the dividends and profits of the company and in the assets on winding up) shall be conferred by an amount of stock which would not, if existing in shares, have conferred that privilege or advantage.</li> <li>• such of the regulations of the company as are applicable to paid-up shares shall apply to stock and the words "share" and "shareholder" in those regulations shall include "stock" and "stock-holder" respectively.</li> </ul>
<input checked="" type="checkbox"/>	<input type="checkbox"/>	38	<ul style="list-style-type: none"> <li>• The company may, by special resolution, reduce in any manner and with, and subject to, any incident authorised and consent required by law, ?</li> <li>• it share capital;</li> <li>• any capital redemption reserve account; or</li> <li>• any share premium account.</li> </ul>
			<b>Capitalisation of profits</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>		<ul style="list-style-type: none"> <li>• 39.1 Capitalization of Profits (1) Any General Meeting of the Company may resolve that any amounts standing to the credit of the Free Reserve or Share Premium Account or the Capital Redemption Reserve Account or any moneys, investment or other assets forming part of the undivided profits including profits or surplus moneys arising from the realization and (when permitted by the law) from the appreciation in value of any capital assets of the Company standing to the credit of the General Reserve or any other Reserve or Reserve Fund or any other Fund of the Company or in the hands of the Company and available for dividend be capitalized:- ? (a) by the issue and distribution of shares, as fully paid-up, and to the extent permitted by the Act, debentures, debenture stock, bonds or other obligations of the Company ; or ? (b) by crediting share of the Company, which may have been issued and are not fully paid-up, with the whole or any part of the sum remaining unpaid thereon; ? PROVIDED that any amounts standing to the credit of the Share Premium Account or the Capital Redemption Reserve Account shall be applied only in crediting the payment of capital on shares to be issued to Members as fully paid bonus shares (Further capitalization of reserve created by the revaluation of assets are not to be used for issuance of Bonus Shares as per section 63 of the Act). ? (2) Such issue and distribution under sub-clause (1) (a) of this Article and payment to the credit of unpaid share capital under sub-clause (1) (b) of this Article shall be made among and in favour of the Members or any class of them or any of them entitled thereto and in accordance with their</li> </ul>

	39	<p>respective rights and interests and in proportion to the amount of capital paid-up on the shares held by them respectively in respect of which such distribution or payment shall be made, on the footing that such Members become entitled thereto as capital. ? (3) The Directors shall give effect to any such resolution and for the said purpose the Board may settle any difficulty which may arise in regard to distribution as it thinks expedient including in regard to fractional entitlements, and shall apply such profits, General Reserve, other Reserve or any other Fund or account as aforesaid as may be required for the purpose of making payment in full on the shares, or other obligations of the Company so distributed under sub clause (1) (a) of this Article or (as the case may be) for the purpose of paying, in whole or in part, the amount remaining unpaid on the shares which may have been issued and are not fully paid-up under sub-clause (1)(b) above. ? PROVIDED that no such distribution or payment shall be made unless recommended by the Directors, and, if so recommended, such distribution and payment shall be accepted by such Members as aforesaid in full satisfaction of their interest in the said capitalized fund. ? (4) For the purpose of giving effect to any such resolution, the Directors may settle any difficulty which may arise in regard to the distribution or payment as aforesaid as they think expedient, and, in particular, they may issue fractional certificates and may fix the value for distribution of any specific asset and may determine that any cash payment be made to any Members on the footing of the value so fixed and may vest any such cash, shares, debentures stock, bonds or other obligations in trustees upon such trusts for the persons entitled thereto as may seem expedient to the directors, and generally may make arrangement for the acceptance, allotment and sale of such shares, debentures, debentures stock, bonds or other obligations and fractional certificates or otherwise as they may think fit. ? (5) When deemed requisite, a proper contract shall be filed in accordance with the Act and the Board may appoint any person to sign such contract on behalf of the Members entitled as aforesaid.</p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<ul style="list-style-type: none"> <li>40 Subject to the provisions of the Act and these Articles, in cases where some of the shares of the Company are fully paid and others are partly paid, such capitalization may be effected by the distribution of further shares in respect of the fully paid shares and by crediting the partly paid shares with the whole or part of the unpaid liability thereon, but so that as between the holders of the fully paid shares and the partly paid shares, the sums so applied in the payment of such further shares and in the extinguishment or diminution of the liability on the partly paid shares shall be applied pro rata in proportion to the amount then already paid or credited as paid on the existing fully paid and partly paid shares respectively. ??</li> </ul>
	40	
		<p><b>Buy-back of shares</b></p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<ul style="list-style-type: none"> <li>41 Buy Back of Shares Notwithstanding anything contained in these articles but subject to the provisions of sections 68 to 70 and any other applicable provision of the Act or any other law for the time being in force, the company may purchase its own shares or other specified securities.?????</li> </ul>
	41	

			<i>General meetings</i>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	42	<ul style="list-style-type: none"> <li>42.1 Annual General Meeting The Company shall in each year hold a General Meeting as its Annual General Meeting in addition to any other meeting in that year. All General Meetings other than Annual General Meetings shall be called Extraordinary General Meetings. If for any reason beyond the control of the Board, the general meeting (including an Annual General meeting) cannot be held on the appointed day, the Board shall have power to postpone the General meeting of which a notice should be given to the members. Every member of the Company shall be entitled to attend either in person or by proxy and the Auditor of the Company shall have the right to attend and to be heard at any General Meeting which he attends on any part of the business which concerns him as Auditor. 42.2 Extraordinary General Meeting The Board may, whenever it thinks fit, call an Extraordinary General Meeting of the Company. The Board? shall at the? requisition in writing by a Member or Members holding in the aggregate not less than one-tenth of such of the paid-up capital of the company on that date and carries the right of voting in regard to the matter in respect of which the requisition has been made. 42.3 Requisition of Members to state object of Meeting Any valid requisition so made by Members must state the object or objects of the meeting proposed to be called, and must be signed by the requisitionists and deposited at the registered office of the company. PROVIDED that such requisition may consist of several documents in like form, each signed by one or more requisitionists.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	43	<ul style="list-style-type: none"> <li>43.1 On receipt of requisition Directors to call meeting and in default requisitionists may do so Upon the receipt of any such requisition, the Board shall forthwith call an Extraordinary General Meeting, and if they do not proceed within twenty-one days from the date of the requisition being deposited at the Registered Office to cause a meeting to be called on a day not later than forty-five days from the date of deposit of the requisition, the requisitionists, or such of their number as represent either a majority in value of the paid-up share capital held by all of them or one-tenth of such of the paid-up share capital of the Company as is referred to in Section 100(2) of the Act, whichever is less, may themselves call the meeting, but in either case, any meeting so called shall be held within three months from the date of the deposit of the requisition, as aforesaid. 43.2 Meeting called by requisitionists Any meeting called under the foregoing Articles by the requisitionists shall be called in the same manner, as nearly as possible, as that in which meetings are to be called by the Board. 43.3 Twenty-one days? notice of meeting to be given A general meeting of a Company may be called by giving not less than clear twenty-one days? notice either in writing or through electronic mode in such a manner as may be prescribed, Every notice of a meeting shall specify the place, date, day and the hour of meeting, and shall contain statement of the business to be transacted at such meeting. And, The notice of every meeting shall be given to every member of the Company, Legal Representative of any deceased member or the assignee of an insolvent member, auditor or auditors of the Company and every director of the Company and all such persons as are under these Articles entitled to receive notice from the Company ? "Provided that a general meeting may be called after giving shorter notice than that specified in this sub-section if consent, in writing or</li> </ul>

			by electronic mode, is accorded thereto ?? (i) in the case of an annual general meeting, by not less than ninety-five per cent. of the members entitled to vote thereat; and (ii) in the case of any other general meeting, by members of the company? (a) holding, if the company has a share capital, majority in number of members entitled to vote and who represent not less than ninety-five per cent. of such part of the paid-up share capital of the company as gives a right to vote at the meeting; or (b) having, if the company has no share capital, not less than ninety-five per cent. of the total voting power exercisable at that meeting: ? Provided further that where any member of a company is entitled to vote only on some resolution or resolutions to be moved at a meeting and not on the others, those members shall be taken into account for the purposes of this sub-section in respect of the former resolution or resolutions and not in respect of the latter."
			<b><i>Proceedings at general meetings</i></b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	44	
<input type="checkbox"/>	<input checked="" type="checkbox"/>	45	<ul style="list-style-type: none"> <li>45.1 Chairman of General Meeting The Chairman of the Board shall be entitled to take the Chair at every General Meeting whether Annual or Extraordinary. If at any meeting the Chairman is not present within fifteen minutes of the time appointed for holding such meeting or he has informed that he shall be unable or unwilling to take the Chair then any one of directors with mutual consent shall so preside at the meeting. If no Director be present or if all the Directors present decline to take the Chair, then the Members present shall elect one of the members to be the Chairman of the Meeting</li> <li>45.2 No Business whilst chair vacant No business shall be discussed at any General Meeting except the election of a Chairman, whilst the Chair is vacant.</li> <li>45.3 Chairman with consent may adjourn meeting The Chairman, with the consent of the Members, may adjourn any meeting from time to time and from place to place within the city, town or village in which the Registered Office of the Company is situated, but no business shall be transacted at any adjourned meeting other than the business left unfinished at the meeting from which the adjournment took place. Notwithstanding, the provision as above in the event of disorder at a validly convened meeting the Chairman may adjourn the meeting provided that such an adjournment shall not be a longer period than the Chairman considers necessary to being order at the meeting and Chairman communicates his decision to those present in so far as it is possible.</li> <li>45.4 Questions at General Meeting how Decided Every question submitted to a meeting shall be decided in the first instance unless a poll is demanded, on a show of hands. Before or on the declaration of the result of the voting on any resolution on a show of hands, a poll may be ordered to be taken by the Chairman of the meeting on his own motion and shall be ordered to be taken by him on a demand made in that behalf by any member or members present in person or by proxy, and holding shares in the Company, which confer a power to vote on the resolution not being less than one-tenth of the total voting power in respect of the Resolution or on which an aggregate sum of not less than five lakh rupees has been paid up. The demand for a poll may be withdrawn at any time by the person or persons making the demand. Unless a poll is so demanded, a declaration by the Chairman that a resolution has, on show of hands, been carried</li> </ul>

		<p>through unanimously or by a particular majority or lost and an entry to that effect in the Minutes Book of the Company shall be conclusive evidence of the fact without proof of the number or proportion of the votes recorded in favour of or against the resolution. 45.5 Chairman's Casting Vote In the case of an equality of votes, the Chairman shall have a casting vote in addition to the vote or votes to which he may be entitled otherwise.</p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>46</p> <ul style="list-style-type: none"> <li>46.1 Poll to be taken, if demanded If a poll is demanded as aforesaid, the same shall be taken at such time (not later than forty-eight hours from the time when the demand was made) and place in the city or town in which the Registered office of the Company is for the time being situated, as the Chairman shall direct, either at once or after an interval or adjournment and the result of the poll shall be deemed to be the resolution of the meeting. 46.2 In which case poll taken without Adjournment Any poll duly demanded on the election of the Chairman of a meeting or on any question of adjournment shall be taken at the meeting forthwith. 46.3 Demand for poll not to prevent transaction of other business ? The demand for a poll except on the questions of the election of the Chairman and of an adjournment shall not prevent the continuance of a meeting for the transaction of any business other than the question on which the poll has been demanded.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>47</p> <ul style="list-style-type: none"> <li>47.1 Minutes of General Meetings (a) The Company shall cause minutes of the proceedings of every General Meeting or every resolution passed by postal ballot to be kept by making within thirty days of the conclusion of every such meeting concerned, record thereof kept with Minute Book for that purpose with their pages consecutively numbered. (b) Each page of every such book shall be initialed or signed and the last page of the record of proceedings of each meeting in such book shall be dated and signed by the Chairman of the same meeting within the aforesaid period of thirty days or in the event of the death or inability of that Chairman within that period, by a Director duly authorised by the Board for the purpose. (c) In no case the minutes of proceedings of a meeting shall be attached to any such book as aforesaid by pasting or otherwise. (d) The minutes of each meeting shall contain a fair and correct summary of the proceedings thereat. (e) All decisions taken and appointments of officers made at any meeting aforesaid shall be included in the minutes of the meeting. (f) Nothing herein contained shall require or be deemed to require the inclusion in any such minutes of any matter which in the opinion of the Chairman of the meeting (a) is or could reasonably be regarded as defamatory of any person, or (b) is irrelevant or immaterial to the proceedings, or (c) is detrimental to the interests of the Company. The Chairman of the meeting shall exercise an absolute discretion in regard to the inclusion or non-inclusion of any matter in the minutes on the aforesaid grounds. (g) Any such minutes shall be evidence of the proceedings recorded therein. Where the minutes have been kept in accordance with section then, until the contrary is proved, the meeting shall be deemed to have been duly called and held, all appointments of directors, key managerial personnel, auditors or company secretary in practice, shall be deemed to be valid. No document purporting to be a report of the proceedings of any general meeting of a company shall be circulated or advertised at the expense of the company, unless it includes the matters required to be contained in the</li> </ul>

			minutes of the proceedings of such meeting. The company shall observe secretarial standards with respect to general and Board meetings specified by the Institute of Company Secretaries of India constituted under section 3 of the Company Secretaries Act, 1980, and approved as such by the Central Government. ? (h) The book containing the minutes of the proceedings of any general meeting of the Company or of a resolution passed by postal ballot, shall be kept at the registered office of the Company and shall be open, during business hours, to the inspection by any member without any charge, for such period not being less than two hours in each business day are allowed for inspection. ?
<input checked="" type="checkbox"/>	<input type="checkbox"/>	48	In case of a One Person Company?
			<b>Adjournment of meeting</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	49	<ul style="list-style-type: none"> <li>49 Adjournment of Meeting (i) The Chairperson may, with the consent of any meeting at which a quorum is present, and shall, if so directed by the meeting, adjourn the meeting from time to time and from place to place. ? (ii) No business shall be transacted at any adjourned meeting other than the business left unfinished at the meeting from which the adjournment took place. ? (iii) When a meeting is adjourned for thirty days or more, notice of the adjourned meeting shall be given as in the case of an original meeting. ? (iv) Save as aforesaid, and as provided in section 103 of the Act, it shall not be necessary to give any notice of an adjournment or of the business to be transacted at an adjourned meeting.</li> </ul>
			<b>Voting rights</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	50	<ul style="list-style-type: none"> <li>50.1 Members in arrears not to vote No member shall be entitled to vote either personally or by proxy at any General Meeting or Meeting of a class of shareholders either upon a show of hands or upon a poll in respect of any shares registered in his name on which any calls or other sums presently payable by him have not been paid or in regard to which the Company has exercised any right of lien. ? 50.2 Number of votes to which Member Entitled Subject to the provisions of these Articles and without prejudice to any special privileges or restrictions as to voting for the time being attached to any class of shares for the time being forming part of the capital of the Company, every Member shall be entitled to be present, and to speak and vote at such meeting by show of hand for which the Member present in person shall have one vote. On a poll taken at a meeting of a company, a member entitled to more than one vote, or his proxy, need not to use all his votes or cast in the same way all the votes he uses.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	51	<ul style="list-style-type: none"> <li>51 Vote of Member who is a minor If any shareholder be a minor, the vote in respect of his share or shares shall be by his guardian, or any one of his guardians, if more than one, to be selected in case of dispute by the Chairman of the meeting.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	52	<ul style="list-style-type: none"> <li>52 Votes of Joint Members If there be joint registered holders of any shares, the vote of the senior who tenders a vote, whether in person or by proxy, shall be accepted to the exclusion of the votes</li> </ul>

			of the other joint holders. For this purpose, seniority shall be determined by the order in which the names stand in the register of members.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	53	<ul style="list-style-type: none"> <li>53 Voting in person or by proxy or Representative Subject to the provisions of these Articles, votes may be given either personally or by proxy. A body corporate being a Member may vote either by proxy or by a representative duly authorised in accordance with Section 113 of the Act and such representative shall be entitled to exercise the same rights and powers (including the right to vote by proxy) and by postal ballot, on behalf of the body corporate which he represents as that body could exercise if it were an individual Member of the Company.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>		
<input type="checkbox"/>	<input checked="" type="checkbox"/>	54	<ul style="list-style-type: none"> <li>54.1 Votes in respect of shares of Deceased Any person entitled under the Transmission Clause to transfer any shares may vote at any General Meeting in respect thereof in the same manner as if he were the registered holder of such shares. PROVIDED that forty-eight hours at least before the time of holding the meeting or adjourned meeting, as the case may be, at which he proposes to vote he shall satisfy the Chairman of his right to transfer such shares and give such indemnity (if any) as the Chairman may require or the Chairman shall have previously admitted his right to vote at such meeting in respect thereof. 54.2 Time for objection to vote No objection shall be made to the validity of any vote, except at the meeting or poll at which such vote was tendered, and every vote whether given personally or by proxy, not disallowed at such meeting or poll, shall be deemed valid for purposes of such meeting or poll whatsoever. 54.3 Chairman of the meeting to be the judge of the validity of any Vote ? The Chairman of any meeting shall be the sole judge of the validity of every vote tendered at such meeting. The Chairman present at the taking of a poll shall be the sole judge of the validity of every vote tendered at such poll.</li> </ul>
<input checked="" type="checkbox"/>	<input type="checkbox"/>		
<input checked="" type="checkbox"/>	<input type="checkbox"/>	55	No member shall be entitled to vote at any general meeting unless all calls or other sums presently payable by him in respect of shares in the company have been paid
<input checked="" type="checkbox"/>	<input type="checkbox"/>	56	<ul style="list-style-type: none"> <li>i. No objection shall be raised to the qualification of any voter except at the meeting or adjourned meeting at which the vote objected to is given or tendered, and every vote not disallowed at such meeting shall be valid for all purposes.</li> <li>ii. Any such objection made in due time shall be referred to the Chairperson of the meeting, whose decision shall be final and conclusive.</li> </ul>
<input type="checkbox"/>	<input type="checkbox"/>		
			<b>Proxy</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>		<ul style="list-style-type: none"> <li>57.1 Appointment of proxy A person can act as proxy on behalf of members not exceeding fifty and holding in the aggregate not more than ten percent of the total share capital of the company carrying voting rights: ? Provided that a member holding more than ten percent of the total share capital of the Company carrying voting rights may appoint a single person as proxy and such person shall not act as proxy for any other person or shareholder. ? Every proxy shall be appointed in writing under the hand of the Member or if such Member is a body corporate under the common seal of such corporation, or be signed by an appointer or his attorney duly</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>		

		57	authorised in writing. The proxy so appointed shall not have any right to speak at the meetings. 57.2 Deposit of instrument of Proxy etc. The instrument appointing a proxy and the power of attorney or other authority (if any), under which it is signed or a notarized copy of that power or authority, shall be deposited at the Registered Office of the Company not later than forty-eight hours before the time for holding the meeting at which the person named in the instrument proposes to vote, and in default, the instrument of proxy shall not be treated as valid. No instrument appointing a proxy shall be valid after the expiration of twelve months from the date of its execution.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	58	<ul style="list-style-type: none"> <li>58 Form of proxy An instrument appointing a proxy shall be in the form No. MGT-11 as prescribed in the rules made under section 105 of the Companies Act, 2013</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	59	<ul style="list-style-type: none"> <li>59.1 Proxy either for specified meeting or for a period An instrument of proxy may appoint a proxy either for the purpose of a particular meeting specified in the instrument and any adjournment thereof or it may appoint for the purpose of every meeting of the Company, or of every meeting to be held before a date specified in the instrument and every adjournment of any such meeting. 59.2 Validity of votes given by proxy notwithstanding death of Member A vote given in accordance with the terms of an instrument of proxy shall be valid, notwithstanding the previous death or insanity of the principal or the revocation of the proxy or of the authority under which the proxy was executed, or the transfer of the shares in respect of which the proxy is given. ? Provided that no intimation in writing of such death, insanity, revocation or transfer shall have been received by the company at its office before the commencement of the meeting or adjourned meeting at which the proxy is used.</li> </ul>
			<b>Board of Directors</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	60	
<input type="checkbox"/>	<input checked="" type="checkbox"/>		<ul style="list-style-type: none"> <li>61.1 Number and appointment of Directors The Board of Directors of the Company shall consist of not less than 3 but not more than 15 Directors. A Director shall not be required to hold any qualification shares in the Company. Notwithstanding anything to the contrary contained in these Articles, so long as any moneys remain owing by the Company to a Financial Institution or any other person by the Company or the Company has entered into any agreement or undertaking or arrangement (hereinafter refer as ? agreement?) with Bodies (like State Electricity Board/Nigam) or the Board of Directors have decided to seek nomination on the Board from the beneficiary state or any Financial Institution or PFC Consulting Limited or person holds Debentures in the Company by direct subscription or private placement, the Company may agree to grant to such Financial Institution, PFC Consulting Limited, person or other Bodies as a condition of such loan or subscription to Debenture or any other agreement or to a Debenture Trustee, the right to appoint from time to time any person or persons as Director or Directors of the Company, (which director or directors is /are hereinafter referred to as ?Nominee Director/s?), retiring or non-retiring, subject to and on such terms and conditions as the</li> </ul>

Company may agree with such Financial Institutions, PFC Consulting Limited, Person, other Bodies and/or Debenture Trustee. The Company shall have a right to remove from office Nominee Director(s) at the option of the Company in consultation with Financial Institutions, PFC Consulting Limited, Bodies, persons or Debenture Trustee. ? Such Nominee Director(s) shall not be required to hold any Share qualification in the Company. Also at the option of the Company such Nominee Director(s) shall not be liable to retirement by rotation of the Directors. Subject as aforesaid, the Nominee Director(s) shall be entitled to the same rights and privileges and be subject to the same obligations as any other Director of the Company. ? The Nominee Director(s) so appointed shall hold the said office only so long as moneys remain owing by the Company to the Financial Institution or so long as the Debenture Trustee hold debenture in the Company or operation of agreement and the Nominee Director/s so appointed in the exercise of the said person shall ipso facto vacate such office immediately the money owing by the Company to the Financial Institution, or on the Debenture Trustee ceasing to hold Debentures/ Shares on the satisfaction of liability of the Company arising out of any Guarantee furnished by the Financial Institutions or satisfactory completion of term of agreement with Bodies. ? The Nominee Director(s) appointed under this article shall be entitled to receive all notice of and attend all General meeting, Board Meeting and of the meetings of the Committee of which the Nominee Director(s) is/are member(s) as also the minutes of meetings. The financial institutions/Debenture Trustee/persons/bodies shall also be entitled to receive all such notice and minutes. ? The Company shall pay to the Nominee Director(s) sitting fees and expenses which other Director of the Company are entitled, but if any other fees, commission, remuneration in any form is payable to the Director of the Company the fees, commission, money and remuneration in relation to such Nominee Director(s) shall accrued to Debenture Trustee and same shall accordingly be paid by the Company directly to the debenture trustee. Any expenses that may incurred by the financial institution or such Nominee Director(s) in connection with their appointment or Directorship shall also be paid or reimbursed by the Company to the financial Institution or as the case may be to such Nominee Director(s). ? Provided that if any such Nominee Director(s) is/are an officer of the Financial Institution, the sitting fees in relation to such Nominee Director(s) shall also accrue to the Financial Institute and the same shall accordingly be paid by the Company directly to that Financial Institution. ? Provided further that if such Nominee Director(s) is/are an official of any of the Reserve Bank of India, the sitting fees in relation to such Nominee Director(s) shall also accrue to Financial Institution to whom he represents as Nominee Director from Reserve Bank of India and the same shall accordingly be paid by the Company directly to that Financial Institution. ? Provided also that in the event of the Nominee Director(s) being appointed as Whole Time Director(s) such Nominee Director(s) shall exercise such powers and duties as may be approved by the Lenders or Bodies in consultation with Board and have such rights as are usually exercised or available to a Whole Time Director, in management of the Borrower or Bodies and such Nominee Director(s) shall be entitled to receive such remuneration fees commission and moneys as may be approved by the Lenders or Bodies in consultation with Board. 61.2 Company may increase the number of Directors Subject to Section 149 of the Act, the Company may subject to special

		<p>resolution in General Meeting increase the maximum number of Directors. ? Further the Company may, subject to the provisions of Section 169 of the Act, by passing the ordinary resolution in the General Meeting of the members, may remove any Director before the expiration of his period of office and appoint another person in the place of director so removed. 61.3Appointment of Alternate Directors In accordance with Section 161 and other applicable provisions (if any) of the Act, the Board shall have power at any time and from time to time, to, appoint a person, not being a person holding any alternate directorship for any other Director in the Company, to act as an alternate director for a director (hereinafter called ?the original Director?) during his absence for a period of not less than three months from India. 61.4Directors? power to fill up casual Vacancies Casual vacancies among Directors may be filled by the Board of Directors at their meeting and any person so appointed shall hold the office as per the provision of section 161. 61.5 Appointment of Additional Director Subject to the provisions of Section 161 and other applicable provisions (if any) of the Act, the Board shall have power at any time and from time to time, to appoint a person as an Additional Director but so that the total number of Directors shall not at any time exceed the maximum number fixed by these Articles. The Additional Director so appointed shall retire from Office at next following Annual General Meeting but shall be eligible for election by the company at that meeting as a Director. 61.6 Directors may act notwithstanding any vacancy The continuing Directors may act notwithstanding any vacancy in their body, but if, and so long as their number is reduced below the minimum number fixed by Article 100 thereof, the continuing Directors may act for the purpose of increasing the number of Directors to that number, or of summoning a General Meeting for that purpose.</p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<ul style="list-style-type: none"> <li>62.1 Remuneration of Directors Subject to the provisions of the Act, the Chairman or Managing Director or any other functional Directors who is/are in the whole-time employment of the Company may be paid remuneration either by way of a monthly payment or at a specified percentage of the net profit of the Company or partly by one way and partly by the other, keeping in view the limiting provisions governing the Managerial remuneration under the provisions of the Act. ? Subject to the provisions of the Act, a Director, who is neither in the whole-time employment nor a Chairman cum Managing Director of the Company may be paid remuneration either:- ? (a) by way of monthly, quarterly or annual payment with the approval of the Central Government, or ? (b) by way of commission if the Company by a special resolution authorizes such payment; and ? The sitting fee payable to a Director (excluding Whole-time Director) for attending a meeting of the Board or Committee thereof shall be such sum as may be fixed by the Board provided that the same shall not exceed Rs. 1,00,000/- or such other sum as prescribed in the Act as amended from time to time. ? Travelling expenses incurred by Director going out on Company?s Business ? The Board may allow and pay to any Director who is not a bona-fide resident of the place where the Registered Office of the Company or where the meetings of the Board are actually held and who has to come to such place for the purpose of attending any meeting, such sum as the Board may consider fair compensation for travelling, boarding, lodging and other actual incidental expenses, in addition to his fee for</li> </ul>

62

		<p>attending such meeting as specified above. If any Director be called upon to go or reside out of the bonafide place of his residence on the Company's business, he shall be entitled to be paid and reimbursed any travelling or other actual expenses incurred by him in connection with the business of the Company.</p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>63</p> <ul style="list-style-type: none"> <li>63.1 When office of Directors to become Vacant Subject to Section 167 of the Act, the office of a Director shall become vacant if:- (a) he incurs any of the disqualifications specified in section 164 under the act; (b) he absents himself from all the meetings of the Board of Directors held during a period of twelve months with or without seeking leave of absence of the Board; (c) he acts in contravention of the provisions of entering into contracts or arrangements in which he is directly or indirectly interested; (d) he fails to disclose his interest in any contract or arrangement in which he is directly or indirectly interested; (e) he becomes disqualified by an order of a court or the Tribunal; (f) he is convicted by a court of any offence, whether involving moral turpitude or otherwise and sentenced in respect thereof to imprisonment for not less than six months: Provided that the office shall be vacated by the director even if he has filed an appeal against the order of such court; (g) he is removed in pursuance of the provisions of this Act; (h) he, having been appointed a director by virtue of his holding any office or other employment in the holding, subsidiary or associate company, ceases to hold such office or other employment in that company.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>64</p> <ul style="list-style-type: none"> <li>64.1 Directors may contract with Company Except with the consent of the Board of Directors given by a resolution at a meeting of the Board and subject to such conditions, the company shall not enter into any contract or arrangement with a related party with respect to (a) sale, purchase or supply of any goods or materials; (b) selling or otherwise disposing of, or buying, property of any kind; (c) leasing of property of any kind; (d) availing or rendering of any services; (e) appointment of any agent for purchase or sale of goods, materials, services or property; (f) such related party's appointment to any office or place of profit in the company, its subsidiary company or associate company; (g) underwriting the subscription of any securities or derivatives thereof, of the company. Every contract or arrangement entered as related party transaction shall be referred in the Board's report to the shareholders along with the justification for entering into such contract or arrangement.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>65</p> <ul style="list-style-type: none"> <li>65.1 Disclosure of interest by Directors 1) Every Director of the Company, who is in any way, whether directly or indirectly, concerned or interested in a contract or arrangement, or proposed by Directors interested in a contract or arrangement, or proposed contract or arrangement entered into or to be entered into, by or on behalf of the Company, shall disclose the nature of his concern or interest at every financial year or whenever there is change in the disclosure of interest. (2) Nothing in sub-clause (1) of this Article shall apply to any contract or arrangement entered into or to be entered into between the Company and any other company, where any of the Directors of the Company or two or more of the Directors together holds or hold not more than two per cent of the paid-up share capital in the other company ? 65.2 Interested Directors not to participate or vote in Board's proceedings An interested director, who is in any way, whether by himself or through any of his</li> </ul>

	65	<p>relatives or firm, body corporate or other association of individuals in which he or any of his relatives is a partner, director or a member, interested in a contract or arrangement, or proposed contract or arrangement, entered into or to be entered into by or on behalf of a company, shall, take any part in the discussion of, or vote on any contract or arrangement entered into, or to be entered into, by or on behalf of the Company, if he is in any way, whether directly or indirectly, concerned or interested in such contract or arrangement, nor shall his presence count for the purpose of forming a quorum at the time of any such discussion or vote, and if he does vote, his vote shall be void. ? A contract or arrangement entered into by the company without disclosure or with participation by a director who is concerned or interested in any way, directly or indirectly, in the contract or arrangement, shall be voidable at the option of the company.</p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>66</p> <ul style="list-style-type: none"> <li>66.1 Register of Contracts in which Directors are interested The company shall keep registers in accordance with Section 189(1) giving separately the particulars of all contracts or arrangements to which to matter of disclosure of interest by directors and related party transaction applies, in such manner and containing such particulars as may be prescribed and after entering the particulars, such registers shall be placed before the next meeting of the Board and signed by all the directors present at the meeting and shall within thirty days of appointment make such disclosure as are necessary for the purpose of same. ? The Register shall be kept at the Registered office of the Company and shall be open to inspection at such office shall be open for inspection at such office during business hours and extracts may be taken there from, and copies thereof as may be required by any member of the company shall be furnished by the company to such extent, in such manner, and on payment of same fee as in the case of the Register of Members of the Company. 66.2 Director may be Director of companies promoted by the Company A Director may become a Director of any other company promoted by the Company, or in which it may be interested as a vendor, shareholder, or otherwise and no such Director shall be accountable for any benefits received as Director or shareholder of such a company except in so far as Section 188 of the Act may be applicable. ? 66.3 Register of Directors and key managerial personnel? and their Shareholding The Company shall keep at its registered office a Register containing such particulars of its Directors and key managerial personnel, Manager as may be prescribed under Section 170 of the Act and shall comply with the provisions of the said Section in all respects. The register shall include the details of securities held by each of them in the company or its holding, subsidiary, subsidiary of company?s holding company or associate companies.</li> </ul>
		<b>Proceedings of the Board</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>67</p> <ul style="list-style-type: none"> <li>67.1 Meetings of Directors The Directors may meet together as a Board for the dispatch of business from time to time, so that at least four such meetings shall be held in every year in such a manner that not more than one hundred and twenty days shall intervene between two consecutive meetings of the Board. The Directors may adjourn and regulate their meetings as they think fit. 67.2 Board may appoint Chairman All meetings of the Directors shall be presided over by the Chairman, if present, but if at any meeting of</li> </ul>

			the Directors, the Chairman is not present at the time appointed for holding the same then in that case the Directors shall choose one of the Directors present to preside over the meeting.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	68	
<input type="checkbox"/>	<input checked="" type="checkbox"/>	69	<ul style="list-style-type: none"> <li>69.1 Notice of Director?s Meeting A meeting of the Board shall be called by giving not less than seven days? notice in writing to every director at his address registered with the company and such notice shall be sent by hand delivery or by post or by electronic means. Board may be called at shorter notice to transact urgent business where at least one independent director, if any, shall be present. ? Every notice convening a meeting of the Board of Directors shall set out the agenda of the business to be transacted thereat in sufficient detail provided however that the meeting may consider any other business with the permission of the chair. 69.2 When meeting to be convened The Company Secretary or any director of the Company may, as and when directed by the Chairman to do so, convene a meeting of the Board by giving a notice in writing to every Director. 69.3 Quorum at Board Meeting No business shall be transacted at any Board meeting unless a quorum of Board of Director is present at the time when the meeting proceeds to business. Save as?? otherwise provided herein, the quorum for the Board meetings shall be as provided in section 174. 69.4 Questions at Board meetings how to be decided All questions arising at a Meeting of the Board or any committee thereof shall be decided by majority of votes of directors present and in case of equality of votes, the Chairperson shall have a second and casting vote.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	70	<ul style="list-style-type: none"> <li>70.1 Committee of Board Subject to the restrictions contained in Section 179, 180 and other applicable provisions of the Act and preceding Articles, the Board may delegate any of its powers to Committees of the Board consisting of such member or members of its body as it may think fit. ? PROVIDED that the Board may, from time to time, revoke, modify and discharge any such Committee of the Board either wholly or in part. Every Committee of the Board so formed shall in the exercise of the powers so delegated conform to any Policy/regulations that may, from time to time, be laid down by the Board. All acts done by any such Committee of the Board in conformity with such regulations and in fulfillment of the purposes of their appointment shall have the like force and effect as if done by the Board 70.2 Meeting of Committee how to be Governed The meetings and proceedings of any such Committee of the Board consisting of two or more members shall be governed by the provisions of the act and guidelines laid down for regulating the meetings and proceedings of the Directors, so far as the same are applicable thereto and are not superseded by any regulations made by Directors under the last preceding Article.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	71	<ul style="list-style-type: none"> <li>71 Resolution by circulation No resolution on matters shall be deemed to have been duly passed by the Board or by a Committee thereof by circulation, unless the resolution has been circulated in draft, together with the necessary papers, if any, to all the Directors, or? members of the Committee, as the case may be, at their addresses registered with the company in India by hand delivery or by post or by courier, or through such electronic means as may be prescribed and has been approved by a majority of the directors or</li> </ul>

			<p>members, who are entitled to vote on the resolution.? Resolution passed in such circulation shall be made part of the minutes of such meeting. ? Provided that, where not less than one-third of the total number of directors of the company for the time being require that any resolution under circulation must be decided at a meeting, the chairperson shall put the resolution to be decided at a meeting of the Board.</p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	72	<ul style="list-style-type: none"> <li>72 Defects in appointment of Directors not to invalidate actions taken All acts done by any meeting of the Board, or by a Committee of the Board, or by any person acting as a Director shall notwithstanding that it was subsequently noticed that there was some defect in the appointment of such Director or persons acting as aforesaid, or that they, or any of them, were disqualified or had vacated office or that the appointment of any of them had been terminated by virtue of any provisions contained in the Act or these Articles, be as valid as if every such person had been duly appointed and was qualified to be a Director and had not vacated his office or his appointment had not been terminated. ? PROVIDED that nothing in this Article shall be deemed to give validity to acts done by a Director after his appointment had been noticed by the Company to be invalid or to have terminated.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	73	<ul style="list-style-type: none"> <li>73.1 Minutes of proceedings of meetings of the Board (a) The Company shall cause minutes of all proceedings of every meeting of the Board and committee thereof to be kept by making within thirty days of the conclusion of every such meeting record thereof in Minute Book kept for that purpose with their pages consecutively numbered. ? (b) Each page of every such book shall be initialed or signed and the last page of the record of proceedings of each meeting in such book shall be dated and signed by the Chairman of the said meeting or the Chairman of the next succeeding meeting. ? The minute books of the Board and committee meetings shall be preserved permanently and kept in the custody of the company secretary of the company or any director duly authorized by the Board for the purpose and shall be kept in the registered office or such place as Board may decide. The minutes shall also contain:- ? (i) the names of the Directors present at the meeting; And ? (ii) in the case of each resolution passed at the meeting, the names of the Directors, if any, dissenting from, or not concurring with the resolution. ? Nothing? deemed to require the inclusion in any such minutes of any matter which, in the opinion of the Chairman of the meeting ? ? (i) is, or could reasonably be regarded as, defamatory of any person. ? (ii) is irrelevant or immaterial to the proceedings, or ? (iii) is detrimental to the interests of the Company. The Chairman shall exercise an absolute discretion in regard to the inclusion or non-inclusion of any matter in the minutes on the grounds specified in this sub-clause. ? (c) Minutes of meetings kept in accordance with the aforesaid provisions shall be evidence of the proceedings recorded therein.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>		<ul style="list-style-type: none"> <li>74.1 Powers of Board The Board may exercise all such powers of the Company and do all such acts and things as it is entitled to do under section 179 of the Act and rules made thereunder, or by the Memorandum or Articles of the Company but shall not decide matters required to be exercised or done by the Company in General Meeting, Subject to these Articles no regulation made by the Company in General Meeting shall invalidate any prior act of</li> </ul>

the Board which would have been valid if that regulation had not been so made. ? Certain powers of the Board Without prejudice to the general powers conferred by the Act and preceding Article and so as not in any way to limit or restrict those powers, and without prejudice to the other powers conferred by these Articles and by General Body, it is hereby declared that the Directors shall have the following powers, that is to say, power:- ? (1)? to pay and charge to the capital account of the Company any commission or interest lawfully payable there out under the provisions of Sections 40 of the Act; ? (2) Subject to Sections 179 and 180 of the Act, to purchase or otherwise acquire for the Company any property, rights or privileges which the Company is authorised to acquire, at or for such price or consideration and generally on such terms and conditions as they may think fit, and in any such purchase or other acquisition to accept such title as the Directors may believe or may be advised to be reasonably satisfactory; ? (3) At their discretion and subject to the provisions of the Act, to pay for any property, rights or privileges acquired by, or services rendered to, the Company either wholly or partially, in cash or in shares, bonds, debentures, mortgages, or other securities of the Company, and any such shares may be issued either as fully paid-up or with such amount credited as paid-up thereon as may be agreed upon, and any such bonds, debentures, mortgages or other securities may be either specially charged upon all or any part of the property of the Company and its uncalled capital or not so charged; ? (4) To secure the fulfillment of any contract or engagement entered into by the Company in the normal course of business, by mortgage or charge any of the property of the Company and its uncalled capital for the time being or in such manner as they may think fit; ? (5) To accept from any Member, as far as may be permissible by law, a surrender of his shares or any part thereof, on such terms and conditions as shall be agreed upon; ? (6) To appoint any person to accept and hold in trust for the Company any property belonging to the Company, in which it is interested, or for any other purposes and to execute and do all such deeds and things as may be required in relation to any such trust, and to provide for the remuneration of such trust or trustees; ? (7) To institute, conduct, defend, compound, or abandon any legal proceedings by or against the Company or its officers, or otherwise concerning the affairs of the Company, and also to compound and allow time for payment or satisfaction of any debts due and of any claim or demand by or against the Company and to refer any differences to arbitration, and observe and execute any awards made thereon; ? (8) To act on behalf of the Company in all matters relating to bankruptcy and insolvency; ? (9) To make and give receipts, releases, and other discharges for moneys payable to the Company and for the claims and demands of the Company; ? (10) Subject to applicable provisions of the Act, to invest and deal with any moneys of the Company not immediately required for the purposes thereof upon such security (not being shares of this Company), or without security and in such manner as they may think fit, and from time to time to vary or realise such investments. Save as provided in Section 187 of the Act, all investments shall be made and held in the Company?s own name; ? (11) To execute, in the name and on behalf of the Company, in favour of any Director or other person who may incur or going to incur any personal liability whether as principal or surety, for the benefit of the Company, such mortgages of the Company?s property (present and future) as they think fit, and any such mortgage may contain a power of sale and such other

74

powers, provisions covenants as shall be agreed upon; ? (12) To open account with any bank or banks and to determine from time to time who shall be entitled to sign, on the Company?s behalf bills, notes, receipts, acceptances, endorsements, cheques dividend warrants, releases, contracts and documents and to issue the necessary authority for such purpose; ? (13) To distribute by way of bonus or commission amongst the staff of the Company on the profits of any particular business or transaction, and to charge such bonus or commission as part of the working expense of the Company; ? (14) To provide for the welfare of employees or ex-employees of the Company and their families or connections of such persons, by building or contributing to the building of houses, dwellings or chawls, or by grants of money, pension, gratuities, allowances, bonus or other payments, or by creating, and from time to time subscribing or contributing to provident and other funds, associations, institutions or trusts and by providing or subscribing or contributing towards places of instrument and recreation, hospitals and dispensaries, medical and other attendance and other assistance as the Board shall think fit; and to subscribe or contribute or otherwise to assist or to guarantee money to charitable, benevolent, religious, scientific, national or other institutions or objects which shall have any moral or other claim to support or aid by the Company either by reason of locality of operation, or of public and general utility or otherwise; ? (15) Before recommending any dividend, to set aside out of the profits of the Company such sums as they may think proper for depreciation or to a Depreciation Fund, or to an Insurance Fund, or as a Reserve Fund or Sinking Fund or any Special Fund to meet contingencies or to repay debentures or debenture stock; or for special dividends or for equalizing dividends or for repairing, improving, extending and maintaining any of the property of the Company and for such other purposes (including the purposes referred to in the preceding clause), as the Board may, in their absolute? discretion, think conducive to the interest of the Company, and subject to Section 179 of the Act, to invest the several sums so set aside or so much thereof as required to be invested, upon such investments (other than shares of the Company) as they may think fit, and from time to time to deal with and vary such investments and dispose of and apply and expend all or any part thereof for the benefit of the Company, in such manner and for such purposes as the Board, in their absolute discretion, think conducive to the interest of the Company notwithstanding that the matters to which the Board apply or upon which they expend the same or any part thereof, may be matters to or upon which the capital moneys of the Company might rightly be applied or expended, and to divide the Reserve Fund or division or a reserve Fund to another Reserve Fund or division of a Reserve Fund and with full power to employ the assets constituting all or any of the above funds, including the Depreciation Fund, in the business of the Company or in the purchase or repayment of Debentures or debenture stock, and without being bound to keep the same separate from the other assets, and without being bound to pay interest on the same with power however to the Board at their discretion to pay or allow to the credit of such funds interest at such rate as the Board may think proper; ? (16) To appoint and at their discretion remove or suspend such officers such as Executive Director, general managers, managers, secretaries, assistants, supervisors, clerks, agents and servants etc. for permanent, temporary or special services as they may from time to time think fit, and to determine their powers and duties and fix their salaries or

emoluments or remunerations and to require security in such instances and to such amounts as they may think fit. And also from time to time to provide for the management and transaction of the affairs of the Company in any specified locality in India or abroad in such manner as they think fit, and the provisions contained in the following sub-clauses shall be without prejudice to the general powers conferred by this sub clause; ? (17) From time to time and at any time to establish any number of offices and establishment for properly managing the affairs of the Company in any specified locality in India or elsewhere and to appoint staff for such offices and to fix their remuneration; ? (18) Subject to the provisions of the Act, from time to time and at any time, to delegate to any such local Board, or any member or members thereof or any managers or agents so appointed or to any other person(s) any of the powers, authorities, and discretions for the time being vested in the Board, and to authorise the members for the time being of any such local Board, or any of them to fill up any vacancies, therein and to act notwithstanding vacancies and any such appointment or delegation under the preceding and this sub-clause may be made on such terms and subject to such conditions as the Board may think fit, and the Board may at any time remove any person so appointed, and may annul or vary any such delegation; ? (19) At any time and from time to time by Power of Attorney under the Seal of the Company, to appoint any person or persons to be the Attorney or Attorneys of the Company for such purposes and with such powers, authorities and discretions (not exceeding those vested in or exercisable by the Board under these presents and excluding the power to make calls and excluding also those which are to be exercised by the Board, in its Meetings) and for such period and subject to such conditions as the Board may from time to time think fit, and any such appointment may (if the Board thinks fit) be made in favour of the members or any of the members of any local Board, established as aforesaid or in favour of any company, or the shareholders, directors, nominees, or managers or any company or firm or otherwise in favour of any persons whether appointed by name or designation by the Board and any such Power of Attorney may contain such powers for the protection or convenience of such Attorney as the Board may think fit, and Board may specifically bestow powers enabling any such delegate or attorneys to sub-delegate all or any of the powers, authorities and discretions for the time being vested in them; ? (20) Subject to Sections 188 of the Act, for or in relation to any of the matters aforesaid or otherwise for the purposes of the Company, to enter into such negotiations and contracts and rescind and vary such contracts, and execute and do all such acts deeds and things in the name and on behalf of the Company as they may consider expedient; ? (21) From time to time to make vary and repeal bye-laws for the regulations of the business of the Company regulate employment of its officers and servants by making service Rules and Regulations; ? (22) Maintain proper records at places as per provisions of the Act and where the Company has a branch office, whether in or outside India, the Company shall be deemed to have complied with this Article if proper Books of Account relating to the transactions effected at the branch office are kept at the branch office and proper summarized returns, made up-to-date at intervals of not more than three months, are sent by the branch office to the Company at its Office or other place in India, at which the Company?s Books of Accounts are kept as aforesaid; ? (23) Ensure proper maintenance of the Books of Account which shall give a true and fair view of the state of

			the affairs of the Company or branch office, as the case may be, and explain its transactions. The Books of Account and other books and papers shall be open to inspection by any Director during business hours.
<input checked="" type="checkbox"/>	<input type="checkbox"/>	75	Save as otherwise expressly provided in the Act, a resolution in writing, signed by all the members of the Board or of a committee thereof, for the time being entitled to receive notice of a meeting of the Board or committee, shall be valid and effective as if it had been passed at a meeting of the Board or committee, duly convened and held.
<input checked="" type="checkbox"/>	<input type="checkbox"/>	76	<ul style="list-style-type: none"> <li>i. In case of a One Person Company?</li> <li>ii. where the company is having only one director, all the businesses to be transacted at the meeting of the Board shall be entered into minutes book maintained under section 118;</li> <li>iii. such minutes book shall be signed and dated by the director;</li> <li>iv. the resolution shall become effective from the date of signing such minutes by the director.</li> </ul>
			<b>Chief Executive Officer, Manager, Company Secretary or Chief Financial Officer</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	77	<ul style="list-style-type: none"> <li>• 77 CEO, MANAGER, CS AND CFO Subject to the provisions of the Act, -- ? (i) A chief executive officer, manager, company secretary or chief financial officer may be appointed by the Board for such term, at such remuneration and upon such conditions as it may think fit; and any chief executive officer, manager, company secretary or chief financial officer so appointed may be removed by means of a resolution of the Board; ? (ii) A director may be appointed as chief executive officer, manager, company secretary or chief financial officer ? As per provisions of the Act or these regulations requiring or authorising a thing to be done by or to a director and chief executive officer, manager, company secretary or chief financial officer shall not be satisfied by its being done by or to the same person acting both as director and as, or in place of, chief executive officer, manager, company secretary or chief financial officer.?</li> </ul>
<input checked="" type="checkbox"/>	<input type="checkbox"/>	78	A provision of the Act or these regulations requiring or authorising a thing to be done by or to a director and chief executive officer, manager, company secretary or chief financial officer shall not be satisfied by its being done by or to the same person acting both as director and as, or in place of, chief executive officer, manager, company secretary or chief financial officer.
			<b>The Seal</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	79	<ul style="list-style-type: none"> <li>• 79.1 The Seal its custody and use The Board shall provide a Common Seal for the purpose of the Company, and shall have power, from time to time, to destroy the same and substitute a new Seal in lieu thereof, and the Board shall provide for the safe custody of the Seal for the time being, and the seal shall never be used except on the authority of the Board or by Committee of the Board as authorised.' 79.2 Deeds how executed Every deed or other instrument, to which the Seal of the Company is required to be affixed, shall unless the same is executed by a duly constituted attorney issued under the seal; be signed by two Directors or one Director and Secretary or some other person authorised by the Board for the purpose: ? PROVIDED that in respect of the Share Certificate, the Seal shall be affixed in accordance with Article as</li> </ul>

mentioned? above.

**Dividends and Reserve**

<input type="checkbox"/>	<input checked="" type="checkbox"/>	80	<ul style="list-style-type: none"> <li>80.1 Division of profits and dividends in proportion to amount paid-up? (a) The profits of the Company, subject to any special rights relating thereto created or authorised to be created by these Articles and subject to the provisions of these Articles, shall be divisible among the Members in proportion to the amount of capital paid-up or credited as paid-up on the shares held by them. (b) All dividends shall be apportioned and paid proportionately to the amounts paid or credited as paid on the shares held during any portion or portions of the period in respect of which the dividend is paid, but if any share is issued on terms providing that it shall rank for dividend from a particular date, such share shall rank for dividend accordingly. 80.2 The Company in General Meeting may declare a dividend Company in General Meeting may declare dividends to be paid to Members according to their respective rights, but no dividends shall exceed the amount recommended by the Board, but the Company in General Meeting may declare a smaller dividend. 80.3 Dividends only to be paid out of Profits a) No dividend shall be declared or paid by the Company for any financial year except out of its profits for that year arrived at in the manner set out in Section 123 of the Act. (b) Where, owing to inadequacy or absence of profits in any financial year, any Company proposes to declare dividend out of the accumulated profits earned by it in previous years and transferred by the company to reserves, such declaration of dividend shall not be made except in accordance with such rules as may be made in that behalf. (c) No dividend shall be declared or paid by a company from its reserves other than free reserves. 80.4 Interim Dividend Subject to the provisions of Section 123, the Board may, from time to time, pay the Members such interim dividend as appear to it to be justified by the profits of the Company.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	81	<ul style="list-style-type: none"> <li>81.1 Capital paid - up in advance to carry Interest Where capital is paid in advance of calls such capital may carry interest but shall not in respect thereof confer a right to dividend or participate in profits.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	82	<ul style="list-style-type: none"> <li>82.1 Retention of dividends until completion of transfer The Board may retain the dividends payable on shares in terms of Section 126 in respect of which any person is entitled to become a Member, or on completion any person under those Articles is entitled to transfer, or until such person shall become a Member in respect of such shares or shall duly transfer the same. 82.2 Transfer of shares must be Registered A transfer of shares shall not pass the right to any dividend declared thereon before the registration of transfer.? Provided that where any instrument of transfer of shares has been delivered to the Company for registration and the transfer of such shares has not been registered by the Company, it shall, notwithstanding anything contained in any other provision of this Act ? a) transfer the dividend in relation to such shares to the Unpaid Dividend Account referred to in Section 124 of the Act unless the Company is authorised by the registered holder of such shares in writing to pay such dividend to the transferee specified in such instrument of transfer ;and ? (b) keep in abeyance in relation to such shares, any offer of rights shares under? clause (a) of sub-</li> </ul>

			section (1) of section 62 of the Act and any issue of fully paid-up bonus shares in pursuance of first proviso to sub-section (5) of section 123 of the Act.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	83	
<input type="checkbox"/>	<input checked="" type="checkbox"/>	84	<ul style="list-style-type: none"> <li>84.1 Dividends how remitted (1) Unless otherwise directed any dividend payable in cash may be paid by cheque or warrant or in any electronic mode or by a pay slip or receipt or in any other manner having the force of a cheque or warrant sent through the post to the registered address of the Member or person entitled or in case of joint holders to that one of them first named in the Register in respect of the joint holdings. Every such cheque or warrant shall be made payable to the order of the person to whom it is sent the Company shall not be liable or responsible for any cheque or warrant or pay slip or receipt lost in transmission, or for any dividend lost to the Member or person entitled thereto by the forged endorsement of any cheque or warrant or the forged signature of any pay slip or receipt or the fraudulent recovery of the dividend by any other means. ? (2) Notwithstanding anything contained in these Articles any dividend declared, may be paid by Electronic Clearing System through any Sponsor Bank, after getting registration with the Reserve Bank of India for using this facility and collecting from the members necessary bank mandate in the prescribed format.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	85	<ul style="list-style-type: none"> <li>85.1 Dividends and call together Any General Meeting declaring a dividend, may, on the recommendation of the Board, make a call on the Members of such amount as the meeting may fix, but so that the call on each Member shall not exceed the dividend payable to him and so that the call be made payable at the same time as the dividend, and the dividend may, if so arranged between the Company and the Member, be set off against the calls.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	86	<ul style="list-style-type: none"> <li>86 Unclaimed dividend No unclaimed dividend shall be forfeited and all unclaimed dividends shall be dealt with in accordance with the provisions of Section 124 and other applicable provisions of the Act.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	87	<ul style="list-style-type: none"> <li>87 No interest against Dividend No dividend shall bear interest against the company.</li> </ul>
<input checked="" type="checkbox"/>	<input type="checkbox"/>	88	No dividend shall bear interest against the company.
			<b>Accounts</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>		<ul style="list-style-type: none"> <li>89.1 Directors to keep true accounts (a) Every company shall prepare and keep at its? registered office including its branch office or offices or at such other place in India as the Board thinks fit, Books of Accounts and other relevant books and papers and financial statement for every financial year which give a true and fair view of the state of the affairs of the company in accordance with Section 128 of the Act with respect to- (i) all sums of money received and expended by the Company and the matters in respect of which the receipts and expenditure take place; ? (ii) all sales and purchases of goods by the Company; ? (iii) the assets and liabilities</li> </ul>

	89	<p>of the Company. ? (iv) state of affairs of the company. ? (b) Where the Board decides to keep all or any of the Books of Account at any place other than the Office of the Company, the Company shall within seven days of the decision file with the Registrar a Notice in writing giving the full address of that other place in accordance with Section 128 of the Act. ? (c) The company may keep such books of account or other relevant papers in electronic mode in such manner as may be prescribed. (d) The Company shall preserve in good order the Books of Account relating to a period of not less than eight financial years immediately preceding a financial year.? The books of account and other relevant books and papers maintained in electronic mode shall remain accessible in India so as to be usable for subsequent reference together with the vouchers relevant to any entry in such Books of Account. 89.2 Inspection of accounts or record by members No Member (not being a director) shall have any right of inspecting any account or books or documents of the Company except as conferred by Section 94 of the Act or authorised by the Board or by the company in general meeting. ? The Board may determine whether and to what extent and at what time and place and under what conditions or regulations the accounts and books of the Company or any of them may be open to inspection of the Members. Notwithstanding anything to the contrary contained hereinabove, the authorised representative of Promoters shall have a right to inspect the accounts books, plant, facility, documents, records, premises, equipment and machinery and all other property of the Company at convenient time(s), after giving advance notice to the Company. 89.3 Statement of Accounts to be furnished to General Meeting The Directors shall, from time to time, in accordance with Sections 129 and 134 and other applicable provisions of the Act, cause to be prepared and to be laid before the Company in General Meeting, such Balance Sheets, Profit and Loss Accounts and Reports as are required by these Sections. 89.4 Copies shall be sent to each Member Without prejudice to the provisions of Section 101 and subject to the provisions of Section 136 of the Act, a copy of the financial statements, including consolidated financial statements, auditors? report and every other document required by law to be annexed or attached to the Balance Sheet shall at least twenty-one days before the General Body Meeting at which the same are to be laid before the members, be sent to the members of the company, to every trustee for every holder of any debenture issued by the company and to all persons other than such members or trustee, being the person so entitled to attend the General Body Meeting. 89.5 Copy of financial statement to be filed with registrar The Company shall comply with Section 137 of the Act as to filing copies of the Balance Sheet and Profit and Loss Account and documents required to be annexed or attached thereto with the Registrar. ??</p>
		<b>Winding up</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<ul style="list-style-type: none"> <li>90 Procedure for winding up If the Company shall be wound up and the assets available for distribution among the members as such shall be insufficient to repay the whole of the paid up capital such assets shall be distributed so that as nearly as may be the losses shall be borne by the members in proportion to the capital paid up or which ought to have been paid up at the commencement of the winding-up on the shares held by them</li> </ul>

		90	respectively. And if in a winding-up the assets available for distribution among the members shall be more than sufficient to repay the whole of the capital paid up at the commencement of the winding-up, the excess shall be distributed amongst the members in proportion to the capital at the commencement of the winding-up paid up or which ought to have been paid up on the shares held by them respectively. But this Article is to be without prejudice to the rights of the holders of shares issued upon special terms and conditions. ? If the Company shall be wound up, whether voluntarily or otherwise, the liquidators may, with the sanction of a Special Resolution, divide among the contributions, in specie or kind, any part of the assets of the Company and may, with the like sanction, vest any part of the assets of the Company in Trustees upon such trusts for the benefit of the contributories, or any of them, as the liquidators, with the like sanction, shall think fit.
			<b>Indemnity</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	91	<ul style="list-style-type: none"> <li>91.1 Officers to be indemnified Subject to provisions of the Act, every Officer of the company shall be indemnified out of the assets of the Company against any liability incurred by him in defending any proceedings, whether civil or criminal, in which judgment is given in his favour or in which he is acquitted or in which relief is granted to him by the court or the Tribunal. Provided that if such person is proved to be guilty, the premium paid on such insurance shall be treated as part of the remuneration.</li> </ul>
			<b>Others</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	92	

#### Subscriber Details

S. No.	Subscriber Details				
	*Name, Address, Description and Occupation	DIN / PAN / Passport number	*Place	DSC	Dated
1	PFC CONSULTING LIMITED, having its Registered office at First Floor, Urjanidhi, 1 Barakhamba Lane, Connaught Place ND 110001, through Sh. Sachin Arora, S/o Sh, Prem Lal Arora, Address: F-5, 1903, SUPERTECH, ECO VILLAGE, NEAR PARK, GREATER NOIDA, Gautam Buddha Nagar 201301 Occupation -Service(as Auth	AKGPA1434J	New Delhi		06/06/2023
2	MANOJ KUMAR RANA S/o Sh. SUBE SINGH, R/o A-32/E, DDA Flats, Munirka ND 110067, Description: As a Nominee of PFC CONSULTING LIMITED, Occupation: Service	02263302	New Delhi		06/06/2023
	DHARUMAN MANAVALAN S/o Sh. PAMANDI CHINNAN DHARUMAN, Address: A-703, Saheta Apartment, Plot No-30,				06/06/2023

3	Dwarka Sector 4 ND-110078, Description: As a Nominee of PFC CONSULTING LIMITED, Occupation: Service	08102722	New Delhi		
4	SANJAY KUMAR NAYAK S/o Sh. JAGABANDHU NAYAK, Address: K-713, Jalvayu Tower Sec 56, Gurgaon, Haryana, 122011, Description: As a Nominee of PFC CONSULTING LIMITED, Occupation: Service	08197193	New Delhi		06/06/2023
5	SACHIN SHUKLA S/o Sh. RAJ KUMAR SHUKLA, Address: 4th floor, House No 6, H-1 BLOCK, Good EARTH CITY CENTER, SOUTH CITY II, GURGAON, HARYANA -122018 Description: As a Nominee of PFC CONSULTING LIMITED, Occupation: Service	08613963	New Delhi		06/06/2023
6	MILIND MADHUSUDAN DAFADE S/o Sh. MADHUSUDAN GURINATH DAFADE, Address: Flat C-31, Aishwarya M Apptt. Sec-4, Plot No. 17, Dwarka, ND 110078, Description: As a Nominee of PFC CONSULTING LIMITED, Occupation: Service	09587967	New Delhi		06/06/2023
7	NEERAJ SINGH S/o Sh. DAYASHANKAR SINGH, Address: C-703, F-2, The Crescent Apartment Sec 50, Noida, Gautam Budha Nagar, UP- 201301 Description: As a Nominee of PFC CONSULTING LIMITED, Occupation: Service	08613892	New Delhi		06/06/2023

## Signed before me

Name Prefix (ACA/FCA/ACS/ FCS/ACMA/ FCMA)	*Name of the witness	*Address, Description and Occupation	*DIN / PAN / Passport number / Membership		DSC	Dated
ACS	Anjali	D-427, 2nd Floor, Ramphal Chowk, (Backside of Goyalsons) Palam Extn, Sector 7, Dwarka, New Delhi-110075, Occupation Practicing Company Secretary	A65330	New Delhi	DIN8##A65330	06/06/2023

**ANNEXURE P/3 (COLLY.)****FORM – I****Application Form for grant of Transmission License****1. Particulars of the Applicant**

- i. Name of the Applicant: Bikaner III Nimrana II Transmission Limited
- ii. Status: Public Limited Company
- iii. Address: Flat No. 94, 3rd Floor, Pocket-4, LIG Flats, Sector-11, Dwarka  
Sec-6, Southwest Delhi, Delhi, Delhi, India, 110075
- iv. Name, Designation & Address of the contact person: Mr. Hemant Atre,  
Head- Project, Shatabdi Bhawan, B-12 & 13, Sector 4, Noida, UP-201301.
- v. Contact Tel. Nos.: 9223311432
- vi. Fax No.:
- vii. E-mail ID: [haatre@tatapower.com](mailto:haatre@tatapower.com)
- viii. Place of Incorporation/Registration: Delhi
- ix. Year of Incorporation/Registration: 2023
- x. Following documents are to be enclosed
  - a) Certificate of registration: Enclosed.
  - b) Original power of attorney of the signatory to commit the  
Applicant or its promoter: Board Resolution

**2. Particulars of the Project for which the Licence is being sought:****a) Transmission Lines:**

<b>Sr. No.</b>	<b>Name (End point location)</b>	<b>Voltage Class</b>	<b>Length (Km)</b>	<b>Type (S/C or D/C)</b>
<b>1</b>	Bikaner-III - Neemrana-II 765 kV D/C line (2nd)	765 kV	350	D/C

b) **Sub-stations:**

<b>Sr. No.</b>	<b>Name of substation</b>	<b>Voltage Level (kV)</b>	<b>Transformer (Nos. and MVA Capacity)</b>	<b>Reactive / capacitive compensation (device with MVAR Capacity)</b>	<b>No. of Bays</b>
<b>1</b>	Bikaner-III PS	765 kV		330 MVAR Switchable line reactors	02
<b>2</b>	Neemrana-II	765 kV		330 MVAR Switchable line reactors	02

c) **Commissioning Schedule:**

<b>Sr. No.</b>	<b>Name of Transmission Element</b>	<b>SCOD in months from Effective Date</b>
1.	<p>Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end</p> <ul style="list-style-type: none"> <li>• 765 kV, 330 MVAR Switchable line reactors at Bikaner- III PS – 2 nos.</li> <li>• 765 kV, 330 MVAR Switchable line reactors at Neemrana-II – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Neemrana-II S/s – 2 nos.</li> </ul>	24 months
2.	2 No. of 765 kV line bays each at Bikaner-III PS	

	& Neemrana- II S/S • 765kV line bays - 4 nos. (2 nos. each at Bikaner-III PS & Neemrana-II S/S)	
--	--	--

*Note:*

(i) *Developer of Bikaner-III PS & Neemrana-II S/s shall provide space for 2 Nos. of 765 kV line bays along with space for Switchable line reactor each at Bikaner-III PS & Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2nd).*

d) **Identified Long Term Customers of the Project:** CTUIL. Signed TSA attached.

e) **Any other information :** nil

3. **Levelised Transmission Charges:** INR 1626.59 million per annum.

4.

a) **Recommendation of selection by the empowered committee:** BEC Certificate enclosed.

b) **Evaluation report made public by the Bid Process coordinator:** BEC Certificate enclosed.

5. **List of documents enclosed:**

a) **Certificate of Incorporation**

b) **MoA and AoA**

c) **Board resolution for Authorised signatory**



*Tkatiya*



**GOVERNMENT OF INDIA  
MINISTRY OF CORPORATE AFFAIRS**

Central Registration Centre

**Certificate of Incorporation**

[Pursuant to sub-section (2) of section 7 and sub-section (1) of section 8 of the Companies Act, 2013 (18 of 2013) and rule 18 of the Companies (Incorporation) Rules, 2014]

I hereby certify that BIKANER III NEEMRANA II TRANSMISSION LIMITED is incorporated on this THIRTEENTH day of JUNE TWO THOUSAND TWENTY THREE under the Companies Act, 2013 (18 of 2013) and that the company is Company limited by shares

The Corporate Identity Number of the company is **U42201DL2023GOI415740**

The Permanent Account Number (PAN) of the company is **AALCB7105R\***

The Tax Deduction and Collection Account Number (TAN) of the company is **DELB27018F\***

Given under my hand at Manesar this THIRTEENTH day of JUNE TWO THOUSAND TWENTY THREE

Certification signature by DS MINISTRY OF CORPORATE AFFAIRS 10 <roc.crc@mca.gov.in> Validity Unknown

Digitally signed by  
DS MINISTRY OF CORPORATE  
AFFAIRS 10  
Date: 2023.07.03 15:15:39 IST

Vairamuthu Nagarajan

Assistant Registrar of Companies/ Deputy Registrar of Companies/ Registrar of Companies

For and on behalf of the Jurisdictional Registrar of Companies

Registrar of Companies

Central Registration Centre

Disclaimer: This certificate only evidences incorporation of the company on the basis of documents and declarations of the applicant(s). This certificate is neither a license nor permission to conduct business or solicit deposits or funds from public. Permission of sector regulator is necessary wherever required. Registration status and other details of the company can be verified on [mca.gov.in](http://mca.gov.in)

Mailing Address as per record available in Registrar of Companies office:

BIKANER III NEEMRANA II TRANSMISSION LIMITED

Urjanidhi, First Floor, 1,Barakhamba Lane,Connaught Place,New Delhi,Central Delhi-110001,Delhi

\*as issued by Income tax Department



**BIKANER III NEEMRANA II TRANSMISSION LIMITED**

---

Certified True Copy of the Resolution passed at the  
Board Meeting held on 27<sup>th</sup> December 2023

“RESOLVED THAT any of the Director of the Company be and is hereby severally authorized to sign and submit the various forms/returns/applications required to be filed with the office of the Registrar of Companies, Ministry of Corporate Affairs, Income Tax and Goods & Services Tax Authorities and other Regulatory bodies, if any, in electronic or physical form as prescribed under their respective statutory laws, and to do all such acts, deeds and things as may be necessary in this regard including obtaining and affixing his/her Digital Signatures thereon.

FURTHER RESOLVED THAT any directors of the Company, the Chief Executive Officer, the Chief Financial Officer or any other officials who will be designated as Project Manager be and hereby authorised to undertake statutory registrations before appropriate authorities in connection with the project including signing and submission of various documents, applications, letter and returns electronically or otherwise and to make necessary applications, representations, modifications, or alterations on behalf of the Company before the any other regulators or authorities, as and when required.

FURTHER RESOLVED THAT any of the Directors of the Company, the Chief Executive Officer, the Chief Financial Officer or Company Secretary be and are hereby severally authorized to take such action as may be necessary, desirable or expedient on behalf of the Company to give effect to this Resolution”.

Certified True Copy  
For **Bikaner III Neemrana II Transmission Limited**

**Nita Jha**  
Digitally signed  
by Nita Jha  
Date: 2023.12.28  
17:06:35 +05'30'  
Nita Jha  
(Director)  
DIN: 10066247

Reg. office: Flat No. 94, 3rd Floor, Pocket-4,  
LIG Flats, Sector-11, Dwarka, New Delhi-  
110075

---

**Regd. Office** - Flat No. 94, 3rd Floor, Pocket-4, LIG Flats, Sector-11, Dwarka, New Delhi-110075

● Tel.: +022- 6717- 3424 ● Email ID: haatre@tatapower.com;

CIN: U42201DL2023GOI415740

**TRANSMISSION SERVICE AGREEMENT****FOR****DEVELOPMENT AND OPERATION OF INTER-STATE  
TRANSMISSION SYSTEM****FOR TRANSMISSION OF ELECTRICITY THROUGH TARIFF  
BASED COMPETITIVE BIDDING FOR****TRANSMISSION SYSTEM FOR EVACUATION OF POWER  
FROM RAJASTHAN REZ PH-IV (PART-1) (BIKANER  
COMPLEX): PART-C****BETWEEN THE****CENTRAL TRANSMISSION UTILITY OF INDIA LIMITED  
(NODAL AGENCY)****AND****BIKANER III NEEMRANA II TRANSMISSION LIMITED**December 27<sup>th</sup> 2023

## Transmission Service Agreement

## CONTENTS

1	Definitions and Interpretations .....	5
2	Effectiveness and Term of Agreement .....	18
3	Conditions Subsequent .....	20
4	Development of the Project .....	24
5	Construction of the Project.....	28
6	Connection and commissioning of the Project.....	33
7	Operation and Maintenance of the Project.....	38
8	Availability of the project.....	39
9	Insurances .....	40
10	Billing And Payment of Transmission Charges.....	42
11	Force Majeure .....	43
12	Change in Law .....	48
13	Events of Default and Termination.....	51
14	Liability and Indemnification .....	56
15	Assignments and Charges .....	62
16	Governing Law and Dispute Resolution.....	64
17	Representation and Warranties .....	66
18	Independent Engineer .....	68
19	Miscellaneous Provisions.....	70



Central Transmission Utility of India Limited

2 Bikaner III Neemrana II Transmission Limited

Bond



Indian Non-Judicial Stamp  
Haryana Government



Date :13/12/2023

Certificate No. G0M2023L4786

Stamp Duty Paid : ₹ 101  
(Rs. Only)

GRN No. 110487533

Penalty : ₹ 0  
(Rs. Zero Only)**Deponent**

Name: Central Transmission utility of India Ltd

H.No/Floor : 2

Sector/Ward : 29

Landmark : Na

City/Village : Gurugram

District : Gurugram

State : Haryana

Phone : 98\*\*\*\*\*10



Purpose : ARTICLE 5 GENERAL AGREEMENT to be submitted at Concerned office

**THIS TRANSMISISON SERVICE AGREEMENT** (hereinafter referred to as "TSA" or "Agreement" or "the Agreement" or "this Agreement") is made on the ..... [Insert day] of..... [Insert month] of Two Thousand and..... [Insert Year]

**BETWEEN:**

The **Central Transmission Utility of India Limited**, "Saudamini", 1st Floor, Plot No. 2, Sector-29, Gurugram-122001, Haryana acting as a Nodal Agency (referred to as the "Nodal Agency"), which expression shall unless repugnant to the context or meaning thereof include its successors, and permitted assigns) as Party of the one part;

**AND**

**Bikaner III Neemrana II Transmission Limited**, incorporated under the Companies Act, 2013, having its registered office at First Floor, Urjanidhi, 1 Barakhamba Lane Cannought Place, New Delhi, Delhi Central Delhi DL 110001 (herein after referred to as "Transmission Service Provider" or "TSP" or "ISTS Licensee", which expression shall unless repugnant to the context or meaning thereof include its successors, and permitted assigns) as Party of the other part;

("Nodal Agency" and "TSP" are individually referred to as "Party" and collectively as the "Parties")



Central Transmission Utility of India Limited

3

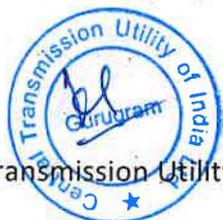
Bikaner III Neemrana II Transmission Limited

|December, 2023

## Transmission Service Agreement

**AND WHEREAS:**

- A) In accordance with the Bidding Guidelines, the Bid Process Coordinator (hereinafter referred to as BPC) had initiated a competitive e-reverse bidding process through issue of RFP for selecting a Successful Bidder to build, own, operate and transfer the Project comprising of the Elements mentioned in Schedule 1 (hereinafter referred to as the Project)
- B) Pursuant to the said e-reverse bidding process, the BPC has identified the Successful Bidder, who will be responsible to set up the Project on build, own, operate and transfer basis to provide Transmission Service in accordance with the terms of this Agreement and the Transmission License.
- C) The Selected Bidder have submitted the Contract Performance Guarantee and acquired one hundred percent (100%) of the equity shareholding of Bikaner III Neemrana II Transmission Limited, along with all its related assets and liabilities in terms of the provisions of the Share Purchase Agreement.
- D) The TSP has agreed to make an application for a Transmission License to the Commission for setting up the Project on build, own, operate and transfer basis.
- E) The TSP has further agreed to make an application to the Commission for the adoption of the Transmission Charges under Section 63 of the Electricity Act, 2003, along with a certification from the Bid Evaluation Committee in accordance with the Bidding Guidelines issued by Ministry of Power, Government of India.
- F) The TSP has agreed to execute the agreement(s) required, if any, under Sharing Regulations within fifteen (15) days from the date of grant of Transmission License from the Commission.
- G) The TSP agrees to the terms and conditions laid down under Sharing Regulations, for making available the ISTS and charge the Transmission Charges in accordance with the terms and conditions of Sharing Regulations.
- H) The billing, collection and disbursement of the Transmission Charges by the CTU to the ISTS Licensee shall be governed as per Sharing Regulations.
- I) The terms and conditions stipulated in the Transmission License issued by the Commission to the TSP shall be applicable to this Agreement and the TSP agrees to comply with these terms and conditions. In case of inconsistency between the Transmission License terms & conditions and the conditions of this Agreement, the conditions stipulated in the Transmission License granted by the Commission shall prevail.



Central Transmission Utility of India Limited

4

Bikaner III Neemrana II Transmission Limited

## Transmission Service Agreement

NOW, THEREFORE, IN CONSIDERATION OF THE PREMISES AND MUTUAL AGREEMENTS, COVENANTS AND CONDITIONS SET FORTH HEREIN, IT IS HEREBY AGREED BY AND BETWEEN THE PARTIES HERETO AS FOLLOWS:



Central Transmission Utility of India Limited

5

Bikaner III Neemrana II Transmission Limited

| December, 2023

**ARTICLE: 1****1. DEFINITIONS AND INTERPRETATIONS****1.1 Definitions:**

- 1.1.1 The words / expressions used in this Agreement, unless as defined below or repugnant to the context, shall have the same meaning as assigned to them by the Electricity Act, 2003 and the rules or regulations framed there under including those issued / framed by the Commission (as defined hereunder), as amended or re-enacted from time to time or the General Clauses Act, failing which it shall bear its ordinary English meaning.

The words/expressions when used in this Agreement shall have the respective meanings as specified below:

**“Acquisition Price”** shall have the same meaning as defined in the Share Purchase Agreement;

**“Act”** or **“Electricity Act”** or **“Electricity Act 2003”** shall mean the Electricity Act, 2003 and any amendments made to the same or any succeeding enactment thereof;

**“Affiliate”** shall mean a company that either directly or indirectly

- i. controls or
- ii. is controlled by or
- iii. is under common control with

a Bidding Company (in the case of a single company) or a Member (in the case of a Consortium) and **“control”** means ownership by one entity of at least twenty six percent (26%) of the voting rights of the other entity;

**“Availability”** in relation to the Project or in relation to any Element of the Project, for a given period shall mean the time in hours during that period the Project is capable to transmit electricity at its Rated Voltage and shall be expressed in percentage of total hours in the given period and shall be calculated as per the procedure contained in **Appendix –II to Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019**, attached herewith in Schedule 6;



**"Bid"** shall mean technical bid and financial bid submitted by the Bidder, in response to the RFP, in accordance with the terms and conditions of the RFP;

**"Bid Deadline"** shall mean the last date and time for submission of the Bid in response to RFP, as specified in the RFP;

**"Bidding Company"** shall refer to such single company that has made a Response to RFP for the Project;

**"Bidding Consortium / Consortium"** shall refer to a group of companies that has collectively made a Response to RFP for the Project;

**"Bid Documents" or "Bidding Documents"** shall mean the RFP, along with all attachments thereto or clarifications thereof;

**"Bidding Guidelines"** shall mean the "Tariff Based Competitive Bidding Guidelines for Transmission Service" and "Guidelines for Encouraging Competition in Development of Transmission Projects" issued by Government of India, Ministry of Power under Section – 63 of the Electricity Act as amended from time to time;

**"Bid Process Coordinator" or "BPC"** shall mean a person or its authorized representative as notified by the Government of India, responsible for carrying out the process for selection of Bidder who will acquire Transmission Service Provider;

**"Bill"** shall mean any bill raised by the CTU on the DICs to recover the Transmission Charges pursuant to the Sharing Regulations;

**"Business Day"** shall mean a day other than Sunday or a statutory holiday, on which the banks remain open for business in the State in which the Nodal Agency's registered office is located and the concerned TSP are located;

**"CEA"** shall mean the Central Electricity Authority constituted under Section -70 of the Electricity Act;

**"Change in law"** shall have the meaning ascribed thereto in Article 12;

**"Commercial Operation Date" or "COD"** shall mean the date as per Article 6.2;

**"Commission" or "CERC"** shall mean the Central Electricity Regulatory Commission referred to in sub-section (1) of Section 76 of the Electricity Act, 2003 or its successors and assigns;



## Transmission Service Agreement

**“Competent Court of Law”** shall mean the Supreme Court or any High Court, or any tribunal or any similar judicial or quasi-judicial body in India that has jurisdiction to adjudicate upon issues relating to the Project;

**“Connection Agreement”** shall mean the agreement between the CTU or STU or any other concerned parties and the TSP, setting out the terms relating to the connection of the Project to the Inter-connection Facilities and use of the Inter State Transmission System as per the provisions of the IEGC, as the case may be;

**“Consultation Period”** shall mean the period of sixty (60) days or such longer period as the Parties may agree, commencing from the date of issue of a TSP’s Preliminary Notice or a Nodal Agency’s Preliminary Termination Notice, as provided in Article 13 of this Agreement, for consultation between the Parties to mitigate the consequence of the relevant event having regard to all the circumstances;

**“Consents, Clearances and Permits”** shall mean all authorizations, licenses, approvals, registrations, permits, waivers, privileges, acknowledgements, agreements, or concessions required to be obtained from or provided by any concerned authority for the development, execution and operation of Project including without any limitation for the construction, ownership, operation and maintenance of the Transmission Lines and/or sub-stations;

**“Construction Period”** shall mean the period from (and including) the Effective Date of the Transmission Service Agreement up to (but not including) the COD of the Element of the Project in relation to an Element and up to (but not including) the COD of the Project in relation to the Project;

**“Contractors”** shall mean the engineering, procurement, construction, operation & maintenance contractors, surveyors, advisors, consultants, designers, suppliers to the TSP and each of their respective sub-contractors (and each of their respective successors and permitted assigns) in their respective capacities as such;

**“Contract Performance Guarantee”** shall mean the irrevocable unconditional bank guarantee, submitted and to be submitted by the TSP or by the Selected Bidder on behalf of the TSP to the Nodal Agency from a bank mentioned in Annexure 17 of the RFP, in the form attached here to as Schedule 8, in accordance with Article 3 of this Agreement and which shall include the additional bank guarantee furnished by the TSP under this Agreement;

**“Contract Year”**, for the purpose of payment of Transmission Charges, shall mean the period beginning on the COD, and ending on the immediately succeeding March 31 and thereafter each period of 12 months beginning on April 1 and ending on March 31 provided that the last Contract Year shall end on the last day of the term of the TSA;

**“CTU” or “Central Transmission Utility”** shall have same meaning as defined in the Electricity Act, 2003;

**“Day”** shall mean a day starting at 0000 hours and ending at 2400 hours;

**“D/C”** shall mean Double Circuit;

**“Designated ISTS Customers” or “DICs”** shall have the meaning as ascribed in the Sharing Regulations;

**“Dispute”** shall mean any dispute or difference of any kind between the Parties, in connection with or arising out of this Agreement including any issue on the interpretation and scope of the terms of this Agreement as provided in Article 16;

**“Effective Date”** for the purposes of this Agreement, shall have the same meaning as per Article 2.1 of this Agreement;

**“Electrical Inspector”** shall mean a person appointed as such by the Government under sub-section (1) of Section 162 of the Electricity Act 2003 and also includes Chief Electrical Inspector;

**“Electricity Rules 2005”** shall mean the rules framed pursuant to the Electricity Act 2003 and as amended from time to time;

**“Element”** shall mean each Transmission Line or each circuit of the Transmission Lines (where there are more than one circuit) or each bay of Sub-station or switching station or HVDC terminal or inverter station of the Project, including ICTs, Reactors, SVC, FSC, etc. forming part of the ISTS, which will be owned, operated and maintained by the concerned ISTS Licensee, and which has a separate Scheduled COD as per Schedule 2 of this Agreement and has a separate percentage for recovery of Transmission Charges on achieving COD as per Schedule 5 of this Agreement;

**“Event of Default”** shall mean the events as defined in Article 13 of this Agreement;



## Transmission Service Agreement

**“Expiry Date”** shall be the date which is thirty five (35) years from the COD of the Project;

**“Financial Closure”** shall mean the first Business Day on which funds are made available to the TSP pursuant to the Financing Agreements;

**“Financially Evaluated Entity”** shall mean the company which has been evaluated for the satisfaction of the financial requirement set forth in the RFP;

**“Financing Agreements”** shall mean the agreements pursuant to which the TSP is to finance the Project including the loan agreements, security documents, notes, indentures, security agreements, letters of credit and other documents, as may be amended, modified, or replaced from time to time, but without in anyway increasing the liabilities of the Designated ISTS Customers / Nodal Agency;

**“Financial Year”** shall mean a period of twelve months at midnight Indian Standard Time (IST) between 1st April & 31st March;

**“Force Majeure”** and **“Force Majeure Event”** shall have the meaning assigned thereto in Article 11;

**“GOI”** shall mean Government of India;

**“Grid Code” / “IEGC”** shall mean the Grid Code specified by the Central Commission under Clause (h) of sub-section (1) of Section 79 of the Electricity Act;

**“Independent Engineer”** shall mean an agency/ company, appointed by Nodal Agency in accordance with the Guidelines for Encouraging Competition in Development of Transmission Projects.

**“Indian Governmental Instrumentality”** shall mean Government of India, Government of any State in India or any ministry, department, board, authority, agency, corporation, commission under the direct or indirect control of Government of India or any State Government or both, any political sub-division of any of them including any court or Commission or tribunal or judicial or quasi-judicial body in India but excluding the CTU, TSP and the Designated ISTS Customers;

**“Insurances”** shall mean the insurance cover to be obtained and maintained by the TSP in accordance with Article 9 of this Agreement;

**“Interconnection Facilities”** shall mean the facilities as may be set up for transmission of electricity through the use of the Project, on either one or both side of generating station’s / CTU’s / STU’s / ISTS Licensee’s / Designated ISTS Customer’s substations (as the case may be) which shall include, without limitation, all other transmission lines, gantries, sub-stations and associated equipments not forming part of the Project;

**“ISTS Licensee”** shall be the TSP under this Agreement, consequent to having been awarded a Transmission License by the CERC and shall be referred to as the TSP or the ISTS Licensee, as the context may require in this Agreement;

**“Law” or “Laws”** in relation to this Agreement, shall mean all laws including electricity laws in force in India and any statute, ordinance, rule, regulation, notification, order or code, or any interpretation of any of them by an Indian Governmental Instrumentality having force of law and shall include all rules, regulations, decisions and orders of the Commission;

**“Lead Member of the Bidding Consortium” or “Lead Member”** shall mean a company who commits at least 26% equity stake in the Project, meets the technical requirement as specified in the RFP and so designated by other Member(s) in Bidding Consortium;

**“Lenders”** means the banks, financial institutions, multilateral funding agencies, non banking financial companies registered with the Reserve Bank of India (RBI), insurance companies registered with the Insurance Regulatory & Development Authority (IRDA), pension funds regulated by the Pension Fund Regulatory & Development Authority (PFRDA), mutual funds registered with Securities & Exchange Board of India (SEBI), etc., including their successors and assigns, who have agreed on or before COD of the Project to provide the TSP with the debt financing described in the capital structure schedule, and any successor banks or financial institutions to whom their interests under the Financing Agreements may be transferred or assigned;

Provided that, such assignment or transfer shall not relieve the TSP of its obligations to the Nodal Agency under this Agreement in any manner and shall also does not lead to an increase in the liability of the Nodal Agency;

**“Lenders Representative”** shall mean the person notified by the Lender(s) in writing as being the representative of the Lender(s) or the Security Trustee and



## Transmission Service Agreement

such person may from time to time be replaced by the Lender(s) pursuant to the Financing Agreements by written notice to the TSP;

“**Letter of Intent**” or “**LOI**” shall have the same meaning as in the RFP;

“**Member in a Bidding Consortium / Member**” shall mean each company in the Bidding Consortium;

“**Month**” shall mean a period of thirty (30) days from (and excluding) the date of the event;

“**Monthly Transmission Charges**” for any Element of the Project, after COD of the Element till COD of the Project, and for the Project after COD of the Project, shall mean the amount of Transmission Charges as specified in Schedule 5 of this Agreement multiplied by no. of days in the relevant month and divided by no. of days in the year;

“**National Load Despatch Centre**” shall mean the centre established as per sub-section (1) of Section 26 of the Electricity Act 2003;

“**Nodal Agency**” shall mean CTU, which shall execute and implement the Transmission Service Agreement (TSA);

Provided that while taking major decisions, CTU shall consult CEA on technical matters and any other matter it feels necessary.

“**Notification**” shall mean any notification, issued in the Gazette of India;

“**Operating Period**” for any Element of the Project shall mean the period from (and including) the COD of such Element of the Project, up to (and including) the Expiry Date and for the Project, shall mean the period from (and including) the COD of the Project, up to (and including) the Expiry Date;

“**Parent Company**” shall mean an entity that holds at least twenty six percent (26%) of the paid - up equity capital directly or indirectly in the Bidding Company or in the Member in a Bidding Consortium, as the case may be;

“**Preliminary Termination Notice**” shall mean a Nodal Agency’s Preliminary Termination Notice as defined in Article 13 of this Agreement;



**“Project”** shall mean **“Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C”**, as detailed in Schedule 1 of this Agreement;

**“Project Assets”** shall mean all physical and other assets relating to and forming part of the Project including:

- (a) rights over the Site for substations, ROW for transmission lines;
- (b) tangible & intangible assets such as civil works and equipment including foundations, embankments, pavements, electrical systems, communication systems, relief centres, administrative offices, Sub-stations, software, tower and sub-stations designs etc;
- (c) project facilities situated on the Site;
- (d) all rights of the TSP under the project agreements;
- (e) financial assets, such as receivables, security deposits etc;
- (f) insurance proceeds; and
- (g) Applicable Permits and authorisations relating to or in respect of the Transmission System;”

**“Project Execution Plan”** shall mean the plan referred to in Article 3.1.3(c) hereof;

**“Prudent Utility Practices”** shall mean the practices, methods and standards that are generally accepted internationally from time to time by electric transmission utilities for the purpose of ensuring the safe, efficient and economic design, construction, commissioning, operation, repair and maintenance of the Project and which practices, methods and standards shall be adjusted as necessary, to take account of:

- (i) operation, repair and maintenance guidelines given by the manufacturers to be incorporated in the Project,
- (ii) the requirements of Law, and
- (iii) the physical conditions at the Site;
- (iv) the safety of operating personnel and human beings;

## Transmission Service Agreement

**"Rated Voltage"** shall mean voltage at which the Transmission System is designed to operate or such lower voltage at which the line is charged, for the time being, in consultation with the Central Transmission Utility;

**"Rebate"** shall have the meaning as ascribed to in Article 10.3 of this Agreement;

**"RFP"** shall mean Request For Proposal dated **March 02, 2023** along with all schedules, annexures and RFP Project Documents attached thereto, issued by the BPC for tariff based competitive bidding process for selection of Bidder as TSP to execute the Project, including any modifications, amendments or alterations thereto;

**"RFP Project Documents"** shall mean the following documents to be entered into in respect of the Project, by the Parties to the respective agreements:

- a. Transmission Service Agreement,
- b. Share Purchase Agreement,
- c. Agreement(s) required under Sharing Regulations and
- d. Any other agreement as may be required;

**"RLDC"** shall mean the relevant Regional Load Dispatch Centre as defined in the Electricity Act, 2003, in the region(s) in which the Project is located;

**"RPC"** shall mean the relevant Regional Power Committee established by the Government of India for the specific Region(s) in accordance with the Electricity Act, 2003 for facilitating integrated operation of the Power System in that Region;

**"Scheduled COD"** in relation to an Element(s) shall mean the date(s) as mentioned in Schedule 2 as against such Element(s) and in relation to the Project, shall mean the date as mentioned in Schedule 2 as against such Project, subject to the provisions of Article 4.4 of this Agreement, or such date as may be mutually agreed among the Parties;

**"Scheduled Outage"** shall mean the final outage plan as approved by the RPC as per the provisions of the Grid Code;

**"Selected Bid"** shall mean the technical Bid and the Final Offer of the Selected Bidder submitted during e-reverse bidding, which shall be downloaded and attached in Schedule 7 on or prior to the Effective Date;



**“Share Purchase Agreement”** shall mean the agreement amongst **PFC Consulting Limited (PFCCL)**, Bikaner III Neemrana II Transmission Limited and the Successful Bidder for the purchase of one hundred (100%) per cent of the shareholding of the Bikaner III Neemrana II Transmission Limited for the Acquisition Price, by the Successful Bidder on the terms and conditions as contained therein;

**“Sharing Regulations”** shall mean the Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations, 2020 and as amended from time to time;

**“Site”** in relation to a substation, switching station or HVDC terminal or inverter station, shall mean the land and other places upon which such station / terminal is to be established;

**“SLDC”** shall mean the State Load Despatch Centre established as per sub-section (1) of Section 31 of the Electricity Act 2003;

**“STU”** or **“State Transmission Utility”** shall be the Board or the Government company, specified as such by the State Government under sub-section (1) of Section 39 of the Electricity Act 2003;

**“Successful Bidder”** or **“Selected Bidder”** shall mean the Bidder selected pursuant to the RFP and who has to acquire one hundred percent (100%) equity shares of Bikaner III Neemrana II Transmission Limited, along with all its related assets and liabilities, which will be responsible as the TSP to establish the Project on build, own, operate and transfer basis as per the terms of the TSA and other RFP Project Documents;

**“TSP’s Preliminary Notice”** shall mean a notice issued by the TSP in pursuant to the provisions of Article 13.3 of this Agreement;

**“Target Availability”** shall have the meaning as ascribed hereto in Article 8.2 of this Agreement;

**“Technically Evaluated Entity”** shall mean the company which has been evaluated for the satisfaction of the technical requirement set forth in RFP;

**“Termination Notice”** shall mean a Nodal Agency’s Termination Notice given by the Nodal Agency to the TSP pursuant to the provisions of Articles 3.3.2, 3.3.4, 4.4.2, 5.8, 13.2 and 13.3 of this Agreement for the termination of this Agreement;



## Transmission Service Agreement

**"Term of Agreement"** for the purposes of this Agreement shall have the meaning ascribed thereto in Article 2.2 of this Agreement;

**"Transmission Charges"** shall mean the Final Offer of the Selected Bidder during the e-reverse bidding and adopted by the Commission, payable to the TSP as per Sharing Regulations;

**"Transmission License"** shall mean the license granted by the Commission in terms of the relevant regulations for grant of such license issued under the Electricity Act;

**"Transmission Service"** shall mean making the Project available as per the terms and conditions of this Agreement and Sharing Regulations;

**"Unscheduled Outage"** shall mean an interruption resulting in reduction of the Availability of the Element(s) / Project (as the case may be) that is not a result of a Scheduled Outage or a Force Majeure Event.

**"Ultimate Parent Company"** shall mean an entity which owns at least twenty six percent (26%) equity in the Bidding Company or Member of a Consortium, (as the case may be) and in the Technically Evaluated Entity and / or Financially Evaluated Entity (as the case may be) and such Bidding Company or Member of a Consortium, (as the case may be) and the Technically Evaluated Entity and / or Financially Evaluated Entity (as the case may be) shall be under the direct control or indirectly under the common control of such entity;

## 1.2 Interpretation:

***Save where the contrary is indicated, any reference in this Agreement to:***

**"Agreement"** shall be construed as including a reference to its Schedules, Appendices and Annexures;

**"Rupee", "Rupees" and "Rs."** shall denote lawful currency of India;

**"crore"** shall mean a reference to ten million (10,000,000) and a **"lakh"** shall mean a reference to one tenth of a million (1,00,000);

**"encumbrance"** shall be construed as a reference to a mortgage, charge, pledge, lien or other encumbrance securing any obligation of any person or any other type of preferential arrangement (including, without limitation, title transfer and retention arrangements) having a similar effect;



"**holding company**" of a company or corporation shall be construed as a reference to any company or corporation of which the other company or corporation is a subsidiary;

"**indebtedness**" shall be construed so as to include any obligation (whether incurred as principal or surety) for the payment or repayment of money, whether present or future, actual or contingent;

"**person**" shall have the meaning as defined in Section 2 (49) of the Act;

"**subsidiary**" of a company or corporation (the holding company) shall be construed as a reference to any company or corporation:

- (i) which is controlled, directly or indirectly, by the holding company, or
- (ii) more than half of the issued share capital of which is beneficially owned, directly or indirectly, by the holding company, or
- (iii) which is a subsidiary of another subsidiary of the holding company,

for these purposes, a company or corporation shall be treated as being controlled by another if that other company or corporation is able to direct its affairs and/or to control the composition of its board of directors or equivalent body;

"**winding-up**", "**dissolution**", "**insolvency**", or "**reorganization**" in the context of a company or corporation shall have the same meaning as defined in the Companies Act, 1956/ Companies Act, 2013 (as the case may be).

- 1.2.1 Words importing the singular shall include the plural and vice versa.
- 1.2.2 This Agreement itself or any other agreement or document shall be construed as a reference to this or to such other agreement or document as it may have been, or may from time to time be, amended, varied, novated, replaced or supplemented.
- 1.2.3 A Law shall be construed as a reference to such Law including its amendments or re-enactments from time to time.
- 1.2.4 A time of day shall, save as otherwise provided in any agreement or document be construed as a reference to Indian Standard Time.



## Transmission Service Agreement

- 1.2.5 Different parts of this Agreement are to be taken as mutually explanatory and supplementary to each other and if there is any inconsistency between or among the parts of this Agreement, they shall be interpreted in a harmonious manner so as to give effect to each part.
- 1.2.6 The tables of contents and any headings or sub-headings in this Agreement have been inserted for ease of reference only and shall not affect the interpretation of this Agreement.
- 1.2.7 All interest payable under this Agreement shall accrue from day to day and be calculated on the basis of a year of three hundred and sixty five (365) days.
- 1.2.8 The words "hereof" or "herein", if and when used in this Agreement shall mean a reference to this Agreement.
- 1.2.9 The contents of Schedule 7 shall be referred to for ascertaining accuracy and correctness of the representations made by the Selected Bidder in Article 17.2.1 hereof.



**ARTICLE: 2****2. EFFECTIVENESS AND TERM OF AGREEMENT****2.1 Effective Date:**

This Agreement shall be effective from later of the dates of the following events:

- a. The Selected Bidder, on behalf of the TSP, has provided the Contract Performance Guarantee, as per terms of Article 3.1 of this Agreement; and
- b. The Selected Bidder has acquired for the Acquisition Price, one hundred percent (100%) of the equity shareholding of **PFC Consulting Limited** in Bikaner III Neemrana II Transmission Limited along with all its related assets and liabilities as per the provisions of the Share Purchase Agreement. and
- c. The Agreement is executed and delivered by the Parties;

**2.2 Term and Termination:**

2.2.1 Subject to Article 2.2.3 and Article 2.4, this Agreement shall continue to be effective in relation to the Project until the Expiry Date, when it shall automatically terminate.

2.2.2 Post the Expiry Date of this Agreement, the TSP shall ensure transfer of Project Assets to CTU or its successors or an agency as decided by the Central Government at zero cost and free from any encumbrance and liability. The transfer shall be completed within 90 days of expiry of this Agreement failing which CTU shall be entitled to take over the Project Assets Suo moto.

2.2.3 This Agreement shall terminate before the Expiry Date in accordance with Article 13 or Article 3.3.2 or Article 3.3.4.

**2.3 Conditions prior to the expiry of the Transmission License**

2.3.1 In order to continue the Project beyond the expiry of the Transmission License, the TSP shall be obligated to make an application to the Commission at least two (2) years before the date of expiry of the Transmission License, seeking the Commission's approval for the extension of the term of the Transmission License up to the Expiry Date.



## Transmission Service Agreement

2.3.2 The TSP shall timely comply with all the requirements that may be laid down by the Commission for extension of the term of the Transmission License beyond the initial term of twenty-five (25) years & upto the Expiry Date and the TSP shall keep the Nodal Agency fully informed about the progress on its application for extension of the term of the Transmission License.

#### 2.4 Survival:

The expiry or termination of this Agreement shall not affect any accrued rights, obligations/ roles and liabilities of the Parties under this Agreement, including the right to receive liquidated damages as per the terms of this Agreement, nor shall it effect the survival of any continuing obligations/ roles for which this Agreement provides, either expressly or by necessary implication, which are to survive after the Expiry Date or termination including those under Articles 3.3.3, 3.3.5, Article 9.3 (Application of Insurance Proceeds), Article 11 (Force Majeure), Article 13 (Events of Default and Termination), Article 14 (Liability & Indemnification), Article 16 (Governing Law & Dispute Resolution), Article 19 (Miscellaneous).

#### 2.5 Applicability of the provisions of this Agreement

2.5.1 For the purpose of Availability, Target Availability and the computation of Availability, Incentive, Penalty, the provisions provided in this Agreement shall apply and any future modifications in the relevant Rules and Regulations shall not be applicable for this Project.

2.5.2 For the purposes of this Agreement for ISTS systems developed under the tariff based competitive bidding framework, the provisions relating to the definitions (Availability and COD), Article 3 (Contract Performance Guarantee and Conditions Subsequent), Article 5 (Construction of the Project), Article 6 (Connection and Commissioning of the Project), Article 8 (Target Availability and calculation of Availability), Article 11 (Force Majeure), Article 12 (Change in Law), Article 13 (Event of Default), Article 14 (Indemnification), Article 15 (Assignment and Charges), Articles 16.1, 16.2 and 16.4 (Governing Laws and Dispute Resolution) and Article 17 (representation and warranties of the ISTS Licensee) of this agreement shall supersede the corresponding provisions under Sharing Regulations.



**ARTICLE: 3****3. CONDITIONS SUBSEQUENT****3.1 Satisfaction of conditions subsequent by the TSP**

3.1.1 Within ten (10) days from the date of issue of Letter of Intent, the Selected Bidder, shall:

- a. Provide the Contract Performance Guarantee, and
- b. Acquire, for the Acquisition Price, one hundred percent (100%) equity shareholding of Bikaner III Neemrana II Transmission Limited from **PFC Consulting Limited**, who shall sell to the Selected Bidder, the equity shareholding of Bikaner III Neemrana II Transmission Limited, along with all its related assets and liabilities.
- c. Execute this Agreement;

The TSP shall, within five (5) working days from the date of acquisition of SPV by the Selected Bidder, undertake to apply to the Commission for the grant of Transmission License and for the adoption of tariff as required under section-63 of the Electricity Act.

The Selected Bidder, on behalf of the TSP, will provide to the **Central Transmission Utility of India Limited** (being the Nodal Agency) the Contract Performance Guarantee for an amount of **Rs 42 Crore (Rupees Forty Two Crore Only)**.

3.1.2 The Contract Performance Guarantee shall be initially valid for a period up to three (3) months after the Scheduled COD of the Project and shall be extended from time to time to be valid for a period up to three (3) months after the COD of the Project. In case the validity of the Contract Performance Guarantee is expiring before the validity specified in this Article, the TSP shall, at least thirty (30) days before the expiry of the Contract Performance Guarantee, replace the Contract Performance Guarantee with another Contract Performance Guarantee or extend the validity of the existing Contract Performance Guarantee until the validity period specified in this Article.

3.1.3 The TSP agrees and undertakes to duly perform and complete the following activities within six (6) months from the Effective Date (except for c) below), unless such



**Transmission Service Agreement**

completion is affected due to any Force Majeure Event, or if any of the activities is specifically waived in writing by the Nodal Agency:

- a. To obtain the Transmission License for the Project from the Commission;
- b. To obtain the order for adoption of Transmission Charges by the Commission, as required under Section 63 of the Electricity Act 2003;
- c. To submit to the Nodal Agency, CEA & Independent Engineer, the Project Execution Plan, immediately after award of contract(s) and maximum within one hundred and twenty (120) days from the Effective Date. Also, an approved copy each of Manufacturing Quality Plan (MQP) and Field Quality Plan (FQP) would be submitted to Independent Engineer & Nodal Agency in the same time period. The TSP's Project Execution Plan should be in conformity with the Scheduled COD as specified in Schedule 2 of this Agreement, and shall bring out clearly the organization structure, time plan and methodology for executing the Project, award of major contracts, designing, engineering, procurement, shipping, construction, testing and commissioning to commercial operation;
- d. To submit to the Nodal Agency, CEA & Independent Engineer a detailed bar (GANTT) chart of the Project outlining each activity (taking longer than one Month), linkages as well as durations;
- e. To submit to the Nodal Agency, CEA & Independent Engineer detailed specifications of conductor meeting the functional specifications specified in RFP;
- f. To achieve Financial Closure;
- g. To provide an irrevocable letter to the Lenders duly accepting and acknowledging the rights provided to the Lenders under the provisions of Article 15.3 of this Agreement and all other RFP Project Documents;
- h. To award the Engineering, Procurement and Construction contract ("EPC contract") for the design and construction of the Project and shall have given to such Contractor an irrevocable notice to proceed; and
- i. To sign the Agreement(s) required, if any, under Sharing Regulations.

**3.2**

**Recognition of Lenders' Rights by the Nodal Agency**



## Transmission Service Agreement

3.2.1 The Nodal Agency hereby accepts and acknowledges the rights provided to the Lenders as per Article 15.3 of this Agreement and all other RFP Project Documents.

### 3.3 Consequences of non-fulfilment of conditions subsequent

3.3.1 If any of the conditions specified in Article 3.1.3 is not duly fulfilled by the TSP even within three (3) Months after the time specified therein, then on and from the expiry of such period and until the TSP has satisfied all the conditions specified in Article 3.1.3, the TSP shall, on a monthly basis, be liable to furnish to **Central Transmission Utility of India Limited (being the Nodal Agency)** additional Contract Performance Guarantee of **Rs. 4.20 Crore (Rupees Four Crore Twenty Lakh Only)** within two (2) Business Days of expiry of every such Month. Such additional Contract Performance Guarantee shall be provided to **Central Transmission Utility of India Limited (being the Nodal Agency)** in the manner provided in Article 3.1.1 and shall become part of the Contract Performance Guarantee and all the provisions of this Agreement shall be construed accordingly. **Central Transmission Utility of India Limited (being the Nodal Agency)** shall be entitled to hold and / or invoke the Contract Performance Guarantee, including such additional Contract Performance Guarantee, in accordance with the provisions of this Agreement.

3.3.2 Subject to Article 3.3.4, if:

- (i) the fulfilment of any of the conditions specified in Article 3.1.3 is delayed beyond nine (9) Months from the Effective Date and the TSP fails to furnish additional Contract Performance Guarantee to the Nodal Agency in accordance with Article 3.3.1 hereof; or
- (ii) the TSP furnishes additional Performance Guarantee to the Nodal Agency in accordance with Article 3.3.1 hereof but fails to fulfil the conditions specified in Article 3.1.3 within a period of twelve (12) months from the Effective Date,

the Nodal Agency shall have the right to terminate this Agreement, by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement.

3.3.3 If the Nodal Agency elects to terminate this Agreement as per the provisions of Article 3.3.2, the TSP shall be liable to pay to the Nodal Agency an amount of **Rs 42 Crore (Rupees Forty Two Crore Only)** as liquidated damages. The Nodal Agency shall be entitled to recover this amount of damages by invoking the Contract



## Transmission Service Agreement

Performance Guarantee to the extent of liquidated damages, which shall be required by the Nodal Agency, and the balance shall be returned to TSP, if any.

It is clarified for removal of doubt that this Article shall survive the termination of this Agreement.

- 3.3.4 In case of inability of the TSP to fulfil the conditions specified in Article 3.1.3 due to any Force Majeure Event, the time period for fulfilment of the condition subsequent as mentioned in Article 3.1.3, may be extended for a period of such Force Majeure Event. Alternatively, if deemed necessary, this Agreement may be terminated by the Nodal Agency by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement and the Contract Performance Guarantee shall be returned as per the provisions of Article 6.5.1.

Provided, that due to the provisions of this Article 3.3.4, any increase in the time period for completion of conditions subsequent mentioned under Article 3.1.3, shall lead to an equal increase in the time period for the Scheduled COD. If the Scheduled COD is extended beyond a period of one hundred eighty (180) days due to the provisions of this Article 3.3.4, the TSP will be allowed to recover the interest cost during construction corresponding to the period exceeding one hundred eighty (180) days by adjustment in the Transmission Charges in accordance with Schedule 9.

- 3.3.5 Upon termination of this Agreement as per Articles 3.3.2 and 3.3.4, the Nodal Agency may take steps to bid out the Project again.
- 3.3.6 The Nodal agency, on the failure of the TSP to fulfil its obligations, if it considers that there are sufficient grounds for so doing, apart from invoking the Contract Performance Guarantee under para 3.3.3 may also initiate proceedings for blacklisting the TSP as per provisions of Article 13.2 of TSA.

### 3.4 Progress Reports

The TSP shall notify the Nodal Agency and CEA in writing at least once a Month on the progress made in satisfying the conditions subsequent in Articles 3.1.3.



## Transmission Service Agreement

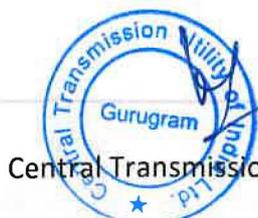
## ARTICLE: 4

## 4. DEVELOPMENT OF THE PROJECT

## 4.1 TSP's obligations in development of the Project:

Subject to the terms and conditions of this Agreement, the TSP at its own cost and expense shall observe, comply with, perform, undertake and be responsible:

- a. for procuring and maintaining in full force and effect all Consents, Clearances and Permits, required in accordance with Law for development of the Project;
- b. for financing, constructing, owning and commissioning each of the Element of the Project for the scope of work set out in Schedule 1 of this Agreement in accordance with:
  - i. the Electricity Act and the Rules made thereof;
  - ii. the Grid Code;
  - iii. the CEA Regulations applicable, and as amended from time to time, for Transmission Lines and sub-stations:
    - the Central Electricity Authority (Technical Standards for Connectivity to the Grid) Regulations, 2007;
    - Central Electricity Authority (Technical Standards for construction of Electrical Plants and Electric Lines) Regulation, 2010;
    - Central Electricity Authority (Grid Standard) Regulations, 2010;
    - Central Electricity Authority (Safety requirements for construction, operation and maintenance of Electrical Plants and Electrical Lines) Regulation, 2011;
    - Central Electricity Authority (Measures relating to Safety and Electricity Supply) Regulation, 2010;
    - Central Electricity Authority (Technical Standards for Communication System in Power System Operation) Regulations, 2020.
  - iv. Safety/ security Guidelines laid down by the Government;



## Transmission Service Agreement

- v. Prudent Utility Practices, relevant Indian Standards and the Law;

not later than the Scheduled COD as per Schedule 2 of this Agreement;

- c. for entering into a Connection Agreement with the concerned parties in accordance with the Grid Code.
- d. for owning the Project throughout the term of this Agreement free and clear of any encumbrances except those expressly permitted under Article 15 of this Agreement;
- e. to co-ordinate and liaise with concerned agencies and provide on a timely basis relevant information with regard to the specifications of the Project that may be required for interconnecting the Project with the Interconnection Facilities;
- f. for providing all assistance to the Arbitrators as they may require for the performance of their duties and responsibilities;
- g. to provide to the Nodal Agency and CEA, on a monthly basis, progress reports with regard to the Project and its execution (in accordance with prescribed form) to enable the CEA to monitor and co-ordinate the development of the Project matching with the Interconnection Facilities;
- h. to comply with Ministry of Power order no. 25-11/6/2018 – PG dated 02.07.2020 as well as other Guidelines issued by Govt. of India pertaining to this;
- i. to procure the products associated with the Transmission System as per provisions of Public Procurement (Preference to Make in India) orders issued by Ministry of Power vide orders No. 11/5/2018 - Coord. dated 28.07.2020 for transmission sector, as amended from time to time read with Department for Promotion of Industry and Internal Trade (DPIIT) orders in this regard (Procuring Entity as defined in above orders shall deemed to have included Selected Bidder and/ or TSP).

Also, to comply with Department of Expenditure, Ministry of Finance vide Order (Public Procurement No 1) bearing File No. 6/18/2019-PPD dated 23.07.2020, Order (Public Procurement No 2) bearing File



## Transmission Service Agreement

No. 6/18/2019-PPD dated 23.07.2020 and Order (Public Procurement No. 3) bearing File No. 6/18/2019-PPD, dated 24.07.2020, as amended from time to time, regarding public procurement from a bidder of a country, which shares land border with India;

- j. to submit to Nodal Agency information in the prescribed format [To be devised by Nodal Agency] for ensuring compliance to Article 4.1 i) above.
- k. to comply with all its obligations undertaken in this Agreement.

#### 4.2 Roles of the Nodal Agency in implementation of the Project:

4.2.1 Subject to the terms and conditions of this Agreement, the Nodal Agency shall be the holder and administrator of this Agreement and shall inter alia:

- a. appoint an Independent Engineer within 90 days of the Effective Date
- b. provide letters of recommendation to the concerned Indian Governmental Instrumentality, as may be requested by the TSP from time to time, for obtaining the Consents, Clearances and Permits required for the Project;
- c. coordinate among TSP and upstream/downstream entities in respect of Interconnection Facilities; and
- d. monitor the implementation of the Agreement and take appropriate action for breach thereof including revocation of guarantees, cancellation of Agreement, blacklisting etc
- e. provide all assistance to the Arbitrators as required for the performance of their duties and responsibilities; and
- f. perform any other responsibility (ies) as specified in this Agreement.

#### 4.3 Time for Commencement and Completion:

- a. The TSP shall take all necessary steps to commence work on the Project from the Effective Date of the Agreement and shall achieve Scheduled COD of the Project in accordance with the time schedule specified in Schedule 2 of this Agreement;
- b. The COD of each Element of the Project shall occur no later than the Scheduled COD or within such extended time to which the TSP shall be entitled under Article 4.4 hereto.



## Transmission Service Agreement

**4.4 Extension of time:**

- 4.4.1 In the event that the TSP is unable to perform its obligations for the reasons solely attributable to the Nodal Agency, the Scheduled COD shall be extended, by a 'day to day' basis, subject to the provisions of Article 13.
- 4.4.2 In the event that an Element or the Project cannot be commissioned by its Scheduled COD on account of any Force Majeure Event as per Article 11, the Scheduled COD shall be extended, by a 'day to day' basis for a period of such Force Majeure Event. Alternatively, if deemed necessary, the Nodal Agency may terminate the Agreement as per the provisions of Article 13.4 by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement.
- 4.4.3 If the Parties have not agreed, within thirty (30) days after the affected Party's performance has ceased to be affected by the relevant circumstance, on how long the Scheduled COD should be deferred by, any Party may raise the Dispute to be resolved in accordance with Article 16.

**4.5 Metering Arrangements:**

- 4.5.1 The TSP shall comply with all the provisions of the IEGC and the Central Electricity Authority (Installation and Operation of Meters) Regulations, 2006 as amended from time to time, with regard to the metering arrangements for the Project. The TSP shall fully cooperate with the CTU / STU / RLDC and extend all necessary assistance in taking meter readings.

**4.6 Interconnection Facilities:**

- 4.6.1 Subject to the terms and conditions of this Agreement, the TSP shall be responsible for connecting the Project with the interconnection point(s) specified in Schedule 1 of this Agreement. The Interconnection Facilities shall be developed as per the scope of work and responsibilities assigned in Schedule 1 of this Agreement. The Nodal Agency shall be responsible for coordinating to make available the Interconnection Facilities.
- 4.6.2 In order to remove any doubts, it is made clear that the obligation of the TSP within the scope of the project is to construct the Project as per Schedule-1 of this Agreement and in particular to connect it to the Interconnection Facilities as specified in this Agreement.



**ARTICLE: 5****5. CONSTRUCTION OF THE PROJECT****5.1 TSP's Construction Responsibilities:**

- 5.1.1 The TSP, at its own cost and expense, shall be responsible for designing, constructing, erecting, testing and commissioning each Element of the Project by the Scheduled COD in accordance with the Regulations and other applicable Laws specified in Article 4.1 of this Agreement.
- 5.1.2 The TSP acknowledges and agrees that it shall not be relieved from any of its obligations under this Agreement or be entitled to any extension of time or any compensation whatsoever by reason of the unsuitability of the Site or Transmission Line route(s).
- 5.1.3 The TSP shall be responsible for obtaining all Consents, Clearances and Permits related but not limited to road / rail / river / canal / power line / crossings, Power and Telecom Coordination Committee (PTCC), defence, civil aviation, right of way / way-leaves and environmental & forest clearances from relevant authorities required for developing, financing, constructing, maintaining/ renewing all such Consents, Clearances and Permits in order to carry out its obligations under this Agreement in general and shall furnish to the Nodal Agency such copy/ies of each Consents, Clearances and Permits, on demand. Nodal Agency shall provide letters of recommendation to the concerned Indian Governmental Instrumentality, as may be requested by the TSP from time to time, for obtaining the Consents, Clearances and Permits required for the Project.
- 5.1.4 The TSP shall be responsible for:
- a) deleted
  - b) deleted
  - c) survey and geo-technical investigation of line route in order to determine the final route of the Transmission Lines;
  - d) seeking access to the Site and other places where the Project is being executed, at its own risk and costs, including payment of any crop, tree compensation or any other compensation as may be required.



## Transmission Service Agreement

5.1.5 In case the Project involves any resettlement and rehabilitation, the resettlement and rehabilitation package will be implemented by the State Government authorities, for which the costs is to be borne by the TSP and no changes would be allowed in the Transmission Charges on account of any variation in the resettlement and rehabilitation cost. The TSP shall provide assistance on best endeavour basis, in implementation of the resettlement and rehabilitation package, if execution of such package is in the interest of expeditious implementation of the Project and is beneficial to the Project affected persons.

**5.2 Appointing Contractors:**

5.2.1 The TSP shall conform to the requirements as provided in this Agreement while appointing Contractor(s) for procurement of goods & services.

5.2.2 The appointment of such Contractor(s) shall neither relieve the TSP of any of its obligations under this Agreement nor make the Nodal Agency liable for the performance of such Contractor(s).

**5.3 Monthly Progress Reporting:**

The TSP shall provide to the CEA, Nodal Agency & Independent Engineer, on a monthly basis, progress reports along with likely completion date of each Element with regard to the Project and its execution (in accordance with prescribed form). The Nodal Agency/ CEA shall monitor the development of the Project for its timely completion for improving and augmenting the electricity system as a part of its statutory responsibility.

**5.4 Quality of Workmanship:**

The TSP shall ensure that the Project is designed, built and completed in a good workmanship using sound engineering and construction practices, and using only materials and equipment that are new and manufactured as per the MQP and following approved FQP for erection, testing & commissioning and complying with Indian /International Standards such that, the useful life of the Project will be at least thirty five (35) years from the COD of the Project.

The TSP shall ensure that all major substation equipment / component (e.g. transformers, reactors, Circuit Breakers, Instrument Transformers (IT), Surge Arresters (SA), Protection relays, clamps & connectors etc.), equipment in terminal stations of HVDC installations including Thyristor/ IGBT valves, Converter Transformers, smoothing reactors, Transformer bushings and wall bushings, GIS bus



## Transmission Service Agreement

ducts, towers and gantry structures and transmission towers or poles and line materials (conductors, earthwire, OPGW, insulator, accessories for conductors, OPGW & earthwires, hardware fittings for insulators, aviation lights etc), facilities and system shall be designed, constructed and tested (Type test, Routine tests, Factory Acceptance Test (FAT)) in accordance with relevant CEA Regulations and Indian Standards. In case Indian Standards for any particular equipment/ system/ process is not available, IEC/ IEEE or equivalent International Standards and Codes shall be followed.

### 5.5 Progress Monitoring & Quality Assurance:

- 5.5.1 The Project Execution Plan submitted by the TSP in accordance with Article 3.1.3 c) shall comprise of detailed schedule of all the equipments/items /materials required for the Project, right from procurement of raw material till the dispatch from works and receipt at the site. Further, it should also include various stages of the construction schedule up to the commissioning of the Project.
- 5.5.2 Nodal Agency, CEA & Independent Engineer shall have access at all reasonable times to the Site and to the Manufacturer's works and to all such places where the Project is being executed.
- 5.5.3 Independent Engineer shall ensure conformity of the conductor specifications with the functional specifications specified in RFP.
- 5.5.4 The Independent Engineer shall monitor the following during construction of the Project:
- a) Quality of equipments, material, foundation, structures and workmanship etc. as laid down in Article 5.4 and 6.1.4 of the TSA. Specifically, quality of Sub-station equipments, transmission line material and workmanship etc. would be checked in accordance with the Article 5.4.
  - b) Progress in the activities specified in Condition Subsequent
  - c) Verification of readiness of the elements including the statutory clearances & completion of civil works, fixing of all components and finalisation of punch points (if any) prior to charging of the elements
  - d) Progress of construction of substation and Transmission Lines

## Transmission Service Agreement

5.5.5 The progress shall be reviewed by the Independent Engineer against the Project Execution Plan. The Independent Engineer shall prepare its report on monthly basis and submit the same to Nodal Agency highlighting the progress achieved till the end of respective month vis-à-vis milestone activities, areas of concern, if any, which may result in delay in the timely completion of the Project. Based on the progress, Nodal Agency and/ or CEA shall issue written instructions to the TSP to take corrective measures, as may be prudent for the timely completion of the Project. In case of any deficiency, the Nodal Agency would be at liberty to take action in accordance with the procedure of this Agreement.

5.5.6 For any delay in commissioning any critical Element(s), as identified in Schedule 1 & Schedule 2 of this Agreement, beyond a period of 45 days shall lead to a sequestration of 10% of the Contract Performance Guarantee.

#### 5.6 Site regulations and Construction Documents

The TSP shall abide by the Safety Rules and Procedures as mentioned in Schedule 3 of this Agreement

The TSP shall retain at the Site and make available for inspection at all reasonable times, copies of the Consents, Clearances and Permits, construction drawings and other documents related to construction.

#### 5.7 Supervision of work:

The TSP shall provide all necessary superintendence for execution of the Project and its supervisory personnel shall be available to provide full-time superintendence for execution of the Project. The TSP shall provide skilled personnel who are experienced in their respective fields.

#### 5.8 Remedial Measures:

The TSP shall take all necessary actions for remedying the shortfall in achievement of timely progress in execution of the Project, if any, as intimated by the Independent Engineer and/ or CEA and/ or the Nodal Agency. However, such intimation by the Independent Engineer and/ or CEA and/ or the Nodal Agency and the subsequent effect of such remedial measures carried out by the TSP shall not relieve the TSP of its obligations in the Agreement. Independent Engineer and/ or CEA and/ or the Nodal Agency may carry out random inspections during the Project



## Transmission Service Agreement

execution, as and when deemed necessary by it. If the shortfalls as intimated to the TSP are not remedied to the satisfaction of the CEA and/ or the Nodal Agency, this Agreement may be terminated by the Nodal Agency by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement.



**ARTICLE: 6****6. CONNECTION AND COMMISSIONING OF THE PROJECT****6.1 Connection with the Inter-Connection Facilities:**

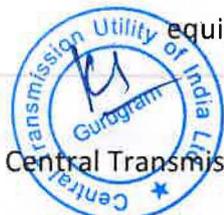
6.1.1 The TSP shall give the RLDC(s), CTU, / STU, as the case may be, and any other agencies as required, at least sixty (60) days advance written notice of the date on which it intends to connect an Element of the Project, which date shall not be earlier than its Scheduled COD or Schedule COD extended as per Article 4.4.1 & 4.4.2 of this Agreement, unless mutually agreed to by Parties. Further, any preponing of COD of any element prior to Scheduled COD must be approved by the Nodal Agency.

6.1.2 The RLDC / SLDC (as the case may be) or the CTU / STU (as the case may be), for reasonable cause, including non-availability of Interconnection Facilities as per Article 4.2, can defer the connection for up to fifteen (15) days from the date notified by the TSP pursuant to Article 6.1.1, if it notifies to the TSP in writing, before the date of connection, of the reason for the deferral and when the connection is to be rescheduled. However, no such deferment on one or more occasions would be for more than an aggregate period of thirty (30) days. Further, the Scheduled COD would be extended as required, for all such deferments on "day to day" basis.

6.1.3 Subject to Articles 6.1.1 and 6.1.2, any Element of Project may be connected with the Interconnection Facilities when:

- a. it has been completed in accordance with this Agreement and the Connection Agreement;
- b. it meets the Grid Code, Central Electricity Authority (Technical Standards for Connectivity to the Grid) Regulations, 2007 as amended from time to time and all other Indian legal requirements, and
- c. The TSP has obtained the approval in writing of the Electrical Inspector certifying that the Element is ready from the point of view of safety of supply and can be connected with the Interconnection Facilities.
- d. It has satisfactorily met all the testing requirements as per Articles 6.1.4.

6.1.4 Site Acceptance Test (SAT)/ pre-commissioning tests of all major substation equipment, component, system, facilities shall be successfully carried out before



commissioning. The Type tests, FAT and SAT reports should be available at the substation / terminal station of HVDC installations for ready reference of operation and maintenance staff and has to be made available to the Independent Engineer appointed for quality monitoring or their authorised representatives, as and when they wish to examine the same.

## 6.2 Commercial Operation:

6.2.1 An Element of the Project shall be declared to have achieved COD twenty four (24) hours following the connection of the Element with the Interconnection Facilities pursuant to Article 6.1 or seven (7) days after the date on which it is declared by the TSP to be ready for charging but is not able to be charged for reasons not attributable to the TSP subject to Article 6.1.2.

Provided that an Element shall be declared to have achieved COD only after all the Element(s), if any, which are pre-required to have achieved COD as defined in Schedule 2 of this Agreement, have been declared to have achieved their respective COD.

6.2.2 Once any Element of the Project has been declared to have achieved deemed COD as per Article 6.2.1 above, such Element of the Project shall be deemed to have Availability equal to the Target Availability till the actual charging of the Element and to this extent, TSP shall be eligible for the Monthly Transmission Charges applicable for such Element.

## 6.3 Compensation for Direct Non Natural Force Majeure Event or Indirect Non Natural Force Majeure Event or Natural Force Majeure Event (affecting the Nodal Agency)

6.3.1 If the TSP is otherwise ready to connect the Element(s) of the Project and has given due notice, as per provisions of Article 6.1.1, to the concerned agencies of the date of intention to connect the Element(s) of the Project, where such date is not before the Scheduled COD, but is not able to connect the Element(s) of the Project by the said date specified in the notice, due to Direct Non Natural Force Majeure Event or Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency, provided such Direct Non Natural Force Majeure Event or Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency has continued for a period of more than three (3) continuous or non-continuous Months, the TSP shall, until the effects of the Direct Non Natural Force



## Transmission Service Agreement

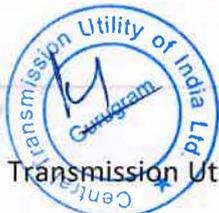
Majeure Event or of Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency no longer prevent the TSP from connecting the Element(s) of the Project, be deemed to have achieved COD relevant to that date and to this extent, be deemed to have been providing Transmission Service with effect from the date notified, and shall be treated as follows:

- a. In case of delay due to Direct Non Natural Force Majeure Event, TSP is entitled for Transmission Charges calculated on Target Availability for the period of such events in excess of three (3) continuous or non continuous Months in the manner provided in (c) below.
- b. In case of delay due to Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency, TSP is entitled for payment for debt service which is due under the Financing Agreements, subject to a maximum of Transmission Charges calculated on Target Availability, for the period of such events in excess of three (3) continuous or non continuous Months in the manner provided in (c) below.
- c. In case of delay due to Direct Non Natural Force Majeure Event or Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency, the TSP is entitled for payments mentioned in (a) and (b) above, after commencement of Transmission Service, in the form of an increase in Transmission Charges. These amounts shall be paid from the date, being the later of a) the date of cessation of such Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency and b) the completion of sixty (60) days from the receipt of the Financing Agreements by the Nodal Agency from the TSP.

Provided such increase in Transmission Charges shall be so as to put the TSP in the same economic position as the TSP would have been in case the TSP had been paid amounts mentioned in (a) and (b) above in a situation where the Force Majeure Event had not occurred.

For the avoidance of doubt, it is clarified that the charges payable under this Article 6.3.1 shall be recovered as per Sharing Regulations.

#### 6.4 Liquidated Damages for Delay in achieving COD of Project:



## Transmission Service Agreement

6.4.1 If the TSP fails to achieve COD of any Element of the Project or the Project, by the Element's / Project's Scheduled COD or such Scheduled COD as extended under Articles 4.4.1 and 4.4.3, then the TSP shall pay to the Nodal Agency, a sum equivalent to 3.33% of Monthly Transmission Charges applicable for the Element of the Project [in case where no Elements have been defined, to be on the Project as a whole] / Project, for each day of delay up to sixty (60) days of delay and beyond that time limit, at the rate of five percent (5%) of the Monthly Transmission Charges applicable to such Element / Project, as liquidated damages for such delay and not as penalty, without prejudice to any rights of the Nodal Agency under the Agreement.

6.4.2 The TSP's maximum liability under this Article 6.4 shall be limited to the amount of liquidated damages calculated in accordance with Article 6.4.1 for and up to six (6) months of delay for the Element or the Project.

Provided that, in case of failure of the TSP to achieve COD of the Element of the Project even after the expiry of six (6) months from its Scheduled COD, the provisions of Article 13 shall apply.

6.4.3 The TSP shall make payment to the Nodal Agency of the liquidated damages calculated pursuant to Article 6.4.1 within ten (10) days of the earlier of:

- a. the date on which the applicable Element achieves COD; or
- b. the date of termination of this Agreement.

The payment of such damages shall not relieve the TSP from its obligations to complete the Project or from any other obligation and liabilities under the Agreement.

6.4.4 If the TSP fails to pay the amount of liquidated damages to the Nodal Agency within the said period of ten (10) days, the Nodal Agency shall be entitled to recover the said amount of the liquidated damages by invoking the Contract Performance Guarantee. If the then existing Contract Performance Guarantee is for an amount which is less than the amount of the liquidated damages payable by the TSP to the Nodal Agency under this Article 6.3 and the TSP fails to make payment of the balance amount of the liquidated damages not covered by the Contract Performance Guarantee, then such balance amount shall be deducted from the Transmission Charges payable to the TSP. The right of the Nodal Agency to encash



Central Transmission Utility of India Limited

37

Bikaner III Neemrana II Transmission Limited

## Transmission Service Agreement

the Contract Performance Guarantee is without prejudice to the other rights of the Nodal Agency under this Agreement.

6.4.5 For avoidance of doubt, it is clarified that amount payable by TSP under this Article is over and above the penalty payable by TSP under Article 5.5.6 of this Agreement.

### 6.5 Return of Contract Performance Guarantee

6.5.1 The Contract Performance Guarantee as submitted by TSP in accordance with Article 3.1.1 shall be released by the Nodal Agency within three (3) months from the COD of the Project. In the event of delay in achieving Scheduled COD of any of the Elements by the TSP (otherwise than due to reasons as mentioned in Article 3.1.3 or Article 11) and consequent part invocation of the Contract Performance Guarantee by the Nodal Agency, Nodal Agency shall release the Contract Performance Guarantee, if any remaining unadjusted, after the satisfactory completion by the TSP of all the requirements regarding achieving the Scheduled COD of the remaining Elements of the Project. It is clarified that the Nodal Agency shall also return / release the Contract Performance Guarantee in the event of (i) applicability of Article 3.3.2 to the extent the Contract Performance Guarantee is valid for an amount in excess of **Rs 42 Crore (Rupees Forty Two Crore Only)**, or (ii) termination of this Agreement by the Nodal Agency as mentioned under Article 3.3.4 of this Agreement.

6.5.2 The release of the Contract Performance Guarantee shall be without prejudice to other rights of the Nodal Agency under this Agreement.



**ARTICLE: 7****7. OPERATION AND MAINTENANCE OF THE PROJECT****7.1 Operation and Maintenance of the Project:**

The TSP shall be responsible for ensuring that the Project is operated and maintained in accordance with the regulations made by the Commission and CEA from time to time and provisions of the Act.



**ARTICLE: 8****8. AVAILABILITY OF THE PROJECT****8.1 Calculation of Availability of the Project:**

Calculation of Availability for the Elements and for the Project, as the case may be, shall be as per **Appendix –II to Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019**, as applicable on the Bid Deadline and as appended in Schedule 6 of this Agreement.

**8.2 Target Availability:**

The Target Availability of each Element and the Project shall be **98%**.

Payment of monthly Transmission charges based on actual availability will be calculated as per para 1.2 of Schedule 4 of this Agreement.

If the availability of any Element or the Project is below the Target Availability, for six consecutive months in a Contract Year, the DIC(s) or the Nodal Agency may issue a show cause notice to the TSP, asking them to show cause as to why the Transmission Service Agreement be not terminated, and if no satisfactory cause is shown it may terminate the Agreement. If the Nodal Agency is of the opinion that the transmission system is of critical importance, it may carry out or cause to carry out the operation and maintenance of transmission system at the risk and cost of TSP.



**ARTICLE: 9****9. INSURANCES****9.1 Insurance:**

- 9.1.1 The TSP shall effect and maintain or cause to be effected and maintained during the Construction Period and the Operating Period, adequate Insurances against such risks, with such deductibles including but not limited to any third party liability and endorsements and co-beneficiary/insured, as may be necessary under
- a. any of the Financing Agreements,
  - b. the Laws, and
  - c. in accordance with Prudent Utility Practices.

The Insurances shall be taken effective from a date prior to the date of the Financial Closure till the Expiry Date.

**9.2 Evidence of Insurance cover:**

- 9.2.1 The TSP shall furnish to the Nodal Agency copies of certificates and policies of the Insurances, as and when the Nodal Agency may seek from the TSP as per the terms of Article 9.1

**9.3 Application of Insurance Proceeds:**

- 9.3.1 Save as expressly provided in this Agreement, the policies of Insurances and the Financing Agreements, the proceeds of any insurance claim made due to loss or damage to the Project or any part of the Project shall be first applied to reinstatement, replacement or renewal of such loss or damage.
- 9.3.2 If a Natural Force Majeure Event renders the Project no longer economically and technically viable and the insurers under the Insurances make payment on a "total loss" or equivalent basis, the portion of the proceeds of such Insurance available to the TSP (after making admissible payments to the Lenders as per the Financing Agreements) shall be allocated only to the TSP. Nodal Agency and / or concerned Designated ISTS Customers shall have no claim on such proceeds of the Insurance:
- 9.3.3 Subject to the requirements of the Lenders under the Financing Agreements, any

## Transmission Service Agreement

dispute or difference between the Parties as to whether the Project is no longer economically and technically viable due to a Force Majeure Event or whether that event was adequately covered in accordance with this Agreement by the Insurances shall be determined in accordance with Article 16.

**9.4 Effect on liability of the Nodal Agency / Designated ISTS Customers**

9.4.1 The Nodal Agency and / or the Designated ISTS Customers shall have no financial obligations or liability whatsoever towards the TSP in respect of this Article 9.



**ARTICLE: 10****10. BILLING AND PAYMENT OF TRANSMISSION CHARGES**

10.1 Subject to provisions of this Article 10, the Monthly Transmission Charges shall be paid to the TSP, in Indian Rupees, on monthly basis as per the provisions of the Sharing Regulations, from the date on which an Element(s) has achieved COD until the Expiry Date of this Agreement, unless terminated earlier and in line with the provisions of Schedule 4 of this Agreement.

**10.2 Calculation of Monthly Transmission Charges:**

The Monthly Transmission Charges for each Contract Year including Incentive & Penalty payment shall be calculated in accordance with the provisions of Schedule 4 of this Agreement.

**10.3 Rebate & Late Payment Surcharge:**

The rebate and late payment surcharge shall be governed as per Sharing Regulations.

**10.4 Disputed Bills, Default in payment by the Designated ISTS Customers & Annual Reconciliation:**

Any Disputed Bill, Default in payment by the Designated ISTS Customers & Annual Reconciliation shall be governed as per Sharing Regulations.

**ARTICLE: 11****11. FORCE MAJEURE****11.1 Definitions**

11.1.1 The following terms shall have the meanings given hereunder.

**11.2 Affected Party**

11.2.1 An Affected Party means any Party whose performance has been affected by an event of Force Majeure.

11.2.2 Any event of Force Majeure shall be deemed to be an event of Force Majeure affecting the TSP only if the Force Majeure event affects and results in, late delivery of machinery and equipment for the Project or construction, completion, commissioning of the Project by Scheduled COD and/or operation thereafter;

**11.3 Force Majeure**

A 'Force Majeure' means any event or circumstance or combination of events and circumstances including those stated below that wholly or partly prevents or unavoidably delays an Affected Party in the performance of its obligations/ roles under this Agreement, but only if and to the extent that such events or circumstances are not within the reasonable control, directly or indirectly, of the Affected Party and could not have been avoided if the Affected Party had taken reasonable care or complied with Prudent Utility Practices:

**a) Natural Force Majeure Events:**

- i. act of God, including, but not limited to drought, fire and explosion (to the extent originating from a source external to the Site), earthquake, volcanic eruption, landslide, flood, cyclone, typhoon, tornado, or exceptionally adverse weather conditions, which are in excess of the statistical measures for the last hundred (100) years; and
- ii. epidemic/ pandemic notified by Indian Governmental Instrumentality.

**b) Non-Natural Force Majeure Events:**

- i. Direct Non-Natural Force Majeure Events



## Transmission Service Agreement

- Nationalization or compulsory acquisition by any Indian Governmental Instrumentality of any material assets or rights of the Affected Party; or
- the unlawful, unreasonable or discriminatory revocation of, or refusal to renew, any Consents, Clearances and Permits required by the Affected Party to perform their obligations/ roles under the RFP Project Documents or any unlawful, unreasonable or discriminatory refusal to grant any other Consents, Clearances and Permits required for the development/ operation of the Project, provided that a Competent Court of Law declares the revocation or refusal to be unlawful, unreasonable and discriminatory and strikes the same down; or
- any other unlawful, unreasonable or discriminatory action on the part of an Indian Governmental Instrumentality which is directed against the Project, provided that a Competent Court of Law declares the action to be unlawful, unreasonable and discriminatory and strikes the same down.

ii. Indirect Non - Natural Force Majeure Events

- act of war (whether declared or undeclared), invasion, armed conflict or act of foreign enemy, blockade, embargo, revolution, riot, insurrection, terrorist or military action; or
- radio active contamination or ionising radiation originating from a source in India or resulting from any other Indirect Non Natural Force Majeure Event mentioned above, excluding circumstances where the source or cause of contamination or radiation is brought or has been brought into or near the Site by the Affected Party or those employed or engaged by the Affected Party; or
- industry-wide strikes and labour disturbances, having a nationwide impact in India.

#### 11.4 Force Majeure Exclusions

11.4.1 Force Majeure shall not include (i) any event or circumstance which is within the reasonable control of the Parties and (ii) the following conditions, except to the



*Handwritten signature*

## Transmission Service Agreement

extent that they are consequences of an event of Force Majeure:

- (a) Unavailability, late delivery, or changes in cost of the machinery, equipment, materials, spare parts etc. for the Project;
- (b) Delay in the performance of any Contractors or their agents;
- (c) Non-performance resulting from normal wear and tear typically experienced in transmission materials and equipment;
- (d) Strikes or labour disturbance at the facilities of the Affected Party;
- (e) Insufficiency of finances or funds or the Agreement becoming onerous to perform; and
- (f) Non-performance caused by, or connected with, the Affected Party's:
  - i. negligent or intentional acts, errors or omissions;
  - ii. failure to comply with an Indian Law; or
  - iii. breach of, or default under this Agreement or any Project Documents.
- (g) Any error or omission in the survey report provided by BPC during the bidding process.

### 11.5 Notification of Force Majeure Event

11.5.1 The Affected Party shall give notice to the other Party of any event of Force Majeure as soon as reasonably practicable, but not later than seven (7) days after the date on which such Party knew or should reasonably have known of the commencement of the event of Force Majeure. If an event of Force Majeure results in a breakdown of communications rendering it unreasonable to give notice within the applicable time limit specified herein, then the Party claiming Force Majeure shall give such notice as soon as reasonably practicable after reinstatement of communications, but not later than one (1) day after such reinstatement.

Provided that, such notice shall be a pre-condition to the Affected Party's entitlement to claim relief under this Agreement. Such notice shall include full particulars of the event of Force Majeure, its effects on the Party claiming relief and the remedial measures proposed. The Affected Party shall give the other Party

## Transmission Service Agreement

regular reports on the progress of those remedial measures and such other information as the other Party may reasonably request about the Force Majeure.

11.5.2 The Affected Party shall give notice to the other Party of (i) the cessation of the relevant event of Force Majeure; and (ii) the cessation of the effects of such event of Force Majeure on the performance of its rights or obligations/ roles under this Agreement, as soon as practicable after becoming aware of each of these cessations.

#### 11.6 Duty to perform and duty to mitigate

To the extent not prevented by a Force Majeure Event, the Affected Party shall continue to perform its obligations/ roles as provided in this Agreement. The Affected Party shall use its reasonable efforts to mitigate the effect of any event of Force Majeure as soon as practicable.

#### 11.7 Available Relief for a Force Majeure Event

Subject to this Article 11,

- (a) no Party shall be in breach of its obligations/ roles pursuant to this Agreement to the extent that the performance of its obligations/ roles was prevented, hindered or delayed due to a Force Majeure Event;
- (b) each Party shall be entitled to claim relief for a Force Majeure Event affecting its performance in relation to its obligations/ roles under Articles 3.3.4, 4.4.2 and 6.3.1 of this Agreement.
- (c) For the avoidance of doubt, it is clarified that the computation of Availability of the Element(s) under outage due to Force Majeure Event, as per Article 11.3 affecting the TSP shall be as per **Appendix-II to Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019** as on Bid Deadline. For the event(s) for which the Element(s) is/are deemed to be available as per **Appendix -II to Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019**, then the Transmission Charges, as applicable to such Element(s), shall be payable as per Schedule 4, for the duration of such event(s).
- (d) For so long as the TSP is claiming relief due to any Force Majeure Event under this Agreement, the Nodal Agency may, if it so desires, from time to time on one (1) day notice, inspect the Project and the TSP shall provide the Nodal



## Transmission Service Agreement

Agency's personnel with access to the Project to carry out such inspections.

- (e) For avoidance of doubt, the TSP acknowledges that for extension of Scheduled COD a period up to one hundred eighty (180) days due to Force Majeure event, no compensation on the grounds such as interest cost, incident expenditure, opportunity cost will be made to the TSP. However, if Scheduled COD is extended beyond a period of one hundred eighty (180) days due to Force Majeure event, the TSP will be allowed to recover the interest cost during construction corresponding to the period exceeding one hundred eighty (180) days by adjustment in the Transmission Charges in accordance with Schedule 9.



**ARTICLE: 12****12. CHANGE IN LAW****12.1 Change in Law**

12.1.1 Change in Law means the occurrence of any of the following after the Bid Deadline resulting into any additional recurring / non-recurring expenditure by the TSP or any savings of the TSP:

- the enactment, coming into effect, adoption, promulgation, amendment, modification or repeal (without re-enactment or consolidation) in India, of any Law, including rules and regulations framed pursuant to such Law, subject to the provisions under Article 12.1.2;
- a change in the interpretation or application of any Law by any Indian Governmental Instrumentality having the legal power to interpret or apply such Law, or any Competent Court of Law;
- the imposition of a requirement for obtaining any Consents, Clearances and Permits which was not required earlier;
- a change in the terms and conditions prescribed for obtaining any Consents, Clearances and Permits or the inclusion of any new terms or conditions for obtaining such Consents, Clearances and Permits;
- any change in the licensing regulations of the Commission, under which the Transmission License for the Project was granted if made applicable by such Commission to the TSP;
- change in wind zone; or
- any change in tax or introduction of any tax made applicable for providing Transmission Service by the TSP as per the terms of this Agreement.

12.1.2 Notwithstanding anything contained in this Agreement, Change in Law shall not cover any change:

- a) Taxes on corporate income; and
- b) Withholding tax on income or dividends distributed to the shareholders of the TSP.



## Transmission Service Agreement

**12.2 Relief for Change in Law**

12.2.1 During Construction Period, the impact of increase/decrease in the cost of the Project on the Transmission Charges shall be governed by the formula given in Schedule 9 of this Agreement

12.2.2 During the Operation Period:

During the operation period, if as a result of Change in Law, the TSP suffers or is benefited from a change in costs or revenue, the aggregate financial effect of which exceeds 0.30% (zero point three percent) of the Annual Transmission Charges in aggregate for a Contract Year, the TSP may notify so to the Nodal Agency and propose amendments to this Agreement so as to place the TSP in the same financial position as it would have enjoyed had there been no such Change in Law resulting in change in costs or revenue as aforesaid.

12.2.3 For any claims made under Articles 12.2.1 and 12.2.2 above, the TSP shall provide to the Nodal Agency documentary proof of such increase / decrease in cost of the Project / revenue for establishing the impact of such Change in Law.

In cases where Change in Law results in decrease of cost and it comes to the notice of Nodal Agency that TSP has not informed Nodal Agency about such decrease in cost, Nodal Agency may initiate appropriate claim.

**12.3 Notification of Change in Law:**

12.3.1 If the TSP is affected by a Change in Law in accordance with Article 12.1 and wishes to claim relief for such Change in Law under this Article 12, it shall give notice to Nodal Agency of such Change in Law as soon as reasonably practicable after becoming aware of the same.

12.3.2 The TSP shall also be obliged to serve a notice to the Nodal Agency even when it is beneficially affected by a Change in Law.

12.3.3 Any notice served pursuant to Articles 12.3.1 and 12.3.2 shall provide, amongst other things, precise details of the Change in Law and its estimated impact on the TSP.

**12.4 Payment on account of Change in Law**

12.4.1 The payment for Change in Law shall be through a separate Bill. However, in case of any change in Monthly Transmission Charges by reason of Change in Law, as



Transmission Service Agreement

determined in accordance with this Agreement, the Bills to be raised by the Nodal Agency after such change in Transmission Charges shall appropriately reflect the changed Monthly Transmission Charges.



Central Transmission Utility of India Limited

51 Bikaner III Neemrana II Transmission Limited



**ARTICLE: 13****13. EVENTS OF DEFAULT AND TERMINATION****13.1 TSP's Event of Default**

The occurrence and continuation of any of the following events shall constitute a TSP Event of Default, unless any such TSP Event of Default occurs as a result of any non-fulfilment of its obligations as prescribed under this Agreement by the Nodal Agency or a Force Majeure Event:

- a. After having taken up the construction of the Project, the abandonment by the TSP or the TSP's Contractors of the construction of the Project for a continuous period of two (2) months and such default is not rectified within thirty (30) days from the receipt of notice from the Nodal Agency in this regard;
- b. The failure to commission any Element of the Project by the date falling six (6) months after its Scheduled COD unless extended by Nodal Agency as per provisions of this Agreement;
- c. If the TSP:
  - i. assigns, mortgages or charges or purports to assign, mortgage or charge any of its assets or rights related to the Project in contravention of the provisions of this Agreement; or
  - ii. transfers or novates any of its obligations pursuant to this Agreement, in a manner contrary to the provisions of this Agreement;

Except where such transfer is in pursuance of a Law and

- it does not affect the ability of the transferee to perform, and such transferee has the financial and technical capability to perform, its obligations under this Agreement;
- is to a transferee who assumes such obligations under the Project and this Agreement remains effective with respect to the transferee;

d. If:



## Transmission Service Agreement

- i. The TSP becomes voluntarily or involuntarily the subject of any bankruptcy or insolvency or winding up proceedings and such proceedings remain uncontested for a period of thirty (30) days; or
- ii. any winding up or bankruptcy or insolvency order is passed against the TSP; or
- iii. the TSP goes into liquidation or dissolution or a receiver or any similar officer is appointed over all or substantially all of its assets or official liquidator is appointed to manage its affairs, pursuant to Law,

Provided that a dissolution or liquidation of the TSP will not be a TSP's Event of Default, where such dissolution or liquidation of the TSP is for the purpose of a merger, consolidation or reorganization with the prior approval of the Commission as per the provisions of Central Electricity Regulatory Commission (Procedure, terms and Conditions for grant of Transmission License and other related matters) Regulations, 2006 or as amended from time to time; or

- e. Failure on the part of the TSP to comply with the provisions of Article 19.1 of this Agreement; or
- f. the TSP repudiates this Agreement and does not rectify such breach even within a period of thirty (30) days from a notice from the Nodal Agency in this regard; or
- g. after Commercial Operation Date of the Project, the TSP fails to achieve monthly Target Availability of 98% for a period of six (6) consecutive months or within a non-consecutive period of six (6) months within any continuous aggregate period of eighteen(18) months except where the Availability is affected by Force Majeure Events as per Article 11; or
- h. any of the representations and warranties made by the TSP in Article 17 of this Agreement being found to be untrue or inaccurate. Further, in addition to the above, any of the undertakings submitted by the Selected Bidder at the time of submission of the Bid being found to be breached or inaccurate, including but not limited to undertakings



## Transmission Service Agreement

from its Parent Company / Affiliates related to the minimum equity obligation; or

- i. the TSP fails to complete / fulfil all the activities / conditions within the specified period as per Article 3; or
- j. except for the reasons solely attributable to Nodal Agency, the TSP is in material breach of any of its obligations under this Agreement and such material breach is not rectified by the TSP within thirty (30) days of receipt of notice in this regard from the Nodal Agency; or
- k. deleted

### 13.2 Termination Procedure for TSP Event of Default

- a. Upon the occurrence and continuance of any TSP's Event of Default under Article 13.1 the Nodal Agency may serve notice on the TSP, with a copy to the CEA and the Lenders' Representative, of their intention to terminate this Agreement (a "Nodal Agency's Preliminary Termination Notice"), which shall specify in reasonable detail, the circumstances giving rise to such Nodal Agency's Preliminary Termination Notice.
- b. Following the issue of a Nodal Agency's Preliminary Termination Notice, the Consultation Period shall apply and would be for the Parties to discuss as to what steps shall be taken with a view to mitigate the consequences of the relevant Event of Default having regard to all the circumstances.
- c. During the Consultation Period, the Parties shall, save as otherwise provided in this Agreement, continue to perform their respective obligations/ roles under this Agreement, and the TSP shall not remove any material, equipment or any part of the Project, without prior consent of the Nodal Agency.

Following the expiry of the Consultation Period, unless the Parties shall have otherwise agreed to the contrary or the circumstances giving rise to Nodal Agency's Preliminary Termination Notice shall have ceased to exist or shall have been remedied, this Agreement may be terminated by the Nodal Agency by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement.



## Transmission Service Agreement

Further, the Nodal Agency may also initiate proceedings to blacklist the TSP & its Affiliates from participation in any RFP issued by BPCs for a period of 5 years.

### 13.3 Procedure for Nodal Agency's non-fulfilment of Role

- a. Upon the Nodal Agency not being able to fulfil its role under Article 4.2, the TSP may serve notice on the Nodal Agency, with a copy to CEA and the Lenders' Representative (a "TSP's Preliminary Notice"), which notice shall specify in reasonable detail the circumstances giving rise to such non-fulfilment of role by the Nodal Agency.
- b. Following the issue of a TSP's Preliminary Notice, the Consultation Period shall apply.
- c. The Consultation Period would be for the Parties to discuss as to what steps shall be taken with a view to mitigate the consequences of the relevant non-fulfilment of role by the Nodal Agency including giving time extension to TSP, having regard to all the circumstances.
- d. During the Consultation Period, both Parties shall, save as otherwise provided in this Agreement, continue to perform their respective obligations/ roles under this Agreement.

### 13.4 Termination due to Force Majeure

13.4.1 In case the Parties could not reach an agreement pursuant to Articles 3.3.4 and 4.4.2 of this Agreement and the Force Majeure Event or its effects continue to be present, the Nodal Agency shall have the right to cause termination of the Agreement. In case of such termination, the Contract Performance Guarantee shall be returned to the TSP as per the provisions of Article 6.5.1.

13.4.2 In case of termination of this Agreement, the TSP shall provide to the Nodal Agency the full names and addresses of its Contractors as well as complete designs, design drawings, manufacturing drawings, material specifications and technical information, as required by the Nodal Agency within thirty (30) days of Termination Notice.



## Transmission Service Agreement

**13.5 Termination or amendment due to non-requirement of any Element or Project during construction**

13.5.1 In case any Element or Project, which is under construction, is no longer required due to any reason whatsoever, the Nodal Agency may issue a notice to this effect to the TSP.

13.5.2 Nodal agency may also issue notice to the TSP seeking their response to the proposed termination/ amendment (as the case may be) of the Agreement. The Nodal Agency shall issue copy of such notice to Lenders. In the notice, Nodal Agency shall also include an assessment of the physical progress made by TSP in the Element/ Project (as the case may be) that is no longer required.

13.5.3 The TSP shall neither carry out further investment nor carry out any work on the Element/ Project (as the case may be) that is no longer required after delivery of the notice.

13.5.4 After taking into account the comments of the TSP, the Nodal Agency may terminate the Agreement or amend it if both Parties agree to the amendment.

**13.6 Revocation of the Transmission License**

13.6.1 The Commission may, as per the provisions of the Electricity Act, 2003, revoke the Transmission License of the ISTS Licensee. Further, in such a case, the Agreement shall be deemed to have been terminated.

**13.7 Termination Payment**

13.7.1 If Agreement is terminated on account of Force Majeure Events, non-requirement of any Element or Project during Construction, Nodal Agency's non-fulfilment of Role & TSP's Event of Default, the TSP shall be entitled for Termination Payment equivalent to valuation of Project Assets. Upon payment, the Nodal Agency shall take over the Project Assets.



**ARTICLE: 14****14. LIABILITY AND INDEMNIFICATION****14.1 Indemnity**

14.1.1 The TSP shall indemnify, defend and hold the Nodal Agency harmless against:

- (a) any and all third party claims, actions, suits or proceedings against the Nodal Agency for any loss of or damage to property of such third party, or death or injury to such third party, arising out of a breach by the TSP of any of its obligations under this Agreement, except to the extent that any such claim, action, suit or proceeding has arisen due to a negligent act or omission, breach of this Agreement or non-fulfilment of statutory duty on the part of Nodal Agency; and
- (b) any and all losses, damages, costs and expenses including legal costs, fines, penalties and interest actually suffered or incurred by the Nodal Agency from third party claims arising by reason of:
  - i. a breach by the TSP of any of its obligations under this Agreement, (provided that this Article 14 shall not apply to such breaches by the TSP, for which specific remedies have been provided for under this Agreement) except to the extent that any such losses, damages, costs and expenses including legal costs, fines, penalties and interest (together to constitute "Indemnifiable Losses") has arisen due to a negligent act or omission, breach of this Agreement or non-fulfilment of statutory duty on the part of the Nodal Agency, or
  - ii. any of the representations and warranties of the TSP under this Agreement being found to be inaccurate or untrue.

14.1.2 The Nodal Agency shall, in accordance with the Regulations framed by CERC in this regard, indemnify, defend and hold the TSP harmless against:

- (a) any and all third party claims, actions, suits or proceedings against the TSP, for any loss of or damage to property of such third party, or death or injury to such third party, arising out of any material breach by the Nodal Agency of any of their roles under this Agreement, except to the extent that any such claim, action, suit or proceeding has arisen due to a negligent act or omission,



## Transmission Service Agreement

breach of this Agreement or breach of statutory duty on the part of the TSP, its Contractors, servants or agents; and

- (b) any and all losses, damages, costs and expenses including legal costs, fines, penalties and interest ('Indemnifiable Losses') actually suffered or incurred by the TSP from third party claims arising by reason of:
- i. any material breach by the Nodal Agency of any of its roles under this Agreement (provided that, this Article 14 shall not apply to such breaches by the Nodal Agency, for which specific remedies have been provided for under this Agreement), except to the extent that any such Indemnifiable Losses have arisen due to a negligent act or omission, breach of this Agreement or breach of statutory duty on the part of the TSP, its Contractors, servants or agents or
  - ii. any of the representations and warranties of the Nodal Agency under this Agreement being found to be inaccurate or untrue.

#### 14.2 Patent Indemnity:

##### 14.2.1

- (a) The TSP shall, subject to the Nodal Agency's compliance with Article 14.2.1 (b), indemnify and hold harmless the Nodal Agency and its employees and officers from and against any and all suits, actions or administrative proceedings, claims, demands, losses, damages, costs, and expenses of whatsoever nature, including attorney's fees and expenses, which the Nodal Agency may suffer as a result of any infringement or alleged infringement of any patent, utility model, registered design, trademark, copyright or other intellectual property right registered or otherwise existing at the date of the Agreement by reason of the setting up of the Project by the TSP.

Such indemnity shall not cover any use of the Project or any part thereof other than for the purpose indicated by or to be reasonably inferred from the Agreement, any infringement resulting from the misuse of the Project or any part thereof, or any products produced in association or combination with any other equipment, plant or materials not supplied by the TSP, pursuant to the Agreement.

If any proceedings are brought or any claim is made against the Nodal Agency



## Transmission Service Agreement

arising out of the matters referred to in Article 14.2.1(a), the Nodal Agency shall promptly give the TSP a notice thereof, and the TSP shall at its own expense take necessary steps and attend such proceedings or claim and any negotiations for the settlement of any such proceedings or claim. The TSP shall promptly notify the Nodal Agency of all actions taken in such proceedings or claims.

- (c) If the TSP fails to notify the Nodal Agency within twenty-eight (28) days after receipt of such notice from the Nodal Agency under Article 14.2.1(b) above, that it intends to attend any such proceedings or claim, then the Nodal Agency shall be free to attend the same on their own behalf at the cost of the TSP. Unless the TSP has so failed to notify the Nodal Agency within the twenty eight (28) days period, the Nodal Agency shall make no admission that may be prejudicial to the defence of any such proceedings or claims.
- (d) The Nodal Agency shall, at the TSP's request, afford all available assistance to the TSP in attending to such proceedings or claim, and shall be reimbursed by the TSP for all reasonable expenses incurred in so doing.

## 14.2.2

- (a) The Nodal Agency, in accordance with the Regulations framed by CERC in this regard, subject to the TSP's compliance with Article 14.2.2(b) shall indemnify and hold harmless the TSP and its employees, officers from and against any and all suits, actions or administrative proceedings, claims, demands, losses, damages, costs and expenses of whatsoever nature, including attorney's fees and expenses, which the TSP may suffer as a result of any infringement or alleged infringement of any patent, utility model, registered design, trademark, copyright or other intellectual property right registered or otherwise existing at the date of the Agreement by reason of the setting up of the Project by the TSP.
- (b) If any proceedings are brought or any claim is made against the TSP arising out of the matters referred to in Article 14.2.2 (a) the TSP shall promptly give the Nodal Agency a notice thereof, and the Nodal Agency shall at its own expense take necessary steps and attend such proceedings or claim and any negotiations for the settlement of any such proceedings or claim. The Nodal Agency shall promptly notify the TSP of all actions taken in such proceedings or claims.



## Transmission Service Agreement

- (c) If the Nodal Agency fails to notify the TSP within twenty-eight (28) days after receipt of such notice from the TSP under Article 14.2.2(b) above, that it intends to attend any such proceedings or claim, then the TSP shall be free to attend the same on its own behalf at the cost of the Nodal Agency. Unless the Nodal Agency has so failed to notify the TSP within the twenty (28) days period, the TSP shall make no admission that may be prejudicial to the defence of any such proceedings or claim.
- (d) The TSP shall, at the Nodal Agency request, afford all available assistance to the Nodal Agency in attending to such proceedings or claim, and shall be reimbursed by the Nodal Agency for all reasonable expenses incurred in so doing.

**14.3 Monetary Limitation of liability**

14.3.1 A Party ("Indemnifying Party") shall be liable to indemnify the other Party ("Indemnified Party") under this Article 14 for any indemnity claims made in a Contract Year only up to an amount of **Rs. 2.80 Crore (Rupees Two Crore Eighty Lakh Only)**.

**14.4 Procedure for claiming indemnity**

14.4.1 Where the Indemnified Party is entitled to indemnification from the Indemnifying Party pursuant to Articles 14.1 or 14.2 the Indemnified Party shall promptly notify the Indemnifying Party of such claim, proceeding, action or suit referred to in Articles 14.1 or 14.2 in respect of which it is entitled to be indemnified. Such notice shall be given as soon as reasonably practicable after the Indemnified Party becomes aware of such claim, proceeding, action or suit. The Indemnifying Party shall be liable to settle the indemnification claim within thirty (30) days of receipt of the above notice.

Provided however that, if:

- i. the Parties choose to contest, defend or litigate such claim, action, suit or proceedings in accordance with Article 14.4.3 below; and
- ii. the claim amount is not required to be paid/deposited to such third party pending the resolution of the Dispute,

the Indemnifying Party shall become liable to pay the claim amount to the Indemnified Party or to the third party, as the case may be, promptly following the



## Transmission Service Agreement

resolution of the Dispute, if such Dispute is not settled in favour of the Indemnified Party.

14.4.2 The Indemnified Party may contest, defend and litigate a claim, action, suit or proceeding for which it is entitled to be indemnified under Articles 14.1 or 14.2 and the Indemnifying Party shall reimburse to the Indemnified Party all reasonable costs and expenses incurred by the Indemnified Party. However, such Indemnified Party shall not settle or compromise such claim, action, suit or proceedings without first getting the consent of the Indemnifying Party, which consent shall not be unreasonably withheld or delayed.

14.4.3 An Indemnifying Party may, at its own expense, assume control of the defence of any proceedings brought against the Indemnified Party if it acknowledges its obligation to indemnify such Indemnified Party, gives such Indemnified Party prompt notice of its intention to assume control of the defence, and employs an independent legal counsel at its own cost that is reasonably satisfactory to the Indemnified Party.

#### 14.5 Limitation on Liability

14.5.1 Except as expressly provided in this Agreement, neither the TSP nor the Nodal Agency nor their respective officers, directors, agents, employees or Affiliates (including, officers, directors, agents or employees of such Affiliates), shall be liable or responsible to the other Party or its Affiliates including its officers, directors, agents, employees, successors, insurers or permitted assigns for incidental, indirect or consequential, punitive or exemplary damages, connected with or resulting from performance or non-performance of this Agreement, or anything done in connection herewith, including claims in the nature of lost revenues, income or profits (other than payments expressly required and properly due under this Agreement), any increased expense of, reduction in or loss of transmission capacity or equipment used therefore, irrespective of whether such claims are based upon breach of warranty, tort (including negligence, whether of the Nodal Agency, the TSP or others), strict liability, contract, breach of statutory duty, operation of law or otherwise.

14.5.2 The Nodal Agency shall have no recourse against any officer, director or shareholder of the TSP or any Affiliate of the TSP or any of its officers, directors or shareholders for such claims excluded under this Article. The TSP shall also have no recourse against any officer, director or shareholder of the Nodal Agency, or any Affiliate of



## Transmission Service Agreement

the Nodal Agency or any of its officers, directors or shareholders for such claims excluded under this Article.

**14.6 Duty to Mitigate**

The party entitled to the benefit of an indemnity under this Article 14 shall take all reasonable measures to mitigate any loss or damage which has occurred. If the Party fails to take such measures, the other Party's liabilities shall be correspondingly reduced.



**ARTICLE: 15****15. ASSIGNMENTS AND CHARGES****15.1 Assignments:**

15.1.1 This Agreement shall be binding upon, and inure to the benefit of the Parties and their respective successors and permitted assigns. This Agreement shall not be assigned by any Party, except as provided in Article 15.3.

**15.2 Permitted Charges:**

15.2.1 Neither Party shall create or permit to subsist any encumbrance over all or any of its rights and benefits under this Agreement.

15.2.2 However, the TSP may create any encumbrance over all or part of the receivables, or the Project Assets of the Project in favour of the Lenders or the Lenders' Representative on their behalf, as security for amounts payable under the Financing Agreements and any other amounts agreed by the Parties.

Provided that:

- i. the Lenders or the Lenders' Representative on their behalf shall have entered into the Financing Agreements and agreed in writing to the provisions of this Agreement; and
- ii. any encumbrance granted by the TSP in accordance with this Article 15.2.2 shall contain provisions pursuant to which the Lenders or the Lender's Representative on their behalf agrees unconditionally with the TSP to release from such encumbrances upon payment by the TSP to the Lenders of all amounts due under the Financing Agreements.

15.2.3 Article 15.2.1 does not apply to:

- a. liens arising by operation of law (or by an agreement evidencing the same) in the ordinary course of the TSP developing and operating the Project;
- b. pledges of goods, the related documents of title and / or other related documents, arising or created in the ordinary course of the TSP developing and operating the Project; or



Central Transmission Utility of India Limited

63

Bikaner III Neemrana II Transmission Limited

## Transmission Service Agreement

- c. security arising out of retention of title provisions in relation to goods acquired in the ordinary course of the TSP developing and operating the Project.

**15.3 Substitution Rights of the Lenders**

15.3.1 The TSP would need to operate and maintain the Project under the provisions of this Agreement and cannot assign the Transmission License or transfer the Project or part thereof to any person by sale, lease, exchange or otherwise, without the prior approval of the Nodal Agency.

15.3.2 However, in the case of default by the TSP in debt repayments or in the case of default by the TSP as per Article 13 of this Agreement during the debt repayments, the Commission may, on an application from the Lenders, assign the Transmission License to the nominee of the Lenders subject to the fulfilment of the qualification requirements and provisions of the Central Electricity Regulatory Commission (Procedure, terms and Conditions for grant of Transmission License and other related matters) Regulations, 2006 and as amended from time to time.



**ARTICLE: 16****16. GOVERNING LAW AND DISPUTE RESOLUTION****16.1 Governing Law:**

This Agreement shall be governed by and construed in accordance with the Laws of India. Any legal proceedings in respect of any matters, claims or disputes under this Agreement shall be under the jurisdiction of appropriate courts in Delhi.

**16.2 Amicable Settlement:**

16.2.1 Either Party is entitled to raise any claim, dispute or difference of whatever nature arising under, out of or in connection with this Agreement, including its existence or validity or termination or whether during the execution of the Project or after its completion and whether prior to or after the abandonment of the Project or termination or breach of the Agreement by giving a written notice to the other Party, which shall contain:

- (i) a description of the Dispute;
- (ii) the grounds for such Dispute; and
- (iii) all written material in support of its claim.

16.2.2 The other Party shall, within thirty (30) days of issue of notice issued under Article 16.2.1, furnish:

- (i) counter-claim and defences, if any, regarding the Dispute; and
- (ii) all written material in support of its defences and counter-claim.

16.2.3 Within thirty (30) days of issue of notice by the Party pursuant to Article 16.2.1, if the other Party does not furnish any counter claim or defense under Article 16.2.2, or thirty (30) days from the date of furnishing counter claims or defence by the other Party, both the Parties to the Dispute shall meet to settle such Dispute amicably. If the Parties fail to resolve the Dispute amicably within thirty (30) days from the later of the dates mentioned in this Article 16.2.3, the Dispute shall be referred for dispute resolution in accordance with Article 16.3.

**16.3 Dispute Resolution:**

Central Transmission Utility of India Limited

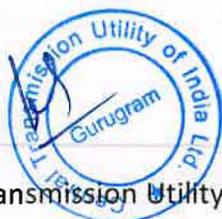
65 Bikaner III Neemrana II Transmission Limited

## Transmission Service Agreement

All Disputes shall be adjudicated by the Commission.

**16.4 Parties to Perform Obligations:**

Notwithstanding the existence of any Dispute and difference referred to the Commission as provided in Article 16.3 and save as the Commission may otherwise direct by a final or interim order, the Parties hereto shall continue to perform their respective obligations/ roles (which are not in dispute) under this Agreement.



**ARTICLE: 17****17. REPRESENTATION AND WARRANTIES****17.1 Representation and warranties of the Nodal Agency**

17.1.1 The Nodal Agency hereby represents and warrants to and agrees with the TSP as follows and acknowledges and confirms that the TSP is relying on such representations and warranties in connection with the transactions described in this Agreement:

- a. It has all requisite powers and authority to execute and consummate this Agreement;
- b. This Agreement is enforceable against the Nodal Agency in accordance with its terms;
- c. The consummation of the transactions contemplated by this Agreement on the part of Nodal Agency will not violate any provision of nor constitute a default under, nor give rise to a power to cancel any charter, mortgage, deed of trust or lien, lease, agreement, license, permit, evidence of indebtedness, restriction, or other contract to which the Nodal Agency is a Party or to which the Nodal Agency is bound, which violation, default or power has not been waived;

**17.2 Representation and Warranties of the TSP:**

17.2.1 The TSP hereby represents and warrants to and agrees with the Nodal Agency as follows and acknowledges and confirms that the Nodal Agency is relying on such representations and warranties in connection with the transactions described in this Agreement:

- a. It has all requisite powers and has been duly authorized to execute and consummate this Agreement;
- b. This Agreement is enforceable against it, in accordance with its terms;
- c. The consummation of the transactions contemplated by this Agreement on the part of the TSP will not violate any provision of nor constitute a default under, nor give rise to a power to cancel any charter, mortgage, deed of trust or lien, lease, agreement, license, permit, evidence of indebtedness,



**Transmission Service Agreement**

restriction, or other contract to which the TSP is a Party or to which the TSP is bound which violation, default or power has not been waived;

- d. The TSP is not insolvent and no insolvency proceedings have been instituted, nor threatened or pending by or against the TSP;
- e. There are no actions, suits, claims, proceedings or investigations pending or, to the best of the TSP's knowledge, threatened in writing against the TSP at law, in equity, or otherwise, and whether civil or criminal in nature, before or by, any court, commission, arbitrator or governmental agency or authority, and there are no outstanding judgments, decrees or orders of any such courts, commission, arbitrator or governmental agencies or authorities, which materially adversely affect its ability to execute the Project or to comply with its obligations under this Agreement.

17.2.2 The TSP makes all the representations and warranties above to be valid as on the Effective Date of this Agreement.



**ARTICLE: 18****18. INDEPENDENT ENGINEER****18.1 Appointment of Independent Engineer**

The Nodal Agency shall appoint an agency/ company as Independent Engineer as per framework provided in the Guidelines for Encouraging Competition in Development of Transmission Projects for selection of Independent Engineer.

**18.2 Roles and functions of Independent Engineer**

The role and functions of the Independent Engineer shall include the following:

- a. Progress Monitoring as required under this Agreement;
- b. Ensuring Quality as required under this Agreement;
- c. determining, as required under the Agreement, the costs of any works or services and/or their reasonableness during construction phase;
- d. determining, as required under the Agreement, the period or any extension thereof, for performing any duty or obligation during construction phase;
- e. determining, as required under the Agreement, the valuation of the Project Assets.
- f. Assisting the Parties in resolution of Disputes and
- g. Undertaking all other duties and functions in accordance with the Agreement.

**18.3 Remuneration of Independent Engineer**

The fee and charges of the Independent Engineer shall be paid by the Nodal Agency as per terms & conditions of appointment.

**18.4 Termination of appointment**

18.4.1 The Nodal Agency may, in its discretion, terminate the appointment of the Independent Engineer at any time, but only after appointment of another Independent Engineer.



## Transmission Service Agreement

18.4.2 If the TSP has reason to believe that the Independent Engineer is not discharging its duties and functions in a fair, efficient and diligent manner, it may make a written representation to the Nodal Agency and seek termination of the appointment of the Independent Engineer. Upon receipt of such representation, the Nodal Agency shall hold a tripartite meeting with the TSP and Independent Engineer for an amicable resolution, and the decision of Nodal agency is final. In the event that the appointment of the Independent Engineer is terminated hereunder, the Nodal Agency shall appoint forthwith another Independent Engineer.

**18.5 Authorised signatories**

The Nodal Agency shall require the Independent Engineer to designate and notify to the Nodal Agency up to 2 (two) persons employed in its firm to sign for and on behalf of the Independent Engineer, and any communication or document required to be signed by the Independent Engineer shall be valid and effective only if signed by any of the designated persons; provided that the Independent Engineer may, by notice in writing, substitute any of the designated persons by any of its employees.



**ARTICLE: 19****19. MISCELLANEOUS PROVISIONS****19.1 Equity Lock-in Commitment:**

19.1.1 The aggregate equity share holding of the Selected Bidder in the issued and paid up equity share capital of Bikaner III Neemrana II Transmission Limited shall not be less than Fifty one percent (51%) up to a period of one (1) year after COD of the Project.

Provided that, in case the Lead Member or Bidding Company is holding equity through Affiliate/s, Ultimate Parent Company or Parent Company, such restriction as specified above shall apply to such entities.

Provided further, that in case the Selected Bidder is a Bidding Consortium, the Lead Member shall continue to hold equity of at least twenty six percent (26%) upto a period of one (1) year after COD of the Project and any Member of such Bidding Consortium shall be allowed to divest its equity as long as the other remaining Members (which shall always include the Lead Member) hold the minimum equity specified above.

19.1.2 If equity is held by the Affiliates, Parent Company or Ultimate Parent Company of the Selected Bidder, then, subject to the second proviso to Article 19.1.1, such Affiliate, Parent Company or Ultimate Parent Company shall be eligible to transfer its shareholding in Bikaner III Neemrana II Transmission Limited to another Affiliate or to the Parent Company / Ultimate Parent Company of the Selected Bidder. If any such shareholding entity, qualifying as an Affiliate / Parent Company / Ultimate Parent Company, is likely to cease to meet the criteria to qualify as an Affiliate / Parent Company / Ultimate Parent Company, the shares held by such entity shall be transferred to another Affiliate / Parent Company / Ultimate Parent Company of the Selected Bidder.

19.1.3 Subject to Article 19.1.1, all transfer(s) of shareholding of Bikaner III Neemrana II Transmission Limited by any of the entities referred to in Article 19.1.1 and 19.1.2 above, shall be after prior written intimation to the Nodal Agency.

19.1.4 For computation of effective Equity holding, the Equity holding of the Selected Bidder or its Ultimate Parent Company in such Affiliate(s) or Parent Company and the equity holding of such Affiliate(s) or Ultimate Parent Company in Bikaner



### Transmission Service Agreement

III Neemrana II Transmission Limited shall be computed in accordance with the example given below:

If the Parent Company or the Ultimate Parent Company of the Selected Bidder A directly holds thirty percent (30%) of the equity in Bikaner III Neemrana II Transmission Limited, then holding of Selected Bidder A in Bikaner III Neemrana II Transmission Limited shall be thirty percent (30%);

If Selected Bidder A holds thirty percent (30%) equity of the Affiliate and the Affiliate holds fifty percent (50%) equity in Bikaner III Neemrana II Transmission Limited, then, for the purposes of ascertaining the minimum equity/equity lock-in requirements specified above, the effective holding of Bidder A in Bikaner III Neemrana II Transmission Limited shall be fifteen percent (15%), (i.e., 30% x 50%)

19.1.5 The provisions as contained in this Article 19.1 shall override the terms of the consortium agreement submitted as part of the Bid.

19.1.6 The TSP shall be responsible to report to Nodal Agency, within thirty (30) days from the occurrence of any event that would result in any change in its equity holding structure from that which existed as on the date of signing of the Share Purchase Agreement. In such cases, the Nodal Agency would reserve the right to ascertain the equity holding structure and to call for all such required documents / information / clarifications as may be required.

### 19.2 Commitment of maintaining Qualification Requirement

19.2.1 The Selected Bidder will be required to continue to maintain compliance with the Qualification Requirements, as stipulated in RFP Document, till the COD of the Project. Where the Technically Evaluated Entity and/or the Financially Evaluated Entity is not the Bidding Company or a Member in a Bidding Consortium, as the case may be, the Bidding Company or Member shall continue to be an Affiliate of the Technically Evaluated Entity and/or Financially Evaluated Entity till the COD of the Project.

19.2.2 Failure to comply with the aforesaid provisions shall be dealt in the same manner as TSP's Event of Default as under Article 13 of this Agreement.

### 19.3 Language:

19.3.1 All agreements, correspondence and communications between the Parties relating



### Transmission Service Agreement

to this Agreement and all other documentation to be prepared and supplied under the Agreement shall be written in English, and the Agreement shall be construed and interpreted in accordance with English language.

19.3.2 If any of the agreements, correspondence, communications or documents are prepared in any language other than English, the English translation of such agreements, correspondence, communications or documents shall prevail in matters of interpretation.

#### 19.4 Affirmation

The TSP and the Nodal Agency, each affirm that:

1. neither it nor its respective directors, employees, or agents has paid or undertaken to pay or shall in the future pay any unlawful commission, bribe, pay-off or kick-back; and
2. it has not in any other manner paid any sums, whether in Indian currency or foreign currency and whether in India or abroad to the other Party to procure this Agreement, and the TSP and the Nodal Agency hereby undertake not to engage in any similar acts during the Term of Agreement.

#### 19.5 Severability

The invalidity or enforceability, for any reason, of any part of this Agreement shall not prejudice or affect the validity or enforceability of the remainder of this Agreement, unless the part held invalid or unenforceable is fundamental to this Agreement.

#### 19.6 Counterparts

This Agreement may be executed in one or more counterparts, each of which shall be deemed an original and all of which collectively shall be deemed one and the same Agreement.

#### 19.7 Breach of Obligations/ Roles

The Parties acknowledge that a breach of any of the obligations/ roles contained herein would result in injuries. The Parties further acknowledge that the amount of the liquidated damages or the method of calculating the liquidated damages specified in this Agreement is a genuine and reasonable pre-estimate of the damages that may be suffered by the non-defaulting Party in each case specified



Central Transmission Utility of India Limited

73

Bikaner III Neemrana II Transmission Limited

## Transmission Service Agreement

under this Agreement

### 19.8 Restriction of Shareholders / Owners Liability

19.8.1 Parties expressly agree and acknowledge that none of the shareholders of the Parties hereto shall be liable to the other Parties for any of the contractual obligations of the concerned Party under this Agreement.

19.8.2 Further, the financial liabilities of the shareholder(s) of each Party to this Agreement shall be restricted to the extent provided in the Indian Companies Act, 1956 / Companies Act, 2013 (as the case may be).

### 19.9 Taxes and Duties:

19.9.1 The TSP shall bear and promptly pay all statutory taxes, duties, levies and cess, assessed/levied on the TSP, its Contractors or their employees that are required to be paid by the TSP as per the Law in relation to the execution of the Project and for providing Transmission Service as per the terms of this Agreement.

19.9.2 The Nodal Agency shall be indemnified and held harmless by the TSP against any claims that may be made against the Nodal Agency in relation to the matters set out in Article 19.9.1.

19.9.3 The Nodal Agency shall not be liable for any payment of, taxes, duties, levies, cess whatsoever for discharging any obligation of the TSP by the Nodal Agency on behalf of TSP or its personnel, provided the TSP has consented in writing to the Nodal Agency for such work, for which consent shall not be unreasonably withheld.

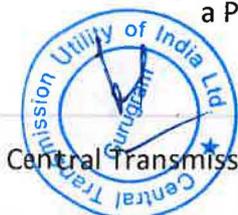
### 19.10 No Consequential or Indirect Losses

The liability of the TSP shall be limited to that explicitly provided in this Agreement.

Provided that, notwithstanding anything contained in this Agreement, under no event shall the Nodal Agency or the TSP claim from one another any indirect or consequential losses or damages.

### 19.11 Discretion:

Except where this Agreement expressly requires a Party to act fairly or reasonably, a Party may exercise any discretion given to it under this Agreement in any way it



## Transmission Service Agreement

deems fit.

**19.12 Confidentiality**

19.12.1 The Parties undertake to hold in confidence this Agreement and RFP Project Documents and not to disclose the terms and conditions of the transaction contemplated hereby to third parties, except:

- (a) to their professional advisors;
  - (b) to their officers, contractors, employees, agents or representatives, financiers, who need to have access to such information for the proper performance of their activities; or
  - (c) disclosures required under Law,
- without the prior written consent of the other Parties.

Provided that, the TSP agrees and acknowledges that the Nodal Agency, may, at any time, disclose the terms and conditions of the Agreement and the RFP Project Documents to any person, to the extent stipulated under the Law and the Competitive Bidding Guidelines.

**19.13 Order of priority in application:**

Save as provided in Article 2.5, in case of inconsistencies between the terms and conditions stipulated in Transmission License issued by the Commission to the TSP, agreement(s) executed between the Parties, applicable Law including rules and regulations framed thereunder, the order of priority as between them shall be the order in which they are placed below:

- terms and conditions of Transmission License;
- applicable Law, rules and regulations framed thereunder;
- this Agreement;
- Agreement(s), if any, under Sharing Regulations.

**19.14 Independent Entity:**

19.14.1 The TSP shall be an independent entity performing its obligations pursuant to the Agreement.



Central Transmission Utility of India Limited

75

Bikaner III Neemrana II Transmission Limited

## Transmission Service Agreement

19.14.2 Subject to the provisions of the Agreement, the TSP shall be solely responsible for the manner in which its obligations under this Agreement are to be performed. All employees and representatives of the TSP or Contractors engaged by the TSP in connection with the performance of the Agreement shall be under the complete control of the TSP and shall not be deemed to be employees, representatives, Contractors of the Nodal Agency and nothing contained in the Agreement or in any agreement or contract awarded by the TSP shall be construed to create any contractual relationship between any such employees, representatives or Contractors and the Nodal Agency.

**19.15 Amendments:**

19.15.1 This Agreement may only be amended or supplemented by a written agreement between the Parties.

**19.16 Waiver:**

19.16.1 No waiver by either Party of any default or breach by the other Party in the performance of any of the provisions of this Agreement shall be effective unless in writing duly executed by an authorised representative of such Party.

19.16.2 Neither the failure by either Party to insist on any occasion upon the performance of the terms, conditions and provisions of this Agreement nor time or other indulgence granted by one Party to the other Parties shall act as a waiver of such breach or acceptance of any variation or the relinquishment of any such right or any other right under this Agreement, which shall remain in full force and effect.

**19.17 Relationship of the Parties:**

This Agreement shall not be interpreted or construed to create an association, joint venture, or partnership or agency or any such other relationship between the Parties or to impose any partnership obligation or liability upon either Party and neither Party shall have any right, power or authority to enter into any agreement or undertaking for, or act on behalf of; or to act as or be an agent or representative of, or to otherwise bind, the other Party.

**Entirety:**

Central Transmission Utility of India Limited

76

Bikaner III Neemrana II Transmission Limited



## Transmission Service Agreement

19.18.1 This Agreement along with its sections, schedules and appendices is intended by the Parties as the final expression of their agreement and is intended also as a complete and exclusive statement of the terms of their agreement.

19.18.2 Except as provided in this Agreement, all prior written or oral understandings, offers or other communications of every kind pertaining to this Agreement or the provision of Transmission Service under this Agreement to the Nodal Agency by the TSP shall stand superseded and abrogated.

**19.19 Notices:**

19.19.1 All notices or other communications which are required to be given under this Agreement shall be in writing and in the English language

19.19.2 If to the TSP, all notices or communications must be delivered personally or by registered post or facsimile or any other mode duly acknowledged to the addressee below:

Address :

Attention :

Email :

Fax. No. :

Telephone No. :

19.19.3 If to the Nodal Agency, all notices or communications must be delivered personally or by registered post or facsimile or any other mode duly acknowledged to the addresses below:

**(i) Central Transmission Utility of India Limited (Nodal Agency)**

Address : Plot No.2, Sector – 29, Gurugram, Haryana-  
: 122001, India

Attention : Mr. Vikram Singh Bhal, ED

Email : vsbhal@powergrid.in

Fax. No. :-

Telephone No. : 9910378068

19.19.4 All notices or communications given by facsimile shall be confirmed by



**Transmission Service Agreement**

sending a copy of the same via post office in an envelope properly addressed to the appropriate Party for delivery by registered mail. All notices shall be deemed validly delivered upon receipt evidenced by an acknowledgement of the recipient, unless the Party delivering the notice can prove in case of delivery through the registered post that the recipient refused to acknowledge the receipt of the notice despite efforts of the postal authorities.

- 19.19.5 Any Party may by notice of at least fifteen (15) days to the other Party change the address and/or addresses to which such notices and communications to it are to be delivered or mailed.

**19.20 Fraudulent and Corrupt Practices**

19.20.1 The TSP and its respective officers, employees, agents and advisers shall observe the highest standard of ethics during the subsistence of this Agreement. Notwithstanding anything to the contrary contained in the Agreement, the Nodal Agency may terminate the Agreement without being liable in any manner whatsoever to the TSP, if it determines that the TSP has, directly or indirectly or through an agent, engaged in corrupt practice, fraudulent practice, coercive practice, undesirable practice or restrictive practice in the Bid process. In such an event, the Nodal Agency shall forfeit the Contract Performance Guarantee of the TSP, without prejudice to any other right or remedy that may be available to the Nodal Agency hereunder or subsistence otherwise.

19.20.2 Without prejudice to the rights of the Nodal Agency under Clause 19.20.1 hereinabove and the rights and remedies which the Nodal Agency may have under this Agreement, if a TSP is found by the Nodal Agency to have directly or indirectly or through an agent, engaged or indulged in any corrupt practice, fraudulent practice, coercive practice, undesirable practice or restrictive practice during the Bid process, or after the issue of Letter of Intent (hereinafter referred to as Lol) or after the execution of the agreement(s) required under Sharing Regulations, the Nodal Agency may terminate the Agreement without being liable in any manner whatsoever to the TSP. Further, the TSP & its Affiliates shall not be eligible to participate in any tender or RFP issued by any BPC for an indefinite period from the date such TSP is found by the Nodal Agency to have directly or indirectly or through an agent, engaged or indulged in any corrupt practice, fraudulent practice, coercive practice, undesirable practice or restrictive practices, as



## Transmission Service Agreement

the case may be.

**19.20.3** For the purposes of this Clause 19.20, the following terms shall have the meaning hereinafter respectively assigned to them:

(a) **“corrupt practice”** means (i) the offering, giving, receiving, or soliciting, directly or indirectly, of anything of value to influence the actions of any person connected with the Bid process (for avoidance of doubt, offering of employment to or employing or engaging in any manner whatsoever, directly or indirectly, any official of the BPC who is or has been associated or dealt in any manner, directly or indirectly with the Bid process or the Lol or has dealt with matters concerning the RFP Project Documents or arising there from, before or after the execution thereof, at any time prior to the expiry of one year from the date such official resigns or retires from or otherwise ceases to be in the service of the BPC, shall be deemed to constitute influencing the actions of a person connected with the Bid Process); or (ii) engaging in any manner whatsoever, whether during the Bid Process or after the issue of the Lol or after the execution of the RFP Project Documents, as the case may be, any person in respect of any matter relating to the Project or the Lol or the RFP Project Documents, who at any time has been or is a legal, financial or technical adviser of the BPC in relation to any matter concerning the Project;

(b) **“fraudulent practice”** means a misrepresentation or omission of facts or suppression of facts or disclosure of incomplete facts, in order to influence the Bid process;

(c) **“coercive practice”** means impairing or harming, or threatening to impair or harm, directly or indirectly, any person or property to influence any person’s participation or action in the Bid process;

(d) **“undesirable practice”** means (i) establishing contact with any person connected with or employed or engaged by the BPC with the objective of canvassing, lobbying or in any manner influencing or attempting to influence the Bid process; or (ii) having a Conflict of Interest; and

(e) **“restrictive practice”** means forming a cartel or arriving at any understanding or arrangement among Bidders with the objective of restricting or manipulating a full and fair competition in the Bid process;

**19.21 Compliance with Law:**

Despite anything contained in this Agreement but without prejudice to Article



## Transmission Service Agreement

12, if any provision of this Agreement shall be in deviation or inconsistent with or repugnant to the provisions contained in the Electricity Act, 2003, or any rules and regulations made there under, such provision shall be deemed to be amended to the extent required to bring it into compliance with the aforesaid relevant provisions as amended from time to time.

**IN WITNESS WHEREOF, THE PARTIES HAVE CAUSED THIS AGREEMENT TO BE EXECUTED BY THEIR DULY AUTHORISED REPRESENTATIVES AS OF THE DATE AND PLACE SET FORTH ABOVE.**

1. For and on behalf of TSP

  
.....

[Signature, Name, Designation and Address]

2. For and on behalf of **Central Transmission Utility of India Limited (Nodal Agency)**

  
.....

[Signature, Name, Designation and Address]

**WITNESSES:**

1. For and on behalf of

: BPC

.....  
[Signature]

.....  
[Insert, Name, Designation and Address of the Witness]

2. For and on behalf of

: **Nodal Agency**

  
.....  
[Signature]

*Deepak Krishnan, manager, CTUIL*  
.....  
[Insert Name, Designation and Address of the Witness]



# SCHEDULES



## Transmission Service Agreement

## Schedule: 1

## Project Description and Scope of Project

## a. Description of the Transmission Scheme

Renewable Energy Zones (REZs) were identified by MNRE/SECI with a total capacity of 181.5 GW for likely benefits by the year 2030 in eight states. This includes 75 GW REZ potential in Rajasthan comprising of 15 GW Wind and 60 GW Solar. In this regard, a Comprehensive transmission scheme for evacuation of 75GW RE potential from Rajasthan is already evolved which includes transmission scheme for total evacuation requirement of 7.7GW from Bikaner Complex (Bikaner-II: 3.7 GW, Bikaner-III: 4 GW).

As part of comprehensive system, 765/400/220kV Bikaner -III & 765/400kV Neemrana-II Substations are to be established along with interconnections of Bikaner-III PS with Bikaner (PG)/ Bikaner-II PS through 400kV lines. For further dispersal of power from Bikaner-III PS, 765kV high capacity corridor i.e. Bikaner-III-Neemrana-II - Bareilly (PG) as well as 400kV interconnections with Gurgaon (PG), Sohna Road and Kotputli is also being implemented.

The subject transmission scheme i.e. Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part C involves implementation of Bikaner-III - Neemrana-II 765 kV D/c line (2nd).

Above transmission system was agreed in the 8th CMETS-NR meeting held on 30.06.22, 56th NRPC meeting held on 29.07.22 and 9th National Committee on Transmission (NCT) held on 28.09.22. Subsequently, Ministry of Power, Government of India, vide its Gazette Notification No. CG-DL-E-14012023-241990 dated 13.01.2023 declared establishment of Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part C through tariff based competitive bidding process route as part of "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex)".



## Transmission Service Agreement

## b. Detailed Scope of Work

S. No.	Name of Transmission Element	Scheduled COD in months from Effective Date
1.	<p>Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end</p> <ul style="list-style-type: none"> <li>• 765 kV, 330 MVAR Switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• 765 kV, 330 MVAR Switchable line reactors at Neemrana-II – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Neemrana-II S/s – 2 nos.</li> </ul>	24 Months
2.	<p>2 no. of 765 kV line bays each at Bikaner-III PS &amp; Neemrana-II S/S</p> <ul style="list-style-type: none"> <li>• 765kV line bays - 4 nos. (2 nos. each at Bikaner-III PS &amp; Neemrana-II S/S)</li> </ul>	

**Note:**

- (i) Developer of Bikaner-III PS & Neemrana-II S/s shall provide space for 2 nos. of 765 kV line bays alongwith space for Switchable line reactor each at Bikaner-III PS & Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2nd).



## Transmission Service Agreement

**SPECIFIC TECHNICAL REQUIREMENTS FOR TRANSMISSION SYSTEM****SPECIFIC TECHNICAL REQUIREMENTS FOR TRANSMISSION LINE**

- A.1.0 The design, routing and construction of transmission lines shall be in accordance with Chapter V, Part-A of CEA (Technical Standards for Construction of Electrical Plants and Electric Lines) Regulations, as amended from time to time.
- A.2.0 Selection of tower type shall be made as per CEA Regulations, however in case lattice type towers are used, the following shall also be applicable:
- A.2.1 Steel section of grade E 250 and/or grade E 350 as per IS 2062, only are permitted for use in towers, extensions, gantry structures and stub setting templates. For towers in snowbound areas, steel sections shall conform to Grade-C of IS-2062.
- A.2.2 Towers shall be designed as per IS-802:2015, however the drag coefficient of the tower shall be as follows: -
- A.3.0 Transmission Service Provider (TSP) shall adopt any additional loading/design criteria for ensuring reliability of the line, if so desired and /or deemed necessary.

Solidity Ratio	Drag Coefficient
Upto 0.05	3.6
0.1	3.4
0.2	2.9
0.3	2.5
0.4	2.2
0.5 and above	2.0

- A.4.0 Transmission line shall be designed considering wind zones as specified in wind map given in National Building Code 2016, Vol.1. The developer shall also make his own assessment of local wind conditions and frequent occurrences of high intensity winds (HIW) due to thunderstorms, dust-storms, downburst etc. along the line route and wherever required, higher wind zone than that given in wind map shall be considered for tower design for ensuring reliability of line. Further, for transmission line sections passing within a distance of 50 km from the boundary of two wind zones, higher of the two wind zones shall be considered for design of towers located in such sections.
- A.5.0 Selection of reliability level for design of tower shall be as per CEA Regulation (Technical Standards for Construction of Electrical Plants and Electric Lines) Regulations, as amended from time to time.



## Transmission Service Agreement

- A.6.0 A) For power line crossing of 400 kV or above voltage level (if crossed over the existing line) large angle & dead end towers (i.e. D/DD/QD) shall be used on either side of power line crossing.
- B) For power line crossing of 132 kV and 220 kV voltage level, angle towers (B/C/D/DB/DC/DD/ QB/QC/QD) shall be used on either side of power line crossing depending upon the merit of the prevailing site condition and line deviation requirement.
- C) For power line crossing of 66 kV and below voltage level, suspension/tension towers shall be provided on either side of power line crossing depending upon the merit of the prevailing site condition and line deviation requirement.
- D) For crossing of railways, national highways and state highways, the rules/Regulations of appropriate authorities shall be followed.

A.7.0 The relevant conductor configuration shall be as follows: -

Type of conductor: ACSR / AAAC / AL59

Basic parameters:

Transmission line	ACSR Conductor specified	Equivalent AAAC conductor based on 53% conductivity of Al Alloy	Equivalent minimum size of AL59 conductor based on 59% conductivity of AL Alloy*	Sub-conductor Spacing
765 kV D/C (Hexa Zebra) transmission lines	Zebra: Stranding 54/3.18 mm-Al + 7/3.18 mm-Steel, 28.62 mm diameter 428 sq. mm, Aluminium area, Maximum DC Resistance at 20°C ( $\Omega$ /km): 0.06868 Minimum UTS: 130.32 kN	Stranding details: 61/3.19mm, 28.71 mm diameter; 487.5 sq.mm Aluminium alloy area Maximum DC Resistance at 20°C ( $\Omega$ /km) : 0.06815 Minimum UTS:	Stranding details: 61/3.08mm, 27.72 mm diameter; 454 sq.mm Aluminium alloy area Maximum DC Resistance at 20°C ( $\Omega$ /km) : 0.0653 Minimum UTS:	457 mm



## Transmission Service Agreement

Transmission line	ACSR Conductor specified	Equivalent AAAC conductor based on 53% conductivity of Al Alloy	Equivalent minimum size of AL59 conductor based on 59% conductivity of AL Alloy*	Sub-conductor Spacing
		135.6 kN	108 kN	

**Note:**

- \*To Select any size above the minimum, the sizes mentioned in the Indian standard IS-398(part-6) shall be followed.*
- The transmission lines shall have to be designed for a maximum operating conductor temperature of 85 deg C.*

A.8.0 The required phase to phase spacing and horizontal spacing for 765 kV line shall be governed by the tower design as well as minimum live metal clearances for 765 kV voltage level under different insulator swing angles. However, the phase to phase spacing for 765 kV line shall not be less than 15 m.

A.9.0 All electrical clearances including minimum live metal clearance, ground clearance and minimum mid span separation between earth wire and conductor shall be as per Central Electricity Authority (Measures Relating to Safety & Electric Supply) Regulations as amended from time to time and IS:5613. Since these clearances for 765kV are not included in CEA Regulation/ Indian Standard, following values shall be considered:

a) Minimum live metal clearances for 765 kV line:

(i) Under stationary conditions

From tower body: For 765 kV D/C: 6.1 m

For 765 kV S/C: 5.6 m

(ii) Under swing conditions

Wind pressure Condition	Minimum electrical clearance
a) Swing angle (25°)	4.4 m
b) Swing angle (55°)	1.3 m



## Transmission Service Agreement

- b) Minimum ground clearance: 18 m
- c) Minimum mid span separation between earthwire and conductor: 9.0 m
- A.10.0 Shielding angle shall not exceed 10 degree for 765 kV D/C transmission line.
- A.11.0 The Fault current for design of line shall be 50 kA for 1 second for 765 kV.
- A.12.0 In case of 765 kV voltage class lines, at least one out of two earth wires shall be OPGW and second earth wire, if not OPGW, shall be either of galvanized standard steel (GSS) or AACSR or any other suitable conductor type depending upon span length and other technical consideration.
- A.13.0 Each tower shall be earthed such that tower footing impedance does not exceed 10 ohms. Pipe type or Counterpoise type earthing shall be provided in accordance with relevant IS. Additional earthing shall be provided on every 7 to 8 km distance at tension tower for direct earthing of both shield wires. If site condition demands, multiple earthing or use of earthing enhancement compound shall be used.
- A.14.0 Pile type foundation shall be used for towers located in river or creek bed or on bank of river having scourable strata or in areas where river flow or change in river course is anticipated, based on detailed soil investigation and previous years' maximum flood discharge of the river, maximum velocity of water, highest flood level, scour depth & anticipated change in course of river based on river morphology data of at least past 20 years to ensure availability and reliability of the transmission line.
- A.15.0 Transmission line route shall be finalized, in consultation with appropriate authorities so as to avoid the habitant zones of endangered species and other protected species. Bird diverters, wherever required, shall be provided on the line.
- A.16.0 A.17.0 The raised chimney foundation is to be provided in areas prone to flooding/water stagnation like paddy field /agricultural field & undulated areas to avoid direct contact of water with steel part of tower. The top of the chimney of foundation should be at least above HFL (High Flood Level) or the historical water stagnation/ logging level (based on locally available data) or above High Tide Level or 500 mm above Natural Ground level (whichever is higher).



## Transmission Service Agreement

**SPECIFIC TECHNICAL REQUIREMENTS FOR SUBSTATION**

The proposed augmentation of **Bikaner-III (AIS) substation** and **Neemrana-II (AIS) substation** shall be generally conforming to the requirements of CEA (Technical Standards for Construction of Electrical Plants and Electric Lines) Regulations as amended from time to time. All other CEA Regulations/guidelines as amended upto date and MoP guidelines shall also be followed.

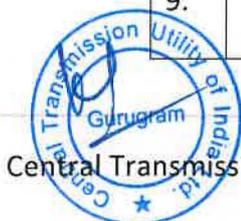
**B.1.0 Salient features of Substation Equipment and Facilities**

The design and specification of substation equipment are to be governed by the following factors:

**B.1.1 Insulation Coordination**

The system design parameters for substations/switchyards shall be as given below:

S. No	Description of parameters	Extn. of 765 kV Bikaner-III s/s	Extn. of 765 kV Neemrana-II s/s
		765 kV System	765 kV System
1.	System operating voltage	765kV	765kV
2.	Maximum voltage of the system (rms)	800kV	800kV
3.	Rated frequency	50Hz	50Hz
4.	No. of phase	3	3
5.	Rated Insulation levels		
i)	Impulse withstand voltage for (1.2/50 micro sec.) for Equipment other than Transformer and Reactors for Insulator String	2100kVp 2100kVp	2100kVp 2100kVp
ii)	Switching impulse withstand voltage (250/2500 micro sec.) dry and wet	1550kVp	1550kVp
iii)	One minute power frequency dry withstand voltage (rms)	830kV	830kV
6.	Corona extinction voltage	508 kV	508 kV
7.	Max. radio interference voltage for frequency between 0.5 MHz and 2 MHz	2500 micro-volts at 508 kV rms	2500 micro-volts at 508 kV rms
8.	Minimum creepage distance for insulator string/ long rod insulators/ outdoor bushings	24800 mm (31mm/kV)	24800 mm (31mm/kV)
9.	Minimum creepage distance for switchyard equipment	20000 mm (25 mm/kV)	20000 mm (25 mm/kV)



## Transmission Service Agreement

S. No	Description of parameters	Extn. of 765 kV Bikaner-III s/s	Extn. of 765 kV Neemrana-II s/s
		765 kV System	765 kV System
10.	Max. fault current	50 kA	50kA
11.	Duration of fault	1 sec	1 Sec

**B.1.2 Switching Scheme**

The switching schemes, as mentioned below, shall be adopted at various voltage levels of substation/switchyard:

Substation	765 kV side
765 kV Bikaner-III S/s Extn	One & half breaker
765 kV Neemrana-II S/s Extn.	One & half breaker

Notes: -

- (i) At 765kV voltage level, each circuit of a double circuit transmission line shall be terminated in different diameters.
- (ii) Connection arrangement of Switchable Line reactors shall be such that it can be used as Line reactor as well as Bus reactor with suitable NGR bypass arrangement.

**B.2.0 Substation Equipment and facilities:**

The switchgear shall be designed and specified to withstand operating conditions and duty requirements. All equipment shall be designed considering the following capacity.

S. No	Description of bay	765kV Bikaner-III S/s Extn	765kV Neemrana-II S/s Extn.
		765kV	765kV
1.	Bus Bar	4000A	4000A
2.	Line bay	3150A	3150A
3.	Line Reactor Bay	3150A	3150A

**B.2.1 Shunt Reactor**

110 MVAR, 765/ $\sqrt{3}$  kV, 1-Phase Reactor (including arrangement for 3-phase bank formation of 330 MVAR) shall conform to CEA's "Standard Specifications and Technical Parameters for Transformers and Reactors (66 kV and above)" available on CEA website.



## Transmission Service Agreement

**Connection arrangement for utilization of existing Spare 1-phase Shunt Reactor unit:**  
TSP shall make the arrangement in such a way that the existing spare unit can be utilized for line reactor banks under present scope without its physical movement.

**Neutral Grounding Reactor and Surge Arrester for 765 kV Line Reactors (as applicable):**

The neutral of the line reactors (wherever provided) shall be grounded through adequately rated Neutral Grounding Reactors (NGR) to facilitate single phase auto-reclosure, provided that the NGR shall be provided with bypass arrangement so that the line reactor can be used as Bus reactor as and when required. The neutral of bus reactor shall be solidly grounded. The ohmic value of NGR for each circuit at both ends of 765kV D/c (2nd) Bikaner-III– Neemrana-II S/s shall be 450 ohms.

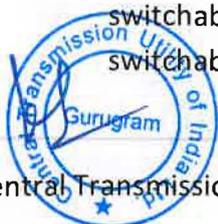
NGR shall be oil filled or dry type air core for outdoor application. NGR shall conform to CEA's "Standard specifications and technical parameters of transformers and reactors (66kV and above)". Technical parameters of NGR shall be as specified in Annexure-A of abovementioned document.

The 145 kV surge arrester of suitable rating shall be provided & physically located between the neutral of shunt reactor (brought out at 145kV class bushing) and neutral grounding reactor. The surge arresters shall be of heavy duty station class gapless Metal oxide (ZnO) type conforming in general to IEC-60099-4. Arresters shall be hermetically sealed units, of self-supporting construction, suitable for mounting on structures.

**B.2.3 765 kV Substation equipment (AIS)**

**B.2.3.1 Circuit Breakers (AIS)**

The circuit breakers and accessories shall conform with IEC: 62271-100, IEC: 62271-1 and shall be of SF6 Type. The circuit breakers shall be of class C2-M2 (as per IEC) with regard to restrike probability during capacitive current breaking and mechanical endurance. The rated break time shall not exceed 40 ms for 765 kV circuit breakers. 765 kV Circuit breakers shall be provided with single phase and three phase auto reclosing. The Circuit breakers controlling 765 kV lines shall be provided either with pre-insertion closing resistor of about 450 ohms maximum with 9 ms minimum insertion time or with Controlled Switching Device. The short line fault capacity shall be same as the rated capacity and this is proposed to be achieved without use of opening resistors. Control switching device shall be provided in Circuit Breaker of switchable line reactor bay and in Main & Tie bay circuit breakers of line with non-switchable line reactors, Bus reactors and 765/400 kV Transformers.



**B.2.3.2 Isolators (AIS)**

The isolators shall comply with IEC 62271-102 in general. 765 kV Isolator design shall be double break or vertical break or knee-type. All Isolators and earth switches shall be motor operated. Earth switches shall be provided at various locations to facilitate maintenance. Isolator rated for 765kV shall be of extended mechanical endurance class-M2 and suitable for bus transfer current switching duty as per IEC-62271-102. Main blades and earth blades shall be interlocked and interlock shall be fail safe type. 765 kV earth switch for line isolator shall be suitable for induced current switching duty as defined for Class-B.

**B.2.3.3 Current Transformers (AIS)**

Current Transformers shall comply with IEC 61869 in general. All ratios shall be obtained by secondary taps only. Generally, Current Transformers (CT) for 765 kV shall have six cores (four for protection and two for metering). The burden and knee point voltage shall be in accordance with the requirements of the system including possible feeds for telemetry. Accuracy class for protection core shall be PX and for metering core it shall be 0.2S. The rated burden of cores shall be closer to the maximum burden requirement of metering & protection system (not more than 20 VA for metering core) for better sensitivity and accuracy. The instrument security factor shall be less than 10 for CTs of 765 kV voltage class.

**B.2.3.4 Capacitive Voltage Transformers (AIS)**

Capacitive Voltage transformers shall comply with IEC 61869 in general. These shall have three secondaries out of which two shall be used for protection and one for metering. Accuracy class for protection cores shall be 3P and for metering core it shall be 0.2. The Capacitive voltage transformers on lines shall be suitable for Carrier Coupling. The Capacitance of CVT for 765 kV shall be 8800 pF. The rated burden of cores shall be closer to the maximum burden requirement of metering & protection system (not more than 50 VA for metering core) for better sensitivity and accuracy.

**B.2.3.5 Surge Arresters (AIS)**

624 kV Station High (SH) duty gapless type Surge arresters with thermal energy (Wth) of minimum 13 kJ/kV conforming to IEC 60099-4 in general shall be provided for 765 kV system. Other characteristics of Surge arrester shall be chosen in accordance with system requirements. Surge arresters shall be provided near line entrances, transformers & Reactor so as to achieve proper insulation coordination. Surge



## Transmission Service Agreement

Arresters shall be provided with porcelain/ polymer housing fitted with pressure relief devices. A leakage current monitor with surge counter shall be provided with each surge arrester.

**B.2.4 Protection Relaying & Control System**

The protective relaying system proposed to be provided for transmission lines, auto-transformers, reactors and bus bars to minimize the damage to the equipment in the events of faults and abnormal conditions, is dealt in this section. All main protective relays shall be numerical type with IEC 61850 communication interface and should have interoperability during integration of numerical relays to communicate over IEC61850 protocol with RTU/SAS/IEDs of different OEMs. All numerical relays shall have built in disturbance recording feature.

The protection circuits and relays of transformer and reactor shall be electrically and physically segregated into two groups each being independent and capable of providing uninterrupted protection even in the event of one of the protection groups failing, to obtain redundancy, and to take protection systems out for maintenance while the equipment remains in service.

**a) Transmission Lines Protection**

765 kV lines shall have Main-I numerical three zone distance protection scheme with carrier aided inter-tripping feature. 765 kV lines shall also have Main-II numerical distance protection scheme like Main-I but from different make that of Main-I. The Main-I and Main-II protection relays of same make may be provided only if they are of different hardware & manufacturing platform or different principle of operation.

Further, all 765 kV lines shall be provided with single and three phase auto-reclosing facility to allow reclosing of circuit breakers in case of transient faults. These lines shall also be provided with distance to fault locators to identify the location of fault on transmission lines.

All 765 kV lines shall also be provided with two stages over voltage protection. Over voltage protection & distance to fault locator may be provided as in-built feature of Main-I & Main-II protection relays. Auto reclose as built in function of Bay Control Unit (BCU) is also acceptable.

The Main-I and Main-II protection relays shall be fed from separate DC sources and shall be mounted in separate panels.



## Transmission Service Agreement

For 765 kV transmission lines, directional IDMT earth fault relay should be provided as standalone unit or in-built feature of Main-I and Main -II feature.

**b) 765 kV Reactor Protection**

Reactor shall be provided with the following protections:

- i) Numerical Differential protection.
- ii) Numerical Restricted earth fault protection
- iii) Numerical Back-up impedance protection

Besides these, reactors shall also be provided with Buchholz relay, MOG with low oil level alarm, protection against oil and winding temperatures & pressure relief device, etc.

**c) Bus bar Protection**

The high speed low impedance type bus bar differential protection, which is essential to minimize the damage and maintain system stability at the time of bus bar faults, shall be provided for 765 kV buses. Duplicated bus bar protection is envisaged for 765 kV bus-bar protection. Bus bar protection scheme shall be such that it operates selectively for each bus and incorporate necessary features required for ensuring security. The scheme shall have complete bus bar protection for present as well as future bays envisaged i.e. input / output modules for future bays shall also be provided. In case, the bus section is provided, then each side of bus section shall have separate set of bus bar protection schemes.

For existing substations, the existing bus bar protection shall be augmented as per requirement.

**d) Local Breaker Back up Protection**

This shall be provided for each 765 kV circuit breakers and will be connected to de-energize the affected stuck breaker from both sides.

Notes:

1. LBB & REF relays shall be provided separately from transformer differential relay.
2. LBB relay may also be provided as built-in protection function of distributed bus bar protection scheme; however, in such case separate LBB relay shall be provided for tie bays (in case of One and Half breaker scheme).
3. Over fluxing & overload protection can be provided as built-in feature of differential relay.



## Transmission Service Agreement

4. *In 765 kV switchyard, if spare bay of half diameter is identified as future, Tie CB relay panel shall be with Auto-reclosure feature.*

**B.2.5 Substation Automation System**

- a) For all the new substations, state of art Substation Automation System (SAS) conforming to IEC-61850 shall be provided. The distributed architecture shall be used for Substation Automation system, where the controls shall be provided through Bay control units. The Bay control unit is to be provided bay wise for voltage level 220 kV and above. All bay control units as well as protection units are normally connected through an Optical fibre high speed network. The control and monitoring of circuit breaker, dis-connector, re-setting of relays etc. can be done from Human Machine Interface (HMI) from the control room.

The functions of control, annunciation, disturbance recording, event logging and measurement of electrical parameters shall be integrated in Substation Automation System.

At new substations, the Substation Automation System (SAS) shall be suitable for operation and monitoring of the complete substation including proposed future bays/elements.

In existing substations with Substation automation system (SAS), augmentation of existing SAS shall be done for bays under present scope.

In existing Substations where Substation automation is not provided, control functions shall be done through control panels.

Necessary gateway & modems (as required) shall be provided to send data to RLDC/SLDC as per their requirement. Any augmentation work at RLDC/SLDC is excluded from TSP's scope. However, all the configuration work at substation end required to send data to RLDC/SLDC shall be in the scope of TSP.

**b) Time synchronisation equipment**

Time synchronization equipment complete in all respect including antenna, cable, processing equipment required to receive time signal through GPS or from National Physical Laboratory (NPL) through INSAT shall be provided at new substations. This equipment shall be used to synchronize SAS & IEDs etc.

**B.2.6 Phasor Measurement Units (PMUs)**

TSP shall supply, install & commission required no. of Phasor Measurement Units (PMUs) for all 400 kV and above voltage line bays under the scope of work and PMUs shall support latest IEEE C-37.118 protocols. The supplied PMUs may be mounted in the



## Transmission Service Agreement

C&R/SAS panels. These PMUs shall be provided with GPS clock and LAN switch and shall connect with LAN switch of control room with Fibre Optic cable which shall further be interfaced with the FOTE. These PMUs shall be integrated with the existing PDC (Phasor Data Concentrator) located at respective RLDC. Configuration work in existing PDC at RLDC for new PMU integration is not in scope of TSP (shall be done by respective RLDC), however all the necessary co-ordination and support in this regard shall be ensured by TSP.

In case of bay extensions work, TSP shall also provide separate WAMS (PMU, switches, interface cabling and other associated accessories) required for extended bays at existing s/s.

### B.3.0 Substation Support facilities

Certain facilities required for operation & maintenance of substations as described below shall be provided at new substation. In existing substation, these facilities have already been provided and would be extended/ augmented as per requirement.

#### B.3.1 AC & DC power supplies

For catering the requirements of three phase & single phase AC supply and DC supply for various substation equipment, existing facilities shall be augmented as required.

#### B.3.2 Fire Fighting System

Fire-fighting system for substation including transformer & reactor shall conform to CEA (Measures Relating to Safety & Electric Supply) Regulations.

Further, adequate water hydrants and portable fire extinguishers shall be provided in the substations. The main header of firefighting system shall be suitable for extension to bays covered under the future scope; necessary piping interface in this regard shall be provided.

At existing substations, the fire-fighting systems as available shall be extended to meet the additional requirements.

#### B.3.3 Oil evacuating, filtering, testing & filling apparatus

To monitor the quality of oil for satisfactory performance of transformers, shunt reactors and for periodical maintenance necessary oil evacuating, filtering, testing and



## Transmission Service Agreement

filling apparatus would be provided at new substations. Oil storage tanks of adequate capacities for storage of transformer oil would be provided.

**B.3.4 Illumination**

Normal & emergency AC & DC illumination shall be provided adequately in the switchyard panel room & other buildings of the substation. The switchyard shall also be provided with adequate illumination.

Lighting of the entire switchyard panel room building and other building (if any) and switchyard shall be done by LED based low power consumption luminaries.

**B.3.5 Control Room**

For new substation, substation control room shall be provided to house substation work stations for station level control (SAS) alongwith its peripheral and recording equipment, AC & DC distribution boards, DC batteries & associated battery chargers, Fire Protection panels, Telecommunication panels & other panels as per requirements. Air conditioning shall be provided in the building as functional requirements. Main cable trenches from the control room shall have adequate space provision for laying of cables from control room for all the future bays also.

At existing substations, the adequacy of size of control room shall be ascertained and the same shall be augmented as per requirement.

**B.3.7 Control Concept**

All the EHV circuit breakers in substation/switching stations shall be controlled and synchronized from the switchyard control room/remote control center. Each breaker would have two sets of trip circuits which would be connected to separate DC supplies for greater reliability. All the isolators shall have control from remote/local whereas the earth switches shall have local control only.

**B.3.8 Visual monitoring system (VMS) for watch and ward of substation premises:**

Visual monitoring system for effective watch and ward of substation premises shall cover all the transformers and reactors, all other major AIS Equipment (such as CB, isolators, CT, CVT, SA etc. as applicable), GIS bays, panel room, all the gates of switchyard and all entry and exit points of control room building and accordingly the location of cameras shall be decided. The camera shall be high definition color CCD camera with night vision feature. The VMS data partly/completely shall be recorded (minimum for 15 days) at least @25fps (or better) and stored on network video



## Transmission Service Agreement

recorder. The system shall use video signals from various cameras installed at different locations, process them for viewing on workstations/monitors in the control room and simultaneously record all the cameras.

Mouse/keyboard controllers shall be used for pan, tilt, zoom and other functions of the desired camera. The Visual Monitoring System shall have provision of WAN connectivity for remote monitoring.

All camera recordings shall have Camera ID & location/area of recording as well as date/time stamp. The equipment should generally conform to Electromagnetic compatibility requirement for outdoor equipment in EHV substation.

At existing substations, the visual monitoring system if available shall be augmented as per existing or better specification as required.

**B.4.0 General Facilities**

- a) Line Gantry/Towers are envisaged for bays under present scope only. However, for adjacent future line bay, tower shall be designed for extension (considering Quad conductors for 765 kV) wherever applicable.
- b) Bay extension works at existing substation shall be executed by TSP in accordance with the requirement/provisions mentioned above. However, interface points shall be considered keeping in view the existing design/arrangement at the substation.
- c) TSP has to arrange for construction power and water on its own.
- d) All outdoor steel structures including anchor/foundation bolts shall be fully galvanized. The weight of the zinc coating shall be at least 610 gm/sq.m and 900 gm/sq.m for coastal/ creek regions (if applicable).
- e) In 765 kV switchyard, if spare bay of half diameter is identified as future, all the equipment for Tie bay and Future bay shall be designed considering the current rating of line bay i.e. 3150A.

All electrical equipment shall be installed above Highest Flood Level (HFL) and where such equipment is not possible to be installed above HFL, it shall be ensured that there is no seepage or leakage or logging of water.

**B.5.0 EXTENSION OF EXISTING SUBSTATION**

## Transmission Service Agreement

The following drawings/details of existing substation is attached with the RFP documents for further engineering by the bidder.

Sl. No.	Drawing Title	Drawing No./Details	Rev. No.
<b>A. 765kV Bikaner-III s/s</b>			
1.0	Single Line Diagram	Developer yet to be finalized by BPC. The finalization of drawings is in the scope of developer. The same may be availed from the developer on finalization.	
2.0	General Arrangement		
3.0	Earthmat Layout		
4.0	Visual Monitoring System		
5.0	Bus Bar Protection (765kV System)		
6.0	Substation Automation System (SAS)		
<b>B. 765kV Neemrana-II s/s</b>			
1.0	Single Line Diagram	Developer yet to be finalized by BPC. The finalization of drawings is in the scope of developer. The same may be availed from the developer on finalization.	
2.0	General Arrangement		
3.0	Earthmat Layout		
4.0	Visual Monitoring System		
5.0	Bus Bar Protection (765kV System)		
6.0	Substation Automation System (SAS)		

Bidder is also advised to visit the substation sites and acquaint themselves with the topography, infrastructure such as requirement of roads, cable trench, drainage etc. and also the design philosophy.



**SPECIFIC TECHNICAL REQUIREMENTS FOR COMMUNICATION**

The communication requirement shall be in accordance to CEA (Technical Standards for Communication System in Power System Operations) Regulations, 2020, CERC (Communication System for inter-State transmission of electricity) Regulations, 2017, and CEA (Cyber Security in Power Sector) Guidelines, 2021, all above documents as amended from time to time.

The protections for transmission line and the line compensating equipment shall have hundred percent back up communication channels i.e. two channels for tele-protection in addition to one channel for speech plus data for each direction.

In order to meet the requirement for grid management and operation of substations, Transmission Service Provider (TSP) shall provide the following:

**C.1.0 Bikaner-III – Neemrana -II 765 kV D/c line (2<sup>nd</sup>):**

On Bikaner-III – Neemrana-II 765 kV D/c line (2<sup>nd</sup>), TSP shall supply, install & commission one (1) no. OPGW cable containing 24 Fibres (24F) on one E/W peak and conventional earth wire on other E/W peak.

The TSP shall install this OPGW from gantry of Bikaner-III up to the gantry of Neemrana-II S/s with all associated hardware including Vibration Dampers, mid-way & gantry Joint Boxes (called **OPGW Hardware** hereafter) and finally terminate in Joint Boxes at end Substations. The transmission line length is 350 kms (approx.) where repeater/s are required to meet link budget requirement of Bikaner-III – Neemrana-II.

TSP shall finalize the location of repeater station depending upon the actual site conditions. Further TSP shall comply to the requirements mentioned as per **Appendix-D.1**.

**C.2.0 2 no. of 765 kV line bays at Bikaner-III for Bikaner-III – Neemrana-II 765 kV D/c line (2<sup>nd</sup>):**

- (i) TSP shall supply, install & commission 1 no. FODP (72 F or higher ) alongwith panel and required Approach Cable (24F) with all associated hardware fittings from gantry tower to Bay Kiosk and from the Bay Kiosk to Control room.
- (ii) TSP shall supply, install & commission One STM-16 (FOTE) equipment alongwith panel/s supporting minimum three (3) directions with MSP (Multiplex Section Protection – 1+1) with necessary interfaces to meet the voice and data communication requirement between Bikaner-III, Neemrana-II S/s. The suitable DC Power Supply and backup to be provided for communication equipment.



## Transmission Service Agreement

- (iii) FOTE/FODP panel shall be installed in the new Bay Kiosk (Switchyard Panel Room (SPR)). The FOTE under present scope shall be integrated by TSP with the existing/proposed FOTE at control room of **Bikaner-III** S/s which shall be communicating with respective control center. TSP to provide necessary FODP sub rack / Splice trays/ Patch cords etc. and optical interfaces/equipment in the existing FOTE/FODP panels in control room for integration with the existing FOTE for onwards data transmission.

In case spare optical direction is not available in the existing FOTE at the control room, the TSP shall coordinate with station owner to reconfigure the directions in existing FOTE at control room. Alternatively, the TSP may integrate the FOTE under the present scope with FOTE in the nearby Kiosk connected to the control room (if available with spare direction). For this purpose, TSP shall provide necessary FODP sub rack / Splice trays/ Patch cords etc. and suitable optical interfaces/ equipment in the existing FOTE/FODP panels in another Kiosk (SPR).

- (iv) FOTE & FODP can be accommodated in same panel to optimize space.
- (v) The new communication equipment under the present scope shall be compatible for integration with existing regional level centralized NMS. The local configuration of the new communication equipment shall be the responsibility of TSP. The configuration work in the existing centralized NMS for integration of new Communication equipment shall be done by Regional ULDC Team, however all the necessary support in this regard shall be ensured by TSP.

The maintenance of all the communication equipment including FOTE, FODP, approach cable, DCPS alongwith Battery Bank shall be the responsibility of TSP.

**C.3.0 2 no. of 765 kV line bays at Neemrana-II for Bikaner-III – Neemrana-II 765 kV D/c line (2nd)**

- (i) TSP shall supply, install & commission 1 no. FODP (72 F or higher) alongwith panel and required Approach Cable (24F) with all associated hardware fittings from gantry tower to Bay Kiosk and from the Bay Kiosk to Control room.
- (ii) TSP shall supply, install & commission One STM-16 (FOTE) equipment alongwith panel/s supporting minimum three (3) directions with MSP (Multiplex Section Protection – 1+1) with necessary interfaces to meet the voice and data communication requirement between Bikaner-III, Neemrana-II S/s. The suitable DC Power Supply and backup to be provided for communication equipment.



## Transmission Service Agreement

- (iii) FOTE/FODP panel shall be installed in the new Bay Kiosk (Switchyard Panel Room (SPR)). The FOTE under present scope shall be integrated by TSP with the existing/proposed FOTE at control room of **Neemrana-II S/s** which shall be communicating with respective control center. TSP to provide necessary FODP sub rack / Splice trays/ Patch cords etc. and optical interfaces/equipment in the existing FOTE/FODP panels in control room for integration with the existing FOTE for onwards data transmission.

In case spare optical direction is not available in the existing FOTE at the control room, the TSP shall coordinate with station owner to reconfigure the directions in existing FOTE at control room. Alternatively, the TSP may integrate the FOTE under the present scope with existing FOTE in the nearby Kiosk connected to the control room FOTE (if available with spare direction). For this purpose, TSP shall provide necessary FODP sub rack / Splice trays/ Patch cords etc. and suitable optical interfaces/ equipment in the existing FOTE/FODP panels in another Kiosk (SPR).

- (iv) FOTE & FODP can be accommodated in same panel to optimize space.
- (v) The new communication equipment under the present scope shall be compatible for integration with existing regional level centralized NMS. The local configuration of the new communication equipment shall be the responsibility of TSP. The configuration work in the existing centralized NMS for integration of new Communication equipment shall be done by Regional ULDC Team, however all the necessary support in this regard shall be ensured by TSP.

The maintenance of all the communication equipment including FOTE, FODP, approach cable, DCPS alongwith Battery Bank shall be the responsibility of TSP.



**Repeater Requirements**

- If the repeater location is finalized in the Control Room of a nearby substation, TSP shall provide 1 no. OPGW (48F) on a single Earthwire peak with OPGW Hardware & mid-way Joint Boxes etc. of the line crossing the main line and 1 no. Approach Cable (48F) with all associated hardware fittings, to establish connectivity between crossing point of main transmission line up to the repeater equipment in substation control room.

TSP shall co-ordinate for Space & DC power supply sharing for repeater equipment.

TSP shall provide FODP, FOTE (with STM-16 capacity) with suitable interfaces require for link budget of respective link.

OR

- If the repeater location is finalized in the nearby substation premises, the TSP shall identify the Space for repeater shelter in consultation with station owner. Further TSP shall provide 1 no. OPGW (48F) on a single Earthwire peak with OPGW Hardware & mid-way Joint Boxes etc. of the line crossing the main line and 1 no. Approach Cable (48F) / UGFO (48F) with all associated hardware fittings, to establish connectivity between crossing point of main transmission line up to the substation where the repeater shelter is to be housed.

TSP shall provide repeater shelter along with FODP, FOTE (with STM-16 capacity) with suitable interfaces require for link budget of respective link, reliable power supply provisioning for AC and DC supply, battery bank, Air Conditioner and other associated systems.

OR

- If the repeater location is finalized on land near the transmission tower. TSP shall make the provisions for Land at nearby tower for repeater shelter. Further TSP shall provide 1 no. Approach Cable (48F) / UGFO (48F) with all associated hardware fittings to establish connectivity up to the location of repeater shelter.

TSP shall provide repeater shelter along with FODP, FOTE (with STM-16 capacity) with suitable interfaces require for link budget of respective link, reliable power supply provisioning for AC and DC supply, battery bank, Air Conditioner and other associated systems

Maintenance of OPGW Cable and **OPGW Hardware**, repeater equipment & items associated with repeater shelter shall be responsibility of TSP.



Transmission Service Agreement

Note: Existing Station owner/s to provide necessary support to integrate different equipment & applications of new extended bays with the existing substation e.g. Communication (through FOTE), Voice etc. for smooth operation and monitoring of new added grid elements.



Central Transmission Utility of India Limited

103

Bikaner III Neemrana II Transmission Limited

A handwritten signature in blue ink, appearing to be 'R. R.', located to the right of the stamp.

Transmission Service Agreement

Proposed Communication for Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1), Part-C

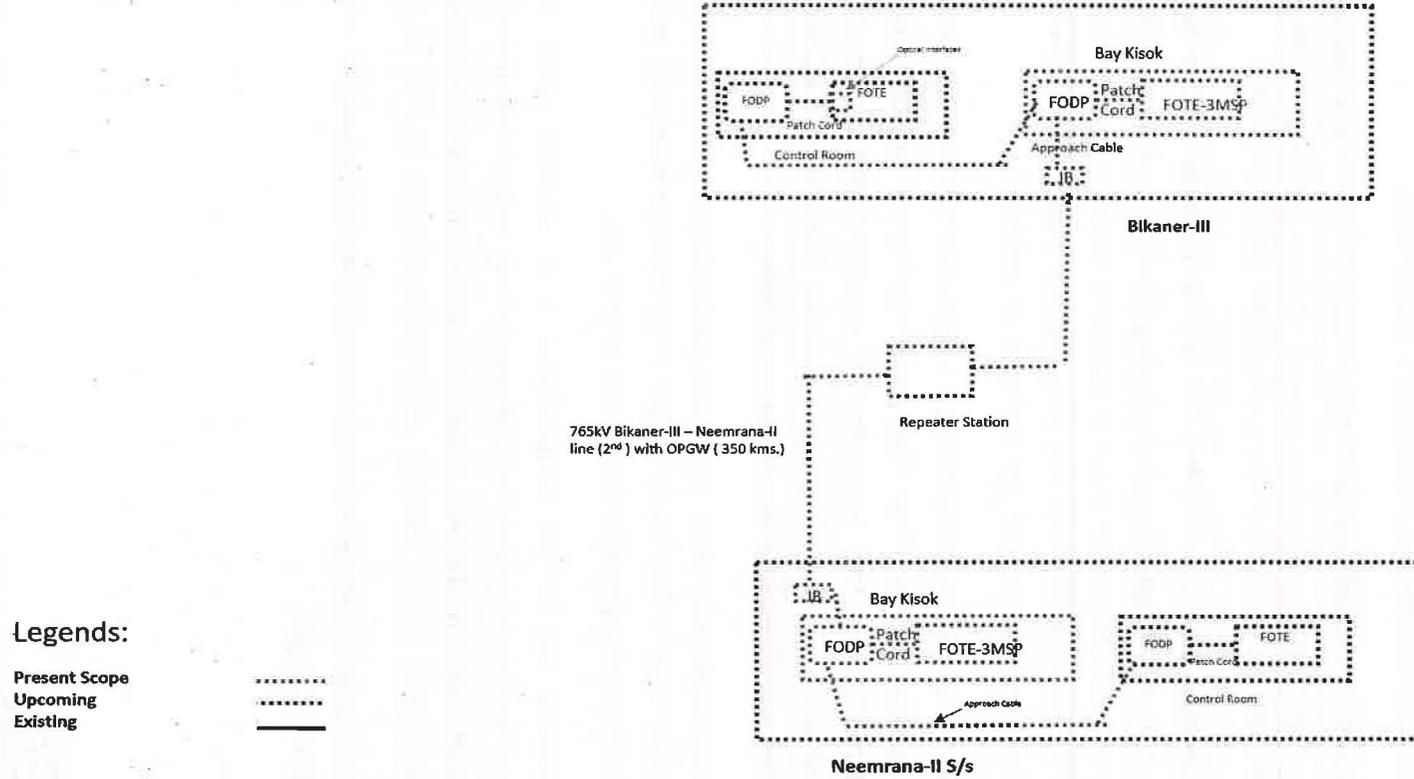


Figure D.1



Handwritten signature or initials in blue ink.

## Transmission Service Agreement

**C.4.0 PLCC& PABX:**

Power line carrier communication (PLCC) equipment complete for speech, tele-protection commands and data channels shall be provided on each transmission line. The PLCC equipment shall in brief include the following: -

- Coupling device, line traps, carrier terminals, protection couplers, HF cables, PABX (if applicable) and maintenance and testing instruments.
- At new substation, a telephone exchange (PABX) of 24 lines shall be provided at as means of effective communication among various buildings of the substation, remote end substations and with control centres (RLDC/SLDC) etc.
- Coupling devices shall be suitable for phase to phase coupling for 765kV Transmission lines. The pass band of coupling devices shall have sufficient margin for adding communication channel in future if required. Necessary protection devices for safety of personnel and low voltage part against power frequency voltages and transient over voltage shall also be provided.
- The line traps shall be broad band tuned suitable for blocking the complete range of carrier frequencies. Line Trap shall have necessary protective devices such as lightning arresters for the protection of tuning device. Decoupling network consisting of line traps and coupling capacitors may also be required at certain substation in case of extreme frequency congestion.
- The carrier terminals shall be of single side-band (SSB) amplitude modulation (AM) type and shall have 4 kHz band width. PLCC Carrier terminals and Protection couplers shall be considered for both ends of the line.
- PLCC equipment for all the transmission lines covered under the scheme (consisting of one set of analog PLCC channel along with circuit protection coupler and one set of Digital protection coupler for both ends) shall be provided by TSP. CVT & Wave trap for all the line bays under present scope shall be provided by TSP.
- All other associated equipment like cabling, coupling device and HF cable shall also be provided by the TSP.



## Transmission Service Agreement

## Schedule: 2

## Scheduled COD

[Note: As referred to in the definition of "Element", "Scheduled COD", and in Articles 3.1.3 (c), 4.1 (b) and 4.3 (a) of this Agreement]

S. No.	Name of the Transmission Element	Scheduled COD	Percentage of Quoted Transmission Charges recoverable on Scheduled COD of the Element of the Project	Element(s) which are pre-required for declaring the commercial operation (COD) of the respective Element
1.	Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end	24 months from SPV transfer	100%	All elements of scheme are required to be commissioned simultaneously as their utilization is dependent on each other.
2.	2 no. of 765 kV line bays each at Bikaner-III PS & Neemrana-II S/s.			

**Note:**

- (i) Developer of Bikaner-III PS & Neemrana-II S/s shall provide space for 2 nos. of 765 kV line bays alongwith space for Switchable line reactor each at Bikaner-III PS & Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2nd).

The payment of Transmission Charges for any Element irrespective of its successful commissioning on or before its Scheduled COD shall only be considered after successful commissioning of the Element(s) which are pre-required for declaring the commercial operation of such Element as mentioned in the above table.

Scheduled COD for the Project: 24 Months from Effective Date.



**Schedule: 3****Safety Rules and Procedures**

[Note: As referred to in Articles 5.6 of this Agreement]

**1: Site Regulations and Safety:**

The TSP shall establish Site regulations within sixty (60) days from fulfilment of conditions subsequent, as per Prudent Utility Practices setting out the rules to be observed till expiry of the Agreement at the Site and shall comply therewith.

Such Site regulations shall include, but shall not be limited to, rules in respect of security, safety of the Project, gate control, sanitation, medical care, and fire prevention, public health, environment protection, security of public life, etc.

Copies of such Site regulations shall be provided to the Nodal Agency and the CEA for the purpose of monitoring of the Project.

**2: Emergency Work:**

In cases of any emergency, the TSP shall carry out all necessary remedial work as may be necessary.

If the work done or caused to be done by any entity, other than the TSP, the TSP shall, reimburse the actual costs incurred, to the other Party carrying out such remedial works.

**3: Site Clearance:**

In the course of execution of the Agreement, the TSP shall keep the Site reasonably free from all unnecessary obstruction, storage, remove any surplus materials, clear away any wreckage, rubbish and temporary works from the Site, and remove any equipment no longer required for execution of the Agreement. After completion of all Elements of the Project, the TSP shall clear away and remove all wreckage, rubbish and debris of any kind from the Site, and shall leave the Site clean and safe.

**4: Watching and Lighting:**

The TSP shall provide and maintain at its own expense all lighting, fencing, and watching when and where necessary for the proper construction, operation, maintenance / repair of any of the Elements of the Project, or for the safety of the owners and occupiers of adjacent property and for the safety of the public, during such maintenance / repair.



## Transmission Service Agreement

## Schedule: 4

## Computation of Transmission Charges

## 1.1 General

The Monthly Transmission Charges to be paid to the TSP for providing Transmission Service for any Contract Year during the term of the Agreement shall be computed in accordance with this Schedule and paid as per Sharing Regulations.

Illustration regarding payment of Transmission Charges under various scenarios (considering definitions of Contract Year, Expiry Date & Monthly Transmission Charges above) is as below: -

**Illustration-1: In case the Project Elements achieve COD as per Schedule**

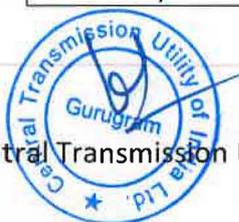
Quoted Transmission Charges: **Rs. 140 Million**

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	28	1-Feb-2018	1-Feb-2018	25%
Element 2	38	1-Dec-2018	1-Dec-2018	75%

Tariff Payable as follows:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Feb-18 to 31-Mar-18	$140 \times 25\% \times ((28+31)/365)$	5.65		--	0.00
1-Apr-18 to 30-Nov-18	$140 \times 25\% \times (244/365)$	23.39		--	0.00
1-Dec-18 to 31-Mar-19	$140 \times 100\% \times (121/365)$				46.41
2	$140 \times 100\% \times 1$				140
3	$140 \times 100\% \times 1$				140
4	$140 \times 100\% \times 1$				140
5	$140 \times 100\% \times 1$				140
.....					
.....					
36 (1-Apr to 30-Nov)	$140 \times 100\% \times (244/365)$				93.59



## Transmission Service Agreement

**Illustration-2: In case of extension of Scheduled COD as per Article 4.4.1 & 4.4.2 of this Agreement**Quoted Transmission Charges: **Rs. 140 Million**

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	20	1-Feb-2018	1-Jul-2018	25%
Element 2	28	1-Oct-2018	1-Dec-2018	75%

Tariff Payable as follows:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Feb-18 to 31-Mar-18	--	0.00		--	0.00
1-Apr-18 to 30-Jun-18	--	0.00		--	0.00
1-Jul-18 to 30-Nov-18	140 X 25% X (153/365)	14.67		--	0.00
1-Dec-18 to 31-Mar-19	140 X 100% X (121/365)				46.41
2	140 X 100% X 1				140
3	140 X 100% X 1				140
4	140 X 100% X 1				140
5	140 X 100% X 1				140
.....					
.....					
36 (1-Apr to 30-Nov)	140 X 100% X (244/365)				93.59



## Transmission Service Agreement

**Illustration-3: In case of delay in achieving COD of Project & all individual Elements (COD of the Project achieved in Contract Year 1)**Quoted Transmission Charges: **Rs. 140 Million**

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	20	1-Feb-2018	1-Dec-2018	25%
Element 2	28	1-Oct-2018	1-Dec-2018	75%

Tariff Payable as follows:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Feb-18 to 31-Mar-18	--	0.00		--	0.00
1-Apr-18 to 30-Sept-18	--	0.00		--	0.00
1-Oct-18 to 30-Nov-18	--	0.00	1-Oct-18 to 30-Nov-18	--	0.00
1-Dec-18 to 31-Mar-19	140 X 100% X (121/365)				46.41
2	140 X 100% X 1				140
3	140 X 100% X 1				140
4	140 X 100% X 1				140
5	140 X 100% X 1				140
.....					
.....					
36 (1-Apr to 30-Nov)	140 X 100% X (244/365)				93.59



## Transmission Service Agreement

**Illustration-4: In case of delay in achieving COD of Project & all individual Elements (COD of the Project achieved in Contract Year other than Contract Year 1)**Quoted Transmission Charges: **Rs. 140 Million**

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	38	1-Oct-2019	1-May-2020	25%
Element 2	38	1-Oct-2019	1-May-2020	75%

Tariff Payment to be paid as:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Oct-19 to 31-Mar-20	--	0.00	1-Oct-19 to 31-Mar-20	--	0.00
1-Apr-20 to 30-Apr-20	-	0.00	1-Apr-20 to 30-Apr-20	-	0.00
1-May-20 to 31-Mar-21	140 X 100% X (335/365)				128.49
2	140 X 100% X 1				140
3	140 X 100% X 1				140
4	140 X 100% X 1				140
5	140 X 100% X 1				140
.....					
.....					
36 (1-Apr to 30-Apr)	140 X 100% X (30/ 365)				11.51



## Transmission Service Agreement

**Illustration5: In case of delay in achieving COD of Element but Project COD achieved on time**Quoted Transmission Charges: **Rs. 140 Million**

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	20	1-Feb-2018	1-Jul-2018	25%
Element 2	30	1-Dec-2018	1-Dec-2018	75%

Tariff Payable as follows:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Feb-18 to 31-Mar-18	--	0.00		--	0.00
1-Apr-18 to 30-Jun-18	--	0.00		--	0.00
1-Jul-18 to 30-Nov-18	140 X 25% X (153/365)	14.67		--	0.00
1-Dec-18 to 31-Mar-19	140 X 100% X (121/365)				46.41
2	140 X 100% X 1				140
3	140 X 100% X 1				140
4	140 X 100% X 1				140
5	140 X 100% X 1				140
.....					
.....					
36 (1-Apr to 30-Nov)	140 X 100% X (244/365)				93.59



## Transmission Service Agreement

**Illustration-6: In case of early commissioning of Project**

Quoted Transmission Charges: Rs. 140 Million

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	38	1-Oct-2019	1-Jul-2019	25%
Element 2	38	1-Oct-2019	1-Jul-2019	75%

Tariff Payment to be paid as:

Transmission Charges for Element 1		Transmission Charges for Element 2	
1-July-19 to 31-Mar-20	140 X 100% X (274/365)		105.09
2	140 X 100% X 1		140
3	140 X 100% X 1		140
4	140 X 100% X 1		140
5	140 X 100% X 1		140
.....			
.....			
36 (1-Apr to 30-Jun)	140 X 100% X (91/365)		34.91

**Illustration-7: In case of early commissioning of an element**

Quoted Transmission Charges: Rs. 140 Million

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	38	1-Oct-2019	1-Apr-2019	25%
Element 2	38	1-Jul-2019	1-Jul-2019	75%



## Transmission Service Agreement

Tariff Payment to be paid as:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Apr-2019 to 30-Jun-19	140 X 25% X (91/365)	8.72	1-Apr-2019 to 30-Jun-19	--	0.00
1-July-19 to 31-Mar-20	140 X 100% X (274/ 365)				105.09
2	140 X 100% X 1				140
3	140 X 100% X 1				140
4	140 X 100% X 1				140
5	140 X 100% X 1				140
.....					
.....					
36 (1-Apr-30-Jun)	140 X 100% X (91/365)				34.91

The Transmission Charges shall be payable on monthly basis as computed above.

### 1.2 Computation of Monthly Transmission Charges

The Monthly Transmission Charges for any month m in a Contract Year n shall be calculated as below:

For AC System:

- a. If Actual Transmission System Availability for the month m of contract year n is greater than or equal to 98% and less than or equal to 98.5%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * 1$$

- a. If Actual Transmission System Availability for the month m of contract year n exceeds 98.5% and less than or equal to 99.75%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA / 98.5\%)$$

- c. If Actual Transmission System Availability for the month m of contract year n is greater than 99.75%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (99.75\% / 98.5\%)$$

- d. If Actual Transmission System Availability for the month m of contract year n is less than 98% and greater than or equal to 95.00%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA / 98\%)$$



## Transmission Service Agreement

- e. If Actual Transmission System Availability for the month m of contract year falls below 95%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA/ 98\%) - 0.02 * (T_{mn} * (AA/ 95\%))$$

For DC System:

- a. If Actual Transmission System Availability for the month m of contract year n is greater than or equal to 95% and less than or equal to 96%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * 1$$

- b. If Actual Transmission System Availability for the month m of contract year n exceeds 96% and less than or equal to 99.75%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA/ 96\%)$$

- c. If Actual Transmission System Availability for the month m of contract year n is greater than 99.75%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (99.75\% / 96\%)$$

- d. If Actual Transmission System Availability for the month m of contract year n is less than 95% and greater than or equal to 92.00%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA/ 95\%)$$

- e. If Actual Transmission System Availability for the month m of contract year falls below 92%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA/ 95\%) - 0.02 * (T_{mn} * (AA/ 92\%))$$

where:

- AA is the actual Availability, as certified by RPC, as per procedure provided in Schedule 6.
- m is the month in Contract Year 'n'
- $T_{mn}$  = Transmission Charges for the month 'm' in Contract Year 'n' = (=Transmission Charge/ no. of days in the Year n)\* no. of days in month m

Provided, no Transmission Charges shall be paid during the period for which the RLDC has not allowed the operation of the Element/Project due to the failure of the TSP to operate it as per the provisions of the Grid Code.



## Transmission Service Agreement

**1.3 RLDC Fee & Charges**

The payment of RLDC fee & charges, in accordance with relevant regulations of CERC, shall be the responsibility of the TSP.



## Transmission Service Agreement

## Schedule: 5

## Quoted Transmission Charges

[Quoted Transmission Charges from Annexure - 21 of the RFP of the Selected Bidder to be inserted here]

[To be incorporated from the Bid of the Selected Bidder submitted during the e-reverse auction after its selection]

Quoted Transmission Charges: Rs. 1626.59 Million per annum

Proportionate Transmission Charges payable for each Element of the Project:

S. No.	Name of the Transmission Element	Percentage of Quoted Transmission Charges recoverable on Scheduled COD of the Element of the Project
1.	Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end	100%
2.	2 no. of 765 kV line bays each at Bikaner-III PS & Neemrana-II S/s	



## Transmission Service Agreement

## Schedule: 6

## Appendix –II of the Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019 as amended from time to time

## Procedure for Calculation of Transmission System Availability Factor for a Month

1. Transmission system availability factor for nth calendar month ("TAFPn") shall be calculated by the respective transmission licensee, got verified by the concerned Regional Load Dispatch Centre (RLDC) and certified by the Member-Secretary, Regional Power Committee of the region concerned, separately for each AC and HVDC transmission system and grouped according to sharing of transmission charges. In case of AC system, transmission System Availability shall be calculated separately for each Regional Transmission System and inter-regional transmission system. In case of HVDC system, transmission System Availability shall be calculated on consolidate basis for all inter-state HVDC system.
2. Transmission system availability factor for nth calendar month ("TAFPn") shall be calculated by consider following:
  - i) **AC transmission lines:** Each circuit of AC transmission line shall be considered as one element;
  - ii) **Inter-Connecting Transformers (ICTs):** Each ICT bank (three single phase transformer together) shall form one element;
  - iii) **Static VAR Compensator (SVC):** SVC along with SVC transformer shall form one element;
  - iv) **Bus Reactors or Switchable line reactors:** Each Bus Reactors or Switchable line reactors shall be considered as one element;
  - v) **HVDC Bi-pole links:** Each pole of HVDC link along with associated equipment at both ends shall be considered as one element;
  - vi) **HVDC back-to-back station:** Each block of HVDC back-to-back station shall be considered as one element. If associated AC line (necessary for transfer of inter- regional power through HVDC back-to-back station) is not available, the HVDC back-to-back station block shall also be considered as unavailable;
  - vii) **Static Synchronous Compensation ("STATCOM"):** Each STATCOM shall be considered as separate element.

3. The Availability of AC and HVDC portion of Transmission system shall be calculated by considering each category of transmission elements as under:



## Transmission Service Agreement

TAFMn (in %) for AC system:

$$= \frac{o \times AV_o + (p \times AV_p) + (q \times AV_q) + (r \times AV_r) + (u \times AV_u)}{(o + p + q + r + u)} \times 100$$

Where,

o	=	Total number of AC lines.
AV <sub>o</sub>	=	Availability of o number of AC lines.
p	=	Total number of bus reactors/switchable line reactors
AV <sub>p</sub>	=	Availability of p number of bus reactors/switchable line reactors
q	=	Total number of ICTs.
AV <sub>q</sub>	=	Availability of q number of ICTs.
r	=	Total number of SVCs.
AV <sub>r</sub>	=	Availability of r number of SVCs
u	=	Total number of STATCOM.
AV <sub>u</sub>	=	Availability of u number of STATCOMs

TAFMn (in %) for HVDC System:

$$= \frac{\sum_{x=1}^s C_{xbp}(\text{act}) \times AV_{xbp} + \sum_{y=1}^t C_{ybtb}(\text{act}) \times AV_{ybtb}}{\sum_{x=1}^s C_{xbp} + \sum_{y=1}^t C_{ybtb}} \times 100$$

Where

C <sub>xbp</sub> (act)	=	Total actual operated capacity of x <sup>th</sup> HVDC pole
C <sub>xbp</sub>	=	Total rated capacity of x <sup>th</sup> HVDC pole
AV <sub>xbp</sub>	=	Availability of x <sup>th</sup> HVDC pole
C <sub>ybtb</sub> (act)	=	Total actual operated capacity of y <sup>th</sup> HVDC back-to-back station block
C <sub>ybtb</sub>	=	Total rated capacity of y <sup>th</sup> HVDC back-to-back station block
AV <sub>ybtb</sub>	=	Availability of y <sup>th</sup> HVDC back-to-back station block
s	=	Total no of HVDC poles
t	=	Total no of HVDC Back to Back blocks

4. The availability for each category of transmission elements shall be calculated based on the weightage factor, total hours under consideration and non-available hours for



## Transmission Service Agreement

each element of that category. The formulae for calculation of Availability of each category of the transmission elements are as per **Appendix-III**. The weightage factor for each category of transmission elements shall be considered as under:

- (a) For each circuit of AC line – Number of sub-conductors in the line multiplied by ckt-km;
  - (b) For each HVDC pole- The rated MW capacity x ckt-km;
  - (c) For each ICT bank – The rated MVA capacity;
  - (d) For SVC- The rated MVAR capacity (inductive and capacitive);
  - (e) For Bus Reactor/switchable line reactors – The rated MVAR capacity;
  - (f) For HVDC back-to-back station connecting two Regional grids- Rated MW capacity of each block; and
  - (g) For STATCOM – Total rated MVAR Capacity.
5. The transmission elements under outage due to following reasons shall be deemed to be available:
- i. Shut down availed for maintenance of another transmission scheme or construction of new element or renovation/ upgradation/ additional capitalization in existing system approved by the Commission. If the other transmission scheme belongs to the transmission licensee, the Member Secretary, RPC may restrict the deemed availability period to that considered reasonable by him for the work involved. In case of dispute regarding deemed availability, the matter may be referred to Chairperson, CEA within 30days.
  - ii. Switching off of a transmission line to restrict over voltage and manual tripping of switched reactors as per the directions of concerned RLDC.
6. For the following contingencies, outage period of transmission elements, as certified by the Member Secretary, RPC, shall be excluded from the total time of the element under period of consideration for the following contingencies:
- i) Outage of elements due to acts of God and force majeure events beyond the control of the transmission licensee. However, whether the same outage is due to force majeure (not design failure) will be verified by the Member Secretary, RPC. A reasonable restoration time for the element shall be considered by Member Secretary, RPC and any additional time taken by the transmission licensee for restoration of the element beyond the reasonable time shall be treated as outage time attributable to the transmission licensee. Member Secretary, RPC may consult the transmission licensee or any expert for estimation of reasonable restoration time. Circuits restored through ERS (Emergency Restoration System) shall be considered as available;



## Transmission Service Agreement

- ii) Outage caused by grid incident/disturbance not attributable to the transmission licensee, e.g. faults in substation or bays owned by other agency causing outage of the transmission licensee's elements, and tripping of lines, ICTs, HVDC, etc. due to grid disturbance. However, if the element is not restored on receipt of direction from RLDC while normalizing the system following grid incident/disturbance within reasonable time, the element will be considered not available for the period of outage after issuance of RLDC's direction for restoration;

Provided that in case of any disagreement with the transmission licensee regarding reason for outage, same may be referred to Chairperson, CEA within 30 days. The above need to be resolved within two months:

Provided further that where there is a difficulty or delay beyond sixty days, from the incidence in finalizing the recommendation, the Member Secretary of concerned RPC shall allow the outage hours on provisional basis till the final view.

7. Time frame for certification of transmission system availability: (1) Following schedule shall be followed for certification of availability by Member Secretary of concerned RPC:

- Submission of outage data by Transmission Licensees to RLDC/constituents – By 5th of the following month;
- Review of the outage data by RLDC / constituents and forward the same to respective RPC– by 20th of the month;
- Issue of availability certificate by respective RPC – by 3rd of the next month.



## Transmission Service Agreement

## Appendix-III

## FORMULAE FOR CALCULATION OF AVAILABILITY OF EACH CATEGORY OF TRANSMISSION ELEMENTS

For AC transmission system

$$AV_o(\text{Availability of } o \text{ no. of AC lines}) = \frac{\sum_{i=1}^o W_i(T_i - TNA_i)/T_i}{\sum_{i=1}^o W_i}$$

$$AV_q(\text{Availability of } q \text{ no. of ICTs}) = \frac{\sum_{k=1}^q W_k(T_k - TNA_k)/T_k}{\sum_{k=1}^q W_k}$$

$$AV_r(\text{Availability of } r \text{ no. of SVCs}) = \frac{\sum_{i=1}^r W_i(T_i - TNA_i)/T_i}{\sum_{i=1}^r W_i}$$

$$AV_p(\text{Availability of } p \text{ no. of Switched Bus reactors}) = \frac{\sum_{m=1}^p W_m(T_m - TNA_m)/T_m}{\sum_{m=1}^p W_m}$$

$$AV_u(\text{Availability of } u \text{ no. of STATCOMs}) = \frac{\sum_{n=1}^u W_n(T_n - TNA_n)/T_n}{\sum_{n=1}^u W_n}$$

$$AV_{x_{bp}}(\text{Availability of an individual HVDC pole}) = \frac{(T_x - TNA_x)}{T_x}$$

$$AV_{y_{btb}}(\text{Availability of an individual HVDC Back-to-back Blocks}) = \frac{(T_y - TNA_y)}{T_y}$$

For HVDC transmission system

For the new HVDC commissioned but not completed twelve months;

For first 12 months:  $[(AV_{x_{bp}} \text{ or } AV_{y_{btb}}) \times 95\% / 85\%]$ , subject to ceiling of 95%.

Where,

- o = Total number of AC lines;
- AV<sub>o</sub> = Availability of o number of AC lines;
- p = Total number of bus reactors/switchable line reactors;
- AV<sub>p</sub> = Availability of p number of bus reactors/switchable line reactors;
- q = Total number of ICTs;
- AV<sub>q</sub> = Availability of q number of ICTs;
- r = Total number of SVCs;
- AV<sub>r</sub> = Availability of r number of SVCs;
- U = Total number of STATCOM;



## Transmission Service Agreement

$AV_u$	=	Availability of $u$ number of STATCOMs;
$W_i$	=	Weightage factor for $i$ th transmission line;
$W_k$	=	Weightage factor for $k$ th ICT;
$W_l$	=	Weightage factors for inductive & capacitive operation of $l$ th SVC;
$W_m$	=	Weightage factor for $m$ th bus reactor;
$W_n$	=	Weightage factor for $n$ th STATCOM.
$T_i, T_k, T_l, T_m, T_n, T_x, T_y$	=	The total hours of $i$ th AC line, $k$ th ICT, $l$ th SVC, $m$ th Switched Bus Reactor & $n$ th STATCOM, $x$ th HVDC pole, $y$ th HVDC back-to-back blocks during the period under consideration (excluding time period for outages not attributable to transmission licensee for reasons given in Para 5 of the procedure)
$T_{NAi}, T_{NAk}, T_{NAL}, T_{NAM}, T_{NAN}, T_{NAX}, T_{NAY}$	=	The non-availability hours (excluding the time period for outages not attributable to transmission licensee taken as deemed availability as per Para 5 of the procedure) for $i$ th AC line, $k$ th ICT, $l$ th SVC, $m$ th Switched Bus Reactor, $n$ th STATCOM, $x$ th HVDC pole and $y$ th HVDC back-to-back block.



Transmission Service Agreement

Schedule: 7

Entire Bid (both financial bid and technical bid) of the Selected Bidder to be attached here



Central Transmission Utility of India Limited

124

Bikaner III Neemrana II Transmission Limited

## Transmission Service Agreement

## Schedule: 8

## Contract Performance Guarantee

(To be on non-judicial stamp paper of appropriate value as per Stamp Act relevant to place of execution. Foreign entities submitting Bids are required to follow the applicable law in their country.)

In consideration of the ..... [Insert name of the SPV or Selected Bidder on behalf of the TSP, or Lead Member in case of the Consortium, with address] agreeing to undertake the obligations under the Transmission Service Agreement dated .....and the other RFP Project Documents and the Nodal Agency and the PFC Consulting Limited, agreeing to execute the *RFP Project Documents* with the Selected Bidder, regarding setting up the Project, the ..... [Insert name and address of the bank issuing the guarantee and address of the head office] (hereinafter referred to as "Guarantor Bank") hereby agrees unequivocally, irrevocably and unconditionally to pay to ..... (being the Nodal Agency) \_at .....[Insert the Place from the address of the Nodal Agency indicated in the TSA] forthwith on demand in writing from the Nodal Agency\_or any Officer authorized by it in this behalf, any amount up to and not exceeding Rupees ..... Crores (Rs. ....) only [Insert the amount of the bank guarantee] on behalf of M/s. .... [Insert name of the Selected Bidder or SPV].

This guarantee shall be valid and binding on the Guarantor Bank up to and including .....and shall not be terminable by notice or any change in the constitution of the Bank or the term of the Transmission Service Agreement or by any other reasons whatsoever and our liability hereunder shall not be impaired or discharged by any extension of time or variations or alternations made, given, or agreed with or without our knowledge or consent, by or between parties to the respective agreement.

Our liability under this Guarantee is restricted to Rs. .... Crores (Rs. ....) only. Our Guarantee shall remain in force until ..... [Insert the date of validity of the Guarantee as per Article 3.1.2 of this Agreement]. The Nodal Agency, shall be entitled to invoke this Guarantee up to three hundred sixty five (365) days of the last date of the validity of this Guarantee.



## Transmission Service Agreement

The Guarantor Bank hereby expressly agrees that it shall not require any proof in addition to the written demand from ..... (in its roles as the Nodal Agency), made in any format, raised at the above mentioned address of the Guarantor Bank, in order to make the said payment to Nodal Agency.

The Guarantor Bank shall make payment hereunder on first demand without restriction or conditions and notwithstanding any objection by ..... [Insert name of the Selected Bidder], ..... [Insert name of the TSP] and / or any other person. The Guarantor Bank shall not require Nodal Agency to justify the invocation of this BANK GUARANTEE, nor shall the Guarantor Bank have any recourse against Nodal Agency in respect of any payment made hereunder.

**THIS BANK GUARANTEE** shall be interpreted in accordance with the laws of India.

The Guarantor Bank represents that this BANK GUARANTEE has been established in such form and with such content that it is fully enforceable in accordance with its terms as against the Guarantor Bank in the manner provided herein.

**THIS BANK GUARANTEE** shall not be affected in any manner by reason of merger, amalgamation, restructuring, liquidation, winding up, dissolution or any other change in the constitution of the Guarantor Bank.

**THIS BANK GUARANTEE** shall be a primary obligation of the Guarantor Bank and accordingly Nodal Agency shall not be obliged before enforcing this BANK GUARANTEE to take any action in any court or arbitral proceedings against **SPV** or the Selected Bidder, as the case may be, to make any claim against or any demand on **SPV** or the Selected Bidder, as the case may be, or to give any notice to **SPV** or the Selected Bidder, as the case may be, or to enforce any security held by the Nodal Agency or to exercise, levy or enforce any distress, diligence or other process against **SPV** or the Selected Bidder, as the case may be.

The Guarantor Bank acknowledges that this BANK GUARANTEE is not personal to Nodal Agency and may be assigned, in whole or in part, (whether absolutely or by way of security) by Nodal Agency to any entity to whom the Nodal Agency is entitled to assign its rights and obligations under the Transmission Service Agreement.

The Guarantor Bank hereby agrees and acknowledges that Nodal Agency shall have a right to invoke this Bank Guarantee either in part or in full, as it may deem fit.

Notwithstanding anything contained hereinabove, our liability under this Guarantee is restricted to Rs. .... Crores (Rs. ....) only and it shall remain in



## Transmission Service Agreement

force until .....[Date to be inserted on the basis of Article 3.1.2 of the Transmission Service Agreement], with an additional claim period of three hundred sixty five (365) days thereafter. This BANK GUARANTEE shall be extended from time to time for such period, as may be desired by ..... [Insert name of the Selected Bidder or Lead Member in case of the Consortium or SPV]. We are liable to pay the guaranteed amount or any part thereof under this Bank Guarantee only if Nodal Agency serves upon us a written claim or demand.

**In witness where of:**

Signature .....

Name: .....

Power of attorney No.: .....

**For:**

..... [Insert Name of the Bank]

**Banker's Seal and Full Address, including mailing address of the Head Office**



## Transmission Service Agreement

## Schedule: 9

## Methodology for determining the Relief Under Force Majeure Event &amp; Change in Law during Construction Period

The relief in the form of revision in tariff due to Force Majeure Event leading to extension of Scheduled COD for a period beyond one hundred eighty (180) days and/ or Change in Law during the construction period shall be as under:

$$\Delta T = [(P \times d)] \div [1 - (1 + d)^{-n}]$$

Where,

$\Delta T$  = Change in Transmission Charges for each year

P = Sum of cumulative increase or decrease in the cost of the Project due to Change in Law and interest cost during construction corresponding to the period exceeding one hundred eighty (180) due to Force Majeure Event leading to extension of Scheduled COD for a period beyond one hundred eighty (180) days

n = number of years over which the Transmission Charges has to be paid

d = Discount rate as notified by the CERC, applicable on the Bid Deadline

The increase in Transmission Charges as stated above shall be applicable only if the value of increase in Transmission Charges as calculated above exceeds 0.30% (zero point three percent) of the quoted Transmission Charges of the TSP.



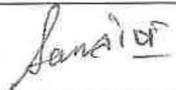
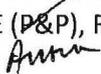
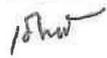
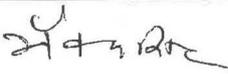
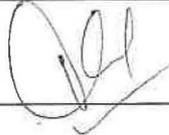
Dated: November 24, 2023

## CERTIFICATE BY THE BID EVALUATION COMMITTEE

**Subject: Selection of Successful Bidder as Transmission Service Provider to establish "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): PART-C".**

It is hereby certified that:

1. The entire bid process has been carried out in accordance with the "Tariff based Competitive Bidding Guidelines for Transmission Service" and "Guidelines for encouraging competition in development of the Transmission Projects" issued by Ministry of Power, Govt. of India under Section 63 of the Electricity Act, 2003 and as amended from time to time.
2. **The Tata Power Company Limited** emerged as the Successful Bidder after the conclusion of e-reverse bidding process with the lowest Quoted Transmission Charges of **Rs. 1626.59 million per annum**.
3. The quoted tariff is lower than the Levelised Tariff calculated based on CERC norms considering the Capital Cost for the Project '**Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): PART-C**' as assessed by Cost Committee. The quoted tariff discovered through e-reverse bidding process is acceptable.

Name of Committee Member	Signature
Sh. Rajesh Kumar Singh, General Manager, SBI, CCGRO-II, New Delhi - <b>Chairman</b>	
Sh. Santosh Kumar, SE, NRPC- <b>Member</b>	
Sh. V.A. Kale, SE (P&P), RVPNL - <b>Member</b> 	
Sh. Bhanwar Singh Meena, Director (PSE&TD), Central Electricity Authority- <b>Member</b>	
Smt. Manjari Chaturvedi, Director (PSPA-I), Central Electricity Authority, New Delhi - <b>Member</b>	
Sh. Neeraj Singh, Chairman, Bikaner III Neemrana II Transmission Limited, New Delhi - <b>Convener Member</b>	

**Form No. INC-34****e-AOA (e-Articles of Association)**

[Pursuant to Section 5 of the Companies Act, 2013 and rules made thereunder read with Schedule I]



Form language

 English  Hindi

Refer instruction kit for filing the form.

All fields marked in \* are mandatory

Table applicable to company as notified under schedule I of the Companies Act, 2013  
(F, G, H)

F

Table F / G / H (basis on the selection of above-mentioned field) as notified under schedule I of the companies Act, 2013 is applicable to

(F – a company limited by shares

G – a company limited by guarantee and having a share capital

H – a company limited by guarantee and not having share capital)

F - A COMPANY LIMITED BY SHARES

The name of the company is

BIKANER III NEEMRANA II TRANSMISSION LIMITED

Check if not applicable	Check if altered	Article No.	Description
			<b>Interpretation</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	I	
			<b>Share Capital and Variation of rights</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	II 1	<ul style="list-style-type: none"> <li>1.1 SHARE CAPITAL AND VARIATION OF RIGHTS 1.1 Share Capital / Increase of capital by the Company and how carried into effect ? The Authorized Share Capital of the Company is as mentioned in clause V of the Memorandum of Association of the Company. The Company in General Meeting may from time to time, by resolution, increase its authorized share capital by creation of new shares, such increase to be of such aggregate amount and to be divided into shares of such respective amounts as may be determined by the General Meeting subject to the provisions of the Act. ? 1.2 New Capital same as existing capital ? Any capital raised by the creation of new shares shall be considered as part of the original capital, and shall be subject to the same provisions herein contained, with reference to the payment of calls and installments, forfeiture, lien, surrender, transfer and transmission, voting and otherwise. ? 1.3 Reduction of Capital ? The Company may, from time to time, by special resolution reduce its capital, which may be paid off either with or without extinguishing or reducing? liability on shares, which is in excess of the wants of the company or canceling such share capital which has been lost or is unrepresented by available</li> </ul>

			assets. ? 1.4 Subdivision and consolidation of shares ? The Company in general meeting may, from time to time, sub-divide or consolidate its shares or any of them and exercise any of the other powers conferred by Section 61 of the Act and shall file with the Registrar such notice of exercise of any such powers as may be required by the Act. ?
<input type="checkbox"/>	<input checked="" type="checkbox"/>	2	<ul style="list-style-type: none"> <li>2.1 Register and Index of Members/ Beneficial owners ? The Company shall cause to be kept a Register and also an Index of Members and Debenture-holders in accordance with Sections 88 of the Act. Further, as permissible under Section 88 of the Act, the register and Index of beneficial owners maintained by a ? Depository? shall be deemed to be the corresponding Register and Index for the purpose of this Act. 2.2 Foreign Register of members ? ? The Company shall be entitled to keep in any country outside India a Foreign Register of members resident in that country, subject to compliance with the provisions of Section 88 of the Act. 2.3 Shares to be numbered distinctively ? The shares in the capital held otherwise than in the depository mode shall be numbered progressively in sequence and given distinctive number, Except and in the manner herein mentioned, no share shall be forfeited or surrendered and shall continue to bear the number which it had originally borne. 2.4 Share Application Money ? The Company shall ensure that the share application money paid is held by it in an account with a Scheduled Commercial Bank (in the name of the Company)</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	3	<ul style="list-style-type: none"> <li>3.1 Further Issue of Capital ? (a)Where at any time the Company wishes to raise its subscribed share capital by issue of further shares, it shall first offer such shares to its existing shareholders in proportion to their existing shareholdings on the date of such issue. Such offer to the existing shareholders shall be in accordance with the provisions of Section 62 of the Act. ? (b) The Company shall subject to applicable provisions of the Act and Articles of Association, make uniform calls from time to time upon all the Shareholders in respect of the moneys remaining unpaid on the issued share capital within 30 days or such time, as the Board may deem fit and appropriate.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	4	<ul style="list-style-type: none"> <li>4.1 Shares under control of Directors ? Subject to the provisions of these Articles and of the Act, the shares including any shares forming part of any increased capital of the Company shall be under the control of the Directors, who may allot or otherwise dispose off the shares to such persons in such proportion, on such terms and conditions and at such times as the Directors may think fit and subject to the sanction of the Company in General Meeting, subject to the provisions of Sections 52 and section 54 of the Act at a premium or par and such option being exercisable for such time and for such consideration as the Directors think fit. The Board shall cause to be filed the returns as to allotment provided for in Section 39(4) of the Act.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	5	
<input type="checkbox"/>	<input checked="" type="checkbox"/>	6	
			<ul style="list-style-type: none"> <li>7.1 Share Certificates ? A certificate, issued under the common seal</li> </ul>

<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>7</p>	<p>of the company, specifying the shares held by any person, shall be?prima facie?evidence of the title of the person to such shares. ?          (a) Every Member or allottee of shares who is holding such shares in the physical form shall be entitled, without payment, to receive certificate specifying the name of the person in whose favour it is issued, the shares to which it relates and the amount paid-up thereof. Such certificates shall be issued only in pursuance of a resolution passed by the Board and on surrender to the Company of the letter of allotment or the fractional coupons of requisite value, save in case of issues against letters of acceptance or of renunciation or in cases of issue of bonus shares. Every such certificate shall be issued under the seal of the Company, which shall be affixed in the presence of two Directors and the Secretary or some other person appointed by the Board for the purpose, and the two directors and the Secretary or other persons as authorized by the Board shall sign the share certificate.? Provided, if the composition of the Board permits of it, at least one of the aforesaid two directors shall be a person other than a Managing or a Whole Time Director. Particulars of every share certificate issued shall be entered in the Register of Members against the name of the person, to whom it has been issued, indicating the date of issue. For issue of any further duplicate certificate, the Board shall be entitled to charge such amount which shall not exceed fifty Rupees per Certificate. ? (b) A Director may sign a share certificate by affixing his signature thereon by means of any machine, equipment or other mechanical means such as engraving in metal or lithography, but not by means of a rubber stamp. PROVIDED that the Director shall be personally responsible for the safe custody of such machine equipment or other material used for the purpose. 7.2 Renewal of Share Certificates ? (a) No certificate of any share or shares shall be issued either in exchange for those which are sub-divided or consolidated or in replacement of those which are defaced, mutilated, torn or old, decrepit, destroyed or where the pages on the reverse for recording transfers have been duly utilized, unless the certificate in lieu of which it is issued is surrendered to the Company and for issuing such share certificate the company may charge such fee as the Board thinks fit,? not exceeding twenty rupees per certificate. ? (b) When a new share certificate has been issued in pursuance of clause (a) of this Article, it shall state on the face of it and against the stub or counterfoil to the effect that it is ? Issued in lieu of share certificate No _____ sub-divided/ replaced/on consolidation.?? (c) If a share certificate is lost or destroyed a new certificate in lieu thereof shall be issued only with the prior consent of the Board and on such reasonable terms, such as furnishing supporting evidence and indemnity and? the payment of out-of-pocket expenses incurred by the Company in investigating evidence produced, as the Board thinks fit. ? (d) When a new share certificate has been issued in pursuance of clause (c) of this Article, it shall state on the face of it and against the stub or counterfoil to the effect that it is ?duplicate issued in lieu of share certificate No._____? and the word ?duplicate? shall be stamped or printed prominently on the face of the share certificate. ? (e) Where a new share certificate has been issued in pursuance of clause (a) and/ or clause (c) of this Article, particulars of every such share certificate shall be entered in a Register of Renewed and Duplicate Share Certificates indicating against the name(s) of the person(s) to whom the certificate is issued, the number and date of issue of the share certificate in lieu of which the new certificate is issued and the necessary changes indicated in the Register of</p>
--------------------------	-------------------------------------	----------	---

		<p>Members by suitable cross reference in the "Remarks" column. (f) All blank forms to be used for issue of share certificates shall be printed and the printing shall be done only on the authority of a resolution of the Board and the blank forms shall be consecutively machine-numbered and the forms and the blocks, engravings, facsimiles relating to the printing of such forms shall be kept in the custody of the Secretary or of such other person as the Board may appoint for the purpose; and the Secretary or the other person aforesaid shall be responsible for rendering an account of these forms to the Board. (g) The Committee of the Board, Company Secretary of the Company or a Director specifically authorized by the Board for such purpose shall be responsible for the maintenance, preservation and safe custody of all books and documents relating to the issue of share certificates including the blank forms of share certificates referred to in clause (f). (h) All books referred to in clause (g) shall be preserved in good order for not less than thirty years and in disputed cases shall be preserved permanently. 7.3 Joint holders (a) Where two or more persons are registered as the holders of any share, they shall be treated as a single shareholder and shall be deemed to hold the same as joint holders with benefits of survivorship subject to the following and other provisions contained in these Articles. (b) The Company shall be entitled to decline to register more than four persons as the holders of any share. (c) The Joint holders of any share shall be liable, severally as well as jointly, for and in respect of all calls and other payments which ought to be made in respect of such shares. (d) On the death of any such joint holder, the survivor or survivors shall be the only person or persons recognized by the Company as having any title to the share, but the Directors may require such evidence of death as they may deem fit and nothing herein contained shall be taken to release the estate of the deceased joint holder from any liability on shares held by him jointly with any other person. (e) Delivery of share certificate to any one of such joint holders shall be deemed to be delivery to all of them and any one of such joint holders may give effectual discharge and receipts for any dividends or other moneys payable in respect of such shares and/or in respect of any other obligation of the Company towards them. (f) Only the person whose name stands in the Register of Members as the first of the joint holders of any shares shall be entitled to delivery of the certificate relating to such share or to receive notices from the Company, and any notice given to such person shall be deemed proper notice to all joint holders. (g) Any one of two or more joint holders may vote at any meeting either personally or by proxy in respect of such share as if he were solely entitled thereto, and if more than one of such joint holders be present at any meeting personally or by proxy, the holder whose name stands first or higher (as the case may be) on the Register of Members in respect of such share shall alone be entitled to vote in respect thereof. PROVIDED always that a member present at any meeting personally shall be entitled to vote in preference to a person present by proxy although the name of such person present by proxy stands first on the Register of Members in respect of such shares.</p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<ul style="list-style-type: none"> <li>8 Terms and Conditions of Preference Shares Subject to the provisions of section 55, any preference shares may, with the sanction of an ordinary resolution, be issued on the terms that they</li> </ul>

		8	are to be redeemed on such terms and in such manner as the company before the issue of the shares may, by special resolution, determine. ?
			<b>Lien</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	9	<ul style="list-style-type: none"> <li>9 Company to have lien on shares ? The Company shall have a first and paramount lien upon all shares (other than fully paid up shares) registered in the name of each member (whether solely or jointly with others) and upon the sale proceeds thereof, for all moneys (whether presently payable or not) called or payable at a fixed time in respect of all such shares (not being fully paid up) for all moneys presently payable by him or his estate to the Company. Any such lien shall extend to all dividends payable and bonuses declared from time to time declared in respect of such shares.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	10	<ul style="list-style-type: none"> <li>10 Enforcing lien by sale ? For the purpose of enforcing such lien, the Board may sell the shares subject thereto in such manner as they shall think fit, and for that purpose it may cause to be issued a duplicate certificate in respect of such shares and may authorize one of their Directors to execute a transfer thereof on behalf of and in the name of the Board. No sale shall be made until notice period for making call as aforesaid have expired and until notice in writing of the intention to sell shall have been made known to the shareholder for default in payment and default has been made by him in the payment of money called in respect of such shares for thirty days after the date of such notice. Upon issue of a duplicate certificate or certificates in lieu of the original share, the certificate or certificates originally issued shall stand cancelled and become null and void and the same shall have no effect.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	11	<ul style="list-style-type: none"> <li>11 .1 Application of proceeds of sale ?? The net proceeds of any such sale shall be received by the Company and applied in or towards payment of such part of the amount as is presently payable and the residue, if any, shall (subject to a like lien for sums not presently payable as existed upon the shares before sale) be paid to the person entitled to the shares, at the date of the sale.</li> </ul>
<input checked="" type="checkbox"/>	<input type="checkbox"/>	12	<ol style="list-style-type: none"> <li>The proceeds of the sale shall be received by the company and applied in payment of such part of the amount in respect of which the lien exists as is presently payable.</li> <li>The residue, if any, shall, subject to a like lien for sums not presently payable as existed upon the shares before the sale, be paid to the person entitled to the shares at the date of the sale.</li> </ol>
			<b>Calls on shares</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	13	<ul style="list-style-type: none"> <li>13.1 Directors may make calls ? The Board may, from time to time, subject to the terms on which any shares may have been issued and subject to the conditions of allotment, by a resolution passed at a meeting of the Board (and not by resolution by circulation) make such call as it thinks fit upon the Members in respect of all moneys unpaid on the shares held by them respectively and each member shall pay the amount of every call so made on him to the person or persons and at the times and places appointed by the board. A call may be made payable by installments. 13.2 Notice of calls ? Not less</li> </ul>

		<p>than thirty days? notice in writing of any call shall be given by the Company specifying the time and place of payment, and the person or persons to whom such call shall be paid. 13.3 When call made ? A call shall be deemed to have been made at the time when the resolution of the Board authorizing such call was passed at a meeting of the Board and demand notice is issued. 13.4 Calls may be revoked or postponed ? A call may be revoked or postponed at the discretion of the Board.</p>	
<input type="checkbox"/>	<input checked="" type="checkbox"/>	14	<ul style="list-style-type: none"> <li>14.1 Directors may extend time The Board may, from time to time at its discretion, extend the time fixed for the payment of any call, and may extend such time as to all or any of the Members for reasons which the Board may consider satisfactory, but no Member shall be entitled to such extension save as a matter of grace.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	15	<ul style="list-style-type: none"> <li>15 Calls to carry interest ? If any Member fails to pay any call due from him on the day appointed for payment thereof, or any such extension thereof as aforesaid, he shall be liable to pay interest on the same from the day appointed for the payment thereof to the time of actual payment at rate not exceeding 10 per cent per annum as maybe decided by the Board, but the Board may in its absolute discretion and in special circumstances waive or reduce the levy of interest as deemed appropriate.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	16	<ul style="list-style-type: none"> <li>16.1 Sums deemed to be call ?? Any sum, which by the terms of issue of a share becomes payable on allotment or at any fixed date, whether on account of the nominal value of the share or by way of premium, shall, for the purposes of these Articles be deemed to be a call duly made and payable on the date on which by the terms of issue the same becomes payable, and in case of non-payment all the relevant provisions of these Articles as to payment of interest and expenses, forfeiture or otherwise shall apply as if such sum had become payable by virtue of a call duly made and notified.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	17	<ul style="list-style-type: none"> <li>17.1 Partial payment not to preclude Forfeiture ? Neither the receipt by the Company of a portion of any money which shall from time to time be due from any Member to the Company in respect of his shares, either by way of principal or interest nor any indulgence granted by the Company in respect of the payment of any such money, shall preclude the Company from thereafter proceeding to enforce a forfeiture of such shares as hereinafter provided. 17.2 Payment in anticipation of calls may carry interest ? The Board may, if it thinks fit, agree to and in anticipation receive from any Member willing to advance the same, all of calls money or any part of the amounts of his respective shares beyond the sums actually called up, and upon the moneys so paid in advance, or upon so much thereof, from time to time, and at any time thereafter as exceeds the amount of the calls then made upon and due in respect of the shares on account of which such advances are made, the Board may pay or allow interest, at such rate as the Member paying the sum in advance and the Board agree upon. The Board may agree to repay at any time any amount so advanced or may at any time repay the same upon giving to the Member three months? notice in writing. ? PROVIDED that moneys paid in advance of calls on any shares may carry interest but shall not confer a right to dividend or to participate in profits. ? (b) No Member paying any such sum in advance shall be entitled to voting rights in respect of the moneys</li> </ul>

			so paid by him until the same would but for such payment become presently payable.
<input checked="" type="checkbox"/>	<input type="checkbox"/>	18	<ul style="list-style-type: none"> <li>The Board -</li> <li>a. may, if it thinks fit, receive from any member willing to advance the same, all or any part of the monies uncalled and unpaid upon any shares held by him and</li> <li>b. upon all or any of the monies so advanced, may (until the same would, but for such advance, become presently payable) pay interest at such rate not exceeding, unless the company in general meeting shall otherwise direct, twelve per cent per annum, as may be agreed upon between the Board and the member paying the sum in advance.</li> </ul>
			<b>Transfer of shares</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	19	<ul style="list-style-type: none"> <li>19.1 Register of Transfers ? The Company shall maintain a Register of Transfers and therein shall be fairly and distinctively enter the particulars of every transfer or transmission of any share in the physical form. ? 19.2 Form of transfer The instrument of transfer shall be in writing and in such form as prescribed under the Act. All the provisions of Section 56 of the Act shall be duly complied with in respect of all transfers and of the registration thereof. The Company shall not charge any fee for registration of a transfer of shares or debentures. ? 19.3 Instrument of Transfer to be completed and presented to the Company ? The Instrument of Transfer duly stamped and executed by the transferor and the transferee shall be delivered to the Company in accordance with the provisions of the Act. The instrument of transfer shall be accompanied by the Share Certificate or such evidences the Board may require to prove the title of transferor and his right to transfer the shares and every registered Instrument of Transfer shall remain in the custody of the Company until destroyed by order of the Board. Any instrument of transfer which the Directors may decline to register shall be returned to the person depositing the same. 19.4 Transferor deemed to be holder ?? The transferor shall be deemed to be the holder of such shares until the name of the transferee shall have entered in the Register of Members in respect thereof. Before the registration of a transfer, the certificate or certificates of the shares must be delivered to the Company along with Transfer Deed. 19.5 No transfer to insolvent etc. ? No transfer shall be made to a person of unsound mind or to an insolvent.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	20	<ul style="list-style-type: none"> <li>20 Closure of Register of Members/Debenture holders ? The Directors shall have power, on giving not less than seven days? previous notice as required by Section 91 of the Act, to close the Register of Transfer, Register of Members or Register of Debenture holders or the register of other security holders of the Company for any period or periods not exceeding in the aggregate forty-five days in each year (but not exceeding thirty days at any one time) as they may determine.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	21	<ul style="list-style-type: none"> <li>21. Nomination by shareholder ? Every share-holder or debenture holder may at any time, nominate in the prescribed manner, a person to whom his shares or debenture shall vest in the event of his death, as provided in Section 72 of the Act.</li> </ul>

<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>22</p>	<ul style="list-style-type: none"> <li>• 22 Title to shares of deceased holder ????????????????????????????????? In the event there is no nomination, the executors or administrators of a deceased Member or the holder of a Succession Certificate in respect of the shares of a deceased Member (not being one of two or more joint holders) shall be the only persons whom the Company will be bound to recognize as having any title to the shares registered in the name of such Member, and the Company shall not be bound to recognize such executors or administrators or holders unless such executors, administrators or holders shall have first obtained probate or Letters of Administration or Succession Certificate as the case may be, from a duly constituted Court in India. ? PROVIDED that the Directors may, at their absolute discretion dispense with production of Probate, Letters of Administration or Succession Certificate upon such terms as to indemnity or otherwise as they think fit and may enter the name of the person who claims to be absolutely entitled to the shares standing in the name of a deceased Member, as a Member</li> </ul>
			<p><b>Transmission of shares</b></p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>23</p>	<ul style="list-style-type: none"> <li>• 23 Transmission of Shares ?? Subject to the provisions of the Act, any person becoming entitled to any share in consequence of the death, lunacy or insolvency of any Member or by any lawful means other than by a transfer in accordance with these Articles, may, with the consent of the Directors (which they shall be under no obligation to give) and upon producing such evidence that he sustains the character in respect of which he proposes to act under this. Article or of his title as the Directors may require, and upon such indemnity as the Directors may require, either be registered as a Member in respect of such shares or elect to have some person nominated by him and approved by the Directors registered as a Member in respect of such shares. PROVIDED that if such persons shall elect to have his nominee registered, he shall testify his election by executing in favor of his nominee an instrument of transfer in accordance with these Articles, and until he does so he shall not be freed from any liability in respect of such shares.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>24</p>	<ul style="list-style-type: none"> <li>• 24 Right of Board to decline or suspend registration (i) Any person becoming entitled to a share in consequence of the death or insolvency of a member may, upon such evidence being produced as may from time to time properly be required by the Board and subject as hereinafter provided, elect, either -- (a) to be registered himself as holder of the share; or (b) to make such transfer of the share as the deceased or insolvent member could have made. ? (ii) The Board shall, in either case, have the same right to decline or suspend registration as it would have had, if the deceased or insolvent member had transferred the share before his death or insolvency.?????</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>		<ul style="list-style-type: none"> <li>• 25 The Company not liable for disregard of notice prohibiting registration of transfer ? The Company shall incur no liability or responsibility whatever in consequence of its registering or giving effect to any transfer of shares made or purported to be made by any apparent legal owner thereof (as shown or appearing in register of Members) to the prejudice of persons having or claiming any equitable right, title or interest to or in the same shares, notwithstanding that the Company may have had notice of such</li> </ul>

		25	equitable right, title or interest or notice prohibiting registration of such transfer, and may have entered such notice or referred to it in any book, or attended or given effect to any notice which may have been given to it of any equitable right, title or interest or be under any liability whatsoever for refusing or neglecting so to do though it may have been entered or referred to in some book of the Company, but the Company shall nevertheless be at liberty to regard and attend to any such notice and give effect thereto, if the Directors shall so think fit.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	26	<ul style="list-style-type: none"> <li>26 Rights of successors ? A person becoming entitled to a share by reason of the death or insolvency of the holder shall be entitled to the same dividends and other advantages to which he would have been entitled if he were the registered holder of the shares, except that he shall not, before being registered as a Member in respect of the shares, be entitled to exercise any right conferred by membership in relation to meetings of the Company. PROVIDED that the Directors shall, at any time, give notice requiring any such person to elect to be registered himself or to transfer the shares, and if the notice is not complied within ninety days from the date of issue of the notice, the Directors may thereafter withhold payment of all dividends, bonuses or other moneys payable in respect of the shares until the requirements of the notice have been complied with.</li> </ul>
<input checked="" type="checkbox"/>	<input type="checkbox"/>	27	In case of a One Person Company?
			<b>Forfeiture of shares</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	28	<ul style="list-style-type: none"> <li>28.1 If money payable on shares not paid notice to be given to members If any Member fails to pay any call, or installment of a call, on or before the day appointed for the payment of the same or any such extension thereof as aforesaid, the Board may, at any time thereafter, during such time as any part of the call or installment remains unpaid, serve a notice on him requiring him to pay the same together with any interest which may have accrued and all expenses that may have been incurred by the Company by reason of such non-payment. 28.2 Contents of Notice The notice shall name a further day (not being less than fourteen days from the date of the service of notice) and a place or places on and at which such call or installment and such interest thereon at such rate as the Directors shall determine from the day on which such call or installment ought to have been paid and expenses as aforesaid are to be paid. The notice shall also state that in the event of the non-payment on or before the day, at or before the time and at the place appointed, the shares in respect of which the call was made or installment is payable, shall be liable to be forfeited.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	29	<ul style="list-style-type: none"> <li>29.1 In default of payment, shares to be Forfeited If the requirement of any such notice as aforesaid are not complied with, every or any share in respect of which such notice has been given may, at any time thereafter, but before payment of all calls or installments, interest and expenses due in respect thereof, be forfeited by a resolution of the Board to that effect. Such forfeiture shall include all dividends declared or any other moneys payable in respect of the aforesaid share and not actually paid before the</li> </ul>

			forfeiture. In default of payment, shares to be Forfeited
<input type="checkbox"/>	<input checked="" type="checkbox"/>	30	<ul style="list-style-type: none"> <li>30 Notice of forfeiture to a Member When any share shall have been so forfeited, notice of the forfeiture shall be given to the Member in whose name it stood immediately prior to the forfeiture, and an entry of the forfeiture, with the date thereof, shall forthwith be made in the Register of Members, but no forfeiture shall be in any manner invalid by any omission or neglect to make any such entry as aforesaid in the Register.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	31	<ul style="list-style-type: none"> <li>31 Forfeited share to be property of the Company and may be sold etc. Any share so forfeited shall be deemed to be the property of the Company, and may be sold, re-allotted, or otherwise disposed of, either to the original holder thereof or to any person, upon such terms and in such manner as the Board shall think fit.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	32	<ul style="list-style-type: none"> <li>32.1 Member still liable to pay calls owing at the time of forfeiture and interest Any members whose shares have been forfeited shall notwithstanding the forfeiture be liable to pay and shall forthwith pay to the Company, on demand, all calls, installment, interest and expenses owing upon or in respect of such shares at the time of the forfeiture together with interest accrued thereon at the time of the forfeiture at such rate as the Board may determine, and the Board may enforce the payment thereof, if it thinks fit.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	33	<ul style="list-style-type: none"> <li>33.1 Effect of forfeiture The forfeiture of a share shall involve extinction, at the time of the forfeiture, of all interest in and all claims and demands against the Company, in respect of the share and all other rights incidental to the share, except only such of those rights as by these Articles are expressly saved. 33.2 Evidence of forfeiture A declaration in writing by Chairman or Managing Director of the Company or by any person duly authorised in this regard that certain shares in the Company have been duly forfeited on a date stated in the declaration, shall be conclusive evidence of the facts therein stated as against all persons claiming to be entitled to the shares and such declaration, and the receipt of the Company for the consideration, if any, given for the shares on the sale or disposition thereof shall constitute a good title to such shares and the person to whom the shares are sold shall be registered as the holder of such shares and shall not be bound to see as to the application of the purchase money nor shall his title to such shares be affected by any irregularity or invalidity in the proceedings in reference to such forfeiture, sale or disposition. 33.3 Validity of sale under Articles of forfeited shares Upon any sale after forfeiture or for enforcing a lien in purported exercise of the powers herein before given, the board may appoint some person to execute an instrument of transfer of the shares sold and cause the purchaser's name to be entered in the Register of Members in respect of the shares sold, and the purchaser shall not be bound to see the regularity of the proceedings, or to the application of the purchase money, and after his name has been entered in the Register in respect of such shares the validity of the sale shall not be impeached by any person and the remedy of any person aggrieved by the sale shall be in damages only and against the Company exclusively. 33.4 Cancellation of Share Certificates in respect of forfeited shares Upon any sale, re-allotment or other disposal under the provisions of the preceding Articles, the certificate or</li> </ul>

			certificates originally issued in respect of the relative shares shall (unless the same shall on demand by the Company have been (previously) surrendered to it by the defaulting member) stand cancelled and become null and void and of no effect, and the Directors shall be entitled to issue a duplicate certificate or certificates in respect of the said shares to the person or persons entitled thereto. ?
<input type="checkbox"/>	<input checked="" type="checkbox"/>	34	<ul style="list-style-type: none"> <li>• 34 Power to annul forfeiture The Board may at any time before any share so forfeited, shall have been sold, re-allotted or otherwise disposed of, annul the forfeiture thereof upon such terms and conditions as it thinks fit.</li> </ul>
			<b>Alteration of capital</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	35	<ul style="list-style-type: none"> <li>• 35.1 Alteration of Share Capital The company may, from time to time, by ordinary resolution increase the share capital by such sum, to be divided into shares of such amount, as may be specified in the resolution. ? Subject to the provisions of section 61, the company may, by ordinary resolution, the Company may from time to time:-- ? (a) consolidate and divide all or any of its share capital into shares of larger amount than its existing shares; ? (b) convert all or any of its fully paid-up shares into stock, and reconvert that stock into fully paid-up shares of any denomination; ? (c) Sub-divide its shares, or any of them into shares of smaller amount than is fixed by the memorandum, so, however, that in the sub-division the proportion between the amount paid and the amount, if any, unpaid on each reduced share shall be the same as it was in the case of the share from which the reduced share is derived.; ? (d) Cancel any shares which as the date of the passing of the resolution, have not been taken or agreed to be taken by any person and diminish the amount of its share capital by the amount of the shares so cancelled. ? The resolution whereby any share is sub-divided may determine that, as between the holders of the shares resulting from such sub-division, one or more of such shares shall have some preference or special advantage as regards dividend, capital, voting or otherwise over or as compared with the others or other, subject, to the provisions of the Act. ? Subject to the provisions of Sections 66 of the Act, the Board may accept from any member the surrender on such terms and conditions as shall be agreed of all or any of his shares. ? The company may, by special resolution, reduce in any manner and with, and subject to, any incident authorised and consent required by law, -- (a) its share capital; (b) any capital redemption reserve account; or (c) any share premium account.</li> </ul>
<input checked="" type="checkbox"/>	<input type="checkbox"/>	36	<ul style="list-style-type: none"> <li>• Subject to the provisions of section 61, the company may, by ordinary resolution,?</li> <li>• consolidate and divide all or any of its share capital into shares of larger amount than its existing shares;</li> <li>• convert all or any of its fully paid-up shares into stock, and reconvert that stock into fully paid-up shares of any denomination;</li> <li>• sub-divide its existing shares or any of them into shares of smaller amount than is fixed by the memorandum;</li> <li>• cancel any shares which, at the date of the passing of the resolution, have not been taken or agreed to be taken by any person.</li> </ul>

<input checked="" type="checkbox"/>	<input type="checkbox"/>	<p>37</p>	<ul style="list-style-type: none"> <li>• Where shares are converted into stock,?</li> <li>• the holders of stock may transfer the same or any part thereof in the same manner as, and subject to the same regulations under which, the shares from which the stock arose might before the conversion have been transferred, or as near thereto as circumstances admit:</li> <li>• Provided that the Board may, from time to time, fix the minimum amount of stock transferable, so, however, that such minimum shall not exceed the nominal amount of the shares from which the stock arose.</li> <li>• the holders of stock shall, according to the amount of stock held by them, have the same rights, privileges and advantages as regards dividends, voting at meetings of the company, and other matters, as if they held the shares from which the stock arose; but no such privilege or advantage (except participation in the dividends and profits of the company and in the assets on winding up) shall be conferred by an amount of stock which would not, if existing in shares, have conferred that privilege or advantage.</li> <li>• such of the regulations of the company as are applicable to paid-up shares shall apply to stock and the words "share" and "shareholder" in those regulations shall include "stock" and "stock-holder" respectively.</li> </ul>
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<p>38</p>	<ul style="list-style-type: none"> <li>• The company may, by special resolution, reduce in any manner and with, and subject to, any incident authorised and consent required by law, ?</li> <li>• it share capital;</li> <li>• any capital redemption reserve account; or</li> <li>• any share premium account.</li> </ul>
			<p><b>Capitalisation of profits</b></p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>		<ul style="list-style-type: none"> <li>• 39.1 Capitalization of Profits (1) Any General Meeting of the Company may resolve that any amounts standing to the credit of the Free Reserve or Share Premium Account or the Capital Redemption Reserve Account or any moneys, investment or other assets forming part of the undivided profits including profits or surplus moneys arising from the realization and (when permitted by the law) from the appreciation in value of any capital assets of the Company standing to the credit of the General Reserve or any other Reserve or Reserve Fund or any other Fund of the Company or in the hands of the Company and available for dividend be capitalized:- ? (a) by the issue and distribution of shares, as fully paid-up, and to the extent permitted by the Act, debentures, debenture stock, bonds or other obligations of the Company ; or ? (b) by crediting share of the Company, which may have been issued and are not fully paid-up, with the whole or any part of the sum remaining unpaid thereon; ? PROVIDED that any amounts standing to the credit of the Share Premium Account or the Capital Redemption Reserve Account shall be applied only in crediting the payment of capital on shares to be issued to Members as fully paid bonus shares (Further capitalization of reserve created by the revaluation of assets are not to be used for issuance of Bonus Shares as per section 63 of the Act). ? (2) Such issue and distribution under sub-clause (1) (a) of this Article and payment to the credit of unpaid share capital under sub-clause (1) (b) of this Article shall be made among and in favour of the Members or any class of them or any of them entitled thereto and in accordance with their</li> </ul>

	39	<p>respective rights and interests and in proportion to the amount of capital paid-up on the shares held by them respectively in respect of which such distribution or payment shall be made, on the footing that such Members become entitled thereto as capital. ? (3) The Directors shall give effect to any such resolution and for the said purpose the Board may settle any difficulty which may arise in regard to distribution as it thinks expedient including in regard to fractional entitlements, and shall apply such profits, General Reserve, other Reserve or any other Fund or account as aforesaid as may be required for the purpose of making payment in full on the shares, or other obligations of the Company so distributed under sub clause (1) (a) of this Article or (as the case may be) for the purpose of paying, in whole or in part, the amount remaining unpaid on the shares which may have been issued and are not fully paid-up under sub-clause (1)(b) above. ? PROVIDED that no such distribution or payment shall be made unless recommended by the Directors, and, if so recommended, such distribution and payment shall be accepted by such Members as aforesaid in full satisfaction of their interest in the said capitalized fund. ? (4) For the purpose of giving effect to any such resolution, the Directors may settle any difficulty which may arise in regard to the distribution or payment as aforesaid as they think expedient, and, in particular, they may issue fractional certificates and may fix the value for distribution of any specific asset and may determine that any cash payment be made to any Members on the footing of the value so fixed and may vest any such cash, shares, debentures stock, bonds or other obligations in trustees upon such trusts for the persons entitled thereto as may seem expedient to the directors, and generally may make arrangement for the acceptance, allotment and sale of such shares, debentures, debentures stock, bonds or other obligations and fractional certificates or otherwise as they may think fit. ? (5) When deemed requisite, a proper contract shall be filed in accordance with the Act and the Board may appoint any person to sign such contract on behalf of the Members entitled as aforesaid.</p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<ul style="list-style-type: none"> <li>40 Subject to the provisions of the Act and these Articles, in cases where some of the shares of the Company are fully paid and others are partly paid, such capitalization may be effected by the distribution of further shares in respect of the fully paid shares and by crediting the partly paid shares with the whole or part of the unpaid liability thereon, but so that as between the holders of the fully paid shares and the partly paid shares, the sums so applied in the payment of such further shares and in the extinguishment or diminution of the liability on the partly paid shares shall be applied pro rata in proportion to the amount then already paid or credited as paid on the existing fully paid and partly paid shares respectively. ??</li> </ul>
	40	<p><b>Buy-back of shares</b></p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<ul style="list-style-type: none"> <li>41 Buy Back of Shares Notwithstanding anything contained in these articles but subject to the provisions of sections 68 to 70 and any other applicable provision of the Act or any other law for the time being in force, the company may purchase its own shares or other specified securities.?????</li> </ul>
	41	

			<i>General meetings</i>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	42	<ul style="list-style-type: none"> <li>42.1 Annual General Meeting The Company shall in each year hold a General Meeting as its Annual General Meeting in addition to any other meeting in that year. All General Meetings other than Annual General Meetings shall be called Extraordinary General Meetings. If for any reason beyond the control of the Board, the general meeting (including an Annual General meeting) cannot be held on the appointed day, the Board shall have power to postpone the General meeting of which a notice should be given to the members. Every member of the Company shall be entitled to attend either in person or by proxy and the Auditor of the Company shall have the right to attend and to be heard at any General Meeting which he attends on any part of the business which concerns him as Auditor. 42.2 Extraordinary General Meeting The Board may, whenever it thinks fit, call an Extraordinary General Meeting of the Company. The Board? shall at the? requisition in writing by a Member or Members holding in the aggregate not less than one-tenth of such of the paid-up capital of the company on that date and carries the right of voting in regard to the matter in respect of which the requisition has been made. 42.3 Requisition of Members to state object of Meeting Any valid requisition so made by Members must state the object or objects of the meeting proposed to be called, and must be signed by the requisitionists and deposited at the registered office of the company. PROVIDED that such requisition may consist of several documents in like form, each signed by one or more requisitionists.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	43	<ul style="list-style-type: none"> <li>43.1 On receipt of requisition Directors to call meeting and in default requisitionists may do so Upon the receipt of any such requisition, the Board shall forthwith call an Extraordinary General Meeting, and if they do not proceed within twenty-one days from the date of the requisition being deposited at the Registered Office to cause a meeting to be called on a day not later than forty-five days from the date of deposit of the requisition, the requisitionists, or such of their number as represent either a majority in value of the paid-up share capital held by all of them or one-tenth of such of the paid-up share capital of the Company as is referred to in Section 100(2) of the Act, whichever is less, may themselves call the meeting, but in either case, any meeting so called shall be held within three months from the date of the deposit of the requisition, as aforesaid. 43.2 Meeting called by requisitionists Any meeting called under the foregoing Articles by the requisitionists shall be called in the same manner, as nearly as possible, as that in which meetings are to be called by the Board. 43.3 Twenty-one days? notice of meeting to be given A general meeting of a Company may be called by giving not less than clear twenty-one days? notice either in writing or through electronic mode in such a manner as may be prescribed, Every notice of a meeting shall specify the place, date, day and the hour of meeting, and shall contain statement of the business to be transacted at such meeting. And, The notice of every meeting shall be given to every member of the Company, Legal Representative of any deceased member or the assignee of an insolvent member, auditor or auditors of the Company and every director of the Company and all such persons as are under these Articles entitled to receive notice from the Company ? "Provided that a general meeting may be called after giving shorter notice than that specified in this sub-section if consent, in writing or</li> </ul>

			by electronic mode, is accorded thereto ?? (i) in the case of an annual general meeting, by not less than ninety-five per cent. of the members entitled to vote thereat; and (ii) in the case of any other general meeting, by members of the company? (a) holding, if the company has a share capital, majority in number of members entitled to vote and who represent not less than ninety-five per cent. of such part of the paid-up share capital of the company as gives a right to vote at the meeting; or (b) having, if the company has no share capital, not less than ninety-five per cent. of the total voting power exercisable at that meeting: ? Provided further that where any member of a company is entitled to vote only on some resolution or resolutions to be moved at a meeting and not on the others, those members shall be taken into account for the purposes of this sub-section in respect of the former resolution or resolutions and not in respect of the latter."
			<b>Proceedings at general meetings</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	44	
<input type="checkbox"/>	<input checked="" type="checkbox"/>	45	<ul style="list-style-type: none"> <li>45.1 Chairman of General Meeting The Chairman of the Board shall be entitled to take the Chair at every General Meeting whether Annual or Extraordinary. If at any meeting the Chairman is not present within fifteen minutes of the time appointed for holding such meeting or he has informed that he shall be unable or unwilling to take the Chair then any one of directors with mutual consent shall so preside at the meeting. If no Director be present or if all the Directors present decline to take the Chair, then the Members present shall elect one of the members to be the Chairman of the Meeting</li> <li>45.2 No Business whilst chair vacant No business shall be discussed at any General Meeting except the election of a Chairman, whilst the Chair is vacant.</li> <li>45.3 Chairman with consent may adjourn meeting The Chairman, with the consent of the Members, may adjourn any meeting from time to time and from place to place within the city, town or village in which the Registered Office of the Company is situated, but no business shall be transacted at any adjourned meeting other than the business left unfinished at the meeting from which the adjournment took place. Notwithstanding, the provision as above in the event of disorder at a validly convened meeting the Chairman may adjourn the meeting provided that such an adjournment shall not be a longer period than the Chairman considers necessary to being order at the meeting and Chairman communicates his decision to those present in so far as it is possible.</li> <li>45.4 Questions at General Meeting how Decided Every question submitted to a meeting shall be decided in the first instance unless a poll is demanded, on a show of hands. Before or on the declaration of the result of the voting on any resolution on a show of hands, a poll may be ordered to be taken by the Chairman of the meeting on his own motion and shall be ordered to be taken by him on a demand made in that behalf by any member or members present in person or by proxy, and holding shares in the Company, which confer a power to vote on the resolution not being less than one-tenth of the total voting power in respect of the Resolution or on which an aggregate sum of not less than five lakh rupees has been paid up. The demand for a poll may be withdrawn at any time by the person or persons making the demand. Unless a poll is so demanded, a declaration by the Chairman that a resolution has, on show of hands, been carried</li> </ul>

		<p>through unanimously or by a particular majority or lost and an entry to that effect in the Minutes Book of the Company shall be conclusive evidence of the fact without proof of the number or proportion of the votes recorded in favour of or against the resolution. 45.5 Chairman's Casting Vote In the case of an equality of votes, the Chairman shall have a casting vote in addition to the vote or votes to which he may be entitled otherwise.</p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>46</p> <ul style="list-style-type: none"> <li>46.1 Poll to be taken, if demanded If a poll is demanded as aforesaid, the same shall be taken at such time (not later than forty-eight hours from the time when the demand was made) and place in the city or town in which the Registered office of the Company is for the time being situated, as the Chairman shall direct, either at once or after an interval or adjournment and the result of the poll shall be deemed to be the resolution of the meeting. 46.2 In which case poll taken without Adjournment Any poll duly demanded on the election of the Chairman of a meeting or on any question of adjournment shall be taken at the meeting forthwith. 46.3 Demand for poll not to prevent transaction of other business ? The demand for a poll except on the questions of the election of the Chairman and of an adjournment shall not prevent the continuance of a meeting for the transaction of any business other than the question on which the poll has been demanded.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>47</p> <ul style="list-style-type: none"> <li>47.1 Minutes of General Meetings (a) The Company shall cause minutes of the proceedings of every General Meeting or every resolution passed by postal ballot to be kept by making within thirty days of the conclusion of every such meeting concerned, record thereof kept with Minute Book for that purpose with their pages consecutively numbered. (b) Each page of every such book shall be initialed or signed and the last page of the record of proceedings of each meeting in such book shall be dated and signed by the Chairman of the same meeting within the aforesaid period of thirty days or in the event of the death or inability of that Chairman within that period, by a Director duly authorised by the Board for the purpose. (c) In no case the minutes of proceedings of a meeting shall be attached to any such book as aforesaid by pasting or otherwise. (d) The minutes of each meeting shall contain a fair and correct summary of the proceedings thereat. (e) All decisions taken and appointments of officers made at any meeting aforesaid shall be included in the minutes of the meeting. (f) Nothing herein contained shall require or be deemed to require the inclusion in any such minutes of any matter which in the opinion of the Chairman of the meeting (a) is or could reasonably be regarded as defamatory of any person, or (b) is irrelevant or immaterial to the proceedings, or (c) is detrimental to the interests of the Company. The Chairman of the meeting shall exercise an absolute discretion in regard to the inclusion or non-inclusion of any matter in the minutes on the aforesaid grounds. (g) Any such minutes shall be evidence of the proceedings recorded therein. Where the minutes have been kept in accordance with section then, until the contrary is proved, the meeting shall be deemed to have been duly called and held, all appointments of directors, key managerial personnel, auditors or company secretary in practice, shall be deemed to be valid. No document purporting to be a report of the proceedings of any general meeting of a company shall be circulated or advertised at the expense of the company, unless it includes the matters required to be contained in the</li> </ul>

			minutes of the proceedings of such meeting. The company shall observe secretarial standards with respect to general and Board meetings specified by the Institute of Company Secretaries of India constituted under section 3 of the Company Secretaries Act, 1980, and approved as such by the Central Government. ? (h) The book containing the minutes of the proceedings of any general meeting of the Company or of a resolution passed by postal ballot, shall be kept at the registered office of the Company and shall be open, during business hours, to the inspection by any member without any charge, for such period not being less than two hours in each business day are allowed for inspection. ?
<input checked="" type="checkbox"/>	<input type="checkbox"/>	48	In case of a One Person Company?
			<b>Adjournment of meeting</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	49	<ul style="list-style-type: none"> <li>49 Adjournment of Meeting (i) The Chairperson may, with the consent of any meeting at which a quorum is present, and shall, if so directed by the meeting, adjourn the meeting from time to time and from place to place. ? (ii) No business shall be transacted at any adjourned meeting other than the business left unfinished at the meeting from which the adjournment took place. ? (iii) When a meeting is adjourned for thirty days or more, notice of the adjourned meeting shall be given as in the case of an original meeting. ? (iv) Save as aforesaid, and as provided in section 103 of the Act, it shall not be necessary to give any notice of an adjournment or of the business to be transacted at an adjourned meeting.</li> </ul>
			<b>Voting rights</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	50	<ul style="list-style-type: none"> <li>50.1 Members in arrears not to vote No member shall be entitled to vote either personally or by proxy at any General Meeting or Meeting of a class of shareholders either upon a show of hands or upon a poll in respect of any shares registered in his name on which any calls or other sums presently payable by him have not been paid or in regard to which the Company has exercised any right of lien. ? 50.2 Number of votes to which Member Entitled Subject to the provisions of these Articles and without prejudice to any special privileges or restrictions as to voting for the time being attached to any class of shares for the time being forming part of the capital of the Company, every Member shall be entitled to be present, and to speak and vote at such meeting by show of hand for which the Member present in person shall have one vote. On a poll taken at a meeting of a company, a member entitled to more than one vote, or his proxy, need not to use all his votes or cast in the same way all the votes he uses.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	51	<ul style="list-style-type: none"> <li>51 Vote of Member who is a minor If any shareholder be a minor, the vote in respect of his share or shares shall be by his guardian, or any one of his guardians, if more than one, to be selected in case of dispute by the Chairman of the meeting.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	52	<ul style="list-style-type: none"> <li>52 Votes of Joint Members If there be joint registered holders of any shares, the vote of the senior who tenders a vote, whether in person or by proxy, shall be accepted to the exclusion of the votes</li> </ul>

			of the other joint holders. For this purpose, seniority shall be determined by the order in which the names stand in the register of members.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	53	<ul style="list-style-type: none"> <li>53 Voting in person or by proxy or Representative Subject to the provisions of these Articles, votes may be given either personally or by proxy. A body corporate being a Member may vote either by proxy or by a representative duly authorised in accordance with Section 113 of the Act and such representative shall be entitled to exercise the same rights and powers (including the right to vote by proxy) and by postal ballot, on behalf of the body corporate which he represents as that body could exercise if it were an individual Member of the Company.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>		
<input type="checkbox"/>	<input checked="" type="checkbox"/>	54	<ul style="list-style-type: none"> <li>54.1 Votes in respect of shares of Deceased Any person entitled under the Transmission Clause to transfer any shares may vote at any General Meeting in respect thereof in the same manner as if he were the registered holder of such shares. PROVIDED that forty-eight hours at least before the time of holding the meeting or adjourned meeting, as the case may be, at which he proposes to vote he shall satisfy the Chairman of his right to transfer such shares and give such indemnity (if any) as the Chairman may require or the Chairman shall have previously admitted his right to vote at such meeting in respect thereof. 54.2 Time for objection to vote No objection shall be made to the validity of any vote, except at the meeting or poll at which such vote was tendered, and every vote whether given personally or by proxy, not disallowed at such meeting or poll, shall be deemed valid for purposes of such meeting or poll whatsoever. 54.3 Chairman of the meeting to be the judge of the validity of any Vote ? The Chairman of any meeting shall be the sole judge of the validity of every vote tendered at such meeting. The Chairman present at the taking of a poll shall be the sole judge of the validity of every vote tendered at such poll.</li> </ul>
<input checked="" type="checkbox"/>	<input type="checkbox"/>		
<input checked="" type="checkbox"/>	<input type="checkbox"/>	55	No member shall be entitled to vote at any general meeting unless all calls or other sums presently payable by him in respect of shares in the company have been paid
<input checked="" type="checkbox"/>	<input type="checkbox"/>	56	<ul style="list-style-type: none"> <li>i. No objection shall be raised to the qualification of any voter except at the meeting or adjourned meeting at which the vote objected to is given or tendered, and every vote not disallowed at such meeting shall be valid for all purposes.</li> <li>ii. Any such objection made in due time shall be referred to the Chairperson of the meeting, whose decision shall be final and conclusive.</li> </ul>
<input type="checkbox"/>	<input type="checkbox"/>		
			<b>Proxy</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>		<ul style="list-style-type: none"> <li>57.1 Appointment of proxy A person can act as proxy on behalf of members not exceeding fifty and holding in the aggregate not more than ten percent of the total share capital of the company carrying voting rights: ? Provided that a member holding more than ten percent of the total share capital of the Company carrying voting rights may appoint a single person as proxy and such person shall not act as proxy for any other person or shareholder. ? Every proxy shall be appointed in writing under the hand of the Member or if such Member is a body corporate under the common seal of such corporation, or be signed by an appointer or his attorney duly</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>		

		57	authorised in writing. The proxy so appointed shall not have any right to speak at the meetings. 57.2 Deposit of instrument of Proxy etc. The instrument appointing a proxy and the power of attorney or other authority (if any), under which it is signed or a notarized copy of that power or authority, shall be deposited at the Registered Office of the Company not later than forty-eight hours before the time for holding the meeting at which the person named in the instrument proposes to vote, and in default, the instrument of proxy shall not be treated as valid. No instrument appointing a proxy shall be valid after the expiration of twelve months from the date of its execution.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	58	<ul style="list-style-type: none"> <li>58 Form of proxy An instrument appointing a proxy shall be in the form No. MGT-11 as prescribed in the rules made under section 105 of the Companies Act, 2013</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	59	<ul style="list-style-type: none"> <li>59.1 Proxy either for specified meeting or for a period An instrument of proxy may appoint a proxy either for the purpose of a particular meeting specified in the instrument and any adjournment thereof or it may appoint for the purpose of every meeting of the Company, or of every meeting to be held before a date specified in the instrument and every adjournment of any such meeting. 59.2 Validity of votes given by proxy notwithstanding death of Member A vote given in accordance with the terms of an instrument of proxy shall be valid, notwithstanding the previous death or insanity of the principal or the revocation of the proxy or of the authority under which the proxy was executed, or the transfer of the shares in respect of which the proxy is given. ? Provided that no intimation in writing of such death, insanity, revocation or transfer shall have been received by the company at its office before the commencement of the meeting or adjourned meeting at which the proxy is used.</li> </ul>
			<b>Board of Directors</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	60	
<input type="checkbox"/>	<input checked="" type="checkbox"/>		<ul style="list-style-type: none"> <li>61.1 Number and appointment of Directors The Board of Directors of the Company shall consist of not less than 3 but not more than 15 Directors. A Director shall not be required to hold any qualification shares in the Company. Notwithstanding anything to the contrary contained in these Articles, so long as any moneys remain owing by the Company to a Financial Institution or any other person by the Company or the Company has entered into any agreement or undertaking or arrangement (hereinafter refer as ? agreement?) with Bodies (like State Electricity Board/Nigam) or the Board of Directors have decided to seek nomination on the Board from the beneficiary state or any Financial Institution or PFC Consulting Limited or person holds Debentures in the Company by direct subscription or private placement, the Company may agree to grant to such Financial Institution, PFC Consulting Limited, person or other Bodies as a condition of such loan or subscription to Debenture or any other agreement or to a Debenture Trustee, the right to appoint from time to time any person or persons as Director or Directors of the Company, (which director or directors is /are hereinafter referred to as ?Nominee Director/s?), retiring or non-retiring, subject to and on such terms and conditions as the</li> </ul>

61

Company may agree with such Financial Institutions, PFC Consulting Limited, Person, other Bodies and/or Debenture Trustee. The Company shall have a right to remove from office Nominee Director(s) at the option of the Company in consultation with Financial Institutions, PFC Consulting Limited, Bodies, persons or Debenture Trustee. ? Such Nominee Director(s) shall not be required to hold any Share qualification in the Company. Also at the option of the Company such Nominee Director(s) shall not be liable to retirement by rotation of the Directors. Subject as aforesaid, the Nominee Director(s) shall be entitled to the same rights and privileges and be subject to the same obligations as any other Director of the Company. ? The Nominee Director(s) so appointed shall hold the said office only so long as moneys remain owing by the Company to the Financial Institution or so long as the Debenture Trustee hold debenture in the Company or operation of agreement and the Nominee Director/s so appointed in the exercise of the said person shall ipso facto vacate such office immediately the money owing by the Company to the Financial Institution, or on the Debenture Trustee ceasing to hold Debentures/ Shares on the satisfaction of liability of the Company arising out of any Guarantee furnished by the Financial Institutions or satisfactory completion of term of agreement with Bodies. ? The Nominee Director(s) appointed under this article shall be entitled to receive all notice of and attend all General meeting, Board Meeting and of the meetings of the Committee of which the Nominee Director(s) is/are member(s) as also the minutes of meetings. The financial institutions/Debenture Trustee/persons/bodies shall also be entitled to receive all such notice and minutes. ? The Company shall pay to the Nominee Director(s) sitting fees and expenses which other Director of the Company are entitled, but if any other fees, commission, remuneration in any form is payable to the Director of the Company the fees, commission, money and remuneration in relation to such Nominee Director(s) shall accrued to Debenture Trustee and same shall accordingly be paid by the Company directly to the debenture trustee. Any expenses that may incurred by the financial institution or such Nominee Director(s) in connection with their appointment or Directorship shall also be paid or reimbursed by the Company to the financial Institution or as the case may be to such Nominee Director(s). ? Provided that if any such Nominee Director(s) is/are an officer of the Financial Institution, the sitting fees in relation to such Nominee Director(s) shall also accrue to the Financial Institute and the same shall accordingly be paid by the Company directly to that Financial Institution. ? Provided further that if such Nominee Director(s) is/are an official of any of the Reserve Bank of India, the sitting fees in relation to such Nominee Director(s) shall also accrue to Financial Institution to whom he represents as Nominee Director from Reserve Bank of India and the same shall accordingly be paid by the Company directly to that Financial Institution. ? Provided also that in the event of the Nominee Director(s) being appointed as Whole Time Director(s) such Nominee Director(s) shall exercise such powers and duties as may be approved by the Lenders or Bodies in consultation with Board and have such rights as are usually exercised or available to a Whole Time Director, in management of the Borrower or Bodies and such Nominee Director(s) shall be entitled to receive such remuneration fees commission and moneys as may be approved by the Lenders or Bodies in consultation with Board. 61.2 Company may increase the number of Directors Subject to Section 149 of the Act, the Company may subject to special

		<p>resolution in General Meeting increase the maximum number of Directors. ? Further the Company may, subject to the provisions of Section 169 of the Act, by passing the ordinary resolution in the General Meeting of the members, may remove any Director before the expiration of his period of office and appoint another person in the place of director so removed. 61.3Appointment of Alternate Directors In accordance with Section 161 and other applicable provisions (if any) of the Act, the Board shall have power at any time and from time to time, to, appoint a person, not being a person holding any alternate directorship for any other Director in the Company, to act as an alternate director for a director (hereinafter called ?the original Director?) during his absence for a period of not less than three months from India. 61.4Directors? power to fill up casual Vacancies Casual vacancies among Directors may be filled by the Board of Directors at their meeting and any person so appointed shall hold the office as per the provision of section 161. 61.5 Appointment of Additional Director Subject to the provisions of Section 161 and other applicable provisions (if any) of the Act, the Board shall have power at any time and from time to time, to appoint a person as an Additional Director but so that the total number of Directors shall not at any time exceed the maximum number fixed by these Articles. The Additional Director so appointed shall retire from Office at next following Annual General Meeting but shall be eligible for election by the company at that meeting as a Director. 61.6 Directors may act notwithstanding any vacancy The continuing Directors may act notwithstanding any vacancy in their body, but if, and so long as their number is reduced below the minimum number fixed by Article 100 thereof, the continuing Directors may act for the purpose of increasing the number of Directors to that number, or of summoning a General Meeting for that purpose.</p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<ul style="list-style-type: none"> <li>62.1 Remuneration of Directors Subject to the provisions of the Act, the Chairman or Managing Director or any other functional Directors who is/are in the whole-time employment of the Company may be paid remuneration either by way of a monthly payment or at a specified percentage of the net profit of the Company or partly by one way and partly by the other, keeping in view the limiting provisions governing the Managerial remuneration under the provisions of the Act. ? Subject to the provisions of the Act, a Director, who is neither in the whole-time employment nor a Chairman cum Managing Director of the Company may be paid remuneration either:- ? (a) by way of monthly, quarterly or annual payment with the approval of the Central Government, or ? (b) by way of commission if the Company by a special resolution authorizes such payment; and ? The sitting fee payable to a Director (excluding Whole-time Director) for attending a meeting of the Board or Committee thereof shall be such sum as may be fixed by the Board provided that the same shall not exceed Rs. 1,00,000/- or such other sum as prescribed in the Act as amended from time to time. ? Travelling expenses incurred by Director going out on Company?s Business ? The Board may allow and pay to any Director who is not a bona-fide resident of the place where the Registered Office of the Company or where the meetings of the Board are actually held and who has to come to such place for the purpose of attending any meeting, such sum as the Board may consider fair compensation for travelling, boarding, lodging and other actual incidental expenses, in addition to his fee for</li> </ul>
62		

		attending such meeting as specified above. If any Director be called upon to go or reside out of the bonafide place of his residence on the Company's business, he shall be entitled to be paid and reimbursed any travelling or other actual expenses incurred by him in connection with the business of the Company.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	63
		<ul style="list-style-type: none"> <li>63.1 When office of Directors to become Vacant Subject to Section 167 of the Act, the office of a Director shall become vacant if:- (a) he incurs any of the disqualifications specified in section 164 under the act; (b) he absents himself from all the meetings of the Board of Directors held during a period of twelve months with or without seeking leave of absence of the Board; (c) he acts in contravention of the provisions of entering into contracts or arrangements in which he is directly or indirectly interested; (d) he fails to disclose his interest in any contract or arrangement in which he is directly or indirectly interested; (e) he becomes disqualified by an order of a court or the Tribunal; (f) he is convicted by a court of any offence, whether involving moral turpitude or otherwise and sentenced in respect thereof to imprisonment for not less than six months: Provided that the office shall be vacated by the director even if he has filed an appeal against the order of such court; (g) he is removed in pursuance of the provisions of this Act; (h) he, having been appointed a director by virtue of his holding any office or other employment in the holding, subsidiary or associate company, ceases to hold such office or other employment in that company.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	64
		<ul style="list-style-type: none"> <li>64.1 Directors may contract with Company Except with the consent of the Board of Directors given by a resolution at a meeting of the Board and subject to such conditions, the company shall not enter into any contract or arrangement with a related party with respect to (a) sale, purchase or supply of any goods or materials; (b) selling or otherwise disposing of, or buying, property of any kind; (c) leasing of property of any kind; (d) availing or rendering of any services; (e) appointment of any agent for purchase or sale of goods, materials, services or property; (f) such related party's appointment to any office or place of profit in the company, its subsidiary company or associate company; (g) underwriting the subscription of any securities or derivatives thereof, of the company. Every contract or arrangement entered as related party transaction shall be referred in the Board's report to the shareholders along with the justification for entering into such contract or arrangement.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	
		<ul style="list-style-type: none"> <li>65.1 Disclosure of interest by Directors 1) Every Director of the Company, who is in any way, whether directly or indirectly, concerned or interested in a contract or arrangement, or proposed by Directors interested in a contract or arrangement, or proposed contract or arrangement entered into or to be entered into, by or on behalf of the Company, shall disclose the nature of his concern or interest at every financial year or whenever there is change in the disclosure of interest. (2) Nothing in sub-clause (1) of this Article shall apply to any contract or arrangement entered into or to be entered into between the Company and any other company, where any of the Directors of the Company or two or more of the Directors together holds or hold not more than two per cent of the paid-up share capital in the other company ? 65.2 Interested Directors not to participate or vote in Board's proceedings An interested director, who is in any way, whether by himself or through any of his</li> </ul>

	65	<p>relatives or firm, body corporate or other association of individuals in which he or any of his relatives is a partner, director or a member, interested in a contract or arrangement, or proposed contract or arrangement, entered into or to be entered into by or on behalf of a company, shall, take any part in the discussion of, or vote on any contract or arrangement entered into, or to be entered into, by or on behalf of the Company, if he is in any way, whether directly or indirectly, concerned or interested in such contract or arrangement, nor shall his presence count for the purpose of forming a quorum at the time of any such discussion or vote, and if he does vote, his vote shall be void. ? A contract or arrangement entered into by the company without disclosure or with participation by a director who is concerned or interested in any way, directly or indirectly, in the contract or arrangement, shall be voidable at the option of the company.</p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>66</p> <ul style="list-style-type: none"> <li>66.1 Register of Contracts in which Directors are interested The company shall keep registers in accordance with Section 189(1) giving separately the particulars of all contracts or arrangements to which to matter of disclosure of interest by directors and related party transaction applies, in such manner and containing such particulars as may be prescribed and after entering the particulars, such registers shall be placed before the next meeting of the Board and signed by all the directors present at the meeting and shall within thirty days of appointment make such disclosure as are necessary for the purpose of same. ? The Register shall be kept at the Registered office of the Company and shall be open to inspection at such office shall be open for inspection at such office during business hours and extracts may be taken there from, and copies thereof as may be required by any member of the company shall be furnished by the company to such extent, in such manner, and on payment of same fee as in the case of the Register of Members of the Company. 66.2 Director may be Director of companies promoted by the Company A Director may become a Director of any other company promoted by the Company, or in which it may be interested as a vendor, shareholder, or otherwise and no such Director shall be accountable for any benefits received as Director or shareholder of such a company except in so far as Section 188 of the Act may be applicable. ? 66.3 Register of Directors and key managerial personnel? and their Shareholding The Company shall keep at its registered office a Register containing such particulars of its Directors and key managerial personnel, Manager as may be prescribed under Section 170 of the Act and shall comply with the provisions of the said Section in all respects. The register shall include the details of securities held by each of them in the company or its holding, subsidiary, subsidiary of company?s holding company or associate companies.</li> </ul>
		<b>Proceedings of the Board</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>67</p> <ul style="list-style-type: none"> <li>67.1 Meetings of Directors The Directors may meet together as a Board for the dispatch of business from time to time, so that at least four such meetings shall be held in every year in such a manner that not more than one hundred and twenty days shall intervene between two consecutive meetings of the Board. The Directors may adjourn and regulate their meetings as they think fit. 67.2 Board may appoint Chairman All meetings of the Directors shall be presided over by the Chairman, if present, but if at any meeting of</li> </ul>

			the Directors, the Chairman is not present at the time appointed for holding the same then in that case the Directors shall choose one of the Directors present to preside over the meeting.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	68	
<input type="checkbox"/>	<input checked="" type="checkbox"/>	69	<ul style="list-style-type: none"> <li>69.1 Notice of Director?s Meeting A meeting of the Board shall be called by giving not less than seven days? notice in writing to every director at his address registered with the company and such notice shall be sent by hand delivery or by post or by electronic means. Board may be called at shorter notice to transact urgent business where at least one independent director, if any, shall be present. ? Every notice convening a meeting of the Board of Directors shall set out the agenda of the business to be transacted thereat in sufficient detail provided however that the meeting may consider any other business with the permission of the chair. 69.2 When meeting to be convened The Company Secretary or any director of the Company may, as and when directed by the Chairman to do so, convene a meeting of the Board by giving a notice in writing to every Director. 69.3 Quorum at Board Meeting No business shall be transacted at any Board meeting unless a quorum of Board of Director is present at the time when the meeting proceeds to business. Save as?? otherwise provided herein, the quorum for the Board meetings shall be as provided in section 174. 69.4 Questions at Board meetings how to be decided All questions arising at a Meeting of the Board or any committee thereof shall be decided by majority of votes of directors present and in case of equality of votes, the Chairperson shall have a second and casting vote.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	70	<ul style="list-style-type: none"> <li>70.1 Committee of Board Subject to the restrictions contained in Section 179, 180 and other applicable provisions of the Act and preceding Articles, the Board may delegate any of its powers to Committees of the Board consisting of such member or members of its body as it may think fit. ? PROVIDED that the Board may, from time to time, revoke, modify and discharge any such Committee of the Board either wholly or in part. Every Committee of the Board so formed shall in the exercise of the powers so delegated conform to any Policy/regulations that may, from time to time, be laid down by the Board. All acts done by any such Committee of the Board in conformity with such regulations and in fulfillment of the purposes of their appointment shall have the like force and effect as if done by the Board 70.2 Meeting of Committee how to be Governed The meetings and proceedings of any such Committee of the Board consisting of two or more members shall be governed by the provisions of the act and guidelines laid down for regulating the meetings and proceedings of the Directors, so far as the same are applicable thereto and are not superseded by any regulations made by Directors under the last preceding Article.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	71	<ul style="list-style-type: none"> <li>71 Resolution by circulation No resolution on matters shall be deemed to have been duly passed by the Board or by a Committee thereof by circulation, unless the resolution has been circulated in draft, together with the necessary papers, if any, to all the Directors, or? members of the Committee, as the case may be, at their addresses registered with the company in India by hand delivery or by post or by courier, or through such electronic means as may be prescribed and has been approved by a majority of the directors or</li> </ul>

		<p>members, who are entitled to vote on the resolution.? Resolution passed in such circulation shall be made part of the minutes of such meeting. ? Provided that, where not less than one-third of the total number of directors of the company for the time being require that any resolution under circulation must be decided at a meeting, the chairperson shall put the resolution to be decided at a meeting of the Board.</p>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>72</p> <ul style="list-style-type: none"> <li>72 Defects in appointment of Directors not to invalidate actions taken All acts done by any meeting of the Board, or by a Committee of the Board, or by any person acting as a Director shall notwithstanding that it was subsequently noticed that there was some defect in the appointment of such Director or persons acting as aforesaid, or that they, or any of them, were disqualified or had vacated office or that the appointment of any of them had been terminated by virtue of any provisions contained in the Act or these Articles, be as valid as if every such person had been duly appointed and was qualified to be a Director and had not vacated his office or his appointment had not been terminated. ? PROVIDED that nothing in this Article shall be deemed to give validity to acts done by a Director after his appointment had been noticed by the Company to be invalid or to have terminated.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<p>73</p> <ul style="list-style-type: none"> <li>73.1 Minutes of proceedings of meetings of the Board (a) The Company shall cause minutes of all proceedings of every meeting of the Board and committee thereof to be kept by making within thirty days of the conclusion of every such meeting record thereof in Minute Book kept for that purpose with their pages consecutively numbered. ? (b) Each page of every such book shall be initialed or signed and the last page of the record of proceedings of each meeting in such book shall be dated and signed by the Chairman of the said meeting or the Chairman of the next succeeding meeting. ? The minute books of the Board and committee meetings shall be preserved permanently and kept in the custody of the company secretary of the company or any director duly authorized by the Board for the purpose and shall be kept in the registered office or such place as Board may decide. The minutes shall also contain:- ? (i) the names of the Directors present at the meeting; And ? (ii) in the case of each resolution passed at the meeting, the names of the Directors, if any, dissenting from, or not concurring with the resolution. ? Nothing? deemed to require the inclusion in any such minutes of any matter which, in the opinion of the Chairman of the meeting ? ? (i) is, or could reasonably be regarded as, defamatory of any person. ? (ii) is irrelevant or immaterial to the proceedings, or ? (iii) is detrimental to the interests of the Company. The Chairman shall exercise an absolute discretion in regard to the inclusion or non-inclusion of any matter in the minutes on the grounds specified in this sub-clause. ? (c) Minutes of meetings kept in accordance with the aforesaid provisions shall be evidence of the proceedings recorded therein.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<ul style="list-style-type: none"> <li>74.1 Powers of Board The Board may exercise all such powers of the Company and do all such acts and things as it is entitled to do under section 179 of the Act and rules made thereunder, or by the Memorandum or Articles of the Company but shall not decide matters required to be exercised or done by the Company in General Meeting, Subject to these Articles no regulation made by the Company in General Meeting shall invalidate any prior act of</li> </ul>

the Board which would have been valid if that regulation had not been so made. ? Certain powers of the Board Without prejudice to the general powers conferred by the Act and preceding Article and so as not in any way to limit or restrict those powers, and without prejudice to the other powers conferred by these Articles and by General Body, it is hereby declared that the Directors shall have the following powers, that is to say, power:- ? (1)? to pay and charge to the capital account of the Company any commission or interest lawfully payable there out under the provisions of Sections 40 of the Act; ? (2) Subject to Sections 179 and 180 of the Act, to purchase or otherwise acquire for the Company any property, rights or privileges which the Company is authorised to acquire, at or for such price or consideration and generally on such terms and conditions as they may think fit, and in any such purchase or other acquisition to accept such title as the Directors may believe or may be advised to be reasonably satisfactory; ? (3) At their discretion and subject to the provisions of the Act, to pay for any property, rights or privileges acquired by, or services rendered to, the Company either wholly or partially, in cash or in shares, bonds, debentures, mortgages, or other securities of the Company, and any such shares may be issued either as fully paid-up or with such amount credited as paid-up thereon as may be agreed upon, and any such bonds, debentures, mortgages or other securities may be either specially charged upon all or any part of the property of the Company and its uncalled capital or not so charged; ? (4) To secure the fulfillment of any contract or engagement entered into by the Company in the normal course of business, by mortgage or charge any of the property of the Company and its uncalled capital for the time being or in such manner as they may think fit; ? (5) To accept from any Member, as far as may be permissible by law, a surrender of his shares or any part thereof, on such terms and conditions as shall be agreed upon; ? (6) To appoint any person to accept and hold in trust for the Company any property belonging to the Company, in which it is interested, or for any other purposes and to execute and do all such deeds and things as may be required in relation to any such trust, and to provide for the remuneration of such trust or trustees; ? (7) To institute, conduct, defend, compound, or abandon any legal proceedings by or against the Company or its officers, or otherwise concerning the affairs of the Company, and also to compound and allow time for payment or satisfaction of any debts due and of any claim or demand by or against the Company and to refer any differences to arbitration, and observe and execute any awards made thereon; ? (8) To act on behalf of the Company in all matters relating to bankruptcy and insolvency; ? (9) To make and give receipts, releases, and other discharges for moneys payable to the Company and for the claims and demands of the Company; ? (10) Subject to applicable provisions of the Act, to invest and deal with any moneys of the Company not immediately required for the purposes thereof upon such security (not being shares of this Company), or without security and in such manner as they may think fit, and from time to time to vary or realise such investments. Save as provided in Section 187 of the Act, all investments shall be made and held in the Company?s own name; ? (11) To execute, in the name and on behalf of the Company, in favour of any Director or other person who may incur or going to incur any personal liability whether as principal or surety, for the benefit of the Company, such mortgages of the Company?s property (present and future) as they think fit, and any such mortgage may contain a power of sale and such other

74

powers, provisions covenants as shall be agreed upon; ? (12) To open account with any bank or banks and to determine from time to time who shall be entitled to sign, on the Company's behalf bills, notes, receipts, acceptances, endorsements, cheques dividend warrants, releases, contracts and documents and to issue the necessary authority for such purpose; ? (13) To distribute by way of bonus or commission amongst the staff of the Company on the profits of any particular business or transaction, and to charge such bonus or commission as part of the working expense of the Company; ? (14) To provide for the welfare of employees or ex-employees of the Company and their families or connections of such persons, by building or contributing to the building of houses, dwellings or chawls, or by grants of money, pension, gratuities, allowances, bonus or other payments, or by creating, and from time to time subscribing or contributing to provident and other funds, associations, institutions or trusts and by providing or subscribing or contributing towards places of instrument and recreation, hospitals and dispensaries, medical and other attendance and other assistance as the Board shall think fit; and to subscribe or contribute or otherwise to assist or to guarantee money to charitable, benevolent, religious, scientific, national or other institutions or objects which shall have any moral or other claim to support or aid by the Company either by reason of locality of operation, or of public and general utility or otherwise; ? (15) Before recommending any dividend, to set aside out of the profits of the Company such sums as they may think proper for depreciation or to a Depreciation Fund, or to an Insurance Fund, or as a Reserve Fund or Sinking Fund or any Special Fund to meet contingencies or to repay debentures or debenture stock; or for special dividends or for equalizing dividends or for repairing, improving, extending and maintaining any of the property of the Company and for such other purposes (including the purposes referred to in the preceding clause), as the Board may, in their absolute? discretion, think conducive to the interest of the Company, and subject to Section 179 of the Act, to invest the several sums so set aside or so much thereof as required to be invested, upon such investments (other than shares of the Company) as they may think fit, and from time to time to deal with and vary such investments and dispose of and apply and expend all or any part thereof for the benefit of the Company, in such manner and for such purposes as the Board, in their absolute discretion, think conducive to the interest of the Company notwithstanding that the matters to which the Board apply or upon which they expend the same or any part thereof, may be matters to or upon which the capital moneys of the Company might rightly be applied or expended, and to divide the Reserve Fund or division or a reserve Fund to another Reserve Fund or division of a Reserve Fund and with full power to employ the assets constituting all or any of the above funds, including the Depreciation Fund, in the business of the Company or in the purchase or repayment of Debentures or debenture stock, and without being bound to keep the same separate from the other assets, and without being bound to pay interest on the same with power however to the Board at their discretion to pay or allow to the credit of such funds interest at such rate as the Board may think proper; ? (16) To appoint and at their discretion remove or suspend such officers such as Executive Director, general managers, managers, secretaries, assistants, supervisors, clerks, agents and servants etc. for permanent, temporary or special services as they may from time to time think fit, and to determine their powers and duties and fix their salaries or

		<p>emoluments or remunerations and to require security in such instances and to such amounts as they may think fit. And also from time to time to provide for the management and transaction of the affairs of the Company in any specified locality in India or abroad in such manner as they think fit, and the provisions contained in the following sub-clauses shall be without prejudice to the general powers conferred by this sub clause; ? (17) From time to time and at any time to establish any number of offices and establishment for properly managing the affairs of the Company in any specified locality in India or elsewhere and to appoint staff for such offices and to fix their remuneration; ? (18) Subject to the provisions of the Act, from time to time and at any time, to delegate to any such local Board, or any member or members thereof or any managers or agents so appointed or to any other person(s) any of the powers, authorities, and discretions for the time being vested in the Board, and to authorise the members for the time being of any such local Board, or any of them to fill up any vacancies, therein and to act notwithstanding vacancies and any such appointment or delegation under the preceding and this sub-clause may be made on such terms and subject to such conditions as the Board may think fit, and the Board may at any time remove any person so appointed, and may annul or vary any such delegation; ? (19) At any time and from time to time by Power of Attorney under the Seal of the Company, to appoint any person or persons to be the Attorney or Attorneys of the Company for such purposes and with such powers, authorities and discretions (not exceeding those vested in or exercisable by the Board under these presents and excluding the power to make calls and excluding also those which are to be exercised by the Board, in its Meetings) and for such period and subject to such conditions as the Board may from time to time think fit, and any such appointment may (if the Board thinks fit) be made in favour of the members or any of the members of any local Board, established as aforesaid or in favour of any company, or the shareholders, directors, nominees, or managers or any company or firm or otherwise in favour of any persons whether appointed by name or designation by the Board and any such Power of Attorney may contain such powers for the protection or convenience of such Attorney as the Board may think fit, and Board may specifically bestow powers enabling any such delegate or attorneys to sub-delegate all or any of the powers, authorities and discretions for the time being vested in them; ? (20) Subject to Sections 188 of the Act, for or in relation to any of the matters aforesaid or otherwise for the purposes of the Company, to enter into such negotiations and contracts and rescind and vary such contracts, and execute and do all such acts deeds and things in the name and on behalf of the Company as they may consider expedient; ? (21) From time to time to make vary and repeal bye-laws for the regulations of the business of the Company regulate employment of its officers and servants by making service Rules and Regulations; ? (22) Maintain proper records at places as per provisions of the Act and where the Company has a branch office, whether in or outside India, the Company shall be deemed to have complied with this Article if proper Books of Account relating to the transactions effected at the branch office are kept at the branch office and proper summarized returns, made up-to-date at intervals of not more than three months, are sent by the branch office to the Company at its Office or other place in India, at which the Company?s Books of Accounts are kept as aforesaid; ? (23) Ensure proper maintenance of the Books of Account which shall give a true and fair view of the state of</p>
--	--	--

			the affairs of the Company or branch office, as the case may be, and explain its transactions. The Books of Account and other books and papers shall be open to inspection by any Director during business hours.
<input checked="" type="checkbox"/>	<input type="checkbox"/>	75	Save as otherwise expressly provided in the Act, a resolution in writing, signed by all the members of the Board or of a committee thereof, for the time being entitled to receive notice of a meeting of the Board or committee, shall be valid and effective as if it had been passed at a meeting of the Board or committee, duly convened and held.
<input checked="" type="checkbox"/>	<input type="checkbox"/>	76	<ul style="list-style-type: none"> <li>i. In case of a One Person Company?</li> <li>ii. where the company is having only one director, all the businesses to be transacted at the meeting of the Board shall be entered into minutes book maintained under section 118;</li> <li>iii. such minutes book shall be signed and dated by the director;</li> <li>iv. the resolution shall become effective from the date of signing such minutes by the director.</li> </ul>
			<b>Chief Executive Officer, Manager, Company Secretary or Chief Financial Officer</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	77	<ul style="list-style-type: none"> <li>• 77 CEO, MANAGER, CS AND CFO Subject to the provisions of the Act, -- ? (i) A chief executive officer, manager, company secretary or chief financial officer may be appointed by the Board for such term, at such remuneration and upon such conditions as it may think fit; and any chief executive officer, manager, company secretary or chief financial officer so appointed may be removed by means of a resolution of the Board; ? (ii) A director may be appointed as chief executive officer, manager, company secretary or chief financial officer ? As per provisions of the Act or these regulations requiring or authorising a thing to be done by or to a director and chief executive officer, manager, company secretary or chief financial officer shall not be satisfied by its being done by or to the same person acting both as director and as, or in place of, chief executive officer, manager, company secretary or chief financial officer.?</li> </ul>
<input checked="" type="checkbox"/>	<input type="checkbox"/>	78	A provision of the Act or these regulations requiring or authorising a thing to be done by or to a director and chief executive officer, manager, company secretary or chief financial officer shall not be satisfied by its being done by or to the same person acting both as director and as, or in place of, chief executive officer, manager, company secretary or chief financial officer.
			<b>The Seal</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	79	<ul style="list-style-type: none"> <li>• 79.1 The Seal its custody and use The Board shall provide a Common Seal for the purpose of the Company, and shall have power, from time to time, to destroy the same and substitute a new Seal in lieu thereof, and the Board shall provide for the safe custody of the Seal for the time being, and the seal shall never be used except on the authority of the Board or by Committee of the Board as authorised.' 79.2 Deeds how executed Every deed or other instrument, to which the Seal of the Company is required to be affixed, shall unless the same is executed by a duly constituted attorney issued under the seal; be signed by two Directors or one Director and Secretary or some other person authorised by the Board for the purpose: ? PROVIDED that in respect of the Share Certificate, the Seal shall be affixed in accordance with Article as</li> </ul>

			mentioned? above.
			<b>Dividends and Reserve</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	80	<ul style="list-style-type: none"> <li>80.1 Division of profits and dividends in proportion to amount paid-up? (a) The profits of the Company, subject to any special rights relating thereto created or authorised to be created by these Articles and subject to the provisions of these Articles, shall be divisible among the Members in proportion to the amount of capital paid-up or credited as paid-up on the shares held by them. (b) All dividends shall be apportioned and paid proportionately to the amounts paid or credited as paid on the shares held during any portion or portions of the period in respect of which the dividend is paid, but if any share is issued on terms providing that it shall rank for dividend from a particular date, such share shall rank for dividend accordingly. 80.2 The Company in General Meeting may declare dividends to be paid to Members according to their respective rights, but no dividends shall exceed the amount recommended by the Board, but the Company in General Meeting may declare a smaller dividend. 80.3 Dividends only to be paid out of Profits a) No dividend shall be declared or paid by the Company for any financial year except out of its profits for that year arrived at in the manner set out in Section 123 of the Act. (b) Where, owing to inadequacy or absence of profits in any financial year, any Company proposes to declare dividend out of the accumulated profits earned by it in previous years and transferred by the company to reserves, such declaration of dividend shall not be made except in accordance with such rules as may be made in that behalf. (c) No dividend shall be declared or paid by a company from its reserves other than free reserves. 80.4 Interim Dividend Subject to the provisions of Section 123, the Board may, from time to time, pay the Members such interim dividend as appear to it to be justified by the profits of the Company.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	81	<ul style="list-style-type: none"> <li>81.1 Capital paid - up in advance to carry Interest Where capital is paid in advance of calls such capital may carry interest but shall not in respect thereof confer a right to dividend or participate in profits.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	82	<ul style="list-style-type: none"> <li>82.1 Retention of dividends until completion of transfer The Board may retain the dividends payable on shares in terms of Section 126 in respect of which any person is entitled to become a Member, or on completion any person under those Articles is entitled to transfer, or until such person shall become a Member in respect of such shares or shall duly transfer the same. 82.2 Transfer of shares must be Registered A transfer of shares shall not pass the right to any dividend declared thereon before the registration of transfer.? Provided that where any instrument of transfer of shares has been delivered to the Company for registration and the transfer of such shares has not been registered by the Company, it shall, notwithstanding anything contained in any other provision of this Act ? a) transfer the dividend in relation to such shares to the Unpaid Dividend Account referred to in Section 124 of the Act unless the Company is authorised by the registered holder of such shares in writing to pay such dividend to the transferee specified in such instrument of transfer ;and ? (b) keep in abeyance in relation to such shares, any offer of rights shares under? clause (a) of sub-</li> </ul>

			section (1) of section 62 of the Act and any issue of fully paid-up bonus shares in pursuance of first proviso to sub-section (5) of section 123 of the Act.
<input type="checkbox"/>	<input checked="" type="checkbox"/>	83	
<input type="checkbox"/>	<input checked="" type="checkbox"/>	84	<ul style="list-style-type: none"> <li>84.1 Dividends how remitted (1) Unless otherwise directed any dividend payable in cash may be paid by cheque or warrant or in any electronic mode or by a pay slip or receipt or in any other manner having the force of a cheque or warrant sent through the post to the registered address of the Member or person entitled or in case of joint holders to that one of them first named in the Register in respect of the joint holdings. Every such cheque or warrant shall be made payable to the order of the person to whom it is sent the Company shall not be liable or responsible for any cheque or warrant or pay slip or receipt lost in transmission, or for any dividend lost to the Member or person entitled thereto by the forged endorsement of any cheque or warrant or the forged signature of any pay slip or receipt or the fraudulent recovery of the dividend by any other means. ? (2) Notwithstanding anything contained in these Articles any dividend declared, may be paid by Electronic Clearing System through any Sponsor Bank, after getting registration with the Reserve Bank of India for using this facility and collecting from the members necessary bank mandate in the prescribed format.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	85	<ul style="list-style-type: none"> <li>85.1 Dividends and call together Any General Meeting declaring a dividend, may, on the recommendation of the Board, make a call on the Members of such amount as the meeting may fix, but so that the call on each Member shall not exceed the dividend payable to him and so that the call be made payable at the same time as the dividend, and the dividend may, if so arranged between the Company and the Member, be set off against the calls.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	86	<ul style="list-style-type: none"> <li>86 Unclaimed dividend No unclaimed dividend shall be forfeited and all unclaimed dividends shall be dealt with in accordance with the provisions of Section 124 and other applicable provisions of the Act.</li> </ul>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	87	<ul style="list-style-type: none"> <li>87 No interest against Dividend No dividend shall bear interest against the company.</li> </ul>
<input checked="" type="checkbox"/>	<input type="checkbox"/>	88	No dividend shall bear interest against the company.
			<b>Accounts</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>		<ul style="list-style-type: none"> <li>89.1 Directors to keep true accounts (a) Every company shall prepare and keep at its? registered office including its branch office or offices or at such other place in India as the Board thinks fit, Books of Accounts and other relevant books and papers and financial statement for every financial year which give a true and fair view of the state of the affairs of the company in accordance with Section 128 of the Act with respect to- (i) all sums of money received and expended by the Company and the matters in respect of which the receipts and expenditure take place; ? (ii) all sales and purchases of goods by the Company; ? (iii) the assets and liabilities</li> </ul>

	89	<p>of the Company. ? (iv) state of affairs of the company. ? (b) Where the Board decides to keep all or any of the Books of Account at any place other than the Office of the Company, the Company shall within seven days of the decision file with the Registrar a Notice in writing giving the full address of that other place in accordance with Section 128 of the Act. ? (c) The company may keep such books of account or other relevant papers in electronic mode in such manner as may be prescribed. (d) The Company shall preserve in good order the Books of Account relating to a period of not less than eight financial years immediately preceding a financial year.? The books of account and other relevant books and papers maintained in electronic mode shall remain accessible in India so as to be usable for subsequent reference together with the vouchers relevant to any entry in such Books of Account. 89.2 Inspection of accounts or record by members No Member (not being a director) shall have any right of inspecting any account or books or documents of the Company except as conferred by Section 94 of the Act or authorised by the Board or by the company in general meeting. ? The Board may determine whether and to what extent and at what time and place and under what conditions or regulations the accounts and books of the Company or any of them may be open to inspection of the Members. Notwithstanding anything to the contrary contained hereinabove, the authorised representative of Promoters shall have a right to inspect the accounts books, plant, facility, documents, records, premises, equipment and machinery and all other property of the Company at convenient time(s), after giving advance notice to the Company. 89.3 Statement of Accounts to be furnished to General Meeting The Directors shall, from time to time, in accordance with Sections 129 and 134 and other applicable provisions of the Act, cause to be prepared and to be laid before the Company in General Meeting, such Balance Sheets, Profit and Loss Accounts and Reports as are required by these Sections. 89.4 Copies shall be sent to each Member Without prejudice to the provisions of Section 101 and subject to the provisions of Section 136 of the Act, a copy of the financial statements, including consolidated financial statements, auditors? report and every other document required by law to be annexed or attached to the Balance Sheet shall at least twenty-one days before the General Body Meeting at which the same are to be laid before the members, be sent to the members of the company, to every trustee for every holder of any debenture issued by the company and to all persons other than such members or trustee, being the person so entitled to attend the General Body Meeting. 89.5 Copy of financial statement to be filed with registrar The Company shall comply with Section 137 of the Act as to filing copies of the Balance Sheet and Profit and Loss Account and documents required to be annexed or attached thereto with the Registrar. ??</p>
		<b>Winding up</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<ul style="list-style-type: none"> <li>90 Procedure for winding up If the Company shall be wound up and the assets available for distribution among the members as such shall be insufficient to repay the whole of the paid up capital such assets shall be distributed so that as nearly as may be the losses shall be borne by the members in proportion to the capital paid up or which ought to have been paid up at the commencement of the winding-up on the shares held by them</li> </ul>

		90	respectively. And if in a winding-up the assets available for distribution among the members shall be more than sufficient to repay the whole of the capital paid up at the commencement of the winding-up, the excess shall be distributed amongst the members in proportion to the capital at the commencement of the winding-up paid up or which ought to have been paid up on the shares held by them respectively. But this Article is to be without prejudice to the rights of the holders of shares issued upon special terms and conditions. ? If the Company shall be wound up, whether voluntarily or otherwise, the liquidators may, with the sanction of a Special Resolution, divide among the contributions, in specie or kind, any part of the assets of the Company and may, with the like sanction, vest any part of the assets of the Company in Trustees upon such trusts for the benefit of the contributories, or any of them, as the liquidators, with the like sanction, shall think fit.
			<b>Indemnity</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	91	<ul style="list-style-type: none"> <li>91.1 Officers to be indemnified Subject to provisions of the Act, every Officer of the company shall be indemnified out of the assets of the Company against any liability incurred by him in defending any proceedings, whether civil or criminal, in which judgment is given in his favour or in which he is acquitted or in which relief is granted to him by the court or the Tribunal. Provided that if such person is proved to be guilty, the premium paid on such insurance shall be treated as part of the remuneration.</li> </ul>
			<b>Others</b>
<input type="checkbox"/>	<input checked="" type="checkbox"/>	92	

#### Subscriber Details

S. No.	Subscriber Details				
	*Name, Address, Description and Occupation	DIN / PAN / Passport number	*Place	DSC	Dated
1	PFC CONSULTING LIMITED, having its Registered office at First Floor, Urjanidhi, 1 Barakhamba Lane, Connaught Place ND 110001, through Sh. Sachin Arora, S/o Sh, Prem Lal Arora, Address: F-5, 1903, SUPERTECH, ECO VILLAGE, NEAR PARK, GREATER NOIDA, Gautam Buddha Nagar 201301 Occupation -Service(as Auth	AKGPA1434J	New Delhi		06/06/2023
2	MANOJ KUMAR RANA S/o Sh. SUBE SINGH, R/o A-32/E, DDA Flats, Munirka ND 110067, Description: As a Nominee of PFC CONSULTING LIMITED, Occupation: Service	02263302	New Delhi		06/06/2023
	DHARUMAN MANAVALAN S/o Sh. PAMANDI CHINNAN DHARUMAN, Address: A-703, Saheta Apartment, Plot No-30,				06/06/2023

3	Dwarka Sector 4 ND-110078, Description: As a Nominee of PFC CONSULTING LIMITED, Occupation: Service	08102722	New Delhi		
4	SANJAY KUMAR NAYAK S/o Sh. JAGABANDHU NAYAK, Address: K-713, Jalvayu Tower Sec 56, Gurgaon, Haryana, 122011, Description: As a Nominee of PFC CONSULTING LIMITED, Occupation: Service	08197193	New Delhi		06/06/2023
5	SACHIN SHUKLA S/o Sh. RAJ KUMAR SHUKLA, Address: 4th floor, House No 6, H-1 BLOCK, Good EARTH CITY CENTER, SOUTH CITY II, GURGAON, HARYANA -122018 Description: As a Nominee of PFC CONSULTING LIMITED, Occupation: Service	08613963	New Delhi		06/06/2023
6	MILIND MADHUSUDAN DAFADE S/o Sh. MADHUSUDAN GURINATH DAFADE, Address: Flat C-31, Aishwarya M Apptt. Sec-4, Plot No. 17, Dwarka, ND 110078, Description: As a Nominee of PFC CONSULTING LIMITED, Occupation: Service	09587967	New Delhi		06/06/2023
7	NEERAJ SINGH S/o Sh. DAYASHANKAR SINGH, Address: C-703, F-2, The Crescent Apartment Sec 50, Noida, Gautam Budha Nagar, UP- 201301 Description: As a Nominee of PFC CONSULTING LIMITED, Occupation: Service	08613892	New Delhi		06/06/2023

## Signed before me

Name Prefix (ACA/FCA/ACS/ FCS/ACMA/ FCMA)	*Name of the witness	*Address, Description and Occupation	*DIN / PAN / Passport number / Membership		DSC	Dated
ACS	Anjali	D-427, 2nd Floor, Ramphal Chowk, (Backside of Goyalsons) Palam Extn, Sector 7, Dwarka, New Delhi-110075, Occupation Practicing Company Secretary	A65330	New Delhi	DIN8##A65330	06/06/2023

**Form No. INC-33**

Form language

 English  Hindi
**e-MOA (e-Memorandum of Association)**

[Pursuant to Schedule I (see Sections 4 and 5) to the Companies Act, 2013]

Refer instruction kit for filing the form

All fields marked in \* are mandatory

**\* Table applicable to company as notified under schedule I of the Companies Act, 2013**

(A - MEMORANDUM OF ASSOCIATION OF A COMPANY LIMITED BY SHARES

B - MEMORANDUM OF ASSOCIATION OF A COMPANY LIMITED BY GUARANTEE AND NOT HAVING A SHARE CAPITAL

C - MEMORANDUM OF ASSOCIATION OF A COMPANY LIMITED BY GUARANTEE AND HAVING A SHARE CAPITAL

D - MEMORANDUM OF ASSOCIATION OF AN UNLIMITED COMPANY AND NOT HAVING SHARE CAPITAL

E - MEMORANDUM OF ASSOCIATION OF AN UNLIMITED COMPANY AND HAVING SHARE CAPITAL)

A - MEMORANDUM OF  
ASSOCIATION OF A COMPANY  
LIMITED BY SHARES

**Table A/B/C/D/E**

1 The name of the company is

BIKANER III NEEMRANA II  
TRANSMISSION LIMITED

2 The registered office of the company will be situated in the State of

Delhi

3 (a) The objects to be pursued by the company on its incorporation are:

1. To develop Power System Network  
To plan, promote and develop an integrated and efficient power transmission system network in all its aspects including planning, investigation, research, design and engineering, preparation of preliminary, feasibility and definite project reports, construction, operation and maintenance of transmission lines, sub-stations, load dispatch stations and communication facilities and appurtenant works, coordination of integrated operation of state, regional and national grid system, execution of turn-key jobs for other utilities/organizations and wheeling of power in accordance with the policies, guidelines and objectives laid down by the Central Government from time to time.

2. To study, investigate, collect information and data

To study, investigate, collect information and data, review operation, plan, research, design

and prepare Report, diagnose operational difficulties and weaknesses and advise on the remedial measures to improve, undertake development of new and innovative product connected with business of the Company as well as modernize existing EHV, HV lines and Sub-Stations.

3. To act as Consultants/ Technical Advisers of public/ private sector enterprises etc.

To act as consultants, technical advisors, surveyors and providers of technical and other services to Public or Private Sector enterprises engaged in the planning, investigation, research, design and preparations of preliminary, feasibility and definite project reports, manufacture of power plant and equipment, construction, generation, operation and maintenance of power transmission system from power generating stations and projects, transmission, distribution and sale of power.

(b) \*Matters which are necessary for furtherance of the objects specified in clause 3(a) are

1. To obtain authority etc. to carry out its objects

To obtain license, approvals and authorization from Governmental Statutory and Regulatory Authorities, as may be necessary to carry out and achieve the Objects of the Company and connected matters which may seem expedient to develop the business interests of the Company in India and abroad.

2. To obtain charters, concession etc.

To enter into any arrangement with the Government of India or with any State Government or with other authorities/ commissions, local bodies or public sector or private sector undertakings, Power Utilities, Financial Institutions, Banks,

International Funding Agencies and obtain such charters, subsidies, loans, advances or other money, grants, contracts, rights, sanctions, privileges, licenses or concessions whatsoever (whether statutory or otherwise) which the Company may think it desirable to obtain for carrying its activities in furthering the interests of the Company or its members.

3.To enter into Implementation/ Construction Agreement

To enter into any agreement, contract or any arrangement for the implementation of the power generation, evacuation, transmission and distribution system and network with Power/ Transmission Utilities, State Electricity Boards, Vidyut Boards, Transmission Companies, Generation Companies, Licensees, Statutory bodies, other organizations (whether in Private, Public or Joint Sector Undertaking) and bulk consumers of power etc.

4.To carry on the business or purchasing, importing, exporting and trading power

To carry on the business or purchasing, importing, exporting and trading of power subject to the provisions of Electricity Act, 2003 and to supply electric power generated by other plants to distribution companies, trading companies, other generation companies and other Persons, and in this regard execute agreements with Central and State generating authorities, departments or companies, Independent Power Producers and other Persons.

5. To enter into Agreements; etc.

To secure the payments of money, receivables on transmission and distribution of electricity and sale of fuel, as the case may be, to the State Electricity Boards, Vidyut Boards,

Transmission Utilities, Generating Companies, Transmission Companies, Distribution Companies, State Governments, Licensees, statutory bodies, other organizations (whether in Private, Public or Joint Sector Undertaking) and bulk consumers of power etc. through Letter of Credits/ESCROW and other security documents.  
6. To execute transmission service Agreements

To execute Transmission Service Agreements or other agreements for transmission of power to distribution, trading, and other companies, State Electricity Boards, State Utilities and any other organization and Persons.

7. To co-ordinate with Central Transmission Utility

To coordinate with the Central Transmission Utility for transmission of electricity under the provisions of Electricity Act 2003.

8. To borrow money

Subject to provisions of Sections 73, 179, 180 and other applicable provisions of the Companies Act, 2013 and subject to other laws or directives, if any, of SEBI/RBI, to borrow money in Indian rupees or foreign currencies and obtain foreign lines of credits/ grants/ aids etc. or to receive money or deposits from public for the purpose of the Company's business in such manner and on such terms and with such rights, privileges and obligations as the Company may think fit. The Company may issue bonds/ debentures whether secured or unsecured; bills of exchange, promissory notes or other securities, mortgage or charge on all or any of the immovable and movable properties, present or future and all or any of the uncalled capital for the time being of the Company as the Company may deem fit and to repay, redeem or pay off any

such securities or charges.

9. To lend money

To lend money on property or on mortgage of immovable properties or against Bank guarantee and to make advances of money against future supply of goods and services on such terms as the Directors may consider necessary and to invest money of the Company in such manner as the Directors may think fit and to sell, transfer or to deal with the same.

10 To acquire, own, lease or dispose off the property

To own, possess, acquire by purchase, lease or otherwise rights, title and interests in and to, exchange or hire real estate, equipment, Transmission lines, lands, buildings, apartments, plants, equipment, machinery, fuel blocks and hereditaments of any tenure or descriptions situated in India or abroad or any estate or interest therein and any right over or connected with land so situated and turn the same to account in any manner as may seem necessary or convenient for the purpose of business of the Company and to hold, improve, exploit, re-organize, manage, lease, sell, exchange or otherwise dispose of the whole or any part thereof.

11. To deal in Scrips/Govt. Securities

Subject to applicable provisions of law, to subscribe for, underwrite, or otherwise acquire, hold, dispose of and deal with the shares, stocks, debentures or other securities and titles of indebtedness or the right to participate in profits or other similar documents issued by any Government authority, Corporation or body or by any company or body of persons and any option or right in respect thereof.

12. To create funds and appropriate profits

To create any depreciation fund, reserve fund, sinking fund, insurance fund, gratuity, provident fund or any other fund, for depreciation or for repairing, improving extending or maintaining any of the properties of the Company or for any other purposes whatsoever conducive to the interests of the Company.

13. To purchase or otherwise acquire companies

To acquire shares, stocks, debentures or securities of any company carrying on any business which this Company is entitled to carry on or acquisition of undertaking itself which may seem likely or calculated to promote or advance the interests of the Company and to sell or dispose of or transfer any such shares, stocks or securities and the acquired undertaking.

14. To enter into partnership Agreement or Merge / amalgamate

To enter into partnership or into any agreement for joint working, sharing or pooling profits, joint venture, amalgamation, union of interests, co-operation, reciprocal concessions or otherwise or amalgamate with any person or company carrying on or engaged in or about to carry on or engaged in any business or transaction in India or abroad which the Company is authorized to carry on or engage in any business undertaking having objects identical or similar to, as are being carried on by this Company.

15. To have agencies and branch offices in India and abroad

To establish and maintain agencies, branch offices and local agencies, to procure business in

any part of India and world and to take such steps as may be necessary to give the Company such rights and privileges in any part of the world as deemed proper in the interest of the Company.

16. To promote institutions or other companies  
To promote and undertake the formation of any institution or Company or subsidiary company or for any aforesaid objects intended to benefit the Company directly or indirectly and to coordinate, control and guide their activities.

17(a) To acquire know how and import-export of machinery and tools etc.

To negotiate and enter into agreements and contracts with domestic and foreign companies, persons or other organizations, banks and financial institutions, in relation to the business of the Company including that of technical know-how, import, export, purchase or sale of plant, machinery, equipment, tools, accessories and consumables, financial assistance and for carrying out all or any of the objects of the Company.

17(b) To negotiate and enter into agreements etc.

To negotiate and enter into agreements and contracts for execution of turnkey jobs, works, supplies and export of plant, machinery, tools and accessories etc.

18. To enter into contracts/arrangements in connection with issue of shares/securities. Upon and for the purpose of any issue of shares, debentures or any other securities of the Company, to enter into agreement with intermediaries including brokers, managers of issue/commission agents and underwriters and to provide for the remuneration of such

persons for their services by way of payment in cash or issue of shares, debentures or other securities of the Company or by granting options to take the same or in any other manner as permissible under the law.

19. To enter into contracts of indemnity and/or guarantee

To enter into contracts of indemnity and get guarantee and allocations for the business of the Company.

20. To arrange for Training and Development

To make arrangements for training of all categories of employees and to employ or otherwise engage experts, advisors, consultants etc. in the interest of achieving the Company's objects.

21. To promote conservation, protect environment, theft etc.

To promote conservation and protection of electricity from theft, safety of life and to protect environments including air, land and water etc.

22. To provide for welfare of employees

To pay and provide for the remuneration, amelioration and welfare of persons employed or formerly employed by the Company and their families providing for pension, allowances, bonuses, other payments or by creating for the purpose from time to time the Provident Fund, Gratuity and other Funds or Trusts. Further to undertake building or contributing to the building or houses, dwellings or chawls by grants of money, or by helping persons employed by the Company to effect or maintain insurance on their lives by contributing to the payment of premium or otherwise and by

providing or subscribing or contributing towards educational institutions, recreation, hospitals and dispensaries, medical and other assistance as the Company may deem fit.

23. To take Insurance

To ensure any rights, properties, undertakings, contracts, guarantees or obligations or profits of the Company of every nature and kind in any manner with any person, firm, association, institution or company.

24. To share the profits pay, dividends and provide bonus etc

To distribute among members of the Company dividend including bonus shares out of profits, accumulated profits or funds and resources of the Company in any manner permissible under law.

25. To institute and defend the legal proceedings

To institute, conduct, defend, compound or abandon any legal proceedings by or against the Company or its officers or otherwise concerning the affairs of the Company and also to compound and to allow time for payment or satisfaction of any debts or recovery due, claims or demands by or against the Company and to refer any claims or demands by or against the Company or any differences arising in execution of contracts to conciliation and arbitration and to observe, comply with and/or challenge any awards preliminary, interim or final made in any such arbitration.

26. To pay and subsequently write off preliminary expenses

To pay out of the funds of the Company all costs, charges, expenses and preliminary and incidental to the promotion, formation, establishment and registration of the Company or

other expenses incurred in this regard.

27. To contribute and make donations

Subject to provisions of Companies Act, 2013 to contribute money or otherwise assist to charitable, benevolent, religious, scientific national, defense, public or other institutions or objects or purposes.

28. To open accounts in Banks

To open an account or accounts with any individual, firm or company or with any bank bankers or shrofs and to pay into and withdraw money from such account or accounts.

29. To accept gifts, donations etc.

To accept gifts, bequests, devises and donations from members and others and to make gifts to members and others of money, assets and properties of any kind.

30. To pursue the objects of the Company as principal, agents, trustee or in any other capacity

To carry out all or any of the objects of the company and do all or any of the above things in any part of the world and either as principal, agent, contractor or trustee or otherwise and either alone or in conjunction with others.

31. To enter into Contracts

To negotiate and/or enter into agreement and contract with individuals, companies, corporations, foreign or Indian, for obtaining or providing technical, financial or any other assistance for carrying on all or any of the objects of the Company and also for the purpose of activating, research, development of projects on the

basis of know-how and/or financial participation and for technical collaboration, and to acquire or provide necessary formulate and patent rights for furthering the objects of the company.

32. To contribute towards promotion of trade and industry

To aid pecuniary or otherwise, any association, body or movement having for its object the solution, settlement or surmounting of industrial or labour problems or trouble or the promotion of industry or trade.

33. To take all necessary steps for winding up of the company

Subject to the provisions of Companies Act, 2013 or any amendment or re-enactment thereof in the event of winding up to distribute among the members in specie any property of the Company or any proceeds of sale on disposal of any property in accordance with the provisions of the Act.

34. To do and perform all coincidental and ancillary acts for the attainment of its objects

To do all such other things as may be deemed incidental or conducive to the attainment of the above Objects or any of them and to carry on any business which may seem to the Company capable of being conveniently carried in connection with any of the Company's Objects or calculated directly or indirectly to enhance the value of or render profitable any of the Company's property or rights.

35. To take up studies and research experiments.

To establish, provide, maintain and conduct or otherwise subsidies research laboratories and experimental workshops for

scientific, technical or researches, experiments and to undertake and carry on directly or in collaboration with other agencies scientific and technical research experiments and tests of all kinds and to process, improve and invent new products and their techniques of manufacture and to promote, encourage, reward in every manner studies and research, scientific and technical investigations and inventions of any kind that may be considered likely to assist, encourage and promote rapid advances in technology, economies, import substitution or any business which the Company is authorized to carry on.

36. To evolve scheme for restructuring or arrangement.

Subject to provisions of the Companies Act,2013, to evolve scheme for restructuring or arrangement, to amalgamate or merge or to enter into partnership or into any consortium or arrangement for sharing of profits, union of interests, co-operation, joint venture with any Person or Persons, partnership firm/firms, or company or companies carrying on or engaged in any operation capable of being conducted so conveniently in co-operation with the business of the Company or to benefit the Company or to the activities for which the Company has been established.

37. To apply for purchase, or otherwise acquire.

To apply for purchase, or otherwise acquire any trademarks, patents, brevets, inventions, licenses, concessions and the like, conferring any exclusive or nonexclusive or limited rights to use, or any secret or other information as to any invention which may be capable of being used for any of the purposes of the Company, or

the acquisition of which may benefit the Company and to use, exercise, develop or grant licenses in respect of or otherwise turn to account the property, rights or information so acquired.

38. To sell, dispose or hive off an undertaking of the Company  
To sell, dispose or hive off an undertaking of the Company or any part thereof for such consideration as the Company may think fit and in particular for shares, debentures or securities of any other association, corporation or company.

39. To sell, improve, manage, develop

To sell, improve, manage, develop, exchange, loan, lease or let, under-lease, sub - let, mortgage, dispose of, deal with in any manner, turn to account or otherwise deal with any rights or property of the Company.

40. To outsource parts of its activities

To outsource parts of its activities to achieve higher efficiencies and throughputs in the achievement of its business goals.

4 The liability of the member(s) is limited, and this liability is limited to the amount unpaid if any, on the shares held by them.

The liability of the member(s) is limited

The liability of the member(s) is Unlimited

5 Every member of the company undertakes to contribute:

(i) to the assets of the company in the event of its being wound up while he is a member, or within one year after he ceases to be a member, for payment of the debts and liabilities of the company or of such debts and liabilities as may have been contracted before he ceases to be a member; and

(ii) to the costs, charges and expenses of winding up (and for the adjustment of the rights of the contributories among

themselves), such amount as may be required, not exceeding \*  rupees.

(iii) The share capital of the company is  rupees, divided into

Equity Share	Shares of	10	Rupees each		10000
--------------	-----------	----	-------------	--	-------

6

- We, the several persons, whose names and address are subscribed, are desirous of being formed into a company in pursuance of this memorandum of association, and we respectively agree to take the number of shares in the capital of the company set against our respective names:
- I, whose name and address is given below, am desirous of forming a company in pursuance of this memorandum of association and agree to take all the shares in the capital of the company:
- We, the several persons, whose names and addresses are subscribed, are desirous of being formed into a company in pursuance of this memorandum of association:

Subscriber Details					
S. No.	*Name, Address, Description and Occupation	DIN / PAN / Passport number	No. of shares taken	DSC	Dated
1	SACHIN SHUKLA, S/o Sh. RAJ KUMAR SHUKLA, Address: 4TH FLOOR, HOUSE NO. 6, H 1 BLOCK, GOOD EARTH CITY CENTER, SOUTH CITY II Gurgaon Haryana 122018 South City Gurgaon India Description: (As a Nominee of PFC CONSULTING LIMITED) Occupation: Service	08613963	100 Equity,0 Preference		08/06/2023
2	MILIND MADHUSUDAN DAFADE, S/o Sh. MADHUSUDAN GURINATH DAFADE, Address: C-31, AISHWARYA M APPTT DWARKA, PLOT NO. 17, SECTOR 4 DELHI-110078 India Description:(As a Nominee of PFC CONSULTING LIMITED Occupation: Service	09587967	100 Equity,0 Preference		08/06/2023
3	NEERAJ SINGH, S/o Sh. DAYASHANKAR SINGH, Address: C-703, F-2, THE CRESCENT APPARTMENT SEC-50 GAUTAM BUDDHA NAGAR NOIDA Uttar Pradesh 201301 India Description:(As a Nominee of PFC CONSULTING LIMITED Occupation: Service	08613892	100 Equity,0 Preference		08/06/2023
4	PFC CONSULTING LIMITED having its Registered Office at FIRST FLOOR, "URJANIDHI", 1, BARAKHAMBHA LANE CONNAUGHT PLACE, New Delhi-110001 through Sh. SACHIN ARORA, S/o Sh. Prem Lal Arora, Address: F-5, 1903, SUPERTECH, ECO VILLAGE, 1, NEAR PARK, GREATER NOIDA, Uttar Pradesh-201301 (as Authorised Si	AKGPA1434J	9400 Equity,0 Preference		08/06/2023

5	MANOJ KUMAR RANA, S/o Sh. SUBE SINGH, Address: A-32-E, DDA FLATS MUNIRKA NEW DELHI 110067 India Description:(As a Nominee of PFC CONSULTING LIMITED Occupation: Service	02263302	100 Equity,0 Preference	08/06/2023
6	DHARUMAN MANAVALAN, S/o Sh. PAMANDI CHINNAN DHARUMAN, Address A-703, SAHETA APARTMENT, PLOT NO. 30, DWARKA, SECTOR-4, SOUTH WEST DELHI 110078 India Description:(As a Nominee of PFC CONSULTING LIMITED Occupation: Service	08102722	100 Equity,0 Preference	08/06/2023
7	SANJAY KUMAR NAYAK, S/o Sh. JAGABANDHU NAYAK, Address: K 713, JALVAYU TOWER, SECTOR 56 GURGAON Haryana 122011 India Description: (As a Nominee of PFC CONSULTING LIMITED Occupation: Service	08197193	100 Equity,0 Preference	08/06/2023
<b>Total shares taken</b>			10000 Equity,0 Preference	

## Signed before me

Membership type of the witness (ACA/FCA/ACS/FCS/ACMA/FCMA)	*Name of the witness	*Address, Description and Occupation	DIN / PAN / Passport number / Membership number	DSC	Dated
ACS	Anjali	D-427, 2nd Floor, Ramphal Chowk, (Backside of Goyalsons) Palam Extn, Sector 7, Dwarka, New Delhi-110075 Occupation: Practicing Company Secretary	65330		08/06/2023

7 Shri / Smt

Of

resident of

aged

years shall be the nominee in the event of death of the sole member.



भारत सरकार  
Government of India  
विद्युत मंत्रालय  
Ministry of Power  
केंद्रीय विद्युत प्राधिकरण  
Central Electricity Authority  
विद्युत प्रणाली योजना एवं मूल्यांकन प्रभाग- II  
Power System Planning & Appraisal Division-II

सेवा में/To

As per list of Addresses

विषय : ट्रांसमिशन पर राष्ट्रीय समिति (एनसीटी) की नवी बैठक के कार्यवृत्त - के सम्बन्ध में ।

Subject: Minutes of the 9<sup>th</sup> Meeting of National Committee on Transmission (NCT) –regarding.

महोदया (Madam) / महोदय (Sir),

The 9<sup>th</sup> meeting of the "National Committee on Transmission" (NCT) was held on 28<sup>th</sup> September, 2022. Minutes of the meeting is attached for kind information.

भवदीय/Yours faithfully,

 01.11.2022

(ईशान शरण/Ishan Sharan)  
मुख्य अभियंता / Chief Engineer

प्रतिलिपि / Copy to:

संयुक्त सचिव (पारेषण), विद्युत मंत्रालय, नई दिल्ली /  
Joint Secretary (Trans), Ministry of Power, New Delhi

## File No.CEA-PS-12-13/3/2019-PSPA-II Division

I/24302/2022

**List of Addresses:**

1.	Chairperson, Central Electricity Authority Sewa Bhawan, R.K. Puram, New Delhi – 110 066.	2.	Member (Power System), Central Electricity Authority Sewa Bhawan, R.K. Puram, New Delhi – 110 066.
3.	Member (Economic & Commercial), Central Electricity Authority Sewa Bhawan, R.K. Puram, New Delhi – 110 066.	4.	Director (Trans), Ministry of Power Shram Shakti Bhawan, New Delhi-110001.
5.	Sh. Dilip Nigam, Scientist 'G', MNRE, Block no. 14, CGO Complex, Lodhi Road, New Delhi – 110003	6.	Chief Operating Officer, CTUIL, Saudamini, Plot No. 2, Sector-29, Gurgaon – 122 001.
7.	Sh. Rajnath Ram, Adviser (Energy), NITI Aayog, Parliament Street, New Delhi – 110 001.	8.	CMD, POSOCO, B-9, Qutub, Institutional Area, Katwaria Sarai, New Delhi – 110010
9.	Dr. Radheshyam Saha, Ex. Chief Engineer, Central Electricity Authority		

## Index

1	Confirmation of the minutes of the 8 <sup>th</sup> meeting of National Committee on Transmission.....	2
2	Change in Scope of Under Bidding Schemes.....	2
3	Status of the transmission schemes noted/approved/recommended to MoP in the meetings of NCT:.....	5
4	New Transmission Schemes submitted by CTUIL for consideration of 9 <sup>th</sup> NCT: .....	8
5	Schemes referred from previous NCT:.....	23
6	Supply and Installation of OPGW on existing main lines which are to be LILoed under various transmission schemes. ....	37
7	Evaluation of functioning of National Grid. ....	37
8	Comprehensive presentation by CTU apprising NCT of measures taken for ensuring development of an efficient, co-ordinated and economical ISTS for smooth flow of electricity. ....	38
9	Five-year rolling plan for ISTS capacity addition. ....	38
	Summary of the deliberations of the 09th NCT meeting held on 28.09.2022. ....	39

**Minutes of the 9<sup>th</sup> meeting of National Committee on Transmission (NCT) held on 28.09.2022**

List of participants is attached as **Annex-I**.

Chairperson, CEA, & Chairman, NCT, welcomed the participants and suggested that the meetings of NCT should be held more frequently, preferably every month. Thereafter, he requested Member Secretary, NCT, to take up the agenda points for discussion.

**1 Confirmation of the minutes of the 8<sup>th</sup> meeting of National Committee on Transmission.**

- 1.1 Member Secretary, NCT, stated that the minutes of the 8<sup>th</sup> meeting of NCT held on 25.03.2022 was issued vide CEA letter no CEA-PS-11-15(11)/1/20-PSPA-I dated 05.05.2022. Further, corrigendum to the minutes was issued vide CEA letter no.CEA-PS-11-15(11)/1/2020-PSPA-I Division/258 dated 13.06.2022.
- 1.2 The minutes of 8<sup>th</sup> meeting of NCT along with the corrigendum dated 13.06.2022 were confirmed.

**2 Change in Scope of Under Bidding Schemes**

**2.1 Transmission scheme for Solar Energy Zone in Gadag (1500 MW), Karnataka: Part A Phase-II**

- 2.1.1 Member Secretary, NCT, stated that in the revised scope of works for “Transmission scheme for Solar Energy Zone in Gadag (1500MW), Karnataka: Part A Phase-II” (approved in the 8<sup>th</sup> meeting of NCT held on 25.03.2022), provision for bus sectionalizer at 220 kV level was not included in the scope of works. However, during the preparation of RfP document for the scheme, it was observed that provision for total 12 no of bays at 220 kV level (present as well as future) had been approved at Gadag Pooling station (Phase I & Phase II). As per CEA Manual on Transmission Planning Criteria, there can be a maximum of eight (8) feeders in one section at 220 kV level. Keeping in view that 4 no of 220 kV bays are already under implementation under Gadag Phase-I scheme, it was necessary to incorporate the provision of bus sectionaliser at 220 kV level in the RfP document of Gadag Phase-II scheme
- 2.1.2 In line with the same, CTU vide letter no. C/CTU/S/03/NCT dated 15.06.2022 had requested for inclusion of 220 kV bus sectionalizer bay along with associated Bus Coupler (BC) & Transfer Bus Coupler (TBC) bays at Gadag PS in the scope of works for Transmission scheme for Solar Energy Zone in Gadag (1500MW), Karnataka: Part A Phase-II.

2.1.3 As the scheme was already under bidding, following revised scope of works was communicated to the BPC:

Sl. No.	Scope of the Transmission Scheme	Capacity / line length km
1.	400/220 kV, 3x500 MVA ICT Augmentation at Gadag Pooling Station	400/220 kV, 500 MVA ICT – 3 400 kV ICT bays – 3 220 kV ICT bays – 3 220 kV line bays – 4 <b>220kV sectionalization bay: 1 set</b> <b>220kV Bus Coupler (BC) bay: 1</b> <b>220kV Transfer Bus Coupler (TBC) bay - 1</b>
2.	Gadag PS-Koppal PS 400 kV (high capacity equivalent to quad moose) D/c line	Length – 60
3.	400 kV line bays at Gadag PS and Koppal PS for Gadag PS-Koppal PS 400 kV D/c line	Line bays – 4 (2 each at Gadag PS & Koppal PS)

2.1.4 Members noted the above revised scope of Transmission scheme for Solar Energy Zone in Gadag (1500MW), Karnataka: Part A Phase-II. Chairperson, CEA, opined that the transmission schemes must be formulated with utmost care and modifications at later stage must be avoided.

## 2.2 Modification in the “Transmission system for evacuation of power from REZ in Rajasthan (20GW) Phase –III”

2.2.1 Various transmission schemes viz. ‘Transmission system for evacuation of power from REZ in Rajasthan (20GW) Phase –III’ were approved in the 5<sup>th</sup> NCT meeting held on 25.08.2021 and 02.09.2021. The same was notified by MoP for implementation vide Gazette notification dated 06.12.2021. The transmission schemes are presently under bidding. In regard to the above approved schemes, CTUIL vide mail dated 08.09.2022 has intimated some modifications in the following packages on account of increase in line length and addition in future provisions:

Sl. No.	Scheme	Scope	As approved in 5 <sup>th</sup> NCT	Modification/ Additional provision
1.	Transmission system for evacuation of power from REZ in Rajasthan (20GW) under Phase-III Part A3	Fatehgarh-III PS - Bhadla-III PS 400kV D/c line (Quad)	<ul style="list-style-type: none"> <li>• 400 kV, 50 MVAR Switchable line reactor – 4 nos.</li> <li>• Switching equipment for 400 kV 50 MVAR switchable line reactor – 4 nos.</li> </ul>	<ul style="list-style-type: none"> <li>• 400 kV, 63 MVAR Switchable line reactor – 4 nos.</li> <li>• Switching equipment for 400 kV 63 MVAR switchable line reactor – 4 nos.</li> </ul>

Sl. No.	Scheme	Scope	As approved in 5 <sup>th</sup> NCT	Modification/ Additional provision
2.	Transmission system for evacuation of power from REZ in Rajasthan (20GW) under Phase-III Part B1	Fatehgarh-II PS – Bhadla-III PS 400kV D/c line (Quad)	<ul style="list-style-type: none"> <li>• 400 kV, 50 MVAR Switchable line reactor – 4 nos.</li> <li>• Switching equipment for 400 kV 50 MVAR switchable line reactor – 4 nos.</li> </ul>	<ul style="list-style-type: none"> <li>• 400 kV, 63 MVAR Switchable line reactor – 4 nos.</li> <li>• Switching equipment for 400 kV 63 MVAR switchable line reactor – 4 nos.</li> </ul>
3.	Transmission system for evacuation of power from REZ in Rajasthan (20GW) under Phase-III Part C1	Establishment of 2x1500 MVA/765/400kV & 2x500 MVA 400/220 kV pooling station at Ramgarh along with 2x240 MVAR (765kV) Bus Reactor & 2x125 MVAR (420kV) Bus reactor	--	<i>Future provision to be included:</i> Space provision for STATCOM ( $\pm$ 2x300MVAR, 4x125 MVAR MSC, 2x125 MVAR MSR) at Ramgarh S/s

2.2.2 CTU informed that in the survey report shared by BPC, with the identified Bhadla-III PS location, there is significant increase in the length of Fatehgarh-III PS - Bhadla-III PS 400 kV D/c line and Fatehgarh-II PS - Bhadla-III PS 400 kV D/c line from the tentative length approved in the 5th NCT meeting (i.e. 200 km to around 274 km and 243 km respectively). Therefore, the line reactive compensation agreed with the earlier line lengths also need to be revised. Further, as part of Rajasthan Phase-III schemes, establishment of Ramgarh S/s was approved under Phase-III Part C1 package in the 5<sup>th</sup> NCT. However, future space provision for STATCOM ( $\pm$  2x300 MVAR, 4x125 MVAR MSC, 2x125 MVAR MSR) at Ramgarh S/s was inadvertently missed in the above package. Since the Package Phase-III Part C1 is under bidding, the same can be included in the future provision under Scope of works of Ramgarh S/s.

2.2.3 Dr. R. Saha, Expert Member NCT, raised the apprehension regarding very less improvement in voltage profile with upgradation of capacity of Switchable Line Reactors (SLR) from 50MVAR to 63MVAR. He stated that for substantial improvement in voltage profile, upgrading the capacity of SLR to 125 MVAR may be considered.

2.2.4 Representative of CTUIL stated that 63 MVAR is the optimum capacity chosen for upgradation as any rating above 80 MVAR would result in overcompensation of the transmission line. He further stated that modifications/additional provisions proposed in the above table have been

intimated to BPCs for incorporation in the RfP document of the respective transmission schemes.

2.2.5 Chairperson, CEA, and Chairman, NCT, stated that any change in the scope of already notified schemes must be ratified by NCT.

2.2.6 NCT noted the modifications in the scope of works of Transmission system for evacuation of power from REZ in Rajasthan (20 GW) Phase –III.

### 3 Status of the transmission schemes noted/approved/recommended to MoP in the meetings of NCT:

3.1 Member Secretary, NCT, presented the status of the transmission schemes noted/approved/recommended in the 8<sup>th</sup> meeting of NCT. The Updated status is given below:

Sr. No	Name of the Transmission Scheme	Noted/ Recommended/ Approved	Survey Agency	MoP approval	BPC	Status
1.	Inter-regional ER-WR Interconnection	Approved for implementation through TBCB	RECPDCL	Not required	RECPDCL	RFP initiated on 21.09.2022. Bid deadline 23.11.2022.
2.	Western Region Expansion Scheme-XXV (WRES-XXV)	Approved for implementation through RTM	Not applicable	Not required	CTUIL	
3.	Western Region Expansion Scheme-XXVII (WRES-XXVII)	Approved for implementation through TBCB	PFCCCL	Not required	PFCCCL	Issuance of RFP Notification and documents is at approval stage.
4.	Western Region Expansion Scheme-XXVIII (WRES-XXVIII)	Approved for implementation through TBCB	PFCCCL	Not required	PFCCCL	RFP initiated on 20.09.2022.  Bid deadline 21.11.2022.
5.	Western Region Expansion Scheme-XXIX (WRES-XXIX)	Approved for implementation through TBCB	PFCCCL	Not required	PFCCCL	RFP initiated on 20.09.2022.  Bid deadline 21.11.2022.
6.	Transmission system for evacuation of power from Luhri Stage-I HEP	Approved for implementation through TBCB	CTUIL	Not required	RECPDCL	RFP initiated on 06.09.2022. Bid deadline 09.11.2022
7.	Transmission system for evacuation of power from Kaza Solar Power Project (880 MW)	Recommended to MoP for Implementation through TBCB	PFCCCL	MoP approval awaited		Discussed below at para 3.2.
8.	ISTS Network Expansion scheme in Western Region & Southern Region for export of surplus power	Recommended to MoP for Implementation through TBCB	RECPDCL	Approved and notified vide Gazette		RfP initiated on 25.07.2022. Bid deadline 10.11.2022.

Sr. No	Name of the Transmission Scheme	Noted/ Recommended/ Approved	Survey Agency	MoP approval	BPC	Status
	during high RE scenario in Southern Region			Notification dated 13.06.2022		

3.2 Regarding transmission system for evacuation of power from Kaza Solar Power Project (880 MW), Director, MoP, stated that SJVN had informed them about land identification issues and involvement of forest land for which relaxation is being sought.

CTUIL stated that NRPC has agreed for phasing of approved transmission system for Kaza solar project.

After discussions, NCT decided that the Transmission system for evacuation of power from Kaza Solar Power Project (880 MW) would be taken up once firm commitment about timeline of commissioning of Kaza solar park is received from SJVNL.

3.3 Chairperson, CEA, enquired about the reasons for delay in the issuance of RfP documents by the BPC. It was informed that after issuance of minutes of NCT, CTUIL (for schemes involving augmentation of existing ISTS substation) obtains requisite information/inputs like sub-station layout, upstream/downstream elements etc. from the existing sub-station owner. CTUIL then prepares the project specific Technical Requirements for substations, transmission lines and communication system etc. to be incorporated in the RfP document of the scheme. After CEA vets the inputs furnished by CTUIL, BPC issues the RfP. In case intra-state sub-stations are involved, requisite information is obtained by BPC. Sometimes delay in issuance of RfP is due to delay in information provided by the existing substation owner.

3.4 Chairperson, CEA, directed Member Secretary, NCT, to take up the standardization of the procedure, formats and timelines for preparation of project specific technical inputs for RfP in consultation with BPCs and CTUIL in order to minimize the duration between approval of schemes by NCT and issuance of RfP by BPC.

3.5 CTUIL stated that the issue pertaining to the implementation timelines of the TBCB projects also needs deliberation as time and again requests are received from Industry Associations for increasing the implementation timeframe. While the preliminary information regarding any wild life/protected area along the planned transmission line route is provided by CTUIL in the agenda of NCT, however, possibility of some uncertainties like avoiding prioritized zone of the GIB potential area for Rajasthan Phase-III schemes, land acquisition and RoW issues, difficult terrain etc. in case of RE linked schemes results in change in scope and increase in estimated timelines and cost of the transmission scheme. Keeping in view short gestation period of RE generation projects,

implementation timeframe for RE linked transmission schemes had been agreed to be kept as 18 months. However, considering the recent cases of time overrun, a holistic view with respect to the implementation timeframe needs to be taken.

- 3.6 Member Secretary, NCT, suggested the deployment of features offered in PM-GatiShakti portal for tentative routing of planned transmission lines through forest, GIB areas, railway crossings etc. to work out the tentative route and length of the transmission line. This will in turn help to work out the project completion schedule and estimated cost. He further stated that as per MoP OM dated 01<sup>st</sup> July, 2022, assuming the role of CTUIL as BPC, under Pre-bidding activities of TBCB projects, CTUIL required to comply with the following:
- CTU shall diligently carry out the route survey of approved ISTS schemes, so that the routes are realistic and can be used by successful bidders without much deviation.
  - The cost assessment for the approved ISTS shall be done accurately, so that the estimated cost closely represents the cost of developing the ISTS. For this, the cost data to be continuously compiled for various completed or awarded projects.
  - CTU will initiate land acquisition for the proposed substation and initiate process for other clearances including Railway/highway crossings etc.
- 3.7 NCT agreed that a realistic, scheme-wise implementation timeframe is required for the planned ISTS schemes. A realistic implementation timeframe would provide the clarity to the RE generators so that they can incorporate flexibility in the implementation timeframe of their generation projects to match the SCoD of the evacuation schemes.
- 3.8 Chairperson asked CEA and CTUIL to formulate norms for assessing realistic timeline for completion of transmission projects considering the terrain and other factors.
- 3.9 Regarding the issue of how to proceed with the bid submission of the Rajasthan Phase-III projects falling in GIB areas with uncertainty in implementation timeframe, MNRE stated that they have granted 30-day extension on SCoD to RE generation projects, after the date of judgement by the Supreme Court. Possibility of similar provision for associated ISTS schemes can be explored. Chairperson, CEA, stated that the matter is under deliberation in MoP and would soon be resolved.
- 3.10 CTUIL also informed that the RE generation developers while seeking connectivity, ask for a tentative location of the pooling station. Finalizing the location of the pooling station based on the location of the first few connectivity applicants would result in sub-optimal location of pooling station. Accordingly, CTUIL requested MNRE to take up the matter with SECI so that SECI, while identifying RE potential areas, may also indicate the tentative location of the

pooling station and the same could be made available to generation project developers seeking connectivity to the grid.

3.11 MNRE stated that SECI would be able to provide broad coordinates for the RE potential areas, however, providing coordinates of the pooling station would not be possible.

3.12 Chairperson, CEA, advised CTUIL to separately take up the issue of identification of the location of pooling stations in coordination with SECI and MNRE.

#### 4 New Transmission Schemes submitted by CTUIL for consideration of 9<sup>th</sup> NCT:

##### 4.1 Augmentation of ISTS for interconnection of HVPNL transmission schemes:

4.1.1 The scheme comprises inter-state transmission system involving inter-connections with intra-state transmission scheme of HVPNL. The scheme involves 400/220 kV ICT Augmentation at 400/220 kV Bahadurgarh (PG) S/s and 400/220 kV Jind S/s to ensure 'N-1' compliance with proposed downstream network at 220 kV level.

4.1.2 Further, the scheme also comprises of provision of 220 kV line bays at the following S/s:

- (i) 4 nos. of 220kV line bays at Bahadurgarh (PG) for interconnection to 220 kV Kharkhoda pocket B (HVPN) and 220 kV METL (HVPN) S/s.
- (ii) 2 nos. of 220 kV line bays at Sonapat (PG) for interconnection to 220kV Kharkhoda pocket A (HVPN) S/s.

4.1.3 The estimated cost of scheme is about Rs. 117 Crs. As the estimated cost of the scheme lies between Rs 100 to 500 Crore and works are of the nature of technical upgradation (clause 7.1(7) of Tariff Policy, 2016), NCT approved the scheme for implementation through RTM mode.

Sl. No.	Name of the scheme/est. cost	Decision of NCT	Purpose /Justification
1.	Augmentation of ISTS for interconnection of HVPNL transmission schemes  Est. Cost: Rs. 117.05 Crs.  Implementation timeframe: Given in detailed scope.	• Approved for implementation through RTM mode - to be given to POWERGRID (as these substations are owned by POWERGRID)	To provide 'N-1' compliant system as well as 220kV line bays for interconnection with HVPNL transmission schemes at various ISTS substations.

4.1.4 Detailed scope of the scheme alongwith implementation timeline is given below:

**Augmentation of ISTS for interconnection of HVPNL transmission schemes**

- i. Augmentation by 1x500 MVA, 400/220 kV ICT (3<sup>rd</sup>) at 400/220 kV Bahadurgarh (PG) S/s -**July, 24**
  - 400/220 kV, 500 MVA ICT – 1 no.
  - 400 kV ICT bay – 1 no.
  - 220 kV ICT bay – 1 no.
- ii. 2 nos of 220 kV line bays at 400/220 kV Bahadurgarh (PG) S/s (for 220 kV Kharkhoda pocket B- Bahadurgarh (PG) D/c line) – **July, 24**
  - 220 kV line bays – 2 nos.
- iii. 2 nos of 220 kV line bays at 400/220 kV Bahadurgarh (PG) S/s (for 220 kV METL – Bahadurgarh (PG) D/c line) – **March, 24**
  - 220 kV line bays – 2 nos.
- iv. Augmentation by 1x500 MVA, 400/220 kV ICT (3<sup>rd</sup>) at 400/220 kV Jind (PG) S/s – **February, 24**
  - 400/220 kV, 500 MVA ICT – 1 no.
  - 400 kV ICT bay – 1 no.
  - 220 kV ICT bay – 1 no.
- v. 2 nos of 220 kV line bays at 400/220 kV Sonapat (PG) S/s (for 220 kV D/c line from Kharkhoda pocket A) - **July, 24**
  - 220 kV line bays – 2 nos.

**4.2 Scheme to relieve high loading of WR-NR Inter Regional Corridor (400 kV Bhinmal-Zerda line):**

4.2.1 CTU had proposed following scheme as immediate requirement (Phase-I: short term) to relieve high loading of WR-NR Inter Regional Corridor (400 kV Bhinmal-Zerda line) (tentative cost Rs. 279.5 Cr):

- Bypassing of 400 kV Kankroli - Bhinmal-Zerda line at Bhinmal to form 400 kV Kankroli – Zerda (direct) line *(with necessary arrangement for bypassing Kankroli- Zerda line at Bhinmal with suitable switching equipment inside the Bhinmal substation)*
- Reconductoring of 400 kV Jodhpur (Surpura)(RVPN) – Kankroli S/c line with twin HTLS conductor *[with minimum capacity of 1940 MVA/ckt at nominal voltage (line length is about 188 km); Upgradation of existing 400kV bay equipment's each at Jodhpur (Surpura)(RVPN) and Kankroli S/s (3150 A)]*

CTUIL stated that initially the reconductoring was proposed with capacity of 2100MVA/ckt, however, POWERGRID informed them that the recent experience of re-conductoring of various old lines based on HTLS conductor design principles for 400KV Lines designed with ACSR Moose conductor for 85 Deg C, ampacity of around 1400A may be possible with GAP & Composite Core type HTLS Conductor. For higher ampacity corresponding to 2100MVA

capacity, GAP type HTLS Conductor may not be suitable and Composite Core type HTLS conductor may be the only option. It was also mentioned that the Composite Core type HTLS conductors is very costly (around 3 times to that of equivalent ACSR), whereas, GAP is economical (around 1.5 times to that of equivalent ACSR). With ampacity requirement of 1400A, possibility of GAP & Composite core type HTLS conductor may facilitate larger vendor base leading to better competition & fair price discovery. In case of higher ampacity, limited vendors of Composite core conductor may lead to reduced competition. With 1400 Ampacity, 400kV line can be designed for about 1940 MVA.

CTU also mentioned that in the studies, line loading at 400 kV Jodhpur (Surpura) (RVPN) – Kankroli S/c (twin moose) line was about 1250 MW in Feb solar max scenario under worst case contingency. As the envisaged power flow is less than 1940MVA, the reconductoring is proposed with HTLS Conductor (Gap/Composite core) with 1400 Amps(~1940MVA).

4.2.2 Further, CTUIL proposed that on 400 kV Jodhpur (Surpura) – Kankroli line, existing earth wire to be replaced with OPGW and associated FOTE need to be replaced alongwith the reconductoring work of 400kV Jodhpur (Surpura) - Kankroli line (tentative cost Rs. 9.4 Cr).

4.2.3 Further, it was opined that the scheme is an integral part of transmission scheme for evacuation of power for various upcoming RE developers in Western Rajasthan and required urgently. In view of that Bypassing of 400 kV Kankroli - Bhinmal-Zerda lines at Bhinmal may be implemented in shorter time i.e. 12 months and implementation time of reconductoring of 400kV Jodhpur (Surpura) – Kankroli line may be kept as 18 months, however, best effort can be made for reconductoring by 15 months due to urgent requirement. Members agreed on the same.

4.2.4 As the estimated cost of the scheme lies between Rs 100 to 500 Crore and works are of the nature of technical upgradation, NCT approved the scheme for implementation through RTM mode.

S.No.	Name of the scheme/est. cost	Decision of NCT	Purpose /Justification
1.	Scheme to relieve high loading of WR-NR Inter Regional Corridor (400 kV Bhinmal-Zerda line)  Est. Cost: Rs. 288.9 Crs (includes Rs 9.4 Crs for OPGW and associated FOTE)	• Approved for implementation through RTM mode- to be given to POWERGRID (as the transmission lines/bays are	To relieve overloading of Bhinmal-Zerda line under various operating conditions.

	<p>Implementation timeframe: 12 months for bypassing at Bhinmal and 18 months for reconductoring works* from date of allocation.</p> <p><i>*Best effort to be made for reconductoring in 15 months.</i></p>	<p>owned by POWERGRID)</p>	
--	---	--------------------------------	--

#### 4.2.5 Detailed scope of the scheme:

##### **Scheme to relieve high loading of WR-NR Inter Regional Corridor (400 kV Bhinmal-Zerda line)**

- i. Bypassing of 400 kV Kankroli - Bhinmal-Zerda line at Bhinmal to form 400 kV Kankroli – Zerda (direct) line<sup>#</sup> - 12 months from date of allocation
- ii. Reconductoring of 400 kV Jodhpur (Surpura)(RVPN) – Kankroli S/c (twin moose) line with twin HTLS conductor\*- 18 months\*\* from date of allocation
- iii. OPGW installation on 400 kV Jodhpur (Surpura)(RVPN) – Kankroli S/c (twin moose) line -188 km

*# with necessary arrangement for bypassing Kankroli- Zerda line at Bhinmal with suitable switching equipment inside the Bhinmal substation*

*\*with minimum capacity of 1940MVA/ckt at nominal voltage; Upgradation of existing 400kV bay equipment's each at Jodhpur (Surpura)(RVPN) and Kankroli S/s(3150 A)*

*\*\*Best effort to be made for reconductoring in 15 months from date of allocation*

#### 4.3 **Eastern Region Expansion Scheme-XXIX (ERES-XXIX)**

- 4.3.1 CTUIL stated that as per inputs from Odisha, large number of industries are expected in and around Joda area with cumulative demand of about 480 MW which cannot be catered with the existing 220 kV network in the area. Accordingly, OPTCL will be implementing 400/220 kV Joda new substation under intra-state scheme through LILO of existing Rourkela (POWERGRID) – Talcher (NTPC) 400kV D/c ISTS line at Joda New S/s. With the integration of Joda New 400/220 kV substation with ISTS, most of the power flows to Joda New through Jharsuguda – Rourkela – Joda New 400 kV corridor. Further, Rourkela substation also acts as a source of power to Jharkhand through Rourkela – Chaibasa and Rourkela – Ranchi 400kV D/c lines. Accordingly, it has been agreed in the 7<sup>th</sup> CMETS-ER meeting held on 31.05.2022 to reconductor Jharsuguda – Rourkela 400 kV 2xD/c lines with HTLS conductor in similar timeframe of establishment of Joda New 400/220kV substation i.e. in 36 months.

Further, Circuit I & III of Rourkela-Jharsuguda 400kV D/c line are designed for 75°C max. conductor temperature and Circuit II & IV are designed for 85°C max. conductor temperature with ampacity of 1228 Amperes & 1400 Amperes

(per conductor) respectively. However, to have equitable rating for all circuits, it was proposed in the meeting that all four circuits of Rourkela-Jharsuguda may be reconducted with HTLS conductor of 1228 A rating

- 4.3.2 Dr. R. Saha, Expert Member, stated that different ampacity values at the same voltage level have been mentioned in the agenda items pertaining to reconducting, which needs to be standardized. He also suggested that the details about the ambient temperature in case of reconducting works needs to be clearly mentioned in the agenda item.
- 4.3.3 CTUIL clarified that in this particular instance, ampacity of 1228A with ambient temperature of 75°C have been considered as these lines have to be reconducted on the existing towers. In the new towers, ampacity of 1400A with ambient temperature of 85°C can be achieved. However, to avoid differential loading of the circuits, 1228A ampacity with ambient temperature of 75°C had been considered.
- 4.3.4 As the estimated cost of the scheme lies between Rs 100 to 500 Crore, and works are of the nature of technical upgradation (clause 7.1(7) of Tariff Policy, 2016), accordingly NCT approved the scheme for implementation through RTM mode.

S.No.	Name of the scheme/est. cost	Decision of NCT	Purpose /Justification
1.	Eastern Region Expansion Scheme-XXIX (ERES-XXIX)  Est. Cost: Rs. 422.23 Crs  Implementation timeframe: 36 months from date of allocation.	• Approved for implementation through RTM mode- to be given to POWERGRID (as these substations and transmission lines are owned by POWERGRID)	To provide power supply to Joda and improve power supply in adjoining areas of Odisha and Jharkhand.

4.3.5 Detailed scope of the scheme is as given below:

- Reconducting of Jharsuguda/Sundargarh (PG) – Rourkela (PG) 400kV 2xD/c Twin Moose line with Twin HTLS conductor (with ampacity of equivalent to single HTLS as 1228 A at nominal voltage).
- Bay upgradation at Rourkela (PG) end for 3150 A rating – 04 nos. diameters in one and half breaker scheme (except 09 nos. existing circuit breakers which are of minimum 3150 A rating).

**Note:** No upgradation in line bays is envisaged at Jharsuguda/Sundargarh (POWERGRID) S/s as the existing line bays are rated for 3150 A.

#### 4.4 Augmentation of transformation capacity at Kallam PS by 2x500 MVA, 400/220kV ICTs (3<sup>rd</sup> & 4<sup>th</sup>) along with 220 kV bays for RE interconnection

4.4.1 CTUIL stated that Kallam PS with transformation capacity of 2x500MVA is under implementation by consortium of IndiGrid 1 Ltd. (Lead Member) and IndiGrid 2 Ltd., with target commissioning of June, 2023. Stage-II connectivity at Kallam PS has already crossed 1 GW (~1782.6 MW). Further, 3 nos. 220kV line bays are proposed for following RE projects which have been granted/proposed to be granted Stage-II connectivity at Kallam PS:

- M/s Veh Aarush (201MW: Granted)
- M/s JSW Neo (300MW: Under Process)
- M/s Serentica Renewables (210MW: Under Process)

4.4.2 In the 9<sup>th</sup> CMETS-WR meeting, it was agreed that augmentation of transformation capacity at Kallam PS may be taken up considering the 1 GW additional potential at Kallam (under 181.5 GW RE Zones) as well as rapid pace of Stage-II connectivity applications being received by CTUIL at Kallam PS. Accordingly, CTUIL had proposed 'Augmentation of transformation capacity at Kallam PS by 2x500MVA, 400/220kV ICTs (3<sup>rd</sup> & 4<sup>th</sup>) along with 220 kV bays for RE interconnection with estimated cost of Rs. 156.89 Crs.

4.4.3 CMD, POSOCO, stated that even after augmentation of ICTs at Kallam by 2x500 MVA, 400/22kV ICTs, Kallam substation will not fulfill 'N-1' criteria.

4.4.4 CTUIL stated that there is provision of space for only 02 nos. additional ICTs. As such, additional augmentation is not proposed. He further stated that at present Stage-II connectivity applications totaling around 1782.6 MW have been received.

4.4.5 It was deliberated that as there is only wind generation, taking a peak factor of 0.75, generation of around 1340MW needs to be evacuated and hence the system would remain 'N-1' compliant with 4x500 MVA ICTs. Nevertheless, CTU may also take up with the TSP of Kallam PS for exploring space for 5<sup>th</sup> 400/220 kV ICT at Kallam PS.

4.4.6 As the estimated cost of the scheme lies between Rs 100 to 500 Crore, and works are of the nature of technical upgradation (clause 7.1(7) of Tariff Policy, 2016), NCT approved the scheme for implementation through RTM mode.

S.No.	Name of the scheme/est. cost	Decision of NCT	Purpose /Justification
1.	Augmentation of transformation capacity at Kallam PS by 2x500MVA, 400/220 kV ICTs (3 <sup>rd</sup> & 4 <sup>th</sup> )	• Approved for implementation through RTM mode- to be	Stage-II connectivity at Kallam PS has already crossed 1 GW (~1782.6 MW). Hence, scheme for

along with 220 kV bays for RE interconnection  Est. Cost: Rs. 156.89 Crs  Implementation timeframe: 18 months from date of allocation.	given to consortium of IndiGrid 1 Ltd. (Lead Member) and IndiGrid 2 Ltd. (as the substation is owned by the above consortium)	augmentation of Kallam PS was agreed to be taken up considering the 1 GW additional potential under 181.5 GW as well as rapid pace of Stage-II connectivity applications being received by CTU.
--	---	---

4.4.7 Detailed scope of the scheme is given below:

Sl. No.	Scope of the Transmission Scheme	Capacity /km
1.	Augmentation of Kallam Pooling Station by 2x500 MVA, 400/220 kV ICTs	500 MVA, 400/220kV ICT: 2 nos. 400 kV ICT bays: 2 nos. 220 kV ICT bays: 2 nos.
2.	3 nos. 220 kV line bays for RE interconnection	220 kV line bays: 3 nos.
3.	1x125 MVA bus reactor (2 <sup>nd</sup> ) at Kallam PS	125 MVA, 420 kV Bus reactor – 1 no. Bus reactor bay: 1 no.

#### 4.5 **Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex)**

4.5.1 CTU stated that out of additional RE capacity of 181.5 GW planned by the year 2030, 75 GW REZs lie in the state of Rajasthan comprising of 15 GW Wind and 60 GW Solar potential. Accordingly, a comprehensive transmission scheme was evolved for evacuation of 75 GW RE from Rajasthan, which includes transmission scheme for about 8GW (Solar) in Bikaner complex (14GW along with 6GW BESS), Bikaner-II: 4 GW (7GW Solar+ 3 GW BESS) and Bikaner-III:4 GW (7GW Solar+ 3 GW BESS). Bikaner complex being out of GIB area, more RE developers are interested in this complex.

CTU also stated that at Bikaner-II PS, St-II Connectivity for 5.575 GW RE has already been granted against the potential of 1.9 GW (revised from 2.9 GW) identified under Ph-II), therefore, evacuation for additional 3.7 GW capacity is required from Bikaner-II PS. For additional solar potential of 7GW with 3GW BESS at Bikaner-III, evacuation system (4 GW) shall also be required. Therefore, total evacuation system requirement for 7.7GW (3.7 GW+4 GW) shall be required from Bikaner Complex (Bikaner-II & III).

4.5.2 Considering grant of connectivity to new RE generators in Bikaner complex (incl. Bikaner-III) as well as for evacuation of power beyond Bikaner complex (Bikaner/Bikaner-II/Bikaner-III PS), following transmission scheme had been

agreed for evacuation of power from Rajasthan REZ Ph-IV (Part-1) [Bikaner complex: 7.7 GW] in the 8<sup>th</sup> CMETS-NR meeting.

Items	Details
Name of Scheme	Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex: 7.7GW) (Bikaner-II: 3.7GW (Solar) + Bikaner-III: 4 GW (7GW Solar+3GW BESS))
Scope of the scheme	<ul style="list-style-type: none"> <li>• Establishment of 6x1500 MVA, 765/400kV &amp; 5x500 MVA<sup>^</sup> 400/220kV Bikaner-III Pooling Station along with 2x330 MVA<sub>r</sub> (765kV) Bus Reactor &amp; 2x125 MVA<sub>r</sub> (420kV) Bus Reactor at a suitable location near Bikaner <ul style="list-style-type: none"> <li>➤ 765/400kV 1500 MVA ICTs: 6 nos (19x500 MVA including one spare unit)</li> <li>➤ 765kV ICT bays - 6 nos. <ul style="list-style-type: none"> <li>➤ 400/220 kV, 500 MVA ICTs - 5nos</li> <li>➤ 400 kV ICT bays – 11 nos.</li> <li>➤ 400 kV line bays - 6 nos. (4 nos. for LILO of Bikaner-Bikaner-II D/c line &amp; 2 nos. for Bikaner-II D/c line)</li> <li>➤ 220 kV ICT bays - 5 nos.</li> <li>➤ 330 MVA<sub>r</sub> Bus Reactor-2 nos. (7x110 MVA<sub>r</sub>, including one spare unit)</li> <li>➤ 765kV reactor bays- 2 nos.</li> <li>➤ 125 MVA<sub>r</sub>, 420kV bus reactor - 2 nos.</li> <li>➤ 420 kV reactor bays - 2 nos.</li> <li>➤ 220 kV line bays – 6 nos* (for RE connectivity)</li> <li>➤ 220kV Sectionalization bay: 1 set</li> <li>➤ BC and TBC: 2 nos. (each)</li> </ul> </li> </ul> </li> </ul> <p><b><u>Future provisions at Bikaner-III PS*:</u></b></p> <p><b>Space for</b></p> <ul style="list-style-type: none"> <li>▪ 765/400kV ICT along with bay- 1 no.</li> <li>▪ 765 kV line bays along with switchable line reactors – 4 nos.</li> <li>▪ 765kV Bus Reactor along with bay: 1 no.</li> <li>▪ 400 kV line bays along with switchable line reactor –4 nos.</li> <li>▪ 400 kV line bays–4 nos.</li> <li>▪ 400/220kV ICT along with bays -5 nos.</li> <li>▪ 400 kV Bus Reactor along with bay: 1 no.</li> <li>▪ 400kV Sectionalisation bay: 2 sets</li> <li>▪ 220 kV line bays for connectivity of RE Applications - 6 nos.</li> <li>▪ 220kV Sectionalization bay: 2 sets</li> <li>▪ STATCOM (2x±300MVA<sub>r</sub>) along with MSC (4x125 MVA<sub>r</sub>) &amp; MSR (2x125 MVA<sub>r</sub>)</li> </ul> <ul style="list-style-type: none"> <li>• LILO of both ckts of 400kV Bikaner (PG)-Bikaner-II D/c line at Bikaner-III PS (~20 km)</li> <li>• Bikaner-II PS – Bikaner-III PS 400 kV D/c line (Quad) (~30 km) <ul style="list-style-type: none"> <li>➤ 400 kV line bays at Bikaner-II – 2 nos.</li> </ul> </li> </ul>

Items	Details
	<ul style="list-style-type: none"> <li>• Establishment of 765/400 kV, 4x1500 MVA Neemrana-II S/s along with 2x330 MVA (765kV) Bus Reactor &amp; 2x125 MVA (420kV) Bus Reactor at a suitable location near Neemrana <ul style="list-style-type: none"> <li>➤ 765/400kV 1500 MVA ICTs: 4 nos (13x500 MVA including one spare unit)</li> <li>➤ 765kV ICT bays - 4 nos.</li> <li>➤ 400 kV ICT bays – 4 nos.</li> <li>➤ 400 kV line bays - 6 nos (4 nos. for LILO of Gurgaon -Sohna Road D/c line &amp; 2 nos. for Kotputli D/c line)</li> <li>➤ 330 MVA Bus Reactor-2 nos. (7x110 MVA, including one spare unit)</li> <li>➤ 765kV reactor bays- 2 nos.</li> <li>➤ 125 MVA, 420kV bus reactor - 2 nos.</li> <li>➤ 420 kV reactor bays - 2 nos.</li> </ul> </li> </ul> <p><b><u>Future provisions at Neemrana-II S/s:</u></b></p> <p><b>Space for</b></p> <ul style="list-style-type: none"> <li>▪ 765/400kV ICT along with bays- 2 nos.</li> <li>▪ 765 kV line bays along with switchable line reactors – 6 nos.</li> <li>▪ 765kV Bus Reactor along with bay: 1 no.</li> <li>▪ 400 kV line bays along with switchable line reactor –6 nos.</li> <li>▪ 400 kV Bus Reactor along with bays: 1 no.</li> <li>▪ 400kV Sectionalization bay: 2 sets</li> </ul> <ul style="list-style-type: none"> <li>• LILO of both ckts of 400 kV Sohna Road (GPTL)-Gurgaon(PG) D/c line at Neemrana-II S/s (~85 km)</li> <li>• Neemrana-II -Kotputli 400 kV D/c line (Quad) (~70 km) <ul style="list-style-type: none"> <li>➤ 400 kV line bays at Kotputli- 2 nos.</li> </ul> </li> <li>• Bikaner-III – Neemrana-II 765 kV 2xD/c line (~350 km) along with 330 MVA switchable line reactor for each circuit at each end <ul style="list-style-type: none"> <li>➤ 765kV line bays at Bikaner-III PS – 4 nos</li> <li>➤ 765kV line bays at Neemrana-II – 4 nos.</li> <li>➤ 765 kV, 330 MVA Switchable line reactors at Bikaner-III PS – 4 nos.</li> <li>➤ 765 kV, 330 MVA Switchable line reactors at Neermana-II – 4 nos.</li> <li>➤ Switching equipment for 765kV 330 MVA switchable line reactors at Bikaner-III PS – 4 nos.</li> <li>➤ Switching equipment for 765kV 330 MVA switchable line reactors at Neemrana-II – 4 nos.</li> </ul> </li> <li>• Neemrana-II- Bareilly(PG) 765 kV D/c line (~350 km) along with 330 MVA switchable line reactor for each circuit at each end <ul style="list-style-type: none"> <li>➤ 765 kV line bays at Neemrana-II – 2 nos.</li> <li>➤ 765 kV line bays at Bareilly(PG) – 2 nos.</li> </ul> </li> </ul>

Items	Details
	<ul style="list-style-type: none"> <li>➤ 765 kV, 330 MVAr Switchable line reactors at Neemrana-II – 2 nos.</li> <li>➤ 765 kV, 330 MVAr Switchable line reactors at Bareilly(PG) – 2 nos.</li> <li>➤ Switching equipment for 765kV 330 MVAR switchable line reactors at Neemrana-II – 2 nos.</li> <li>➤ Switching equipment for 765kV 330 MVAR switchable line reactors at Bareilly(PG) – 2 nos.</li> <li>• Augmentation with 400/220 kV, 5x500 MVA<sup>^</sup> ICT at Bikaner-II PS along with associated bays <ul style="list-style-type: none"> <li>➤ 400/220 kV, 500 MVA ICTs – 5 nos</li> <li>➤ 400 kV ICT bays – 5 nos.</li> <li>➤ 220 kV ICT bays - 5 nos.</li> </ul> </li> <li>• Augmentation with 765/400 kV, 1x1500MVA ICT (4th) at Bikaner (PG) <ul style="list-style-type: none"> <li>➤ 765/400 kV, 1500 MVA ICT – 1 no.</li> <li>➤ 765 kV ICT bay – 1 no.</li> <li>➤ 400 kV ICT bay – 1 no.</li> </ul> </li> <li>• Augmentation by 400/220 kV, 1x500 MVA (3rd) ICT at Kotputli (PG) <ul style="list-style-type: none"> <li>➤ 400/220 kV, 500 MVA ICT – 1 no</li> <li>➤ 400 kV ICT bay – 1 no</li> <li>➤ 220 kV ICT bay - 1 no</li> </ul> </li> </ul> <p><b><sup>^</sup>incl 1x500MVA ICT to fulfill 'N-1' requirement</b></p> <p><i>* Recently, 220kV bays (3 nos. under ISTS scope+1 no. under developer scope) at Bikaner-III PS under ISTS were agreed in CMETS-NR meetings commensurate to Stage-II connectivity applications granted at Bikaner-III PS. Considering additional envisaged applications as well as agreed bays (3 nos) under ISTS, 220 kV line bays at Bikaner-III PS for RE Connectivity (6 nos.) is considered in the scheme. The corresponding no. of 220 kV bays may be considered reduced from future scope of Bikaner-III PS.</i></p>

4.5.3 CEA stated that as per the Manual on Transmission Planning Criteria, maximum transformation capacity at a substation at 765 kV level can be 9000MVA and 6x1500 MVA ICTs have been proposed, therefore, there is no need to keep space for one number of additional 765/400 kV ICT.

4.5.4 Since the estimated cost of the scheme is very high (Rs. 13,460 Cr.), to make the scheme competitive for bidders and considering ICT augmentation at later stage, various packages were proposed. During deliberations, NCT opined that the complete scope of the substation including the augmentation may be clubbed as a single package. Accordingly, some packages proposed in the agenda of NCT were combined. Package wise details are given below:

**PART-A: (Rs. 4,741 Cr.)**

Sl. No.	Scope of Transmission Scheme	Capacity /km
1	<p>Establishment of 6x1500 MVA (along with one spare unit of 500 MVA), 765/400 kV &amp; 5x500 MVA 400/220 kV Bikaner-III Pooling Station along with 2x330 MVA (765 kV) Bus Reactor (along with one spare unit of 110 MVA) &amp; 2x125 MVA (420 kV) Bus Reactor at a suitable location near Bikaner</p> <p><b>Future provisions: Space for</b></p> <ul style="list-style-type: none"> <li>• 765 kV line bays along with switchable line reactors – 6 nos.</li> <li>• 765kV Bus Reactor along with bay: 1 no.</li> <li>• 400 kV line bays along with switchable line reactor –4 nos.</li> <li>• 400 kV line bays–4 nos.</li> <li>• 400/220kV ICT along with bays -5 nos.</li> <li>• 400 kV Bus Reactor along with bay: 1 no.</li> <li>• 400kV Sectionalization bay: 2 sets</li> <li>• 220 kV line bays for connectivity of RE Applications -8 nos.</li> <li>• 220kV Sectionalization bay: 2 sets</li> <li>• STATCOM (2x±300MVA) along with MSC (4x125 MVA) &amp; MSR (2x125 MVA)</li> </ul>	<ul style="list-style-type: none"> <li>• 765/400 kV 1500 MVA ICTs: 6 nos (19x500 MVA including one spare unit)</li> <li>• 765 kV ICT bays – 6 nos.</li> <li>• 765 kV line bays- 2 nos.</li> <li>• 330 MVA Bus Reactor-2 nos. (7x110 MVA, including one spare unit)</li> <li>• 765kV reactor bays- 2 nos.</li> <li>• 400/220 kV, 500 MVA ICTs – 5 nos</li> <li>• 400 kV ICT bays – 11 nos.</li> <li>• 420 kV reactor bays - 2 nos.</li> <li>• 125 MVA, 420 kV bus reactor - 2 nos.</li> <li>• 400 kV line bays - 6 nos. (4 nos. for LILO of Bikaner-Bikaner-II D/c line &amp; 2 nos. for Bikaner-II D/c line)</li> <li>• 220 kV ICT bays - 5 nos.</li> <li>• 220 kV line bays – 6 nos (for RE connectivity)</li> <li>• 220 kV BC (2 no.) and 220 kV TBC (2 no.)</li> <li>• 220 kV Sectionalisation bay: 1 set</li> </ul>
2	LILO of both ckts of 400 kV Bikaner (PG)-Bikaner-II D/c line (Quad) at Bikaner-III PS	Length: 20 km
3	Bikaner-II PS – Bikaner-III PS 400 kV D/c line (Quad)	Length: 30 km
4	2 no. of 400 kV line bays at Bikaner-II	400 kV line bays - 2 nos.

Sl. No.	Scope of Transmission Scheme	Capacity /km
5	Bikaner-III - Neemrana-II 765 kV D/c line along with 330 MVAR switchable line reactor for each circuit at each end	Length: 350 km <ul style="list-style-type: none"> <li>• 765 kV, 330 MVAR switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• 765 kV, 330 MVAR Switchable line reactors at Neemrana-II S/s – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Neemrana-II S/s – 2 nos.</li> </ul>
6	2 no. of 765 kV line bays at Neemrana-II S/s	<ul style="list-style-type: none"> <li>• 765kV line bays at Neemrana-II S/s- 2 nos.</li> </ul>

**Note:**

- 1) The line lengths mentioned above are approximate as the exact length shall be obtained after the detailed survey
- 2) POWERGRID to provide space for 2 nos. of 400 kV line bays at Bikaner-II PS
- 3) Developer of Neemrana-II S/s to provide space for 2 nos. of 765 kV line bays at Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line
- 4) Provision of suitable sectionalization shall be kept at Bikaner-III PS at 400kV & 220kV level to limit short circuit level

**PART-B: (Rs. 1,876 Cr.)**

Sl. No.	Scope of Transmission Scheme	Capacity /km
1	Establishment of 765/400 kV, 4x1500 MVA (along with one spare unit of 500 MVA) Neemrana-II S/s along with 2x330 MVAR (765 kV) Bus Reactor (along with one spare unit of 110 MVAR) & 2x125 MVAR (420kV) Bus Reactor at a suitable location near Neemrana  <b>Future provisions: Space for</b> <ul style="list-style-type: none"> <li>• 765/400kV ICT along with bays- 2</li> <li>• 765 kV line bays along with switchable line reactors – 12</li> <li>• 765 kV Bus Reactor along with bay: 1 nos.</li> </ul>	<ul style="list-style-type: none"> <li>• 765/400 kV 1500 MVA ICTs – 4 nos (13x500 MVA including one spare unit)</li> <li>• 330 MVAR Bus Reactor-2 nos (7x110 MVAR, including one spare unit)</li> <li>• 765 kV reactor bays- 2 nos.</li> <li>• 125 MVAR, 420kV bus reactor - 2 nos.</li> <li>• 420 kV reactor bays - 2 nos.</li> <li>• 765 kV ICT bays – 4 nos.</li> <li>• 400 kV ICT bays – 4 nos.</li> <li>• 400 kV line bays - 6 nos (4 nos. for LILO of Gurgaon -Sohna Road D/c line &amp; 2 nos. for Kotputli D/c line)</li> </ul>

	<ul style="list-style-type: none"> <li>• 400 kV line bays along with switchable line reactor –6</li> <li>• 400 kV Bus Reactor along with bays: 1 no.</li> <li>• 400kV Sectionalization bay: 2 sets</li> </ul>	
2	Neemrana-II -Kotputli 400 kV D/c line (Quad)	Length: 70 km
3	2 no. of 400 kV line bays at Kotputli	400 kV line bays at Kotputli - 2 nos.
4	LILO of both ckts of 400 kV Gurgaon (PG) - Sohna Road (GPTL) D/c line (Quad) at Neemrana-II S/s	Length: 85 km

**Note:**

- 1) The line lengths mentioned above are approximate as the exact length shall be obtained after the detailed survey
- 2) Provision of suitable sectionalization shall be kept at Neemrana-II S/s at 400kV level to limit short circuit level
- 3) POWERGRID to provide space for 2 nos. of 400 kV line bays at Kotputli S/s
- 4) The implementation of package shall be taken up matching with Package A

**PART-C: (Rs. 3,204 Cr.)**

Sl. No.	Scope of Transmission Scheme	Capacity /km
1	Bikaner-III - Neemrana-II 765 kV D/c line (2 <sup>nd</sup> ) along with 330 MVAR switchable line reactor for each circuit at each end	Length: 350 km <ul style="list-style-type: none"> <li>• 765 kV, 330 MVAR Switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• 765 kV, 330 MVAR Switchable line reactors at Neemrana-II – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Neemrana-II S/s – 2 nos.</li> </ul>
2	2 no. of 765 kV line bays each at Bikaner-III PS & Neemrana-II S/s	765kV line bays - 4 nos (2 nos. each at Bikaner-III PS & Neemrana-II S/s)

**Note:**

1. The line lengths mentioned above are approximate as the exact length shall be obtained after the detailed survey
2. Developer of Bikaner-III PS & Neemrana-II S/s to provide space for 2 nos. of 765 kV line bays alongwith space for Switchable line reactor each at Bikaner-III PS & Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2<sup>nd</sup>)

**PART-D: (Rs. 3,271 Cr.)**

Sl. No.	Scope of Transmission Scheme	Capacity /km
1	Neemrana-II- Bareilly (PG) 765 kV D/c line along with 330 MVAR switchable line reactor for each circuit at each end	Length: 350 km <ul style="list-style-type: none"> <li>• 765 kV, 330 MVAR switchable line reactors at Neermana-II S/s– 2 nos.</li> <li>• 765 kV, 330 MVAR Switchable line reactors at Bareilly (PG) – 2 nos.</li> <li>• Switching equipment for 765 kV 330 MVAR switchable line reactors at Neermana-II S/s – 2 nos.</li> <li>• Switching equipment for 765 kV 330 MVAR switchable line reactors at Bareilly (PG) S/s – 2 nos.</li> </ul>
2	2 no. of 765 kV line bays each at Neemrana-II & Bareilly (PG) S/s	765 kV line bays - 4 nos (2 nos. each at Neemrana-II & Bareilly (PG) S/s)

**Note:**

- 1) The implementation of package shall be taken up matching with Package C.
- 2) The line lengths mentioned above are approximate as the exact length shall be obtained after the detailed survey.
- 3) Developer of Neemrana-II S/s to provide space for 2 nos. of 765 kV line bays alongwith space for Switchable line reactor at Neemrana-II S/s for termination of Neemrana-II- Bareilly (PG) 765 kV D/c line
- 4) POWERGRID to provide space for 2 nos. of 765 kV line bays alongwith space for Switchable line reactor at Bareilly (PG) S/s

**PART-E: (Rs. 368 Cr.)**

S.No.	Scope of Transmission Scheme	Capacity /km
1	Augmentation by 765/400 kV, 1x1500 MVA ICT (4 <sup>th</sup> ) at Bikaner (PG)	<ul style="list-style-type: none"> <li>• 765/400 kV, 1500 MVA ICT – 1 no.</li> <li>• 765 kV ICT bay – 1 nos.</li> <li>• 400 kV ICT bay - 1 nos.</li> </ul>
2	Augmentation by 400/220 kV, 1x500 MVA ICT (3 <sup>rd</sup> ) at Kotputli (PG)	<ul style="list-style-type: none"> <li>• 400/220 kV, 500 MVA ICT – 1 nos.</li> <li>• 400 kV ICT bay – 1 nos.</li> <li>• 220 kV ICT bay - 1 nos.</li> </ul>
3	Augmentation by 400/220 kV, 5x500 MVA ICT at Bikaner-II PS	<ul style="list-style-type: none"> <li>• 400/220 kV, 500 MVA ICT – 5 nos.</li> <li>• 400 kV ICT bays – 5 nos.</li> <li>• 220 kV ICT bays - 5 nos.</li> </ul>

**Note:**

1. Though, the augmentation by 765/400 kV, 1x1500 MVA ICT (4<sup>th</sup>) at Bikaner (PG) shall be required for evacuation requirement beyond 5.5 GW (out of 7.7 GW capacity) at Bikaner-II/Bikaner-III, it was decided to take up the same earlier as it would facilitate evacuation of some power in absence of other transmission elements mentioned in Part-A to D, which may take longer time for implementation. The Implementation timeframe for Augmentation of 765/400kV, 1x1500MVA Transformer (4<sup>th</sup>) at Bikaner (PG) shall be kept 18 months from date of allocation.

2. Implementation of Augmentation by 400/220kV, 1x500MVA Transformer (3<sup>rd</sup>) at Kotputli (PG) shall be taken up matching with Package B.
3. CTU informed that recently about 4400 MW St-II Connectivity was granted at Bikaner-II PS. Earlier 2x500 MVA ICTs was approved by CTU and awarded to POWERGRID. Additionally, 2x500 MVA ICTs shall be taken up for approval by CTU as per the requirement. Subsequently, implementation of additional 400/220 kV, 5x500 MVA ICT at Bikaner-II PS shall be taken up for evacuation requirement beyond 2000 MW at 220 kV level of Bikaner-II PS.

4.5.5 On the implementation time line of the projects, it was pointed out that due to shutdown requirements of existing lines and considering the long lengths of the 765 kV lines, the implementation timeframe to be kept as 24 months from the date of SPV transfer.

4.5.6 After deliberations, NCT approved Part-E for implementation under RTM to POWERGRID and recommended Part-A to Part-D for implementation under TBCB.

S.No.	Package	Implementation time	Mode of implementation
1	Part-A	24 months	TBCB
2	Part-B		TBCB
3	Part-C		TBCB
4	Part-D		TBCB
5	Part-E	<ul style="list-style-type: none"> <li>• Augmentation by 765/400 kV, 1x1500MVA ICT (4th) at Bikaner (PG) - 18 months from date of allocation.</li> <li>• Augmentation by 400/220 kV, 1x500 MVA ICT (3<sup>rd</sup>) at Kotputli (PG) - 18 months from date of allocation (matching with Part B).</li> <li>• Augmentation with 400/220 kV, 5x500 MVA ICT at Bikaner-II PS –to be taken up for evacuation requirement beyond 2000 MW at 220 kV level of Bikaner-II PS, with implementation timeframe matching with schedule of RE generation or 18 months from date of allocation, whichever is later.</li> </ul>	RTM to POWERGRID

## 5 Schemes referred from previous NCT:

### 5.1 Transmission system for evacuation of power from REZ in Rajasthan (20 GW) under Phase-III Part I

- 5.1.1 Member Secretary, NCT, stated that the scheme was discussed in 5<sup>th</sup> NCT meeting held on 25.08.2021 and 02.09.2021. In the meeting, the scheme was deferred and NCT recommended the scheme to be reviewed in next NCT meeting.
- 5.1.2 CTU stated that the Stage-II Connectivity and LTA for 2600MW has already been granted at Ramgarh PS. Further, Adani Renewable Energy Park Rajasthan Ltd. (AREPRL) are in process of developing 2GW Solar Park proposed to be connected at Ramgarh PS and they have requested to enhance the transmission system capacity of Ramgarh PS by minimum 5 GW. Implementation of HVDC shall help in evacuation of additional power from Ramgarh PS.
- 5.1.3 CTUIL further stated that for Bhadla-II – Sikar-II 765 kV D/c line (Phase-II Part- C) has been ratified by the GIB committee nominated by Hon'ble Supreme Court, based on which CERC has accorded grant of transmission license both for Part-C and its onward interconnector i.e. Sikar-II – Aligarh 765kV D/c line (Phase-II Part-D) which is out of GIB area. Since implementation time frame of HVDC is more than gestation period of RE, it was requested that the implementation of above HVDC scheme may be approved.
- 5.1.4 Representative of CTU stated that the HVDC will be implemented with overhead Dedicated Metallic Return (DMR) technology. He also stated that by default, HVDC terminals can be operated for 50% of its capacity in reverse mode (3000 MW in this case). For 100% reversal of power, i.e., from Fatehpur to Bhadla, there may be some incremental cost. Further Bus sectionalizer may be provided at 400 kV Bus between 2x1500 MW sections each at Bhadla & Fatehpur to ensure reliability of 3000 MW power during contingencies at HVDC terminals. For drawing Auxiliary supply for HVDC station at Bhadla (HVDC), 400/33 kV transformers may be provided whereas at Fatehpur, auxiliary supply may be drawn from 765/400/33 kV transformers. Members agreed for above including provision for full reversal capability.
- 5.1.5 Detailed scope of the scheme is as follows:
- a) Establishment of 6000 MW,  $\pm$  800 kV Bhadla (HVDC) [LCC] terminal station (4x1500 MW) at a suitable location near Bhadla-3 substation
    - 400/33 kV, 2x50 MVA transformers for exclusively supplying auxiliary power to HVDC terminal.
    - 400kV bus sectionaliser -2 nos (1 Set) at Bhadla (HVDC) station.

- b) Establishment of 6000 MW,  $\pm 800$  kV Fatehpur (HVDC) [LCC] terminal station (4x1500 MW) at suitable location near Fatehpur (UP)
- c) Bhadla-3 – Bhadla (HVDC) 400 kV 2xD/c quad moose line along with the line bays at both substations
  - Line length- 2 km
  - 400 kV line bays -8 nos
- d)  $\pm 800$  kV HVDC line (Hexa lapwing) between Bhadla (HVDC) & Fatehpur (HVDC) (with Dedicated Metallic Return)
  - Line length- 950 km
- e) Establishment of 5x1500 MVA, 765/400 kV ICTs at Fatehpur (HVDC) along with 2x330 MVA (765kV) bus reactor
  - 765/400kV 1500 MVA ICTs: 5 nos (16x500 MVA, including one spare unit)
  - 765 kV ICT bays – 5 nos.
  - 400 kV ICT bays – 5 nos.
  - 400 kV Bus sectionaliser-2 nos [1 Set]
  - 765 kV line bays – 4 nos.
  - 330 MVA, 765kV Bus Reactor -2 nos. (7x110 MVA, including one spare unit)
  - 765 kV reactor bays- 2 nos.

**Future provisions: Space for**

  - 765/400 kV ICT along with bay: 1 no.
  - 765 kV line bay along with switchable line reactor: 4nos.
  - 765 kV Bus Reactor along with bays: 2 nos.
  - 400/220 kV ICTs along with bays: 4nos.
  - 400 kV line bays along with switchable line reactor: 4 nos.
  - 400 kV Bus Reactor along with bay: 1 no.
  - 220 kV line bays: 6 nos.
- f) LILO of both cks of 765 kV Varanasi – Kanpur (GIS) D/c line at Fatehpur - (30 km)

5.1.6 Expert Member, Shri R. Saha stated that presently, due to technological enhancement in HVDC, upto 7500 MW can be transmitted through  $\pm 800$  kV system. He suggested that this high capacity system may be considered wherever required. In this regard, it was opined that for planning the future transmission corridors, the suggested option would be considered depending upon the quantum of power to be evacuated.

5.1.7 After deliberations, the scheme mentioned at para 5.1.5 was recommended to MoP for implementation under TBCB route with following considerations:

- (a) The implementation time will be 42 months from date of SPV transfer.

(b) The estimated cost of the scheme is Rs. 12,700 Cr (as per 5<sup>th</sup> NCT estimate).

(c) HVDC terminals will be implemented with 100% power reversal capability.

## 5.2 **Augmentation of 1x1500MVA ICT at 765/400 kV Kanpur (GIS) substation (Part of Transformer augmentation at various substations for evacuation of power from REZ in Rajasthan (20GW) under Phase-III Part J)**

5.2.1 Member Secretary, NCT, stated that transmission system for evacuation of power from additional 20 GW REZs envisaged in Rajasthan (Phase-III), was discussed and agreed in 5<sup>th</sup> NCT meeting held on 25.08.2021 and 02.09.2021. As part of above scheme, Transmission system for evacuation of power from REZ in Rajasthan (20 GW) under Phase-III Part I i.e. 6000MW HVDC corridor towards Fatehpur for further dispersal of RE power from Ramgarh PS/Bhadla-3 PS was also discussed. Augmentation of 1x1500MVA ICT at 765/400 kV Kanpur (GIS) substation was also linked with HVDC system (LILO of Varanasi-Kanpur at Fatehpur). The scope of the scheme is as follows:

- Augmentation by 1x1500 MVA ICT at 765/400kV Kanpur (GIS) substation
  - 765/400kV 1500 MVA ICT: 1 no
  - 765kV ICT bay – 1 no.
  - 400 kV ICT bay – 1 no.

5.2.2 The above scheme would be required with the Transmission system for evacuation of power from REZ in Rajasthan (20GW) under Phase-III Part I, recommended at para 5.1 above, with implementation timeframe of 42 months from date of SPV transfer. However, the augmentation of ICT work at Kanpur (GIS) S/s will take about 18 months.

5.2.3 After deliberations, it was agreed that the scheme may be put on hold for time being and would be reviewed by NCT after award of Bhadla III-Fatehpur HVDC system or in case prior requirement arises as part of grid strengthening

## 5.3 **North Eastern Region Expansion Scheme-XVI (NERES-XVI)**

5.3.1 Member Secretary, NCT, stated that this scheme comprising of establishment of a new 400 kV substation at Gogamukh has been proposed by CTU for feeding power to upper Assam above Brahmaputra River. The proposed substation is also planned to be utilised for providing additional feed and strength to the under construction 132 kV Pasighat to Khupi corridor in Arunachal Pradesh under comprehensive scheme through Gogamukh (ISTS) – Gerukamukh (Arunachal Pradesh) 132kV D/c line.

5.3.2 He informed that the scheme was discussed in 8<sup>th</sup> Meeting of NCT, wherein the proposal was deferred. Thereafter, the proposal was discussed in NERPC

forum on 11.07.2022 and agreed in special meeting held among CEA, NERPC and CTU.

5.3.3 The scope of the scheme with estimated cost of Rs. 289 Cr is as follows:

- i. Establishment of New Gogamukh 400/220/132kV substation
  - 400/220 kV, 2x500 MVA ICTs alongwith associated ICT bays at both levels
  - 220/132 kV, 2x200 MVA ICTs alongwith associated ICT bays at both levels
  - 400 kV line bays
    - 4 no. for termination of LILO of one D/c line (ckt-1 & ckt-2 of line-1) of Lower Subansiri –Biswanath Chariali 400kV (Twin Lapwing) 2xD/c lines
  - 420 kV, 2x125 MVA bus reactor along with associated bays
  - 220 kV line bays
    - 2 no. for termination of Bihpuria – Gogamukh 220kV D/c line (line to be implemented by AEGCL)
  - 132 kV line bays
    - 2 no. for termination of LILO of one circuit of North Lakhimpur – Dhemaji 132 kV new D/c line (LILO to be implemented by AEGCL)
    - 2 no. for termination of Gogamukh (ISTS) – Gerukamukh (Arunachal Pradesh) 132 kV D/c line
- ii. Extension works at Gerukamukh (Arunachal Pradesh) 132kV S/s
  - 2 no. of 132 kV line bays for termination of Gogamukh (ISTS) – Gerukamukh (Arunachal Pradesh) 132kV D/c line
- iii. Gogamukh (ISTS) – Gerukamukh (Arunachal Pradesh) 132kV D/c (Zebra) line
- iv. LILO of one D/c (ckt-1 & ckt-2 of line-1) of Lower Subansiri – Biswanath Chariali 400kV (Twin Lapwing) 2xD/c lines at Gogamukh S/s
  - Additional space for future expansion:
    - 400/220kV, 1x500MVA ICT - 1 no. (along with associated bays at both levels)
    - 420kV, 1x125MVA bus reactor along with associated bays
    - 12 nos. of 400kV line bays for future lines
      - 4 nos. of 400V line bays for termination of Dibang – Gogamukh 2xD/c lines
      - 2 nos. of 400kV line bays (along with 2x80MVA switchable line reactor) for termination of Gogamukh – Biswanath Chariali 400kV D/c (Quad) line
      - 6 nos. of 400kV line bays (along with switchable line reactor) for future lines

- 220/132kV, 1x200MVA ICT - 1 no. (along with associated bays at both levels)
- 6 nos. of 220kV line bays for future lines
- 6 nos. of 132kV line bays for future lines

**Note:**

- (a) Lower Subansiri – Biswanath Chariali 400kV (Twin Lapwing) D/c-1 line is under implementation by POWERGRID and is expected to be commissioned by Dec 2022.
- (b) Arunachal Pradesh to provide space at Gerukamukh S/s for implementation of 2 no. 132kV line bays.

5.3.4 As the estimated cost of the scheme lies between Rs 100 to 500 Crore, NCT approved the North Eastern Region Expansion Scheme-XVI (NERES-XVI) scheme for implementation through TBCB mode with implementation time frame as 30 months from transfer of SPV.

5.4 **Modification of scope under Western Region Expansion Scheme-XXV (WRES-XXV) scheme on account of space constraints at Raigarh (Kotra) S/s**

5.4.1 Representative of CTU stated that the Western Region Expansion Scheme-XXV (WRES-XXV) involved augmentation of transformation capacity at Raigarh (Kotra) by 1x1500MVA, 765/400kV ICT at Section-A (3<sup>rd</sup> ICT on Section A) and by 2x1500MVA, 765/400kV ICTs at Section-B (3<sup>rd</sup> & 4<sup>th</sup> ICTs on Section B) along with associated ICT bays as elaborated below:

**Raigarh(Kotra) Section-A**

- 765/400kV ICT: 1x1500MVA
- 765kV ICT bay: 1 no.
- 400kV ICT bay: 1 no.

**Raigarh(Kotra) Section-B**

- 765/400kV ICT: 2x1500MVA
- 765kV ICT bay: 2 nos.
- 400kV ICT bay: 2 nos.

5.4.2 He also stated that the above scheme was agreed in the 8<sup>th</sup> NCT meeting held on 25.03.2022 to facilitate 'N-1' compliancy of the 765/400 kV ICTs at Raigarh (Kotra) S/s under following 2 conditions (after bus split arrangement):

- With Raigarh – Pugalur HVDC line operating under blocked mode or reverse mode (SR to WR) during high renewable generation in southern region and high generation at Raigarh (Kotra) PS.
- With Raigarh – Pugalur HVDC line operating under forward mode (WR to SR) and under low generation at either of the bus section at Raigarh PS.

5.4.3 The scheme was awarded to CTU for implementation under RTM mode to be implemented by POWERGRID vide NCT letter dated 10.05.2022 with schedule of 15 months from date of allocation.

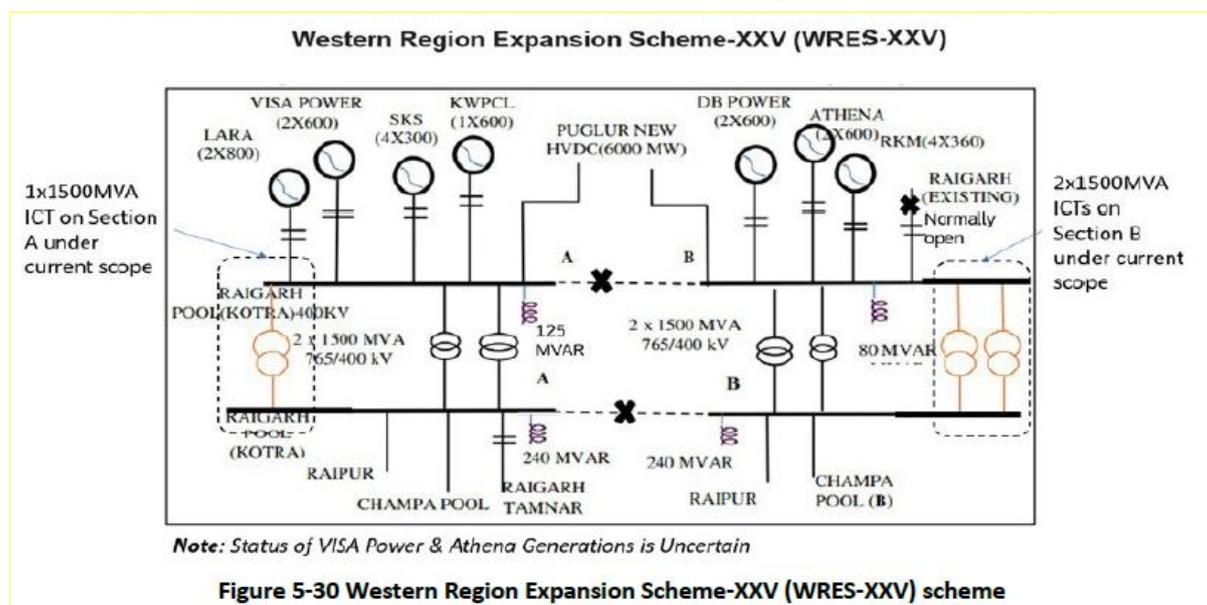
5.4.4 It was further informed that subsequently, POWERGRID vide letter dated 19.05.2022 has intimated that as per site conditions, space for installation of 2nd 765/400kV ICT on Section-B is not feasible. Further, modification of bay orientation may be required for installation of ICT on Section-A. The matter was discussed with POWERGRID and it was decided that a committee comprising of members from CTUIL & POWERGRID shall visit the site and explore options to implement the scheme. The committee visited the site on 31.05.2022 & 01.06.2022 and submitted its site visit report and made the following recommendations:

- 1<sup>st</sup> ICT in Section B: ICT to be installed in Space available for Future ICT. For connection on 765 kV side, Future Bay No. 726 to be constructed in existing Half Dia. For connection in 400kV side, 400kV DB Power 2 Line (along with Line side equipment) to be shifted from existing 400kV Bay No. 433 to Future Bay 444 using additional BPIs. The vacated 400kV Bay no. 433 shall be used to terminate this ICT in AIS. This arrangement requires sufficient outage of DB POWER 2 Line for shifting in new Dia.
- 1<sup>st</sup> ICT in Section A: ICT to be installed in Space available for Future ICT. For connection on 765 kV side, the Dia consisting of Bays 710,711 & 712 to be constructed in AIS (Presently this space has been used to Terminate the Champa-I Line in Bay 715).
- 765kV Champa-1 Line shall be shifted from Bay 715 to Bay 710. For connection of ICT on 765kV side, Bay No. 712 shall be used. For connection of ICT in 400kV side, Future Bay 421 shall be constructed in existing Half Dia.
- 2<sup>nd</sup> ICT in Section B: ICT to be installed in Space available in the area earmarked for Future ICT in Section A. For connection on 765kV side, 1 no. 765kV GIS Bay (consisting of 2 nos. CBs) shall be constructed (Double Bus Double Breaker Scheme) in Bus Section-B in the space available near 765 kV Bus Sectionalizer Area and using GIB (Gas Insulated Bus Duct). The ICT shall be physically located in the area of Section A and connected to Bus in Section B.
- Likewise, for connection on 400kV side also, 1 no 400kV GIS Bay (consisting of 2 nos. CBs) shall be constructed (Double Bus Double Breaker Scheme) in the space available near 400 kV Bus Sectionalizer Area and using GIB (Gas Insulated Bus Duct). The ICT shall be physically located in the area of Section A and connected to Bus in Section B.

5.4.5 To deliberate on DB Power line 2 shifting from existing 400kV Bay No. 433 to Future Bay 444 using additional BPIs (proposed above), a meeting was held amongst CEA, CTUIL, POSOCO, POWERGRID and DB Power on 20.07.22,

wherein DB power expressed their apprehensions in shifting of their bay and subsequently DB Power vide e-mail dated 26.07.2022 informed that the above shifting is not acceptable to them.

5.4.6 In view of above, committee explored alternate arrangement for termination of ICT bay in section-B using partly 400 kV GIB duct and balance by BPI arrangement. In view of the above, the revised scope of the scheme as finalized by the committee is explained as per details given below:



### Raigarh (Kotra) Section-A

Original Scope	Site Visit Recommendation	Committee	Revised Scope
765/400kV ICT: 1x1500MVA	Space available		765/400kV ICT (Sec-A: 3 <sup>rd</sup> ): 1x1500MVA
765kV ICT bay: 1 no.	<ul style="list-style-type: none"> <li>New Diameter with bay nos. 710, 711 &amp; 712 to be constructed (AIS) in the space used for termination of Champa-I 765kV line in Bay No. 715 (existing).</li> <li>Champa-I 765kV line to be shifted from bay no. 715 to 710 (new)</li> <li>Equipment of Existing Main bay (715) of Champa-I line shall be shifted to New ICT Bay (ICT 3<sup>rd</sup> bay no. 712)</li> <li>ICT to be terminated into bay no. 712</li> </ul>		765kV bay: 1 no. for change in termination of Champa-I line from existing bay to new bay & Equipment of Existing Main bay of Champa-I line shall be shifted to New ICT Bay (ICT 3 <sup>rd</sup> bay) for utilization.
400kV ICT bay: 1 no.	Space available (Bay No. 421)		400kV ICT bay: 1 no.

**Raiqarh(Kotra) Section-B**

<b>Original Scope</b>	<b>Site Visit Report Recommendation</b>	<b>Revised Scope</b>
765/400kV ICT: 2x1500MVA	<p><b>ICT-I (3<sup>rd</sup>):</b></p> <ul style="list-style-type: none"> <li>Space Available</li> </ul> <p><b>ICT-II (4<sup>th</sup>):</b></p> <ul style="list-style-type: none"> <li>Space Available in area earmarked for future ICT in the other section (Section-A)</li> </ul>	765/400kV ICTs (Sec-B: 3 <sup>rd</sup> & 4 <sup>th</sup> ): 2x1500MVA
765kV ICT bay: 2 no.	<p><b>ICT-I (3<sup>rd</sup>):</b></p> <ul style="list-style-type: none"> <li>Space Available (Bay No. 726)</li> </ul> <p><b>ICT-II (4<sup>th</sup>):</b></p> <ul style="list-style-type: none"> <li>Due to space constraints / non-availability of required clearances in Section-B, 1 no. 765kV GIS bay (consisting of 2 breakers) to be constructed (Double bus double breaker scheme) in space near 765 kV bus sectionalizer area and the ICT (physically located in section-A) to be connected with the above bay through GIB Duct</li> </ul>	<p><b><u>Sec-B: 3<sup>rd</sup> ICT</u></b></p> <ul style="list-style-type: none"> <li>765kV ICT bay (AIS): 1 no.</li> </ul> <p><b><u>Sec-B: 4<sup>th</sup> ICT</u></b></p> <ul style="list-style-type: none"> <li>765kV ICT bay (GIS): 1 no. consisting of 2 breakers [with Double bus double breaker scheme and the ICT (4<sup>th</sup>) (physically located in the space available near section-A) to be connected with the above bay through GIB Duct]</li> </ul>
400kV ICT bay: 2 no.	<p><b>ICT-I (3<sup>rd</sup>):</b></p> <ul style="list-style-type: none"> <li>Space Available (Bay No. 444)</li> <li>Due to constraints w.r.t. available clearances on 400kV side, ICT shall be terminated into above bay in section-B using partly 400kV GIB duct and balance by BPI arrangement</li> </ul> <p><b>ICT-II (4<sup>th</sup>):</b></p> <ul style="list-style-type: none"> <li>Due to space constraints / non-availability of required clearances in Section-B, 1 no. 400 kV GIS bay (consisting of 2 breakers) to be constructed (Double bus double breaker scheme) in space near 400kV bus sectionalizer area and the ICT (physically located in the space available near section-A) to be connected with the above bay through GIB Duct</li> </ul>	<p><b><u>Sec-B: 3<sup>rd</sup> ICT</u></b></p> <ul style="list-style-type: none"> <li>400kV ICT bay (AIS): 1 no. (ICT shall be terminated into above bay using partly 400kV GIB duct and balance by BPI arrangement)</li> </ul> <p><b><u>Sec-B: 4<sup>th</sup> ICT</u></b></p> <ul style="list-style-type: none"> <li>400 kV ICT bay (GIS): 1 no. consisting of 2 breakers [with Double bus double breaker scheme and the ICT (4<sup>th</sup>) (physically located in the space available near section-A) to be connected with the above bay through GIB Duct]</li> </ul>

5.4.7 Regarding present status and cost implications, representative of CTU stated that although the scheme was to be implemented by POWERGRID as per CTU OM dated 11.05.2022 in time-frame of 15 months (i.e. Aug'23), the same is undergoing changes as per the site visit held on 31.05.2022 & 01.06.2022

leading to time and cost escalation. Hence, POWERGRID has requested approval for revised scheme with revised time-line of implementation. Further, with above changes in the scope of work, the revised cost of the scheme has been worked out as Rs. 381 Cr. (i.e. increment by Rs. 107 Cr.).

- 5.4.8 NCT approved the revised scope of work given in table above under WRES-XXV scheme with implementation timeline as 12 months on best effort basis from date of allocation of the scheme so that the modifications are completed before the start of next winter season.

#### 5.5 **Modification of future space provision in "Establishment of Khavda Pooling Station-2 (KPS2) in Khavda RE Park" scheme**

- 5.5.1 Transmission system for establishment of KPS2 & KPS3 was deliberated in the 5<sup>th</sup> NCT meeting held on 25.08.2021 and 02.09.2021. Ministry of Power vide Gazette notification 5032(E) published on 06.12.2021 has appointed RECPDCL as BPC for implementation of the subject transmission schemes through TBCB route.

- 5.5.2 While preparation of Bidding Documents for the Khavda Phase-II Schemes (8 no.) for evacuation of 5 GW from Khavda RE park, the need was felt to prepare the layout of the pooling stations & outgoing lines from Khavda RE park based on the holistic Transmission System planned for evacuation of total 27.7 GW RE capacity from Khavda. This was mainly on account of limited availability of land and line corridors (RoW) due to restrictions (No-go zones) imposed by Local Military Authority (LMA).

- 5.5.3 While preparing the layout of the pooling stations KPS2 & KPS 3, keeping in view the present as well as future requirements, the following changes in the space requirement (for future expansion) at KPS2 was felt necessary:

- a) 765 kV line bays (future): 10 nos. instead of 8 nos envisaged earlier.
- b) 400 kV line bays (future): 12 nos. instead of 10 nos envisaged earlier.
- c) Space for proposed 8000 MW HVDC System as well as BESS

- 5.5.4 Accordingly, in view of the above changes in space for future provisions at KPS2, the changes in scope of KPS2 are given as under:

#### **Establishment of Khavda Pooling Station-2 (KPS2) in Khavda RE Park:**

S.No	Scope of the Transmission Scheme (Original)	Scope of the Transmission Scheme (Revised)
1.	Establishment of 765/400 kV, 4x1500MVA, KPS2 (GIS) with 2x330 MVAR 765 kV bus reactor and 2x125 MVAR 400 kV bus reactor.	Establishment of 765/400 kV, 4x1500MVA, KPS2 (GIS) with 2x330 MVAR 765 kV bus reactor and 2x125 MVAR 400 kV bus reactor.

S.No	Scope of the Transmission Scheme (Original)	Scope of the Transmission Scheme (Revised)
	<p>Adequate space for future expansion of 5x1500 MVA 765/400 kV ICT's</p> <p><i>Bus sectionalizer at 765kV &amp; 400kV.</i></p> <p><i>On each bus section, there shall be 2x1500MVA 765/400kV ICTs, 1x330MVA, 765 kV &amp; 1x125MVA 420kV bus reactor with space for future expansion.</i></p> <p><i>Bus sectionalizer at 765 kV level shall normally be closed and bus sectionalizer at 400 kV level shall normally be open</i></p> <p>Future provisions: Space for 765/400 kV ICTs along with bays: 5 nos. <b>765kV line bay with switchable line reactor: 8 nos.</b> <b>400kV line bay with switchable line reactor: 10 nos.</b> To take care of any drawal needs of area in future: 400/220 kV ICT: 2 nos. 220 kV line bays: 4 nos.</p>	<p>Adequate space for future expansion of 5x1500 MVA 765/400 kV ICT's</p> <p><i>Bus sectionalizer at 765kV &amp; 400kV.</i></p> <p><i>On each bus section, there shall be 2x1500MVA 765/400kV ICTs, 1x330MVA, 765 kV &amp; 1x125MVA 420kV bus reactor with space for future expansion.</i></p> <p><i>Bus sectionalizer at 765 kV level shall normally be closed and bus sectionalizer at 400 kV level shall normally be open</i></p> <p>Future provisions: Space for 765/400 kV ICTs along with bays: 5 nos. <b>765kV line bay with switchable line reactor: 10 nos.</b> <b>400kV line bay with switchable line reactor: 12 nos.</b> <b>800MW, ±800kV HVDC Converter station (LCC)</b> To take care of any drawal needs of area in future: 400/220 kV ICT: 2 nos. 220 kV line bays: 4 nos.</p>
2.	LILO of one ckt. of KPS1- Bhuj PS 765 kV D/c line at KPS2	LILO of one ckt. of KPS1- Bhuj PS 765 kV D/c line at KPS2

5.5.5 Chairperson, CEA, enquired about the present status of the original scheme and the need to incorporate the space for future HVDC Converter station in the scope of works of the present scheme.

5.5.6 CEA & CTU stated that on account of limited land availability for Khavda Pooling Station 2, the layout of the KPS-2 S/s depicting the orientation of the HVDC, 765 kV & 400 kV switchyards have to be furnished alongwith the bidding documents. To avoid any space constraints in future, the tentative alignment of the incoming 400 kV lines of the developers and outgoing 765 KV ISTS lines from KPS-2 has also to be clearly marked in the layout. For optimum development of Khavda Pooling Station -2 (KPS-2) keeping in view present as well as future requirements, it is necessary to incorporate the space for future HVDC converter station in the scope of the scheme under bidding.

5.5.7 Chairperson, CEA, stated that as the Transmission scheme for Establishment of Khavda PS-2 has already been notified by MoP and any change in the scope of works would require amendment in the Gazette Notification done by MoP. Accordingly, the scope of works needs to be finalised in a prudent manner, so as to avoid such cases in future.

5.5.8 After detailed deliberations, NCT approved the changes in the future provision to be kept at Khavda Pooling Station-2, on account of urgency to complete the bidding process for the “Transmission Scheme for Establishment of KPS-2”.

#### 5.6 Modification of future space provision in Transmission system for evacuation of power from Chhatarpur SEZ (1500MW) scheme

5.6.1 In view of the direction of MoP, for more space provisions in new ISTS substations (for evacuation of power from potential RE Zones / for meeting drawl requirements of STUs, etc), space provision at Chhatarpur PS, being established under “Transmission system for evacuation of power from Chhatarpur SEZ (1500MW)” (currently under bidding), was reviewed and revised space provision is given below:

#### Transmission system for evacuation of power from Chhatarpur SEZ (1500 MW)

Sl. No.	Scope of the Transmission Scheme (Original)	Scope of the Transmission Scheme (Revised)
1.	<p>(i) Establishment of 3x500MVA, 400/220 kV Pooling Station at Chhatarpur</p> <p>(ii) 1x125 MVAR, 420 kV bus reactor at Chhatarpur PS</p> <p>(iii) 5 nos. 220kV line bays for solar park interconnection</p> <p><i>*out of Satna – Bina 2xD/c lines, one circuit of 2<sup>nd</sup> D/c line has been LILLOed at Sagar (MPPTCL) substation. The proposed LILLO is to be made on the other (1<sup>st</sup>) D/c line between Satna &amp; Bina</i></p> <p>Future provisions: Space to accommodate:</p> <ul style="list-style-type: none"> <li>• 400/220 kV, 500 MVA ICT along with associated bays -1</li> <li>• 4 nos. of 220kV line bays</li> <li>• Sectionaliser arrangement</li> </ul>	<p>(i) Establishment of 3x500MVA, 400/220 kV Pooling Station at Chhatarpur</p> <p>(ii) 1x125 MVAR, 420 kV bus reactor at Chhatarpur PS</p> <p>(iii) nos. 220kV line bays for solar park interconnection</p> <p><i>*out of Satna – Bina 2xD/c lines, one circuit of 2<sup>nd</sup> D/c line has been LILLOed at Sagar (MPPTCL) substation. The proposed LILLO is to be made on the other (1<sup>st</sup>) D/c line between Satna &amp; Bina</i></p> <p>Future provisions: Space to accommodate:</p> <ul style="list-style-type: none"> <li>• 400/220 kV, 500 MVA ICT along with associated bays -5</li> <li>• <b>400 kV line bays: 6 nos.</b></li> <li>• <b>3x125MVAr Bus Reactor with bay</b></li> <li>• <b>13 nos.</b> of 220kV line bays</li> <li>• Sectionaliser arrangement <b>at</b></li> </ul>

Sl. No.	Scope of the Transmission Scheme (Original)	Scope of the Transmission Scheme (Revised)
		<b>220kV (2 Sets) &amp; 400kV (1 Set) levels</b>
2.	LILO of Satna – Bina 400kV (1 <sup>st</sup> ) D/c line at Chhatarpur PS	LILO of Satna – Bina 400kV (1 <sup>st</sup> ) D/c line at Chhatarpur PS

**Note:** As per the MoP Gazette, scheme implementation is to be taken only after grant of LTA. In this respect, it may be noted that Generation Projects are yet to be identified at Chhatarpur PS.

5.6.2 As it is not possible for NTPC to construct dedicated transmission line upto the planned Chhatarpur PS on account of the transmission line passing through Panna Tiger Reserve, it was informed that two separate pooling stations are being planned for pooling of RE power of RUMS and NTPC. Hence, additional future provisions at Chhatarpur PS may not be required.

5.6.3 CTUIL was directed to examine the requirement of future provisions in view of the above and it was decided that the matter shall be deliberated again in the next meeting.

#### **5.13 Transmission System for Evacuation of Power from RE Projects in Rajgarh (2500 MW) SEZ in Madhya Pradesh**

5.13.1 Transmission system for evacuation of Power from RE Projects in Rajgarh (2500 MW) SEZ in Madhya Pradesh was agreed in the 4<sup>th</sup> meeting of NCT held on 20.01.2021 & 28.01.2021 for implementation in two phases as two different Transmission packages: Phase-I (1500MW) & Phase-II (1000MW).

5.13.2 Ministry of Power, vide Gazette notification dated 24.01.2020 had appointed REC as the Bid Process Coordinator (BPC) for selection of Bidder as Transmission Service Provider (TSP) to establish the subject transmission scheme through Tariff Based Competitive Bidding (TBCB) process. Subsequently, MoP vide gazette notification dated 19.07.2021 had modified the scope of the subject transmission scheme after examining the recommendations of the 4<sup>th</sup> NCT meeting and renotified the scope to be taken up under Phase-I i.e. "Transmission system for evacuation of power from RE projects in Rajgarh (1500 MW) SEZ in Madhya Pradesh under Phase-I."

5.13.3 Phase-I of the scheme is under implementation by M/s GR Infraprojects Ltd. with SCOD of 30.11.2023.

5.13.4 SECI vide letter dated 23.06.2022 had requested to initiate the development of several Pooling Stations including Rajgarh Phase-II (1000 MW), irrespective of the receipt of connectivity applications. Rajgarh Phase II Scheme as per 4<sup>th</sup> NCT meeting is given below:

Sl. No.	Scope of the Transmission Scheme	Capacity/km.
1.	Augmentation of 400/220 kV, 2x500 MVA ICT (4 <sup>th</sup> & 5 <sup>th</sup> ) at Pachora PS (Rajgarh)	400/220 kV, 500 MVA ICT – 2 400 kV ICT bays – 2 220 kV ICT bays – 2 400 kV line bays – 2 220 kV line bays – 4 (to be taken up as per Connectivity/LTA applications received)
2.	Pachora – Shujalpur 400kV D/c line (Quad/HTLS) (with minimum capacity of 2100MVA/ckt at nominal voltage)	Length – 80 km
3.	2 no. of 400 kV line bays at Shujalpur for Pachora – Shujalpur 400kV D/c line (Quad/HTLS) (with minimum capacity of 2100MVA/ckt at nominal voltage)	400kV line bays – 2

*Note:*

*(i) Powergrid to provide space for 2 no. of 400 kV line bays at Shujalpur for termination of Rajgarh SEZ PP – Shujalpur 400 kV D/c line.*

*(ii) Phase-II scheme to be taken up only after grant of Connectivity/LTA applications beyond 1500 MW at Pachora P.S.*

*(ii) The schedule of implementation of Phase-II of the scheme would be matching with schedule of RE developers or 18 months from the date of transfer of SPV whichever is later.*

5.13.5 Earlier, the Phase-II of the scheme had been agreed to be taken up only after grant of Connectivity beyond 1500 MW at Pachora PS. However, based on request of SECI to expedite the Phase-II of the scheme irrespective of connectivity applications, the matter needs to be deliberated.

5.13.6 Further, to provide clarity regarding the conductor configuration of Pachora – Shujalpur 400kV D/c line as well as bus sectionalization which shall be required at 220kV level, the revised scope is given below (changes marked in bold):

Sl. No.	Scope of the Transmission Scheme	Capacity/km.
1.	400/220 kV, 2x500 MVA ICT augmentation at Pachora PS	400/220 kV, 500 MVA ICT – 2 400 kV ICT bays – 2 220 kV ICT bays – 2 400 kV line bays – 2 220 kV line bays – 4 (to be taken up as per Connectivity/LTA applications received)

Sl. No.	Scope of the Transmission Scheme	Capacity/km.
		220kV Bus Sectionalizer – 1 set 220kV TBC bay – 1 no. 220kV BC bay – 1 no.
2.	Pachora – Shujalpur 400kV D/c line (Quad ACSR/AAAC/AL59 Moose equivalent)	Length – 80 km
3.	2 no. of 400 kV line bays at Shujalpur for Pachora – Shujalpur 400kV D/c line (Quad ACSR/AAAC/AL59 Moose equivalent)	400kV line bays – 2

Note:

- (i) Powergrid to provide space for 2 no. of 400 kV line bays at Shujalpur for termination of Rajgarh SEZ PP – Shujalpur 400 kV D/c line.
- (ii) Phase-II scheme to be taken up only after grant of Connectivity/LTA applications beyond 1500 MW at Pachora P.S.
- (ii) The schedule of implementation of Phase-II of the scheme would be matching with schedule of RE developers or 18 months from the date of transfer of SPV whichever is later.

5.13.7 It was informed that MPPTCL has requested to review the above scheme in view of overloading of Shujalpur 400/220kV ICTs and downstream system.

5.13.8 After deliberations, it was decided that the scheme would be reviewed in the next NCT meeting based on visibility of RE generation as well as outcome of studies to be carried out in coordination with MPPTCL.

#### 5.14 **Resumption of bidding process of transmission schemes at Bidar and Ananthapuram**

5.14.1 SECI vide the letter dated 23.06.2022 had requested to initiate the development of Pooling Stations simultaneously at different locations including Anantapur and Bidar for integration of RE. The transmission system at Ananthpur and Bidar was to be implemented through TBCB route for which bidding had been initiated but were subsequently put on hold because of uncertainty in development of RE generation projects.

5.14.2 A meeting was held in CEA on 01.08.2022 in which it was agreed that 1000 MVA capacity each at Bidar and Ananthpur could be taken up in first phase and further capacity would be taken up based on the visibility of RE generators. In the meeting, CTUIL had informed that they have not received any connectivity applications at Anantapur and Bidar.

5.14.3 In view of above, the following needed to be deliberated:

- Taking up the transmission schemes without any connectivity applications
- Phasing of the schemes i.e. (i) whether bidding for Phase I & phase II of each scheme would be done simultaneously with time gap in CoD of the phases or (ii) taking up bidding of Phase I & phase II of each scheme in different time frames needs to be deliberated.

5.14.4 After deliberations, it was decided that the scheme would be reviewed in the next NCT meeting based on visibility of RE generators.

## **6 Supply and Installation of OPGW on existing main lines which are to be LILOed under various transmission schemes.**

6.1 CTU stated that some existing transmission lines have been agreed to be LILOed under various transmission schemes. The OPGW on the LILO portion is being implemented by the TSP implementing the LILO portion. However, the main existing lines do not have OPGW and hence the communication of the LILO stations to the respective RLDC cannot be established. Respective RPCs have given their consent for the installation of OPWG.

6.2 The transmission lines which are to be provided with OPGW alongwith necessary accessories and FOTE are mentioned as under.

### **Western Region**

- 400kV Bachau (PG) – EPGL line (221 km) [to be LILOed at Kallam]
- 400kV Satna – Bina (1<sup>st</sup>) D/c line (276 km) [to be LILOed at Chatarpur]
- 400kV Kakrapar - Vapi D/c line (116 km) [to be LILOed at Vapi-II]

Estimated Cost Rs. 31 Crore (approx.)

### **Northern Region**

- 765kV S/c Jaipur (Phagi) (RVPNL) – Gwalior line (312 km) (Ckt-1 is proposed) (to be LILOed at Dausa)
- 400kV D/c Agra – Jaipur (South) (PG) line (254 km) (to be LILOed at Dausa)

Estimated Cost Rs. 28.5 Crore (approx.)

6.3 After detailed deliberations, NCT approved the installation of OPGW (alongwith necessary accessories and FOTE) on the above lines which are to be LILOed under various transmission schemes, under RTM mode to owner of the lines viz. POWERGRID, matching with the timeframe of the respective LILOs.

## **7 Evaluation of functioning of National Grid.**

Due to paucity of time, the agenda could not be discussed.

**8 Comprehensive presentation by CTU apprising NCT of measures taken for ensuring development of an efficient, co-ordinated and economical ISTS for smooth flow of electricity.**

Due to paucity of time, the agenda could not be discussed.

**9 Five-year rolling plan for ISTS capacity addition.**

Due to paucity of time, the agenda could not be discussed.

Meeting ended with thanks to chair.

**Summary of the deliberations of the 09th NCT meeting held on 28.09.2022.**

1. ISTS Transmission schemes, costing upto Rs 100 Crore, noted by NCT: No information in this regard received from CTUIL.
2. ISTS Transmission schemes, costing between Rs 100 Crore to Rs 500 Crore, approved by NCT:

2.1 The transmission schemes approved by NCT under RTM is given below:

Sl. No.	Name of Transmission Scheme	Implementation Mode	Implementation timeframe	Allocated to	Estimated Cost (Rs. Crs)
1.	Augmentation of ISTS for interconnection of HVPNL transmission schemes	RTM	Given in detailed scope	CTUIL	117.05
2.	Scheme to relieve high loading of WR-NR Inter Regional Corridor (400 kV Bhinmal-Zerda line)	RTM	12 months for bypassing and 18 months for <i>reconductoring (Best effort to be made for completing reconductoring works in 15 months)</i> from date of allocation	CTUIL	288.9
3.	Eastern Region Expansion Scheme-XXIX (ERES-XXIX)	RTM	36 months from date of allocation	CTUIL	422.23
4.	Augmentation of transformation capacity at Kallam PS by 2x500 MVA, 400/220 kV ICTs (3rd & 4th) along with 220 kV bays for RE interconnection	RTM	18 months from date of allocation	CTUIL	156.89

Sl. No.	Name of Transmission Scheme	Implementation Mode	Implementation timeframe	Allocated to	Estimated Cost (Rs. Crs)
5.	Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex)-Part-E	RTM	As mentioned in para 4.5.6	CTUIL	368
6.	Supply and Installation of OPGW on existing main lines which are to be LILLOed under various transmission schemes.	RTM	Matching with the timeframe of the respective LILOs.	CTUIL	59.5

2.2 The transmission schemes approved by NCT under TBCB is given below:

Sl. No.	Name of Transmission Scheme	Implementation Mode	Implementation timeframe	Allocated to	Estimated Cost (Rs. Crs)	Survey Agency
1.	North Eastern Region Expansion Scheme-XVI (NERES-XVI)	TBCB	30 months	RECPDCL	289	CTUIL

3. The broad scope of above ISTS scheme, approved by NCT for implementation through TBCB route to be notified in Gazette of India is as given below:

Sl. No.	Name of Scheme & Implementation timeframe	Broad Scope	Bid Process Coordinator
1.	North Eastern Region Expansion Scheme-XVI (NERES-XVI) <b>Implementation Timeframe: 30 months from transfer of SPV</b>	<ul style="list-style-type: none"> <li>i. Establishment of New Gogamukh 400/220/132 kV substation</li> <li>ii. Extension works at Gerukamukh (Arunachal Pradesh) 132 kV S/s</li> <li>iii. Gogamukh (ISTS) – Gerukamukh (Arunachal Pradesh) 132 kV D/c (Zebra) line</li> <li>iv. LILLO of one D/c (ckt-1 &amp; ckt-2 of line-1) of Lower Subansiri – Biswanath Chariali 400kV (Twin Lapwing) 2xD/c lines at Gogamukh S/s</li> <li>v. Associated bays and reactors</li> </ul>	RECPDCL

		(Detailed scope as approved by 9 <sup>th</sup> NCT and subsequent amendments thereof)	
--	--	---	--

4. ISTS Transmission schemes, costing greater than Rs 500 Crore recommended by NCT to MoP:

4.1 The ISTS transmission schemes recommended by NCT to MoP are given below:

Sl. No.	Transmission Scheme	Implementation Mode	Implementation timeframe	Survey Agency	Estimated Cost (Rs. Crs)
1.	Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1: Bikaner Complex)-Part-A	TBCB	24 Months	CTUIL	4741
2.	Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1: Bikaner Complex) Part-B	TBCB	24 Months	PFCCL	1876
3.	Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1: Bikaner Complex) Part-C	TBCB	24 Months	PFCCL	3204
4.	Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1: Bikaner Complex) Part-D	TBCB	24 Months	PFCCL	3271
5.	Transmission system for evacuation of power from REZ in Rajasthan (20GW) under Phase-III: Part I	TBCB	42 months	RECPD CL	12,700

4.2 The broad scope of ISTS schemes recommended by NCT to MoP for implementation through TBCB mode, to be notified in Gazette of India is as given below:

Sl. No.	Name of Scheme & Implementation timeframe	Broad Scope	Bid Process Coordinator
1.	Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex)- Part-A  <b>Implementation Timeframe: 24 months</b>	(i) Establishment of 765/400/220 kV Bikaner-III Pooling Station (ii) LILO of both ckts of 400kV Bikaner (PG)-Bikaner-II D/c line (Quad) at Bikaner-III PS (iii) Bikaner-II PS – Bikaner-III PS 400 kV D/c line (Quad) (iv) Bikaner-III - Neemrana-II 765 kV D/c line (v) Associated bays and reactors  <b>(Detailed scope as approved by 9<sup>th</sup> NCT and subsequent amendments thereof)</b>	To be decided by MoP
2.	Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex)- Part-B  <b>Implementation Timeframe: 24 months</b>	1. Establishment of 765/400 kV Neemrana-II S/s 2. Neemrana-II -Kotputli 400 kV D/c line (Quad) 3. LILO of both ckts of 400 kV Gurgaon (PG) - Sohna Road (GPTL) D/c line (Quad) at Neemrana-II S/s 4. Associated bays and reactors  <b>(Detailed scope as approved by 9<sup>th</sup> NCT and subsequent amendments thereof)</b>	To be decided by MoP
3.	Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex)- Part-C  <b>Implementation Timeframe: 24 months</b>	1. Bikaner-III - Neemrana-II 765 kV D/c line (2 <sup>nd</sup> ) 2. Associated bays and reactors  <b>(Detailed scope as approved by 9<sup>th</sup> NCT and subsequent amendments thereof)</b>	To be decided by MoP
4.	Transmission system for	1. Neemrana-II- Bareilly (PG)	To be

Sl. No.	Name of Scheme & Implementation timeframe	Broad Scope	Bid Process Coordinator
	evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex)- Part-D <b>Implementation Timeframe: 24 months</b>	765 kV D/c line 2. Associated bays and reactors <b>(Detailed scope as approved by 9<sup>th</sup> NCT and subsequent amendments thereof)</b>	decided by MoP
5.	Transmission system for evacuation of power from REZ in Rajasthan (20GW) under Phase-III: Part I <b>Implementation Timeframe: 42 months</b>	1. Establishment of 6000MW, $\pm 800$ kV Bhadla (HVDC) terminal station [LCC] (4x1500 MW) at a suitable location near Bhadla-3 substation. 2. Establishment of 6000 MW, $\pm 800$ kV Fatehpur (HVDC) terminal station [LCC] (4x1500 MW) at suitable location near Fatehpur (UP). 3. Bhadla-3 – Bhadla (HVDC) 400 kV 2xD/c line 4. $\pm 800$ kV HVDC line (Hexa lapwing) between Bhadla-3 & Fatehpur (with Dedicated Metallic Return) 5. Establishment of 5x1500 MVA, 765/400 kV ICTs at Fatehpur (HVDC). 6. Associated bays and reactors <b>(Detailed scope as approved by 9<sup>th</sup> NCT and subsequent amendments thereof)</b>	To be decided by MoP

5. Modification in the scope of works of Transmission Scheme awarded through RTM by 8<sup>th</sup> NCT.

5.1 The modified scope of works for Western Region Expansion Scheme-XXV (WRES-XXV) scheme on account of space constraints at Raigarh (Kotra) S/s:

**Raigarh (Kotra) Section-A**

Original Scope	Revised Scope
765/400kV ICT: 1x1500MVA	765/400 kV ICT (Sec-A: 3 <sup>rd</sup> ): 1x1500 MVA

Original Scope	Revised Scope
765kV ICT bay: 1 no.	765 kV bay: 1 no. for change in termination of Champa-I line from existing bay to new bay & Equipment of Existing Main bay of Champa-I line shall be shifted to New ICT Bay (ICT 3 <sup>rd</sup> bay) for utilization.
400kV ICT bay: 1 no.	400 kV ICT bay: 1 no.

### **Raigarh(Kotra) Section-B**

Original Scope	Revised Scope
765/400kV ICT: 2x1500MVA	765/400kV ICTs (Sec-B: 3 <sup>rd</sup> & 4 <sup>th</sup> ): 2x1500MVA
765kV ICT bay: 2 no.	<p><b><u>Sec-B: 3<sup>rd</sup> ICT</u></b></p> <ul style="list-style-type: none"> <li>765kV ICT bay (AIS): 1 no.</li> </ul> <p><b><u>Sec-B: 4<sup>th</sup> ICT</u></b></p> <ul style="list-style-type: none"> <li>765kV ICT bay (GIS): 1 no. consisting of 2 breakers [with Double bus double breaker scheme and the ICT (4<sup>th</sup>) (physically located in the space available near section-A) to be connected with the above bay through GIB Duct]</li> </ul>
400kV ICT bay: 2 no.	<p><b><u>Sec-B: 3<sup>rd</sup> ICT</u></b></p> <ul style="list-style-type: none"> <li>400kV ICT bay (AIS): 1 no. (ICT shall be terminated into above bay using partly 400kV GIB duct and balance by BPI arrangement)</li> </ul> <p><b><u>Sec-B: 4<sup>th</sup> ICT</u></b></p> <ul style="list-style-type: none"> <li>400kV ICT bay (GIS): 1 no. consisting of 2 breakers [with Double bus double breaker scheme and the ICT (4<sup>th</sup>) (physically located in the space available near section-A) to be connected with the above bay through GIB Duct]</li> </ul>

5.2 The revised cost of Western Region Expansion Scheme-XXV (WRES-XXV) scheme is Rs. 381 Crs.

6. Modification in the scope of works of Transmission Scheme presently under bidding (recommended in 5<sup>th</sup> NCT meeting).

6.1 Ministry of Power vide Gazette notification 5032(E) published on 06.12.2021 had appointed RECPDCL as BPC for implementation of the transmission scheme "Establishment of Khavda Pooling Station-2 (KPS-2) in Khavda RE Park" through TBCB route. Space for future provisions at KPS2 needs to be kept. Accordingly, the changes in scope of KPS2 are given as under:

### **Establishment of Khavda Pooling Station-2 (KPS2) in Khavda RE Park**

Sl. No.	Scope of the Transmission Scheme (Original)	Scope of the Transmission Scheme (Revised)
1.	Establishment of 765/400 kV, 4x1500MVA, KPS2 (GIS) with 2x330 MVAR 765 kV bus reactor and 2x125 MVAR 400 kV bus	Establishment of 765/400 kV, 4x1500MVA, KPS2 (GIS) with 2x330 MVAR 765 kV bus reactor and 2x125 MVAR 400 kV bus

Sl. No.	Scope of the Transmission Scheme (Original)	Scope of the Transmission Scheme (Revised)
	<p>reactor.</p> <p>Adequate space for future expansion of 5x1500 MVA 765/400 kV ICT's</p> <p><i>Bus sectionalizer at 765kV &amp; 400kV.</i></p> <p><i>On each bus section, there shall be 2x1500MVA 765/400kV ICTs, 1x330MVAR, 765 kV &amp; 1x125MVAR 420kV bus reactor with space for future expansion.</i></p> <p><i>Bus sectionalizer at 765 kV level shall normally be closed and bus sectionalizer at 400 kV level shall normally be open</i></p> <p>Future provisions: Space for 765/400 kV ICTs along with bays: 5 nos. <b>765kV line bay with switchable line reactor: 8 nos.</b> <b>400kV line bay with switchable line reactor: 10 nos.</b> To take care of any drawal needs of area in future: 400/220 kV ICT: 2 nos. 220 kV line bays: 4 nos.</p>	<p>reactor.</p> <p>Adequate space for future expansion of 5x1500 MVA 765/400 kV ICT's</p> <p><i>Bus sectionalizer at 765kV &amp; 400kV.</i></p> <p><i>On each bus section, there shall be 2x1500MVA 765/400kV ICTs, 1x330MVAR, 765 kV &amp; 1x125MVAR 420kV bus reactor with space for future expansion.</i></p> <p><i>Bus sectionalizer at 765 kV level shall normally be closed and bus sectionalizer at 400 kV level shall normally be open</i></p> <p>Future provisions: Space for 765/400 kV ICTs along with bays: 5 nos. <b>765kV line bay with switchable line reactor: 10 nos.</b> <b>400kV line bay with switchable line reactor: 12 nos.</b> <b>8000MW, ±800kV HVDC Converter station (LCC)</b> To take care of any drawal needs of area in future: 400/220 kV ICT: 2 nos. 220 kV line bays: 4 nos.</p>
2.	LILO of one ckt. Of KPS1- Bhuj PS 765 kV D/c line at KPS2	LILO of one ckt. Of KPS1- Bhuj PS 765 kV D/c line at KPS2

6.2 'Transmission system for evacuation of power from REZ in Rajasthan (20 GW) Phase –III' were approved in the 5<sup>th</sup> NCT meeting. The same was notified by MoP for implementation vide Gazette notification dated 06.12.2021. The transmission schemes are presently under bidding. In regard to the following schemes, some modifications are necessary on account of increase in actual line length (after detailed survey) and incorporation of future provisions as detailed below:

Sl. No.	Scheme	Scope	As approved in 5 <sup>th</sup> NCT	Modification/ Additional provision
1.	Transmission system for evacuation of power from REZ in Rajasthan (20GW) under Phase-III Part A3	Fatehgarh-III PS - Bhadla-III PS 400kV D/c line (Quad)	<ul style="list-style-type: none"> <li>• 400 kV, 50 MVAR Switchable line reactor – 4 nos.</li> <li>• Switching equipment for 400 kV 50 MVAR switchable line reactor – 4 nos.</li> </ul>	<ul style="list-style-type: none"> <li>• 400 kV, 63 MVAR Switchable line reactor – 4 nos.</li> <li>• Switching equipment for 400 kV 63 MVAR switchable line reactor – 4 nos.</li> </ul>
2.	Transmission system for evacuation of power from REZ in Rajasthan (20GW) under Phase-III Part B1	Fatehgarh-II PS – Bhadla-III PS 400kV D/c line (Quad)	<ul style="list-style-type: none"> <li>• 400 kV, 50 MVAR Switchable line reactor – 4 nos.</li> <li>• Switching equipment for 400 kV 50 MVAR switchable line reactor – 4 nos.</li> </ul>	<ul style="list-style-type: none"> <li>• 400 kV, 63 MVAR Switchable line reactor – 4 nos.</li> <li>• Switching equipment for 400 kV 63 MVAR switchable line reactor – 4 nos.</li> </ul>
3.	Transmission system for evacuation of power from REZ in Rajasthan (20GW) under Phase-III Part C1	Establishment of 2x1500 MVA/400kV & 2x500 MVA 400/220 kV pooling station at Ramgarh along with 2x240 MVAR (765kV) Bus Reactor & 2x125 MVAR (420kV) Bus reactor	--	<i>Future provision to be included:</i> Space provision for STATCOM ( $\pm$ 2x300MVAR, 4x125 MVAR MSC, 2x125 MVAR MSR) at Ramgarh S/s

**List of participants of the 9<sup>th</sup> meeting of NCT****CEA:**

1. Sh. Ghanshyam Prasad, Chairperson, CEA & Chairman, NCT
2. Sh. Ajay Talegaonkar, Member (E&C)
3. Sh. Ravinder Gupta, Chief Engineer (PSPA-II)
4. Sh. Ishan Sharan, Chief Engineer (PSPA-I)
5. Sh. B.S. Bairwa, Director (PSPA-II)
6. Smt. Manjari Chaturvedi, Director (PSPA-I)
7. Sh. Subhro Paul, Director (F&CA)
8. Sh. J. Ganeswara Rao, Deputy Director (PSPA-I)
9. Ms. Priyam Shrivastava, Deputy Director (PSPA-I)
10. Sh. Suyash Ayush Verma, Deputy Director (PSPA-II)
11. Sh. Deepanshu Rastogi, Deputy Director (PSPA-II)
12. Sh. Manish Maurya, Assistant Director (PSPA-II)

**MoP:**

1. Sh. Goutam Ghosh, Director (Trans.)

**MNRE:**

1. Sh. Dilip Nigam, Adviser

**NITI Aayog:**

1. Sh. Manoj Kumar Upadhyay, Deputy Adviser

**CTUIL:**

1. Sh. Ashok Pal, Deputy COO
2. Sh. Jasbir Singh, CGM
3. Sh. P.S. Das, Sr.GM
4. Sh. Kashish Bhambhani, GM
5. Sh. Anil Kumar Meena, Sr. DGM
6. Sh. Sandeep Kumawat, CM

**POSOCO:**

1. Sh. S.R. Narasimhan, CMD
2. Sh. Surajit Banerjee, CGM
3. Sh. Vivek Pandey, GM
4. Sh. Priyam Jain, Manager
5. Sh. Prabhankar Porwal, Dy Manager

**Expert Member:**

1. Dr. R. Saha

\*\*\*



# भारत का राजपत्र The Gazette of India

सी.जी.-डी.एल.-अ.-14012023-241990  
CG-DL-E-14012023-241990

असाधारण

**EXTRAORDINARY**

भाग II—खण्ड 3—उप-खण्ड (ii)

**PART II—Section 3—Sub-section (ii)**

प्राधिकार से प्रकाशित

**PUBLISHED BY AUTHORITY**

सं. 221]

नई दिल्ली, शुक्रवार, जनवरी 13, 2023/पौष 23, 1944

No. 221]

NEW DELHI, FRIDAY, JANUARY 13, 2023/PAUSHA 23, 1944

विद्युत मंत्रालय

अधिसूचना

नई दिल्ली, 13 जनवरी, 2023

का.आ. 234(अ).—निम्नलिखित पारेषण स्कीम को नीचे तालिका में वर्णित राजपत्र अधिसूचना द्वारा टैरिफ आधारित प्रतिस्पर्धी बोली (टीबीसीबी) के अंतर्गत कार्यान्वयन के लिए अधिसूचित किया गया था:

क्रम सं.	स्कीम का नाम	राजपत्र अधिसूचना जिसके द्वारा यह स्कीम अधिसूचित की गई थी
1	चरण-II भाग घ के अंतर्गत खावड़ा पीएस में 4.5 गीगावाट आरई अंतःक्षेपण की निकासी के लिए पारेषण स्कीम	सां.आ.3313(अ) दिनांक 25.9.2020 (फा.सं.15/3/2018-पारेषण-पार्ट(2))

2. पारेषण संबंधी राष्ट्रीय समिति की 9वीं बैठक में विद्युत मंत्रालय से उपर्युक्त वर्णित स्कीम को अन-अधिसूचित करने की सिफारिश की गई थी। अतएव, एतद्वारा उक्त स्कीम को इसके कार्यक्षेत्र सहित अन-अधिसूचित किया जाता है।

[फा. सं. 15/3/2018-पारेषण-पार्ट (1)]

मोहम्मद अफजल, संयुक्त सचिव (पारेषण)

## MINISTRY OF POWER

## NOTIFICATION

New Delhi, the 13th January, 2023

**S.O. 234(E).**— The following transmission scheme was notified for implementation under Tariff Based Competitive Bidding (TBCB) vide Gazette Notification mentioned in below table:

Sl. No.	Name of the Scheme	Gazette Notification by which Scheme was notified
1	Transmission scheme for evacuation of 4.5 GW RE injection at Khavda P.S. under Phase-II – Part D	S.O. 3313(E). Dated 25.9.2020 (F.No.15/3/2018-Trans-Pt(2))

2. Above mentioned scheme was recommended to Ministry of Power for de-notification in the 9th meeting of National Committee on Transmission. As such, above scheme including its scope is hereby de-notified.

[F. No. 15/3/2018-Trans-Pt(1)]

MOHAMMAD AFZAL, Jt. Secy. (Trans)

## अधिसूचना

नई दिल्ली, 13 जनवरी, 2023

**का.आ. 235(अ).**—केंद्र सरकार, विद्युत अधिनियम, 2003 (2003 की संख्या 36) की धारा 63 के अंतर्गत परिचालित दिशा-निर्देशों के पैरा 3 के उप-पैरा 3.2 द्वारा प्रदत्त शक्तियों का प्रयोग करते हुए, पारेषण स्कीमों के नाम के सामने दर्शाए अनुसार, पारेषण स्कीमों के लिए एतद्वारा निम्नलिखित बोली-प्रक्रिया समन्वयकों (बीपीसी) को नियुक्त करती है:

क्र.सं.	पारेषण स्कीमों के नाम एवं कार्यक्षेत्र	बोली प्रक्रिया समन्वयकर्ता						
1	राजस्थान आरईजेड फेज-IV (भाग-1) (बीकानेर कॉम्प्लेक्स)- से विद्युत की निकासी के लिए पारेषण प्रणाली - भाग-क  कार्यक्षेत्र:	पीएफसी कंसल्टिंग लिमिटेड						
	<table border="1"> <thead> <tr> <th>क्र.सं.</th> <th>पारेषण स्कीम का कार्यक्षेत्र</th> <th>क्षमता/किमी</th> </tr> </thead> <tbody> <tr> <td>1</td> <td>बीकानेर के निकट उपयुक्त स्थान पर 2x330 एमवीएआर (765 केवी) बस रिएक्टर (110 एमवीएआर की एक अतिरिक्त इकाई के साथ) और 2x125 एमवीएआर (420 केवी) बस रिएक्टर सहित 6x1500 एमवीए (500 एमवीए की एक अतिरिक्त इकाई के साथ) 765/400 केवी और 5x500 एमवीए 400/220 केवी बीकानेर-III पूलिंग स्टेशन की संस्थापना भावी प्रावधान: निम्नलिखित के लिए स्थान</td> <td> <ul style="list-style-type: none"> <li>765/400 केवी 1500 एमवीए आईसीटी: 6 (एक अतिरिक्त इकाई सहित 19x500 एमवीए)</li> <li>765 केवी आईसीटी बे-6</li> <li>765 केवी लाइन बे- 2</li> <li>330 एमवीएआर बस रिएक्टर-2 (एक अतिरिक्त इकाई सहित, 7x110 एमवीएआर)</li> <li>765 केवी रिएक्टर बे-2</li> <li>400/220 केवी, 500 एमवीए आईसीटी- 5</li> <li>400 केवी आईसीटी बे-11</li> </ul> </td> </tr> </tbody> </table>	क्र.सं.	पारेषण स्कीम का कार्यक्षेत्र	क्षमता/किमी	1	बीकानेर के निकट उपयुक्त स्थान पर 2x330 एमवीएआर (765 केवी) बस रिएक्टर (110 एमवीएआर की एक अतिरिक्त इकाई के साथ) और 2x125 एमवीएआर (420 केवी) बस रिएक्टर सहित 6x1500 एमवीए (500 एमवीए की एक अतिरिक्त इकाई के साथ) 765/400 केवी और 5x500 एमवीए 400/220 केवी बीकानेर-III पूलिंग स्टेशन की संस्थापना भावी प्रावधान: निम्नलिखित के लिए स्थान	<ul style="list-style-type: none"> <li>765/400 केवी 1500 एमवीए आईसीटी: 6 (एक अतिरिक्त इकाई सहित 19x500 एमवीए)</li> <li>765 केवी आईसीटी बे-6</li> <li>765 केवी लाइन बे- 2</li> <li>330 एमवीएआर बस रिएक्टर-2 (एक अतिरिक्त इकाई सहित, 7x110 एमवीएआर)</li> <li>765 केवी रिएक्टर बे-2</li> <li>400/220 केवी, 500 एमवीए आईसीटी- 5</li> <li>400 केवी आईसीटी बे-11</li> </ul>	
क्र.सं.	पारेषण स्कीम का कार्यक्षेत्र	क्षमता/किमी						
1	बीकानेर के निकट उपयुक्त स्थान पर 2x330 एमवीएआर (765 केवी) बस रिएक्टर (110 एमवीएआर की एक अतिरिक्त इकाई के साथ) और 2x125 एमवीएआर (420 केवी) बस रिएक्टर सहित 6x1500 एमवीए (500 एमवीए की एक अतिरिक्त इकाई के साथ) 765/400 केवी और 5x500 एमवीए 400/220 केवी बीकानेर-III पूलिंग स्टेशन की संस्थापना भावी प्रावधान: निम्नलिखित के लिए स्थान	<ul style="list-style-type: none"> <li>765/400 केवी 1500 एमवीए आईसीटी: 6 (एक अतिरिक्त इकाई सहित 19x500 एमवीए)</li> <li>765 केवी आईसीटी बे-6</li> <li>765 केवी लाइन बे- 2</li> <li>330 एमवीएआर बस रिएक्टर-2 (एक अतिरिक्त इकाई सहित, 7x110 एमवीएआर)</li> <li>765 केवी रिएक्टर बे-2</li> <li>400/220 केवी, 500 एमवीए आईसीटी- 5</li> <li>400 केवी आईसीटी बे-11</li> </ul>						

	<ul style="list-style-type: none"> <li>स्विचेबल लाइन रिएक्टर सहित 765 केवी लाइन बे-6</li> <li>बे सहित 765 केवी बस रिएक्टर-1</li> <li>स्विचेबल लाइन रिएक्टर सहित 400 केवी लाइन बे-4</li> <li>400 केवी लाइन बे-4</li> <li>बे सहित 400/220 केवी आईसीटी - 5</li> <li>बे सहित 400 केवी बस रिएक्टर-1</li> <li>400 केवी सेक्शनलाइजेशन बे- 2 सेट</li> <li>आरई अनुप्रयोगों की कनेक्टिविटी के लिए 220 केवी लाइन बे- 8</li> <li>220 केवी सेक्शनलाइजेशन बे: 2 सेट</li> <li>220 केवी बीसी (2) तथा 220 केवी टीबीसी (2)</li> <li>एमएससी (4x125 एमवीएआर) तथा एमएसआर (2x125 एमवीएआर) सहित स्टेटकॉम (2x±300 एमवीएआर)</li> </ul>	<ul style="list-style-type: none"> <li>420 केवी रिएक्टर बे- 2</li> <li>125 एमवीएआर, 420 केवी बस रिएक्टर-2</li> <li>400 केवी लाइन बे - 6 (बीकानेर-बीकानेर-द्वितीय डी/सी लाइन के लिलो के लिए 4 और बीकानेर-द्वितीय डी/सी लाइन के लिए 2)</li> <li>220 केवी आईसीटी बे-5</li> <li>220 केवी लाइन बे-6 (आरई कनेक्टिविटी के लिए)</li> <li>220 केवी बीसी (2) तथा 220 केवी टीबीसी (2)</li> <li>220 केवी सेक्शनलाइजेशन बे: 1 सेट</li> </ul>	
2	बीकानेर-III पीएस पर 400 केवी बीकानेर (पीजी)-बीकानेर-II डी/सी लाइन (क्वाड) के दोनों सर्किटों का लिलो	लंबाई: 20 किमी	
3	बीकानेर-II पीएस - बीकानेर-III पीएस 400 केवी डी/सी लाइन (क्वाड)	लंबाई: 30 किमी	
4	बीकानेर-II पर 400 केवी की 2 लाइन बे	400 केवी लाइन बे-2	
5	प्रत्येक सर्किट के लिए प्रत्येक छोर पर 330 एमवीएआर स्विचेबल लाइन रिएक्टर सहित बीकानेर-III - नीमराना-II 765 केवी डी/सी लाइन	लंबाई: 350 किमी	<ul style="list-style-type: none"> <li>बीकानेर-III पीएस पर 765 केवी, 330 एमवीएआर स्विचेबल लाइन रिएक्टर-2</li> <li>नीमराना-II सब/स्टेशन पर 765 केवी, 330 एमवीएआर स्विचेबल लाइन रिएक्टर -2</li> <li>बीकानेर-III पीएस पर 765 केवी, 330 एमवीएआर स्विचेबल लाइन रिएक्टरों के लिए स्विचिंग उपकरण-2</li> </ul>

		<ul style="list-style-type: none"> <li>नीमराना-II सब/स्टेशन पर 765 केवी, 330 एमवीएआर स्विचेबल लाइन रिएक्टरों के लिए स्विचिंग उपकरण -2</li> </ul>						
6	नीमराना-II सब/स्टेशन में 765 केवी की 2 लाइन बे	<ul style="list-style-type: none"> <li>नीमराना-II सब/स्टेशन पर 765 केवी लाइन बे-2</li> </ul>						
<p><b>टिप्पणी:</b></p> <ol style="list-style-type: none"> <li>उक्तवर्णित लाइनों की लंबाईयां अनुमानित हैं क्योंकि सटीक लंबाई विस्तृत सर्वेक्षण के बाद प्राप्त की जाएगी।</li> <li>पावरग्रिड को बीकानेर-द्वितीय पीएस पर 400 केवी की 2 लाइन बे के लिए स्थान उपलब्ध कराना है।</li> <li>नीमराना-II सब/स्टेशन के विकासकर्ता को बीकानेर-III-नीमराना-II 765 केवी डी/सी लाइन को समापन के लिए नीमराना-II सब/स्टेशन पर स्विचेबल लाइन रिएक्टर के लिए स्थान सहित 765 केवी की 2 लाइन बे के लिए स्थान उपलब्ध कराना है।</li> <li>बीकानेर-III पीएस पर शॉर्ट सर्किट स्तर को सीमित करने के लिए 400 केवी और 220 केवी स्तर पर उपयुक्त सेक्शनलाइजेशन का प्रावधान रखा जाएगा।</li> </ol> <p><b>कार्यान्वयन समय-सीमा:</b> सफल बोलीदाता को एसपीवी के अंतरण की तारीख से 24 माह।</p>								
2	राजस्थान आरईजेड फेज-IV (भाग-1) (बीकानेर कॉम्प्लेक्स) -से विद्युत की निकासी के लिए पारेषण प्रणाली - भाग-ख		पीएफसी कंसल्टिंग लिमिटेड					
	<table border="1"> <thead> <tr> <th>क्र.सं.</th> <th>पारेषण स्कीम का कार्यक्षेत्र</th> <th>क्षमता/किमी</th> </tr> </thead> <tbody> <tr> <td>1</td> <td> <p>नीमराना के निकट उपयुक्त स्थान पर 2x330 एमवीएआर (765 केवी) बस रिएक्टर (110 एमवीएआर की एक अतिरिक्त इकाई सहित) और 2x125 एमवीएआर (420 केवी) बस रिएक्टर के साथ 765/400 केवी, 4x1500 एमवीए (500 एमवीए की एक अतिरिक्त इकाई सहित) नीमराना-II सब-स्टेशन की स्थापना</p> <p><b>भावी प्रावधान:निम्नलिखित के लिए स्थान</b></p> <ul style="list-style-type: none"> <li>बे सहित 765/400 केवी आईसीटी-2</li> <li>स्विचेबल लाइन रिएक्टर सहित 765 केवी लाइन बे-12</li> <li>बे सहित 765 केवी बस रिएक्टर: 1</li> <li>स्विचेबल लाइन रिएक्टर सहित</li> </ul> </td> <td> <ul style="list-style-type: none"> <li>765/400 केवी 1500 एमवीए आईसीटी- 4 (13x500 एक अतिरिक्त इकाई सहित)</li> <li>330 एमवीएआर बस रिएक्टर- 2 (7x110 एमवीएआर, एक अतिरिक्त इकाई सहित)</li> <li>765 केवी रिएक्टर बे- 2</li> <li>125 एमवीएआर, 420 केवी बस रिएक्टर - 2</li> <li>420 केवी रिएक्टर बे - 2</li> <li>765 केवी आईसीटी बे- 4</li> <li>400 केवी आईसीटी बे- 4</li> <li>400 केवी लाइन बे - 6 (गुडगांव-सोहना रोड डी/सी लाइन के लिलो के लिए 4 और कोटपुतली डी/सी लाइन के लिए 2)</li> </ul> </td> </tr> </tbody> </table>	क्र.सं.	पारेषण स्कीम का कार्यक्षेत्र	क्षमता/किमी	1	<p>नीमराना के निकट उपयुक्त स्थान पर 2x330 एमवीएआर (765 केवी) बस रिएक्टर (110 एमवीएआर की एक अतिरिक्त इकाई सहित) और 2x125 एमवीएआर (420 केवी) बस रिएक्टर के साथ 765/400 केवी, 4x1500 एमवीए (500 एमवीए की एक अतिरिक्त इकाई सहित) नीमराना-II सब-स्टेशन की स्थापना</p> <p><b>भावी प्रावधान:निम्नलिखित के लिए स्थान</b></p> <ul style="list-style-type: none"> <li>बे सहित 765/400 केवी आईसीटी-2</li> <li>स्विचेबल लाइन रिएक्टर सहित 765 केवी लाइन बे-12</li> <li>बे सहित 765 केवी बस रिएक्टर: 1</li> <li>स्विचेबल लाइन रिएक्टर सहित</li> </ul>	<ul style="list-style-type: none"> <li>765/400 केवी 1500 एमवीए आईसीटी- 4 (13x500 एक अतिरिक्त इकाई सहित)</li> <li>330 एमवीएआर बस रिएक्टर- 2 (7x110 एमवीएआर, एक अतिरिक्त इकाई सहित)</li> <li>765 केवी रिएक्टर बे- 2</li> <li>125 एमवीएआर, 420 केवी बस रिएक्टर - 2</li> <li>420 केवी रिएक्टर बे - 2</li> <li>765 केवी आईसीटी बे- 4</li> <li>400 केवी आईसीटी बे- 4</li> <li>400 केवी लाइन बे - 6 (गुडगांव-सोहना रोड डी/सी लाइन के लिलो के लिए 4 और कोटपुतली डी/सी लाइन के लिए 2)</li> </ul>	
क्र.सं.	पारेषण स्कीम का कार्यक्षेत्र	क्षमता/किमी						
1	<p>नीमराना के निकट उपयुक्त स्थान पर 2x330 एमवीएआर (765 केवी) बस रिएक्टर (110 एमवीएआर की एक अतिरिक्त इकाई सहित) और 2x125 एमवीएआर (420 केवी) बस रिएक्टर के साथ 765/400 केवी, 4x1500 एमवीए (500 एमवीए की एक अतिरिक्त इकाई सहित) नीमराना-II सब-स्टेशन की स्थापना</p> <p><b>भावी प्रावधान:निम्नलिखित के लिए स्थान</b></p> <ul style="list-style-type: none"> <li>बे सहित 765/400 केवी आईसीटी-2</li> <li>स्विचेबल लाइन रिएक्टर सहित 765 केवी लाइन बे-12</li> <li>बे सहित 765 केवी बस रिएक्टर: 1</li> <li>स्विचेबल लाइन रिएक्टर सहित</li> </ul>	<ul style="list-style-type: none"> <li>765/400 केवी 1500 एमवीए आईसीटी- 4 (13x500 एक अतिरिक्त इकाई सहित)</li> <li>330 एमवीएआर बस रिएक्टर- 2 (7x110 एमवीएआर, एक अतिरिक्त इकाई सहित)</li> <li>765 केवी रिएक्टर बे- 2</li> <li>125 एमवीएआर, 420 केवी बस रिएक्टर - 2</li> <li>420 केवी रिएक्टर बे - 2</li> <li>765 केवी आईसीटी बे- 4</li> <li>400 केवी आईसीटी बे- 4</li> <li>400 केवी लाइन बे - 6 (गुडगांव-सोहना रोड डी/सी लाइन के लिलो के लिए 4 और कोटपुतली डी/सी लाइन के लिए 2)</li> </ul>						

	<p>400 केवी लाइन बे-6</p> <ul style="list-style-type: none"> <li>बे सहित 400 केवी बस रिएक्टर: 1</li> <li>400 केवी सेक्शनलाइजेशन बे- 2 सेट</li> </ul>											
2	नीमराना-II-कोटपुतली 400 केवी डी/सी लाइन (क्वाड)	लंबाई: 70 किमी										
3	कोटपुतली पर 400 केवी की 2 लाइन बे	कोटपुतली पर 400 केवी लाइन बे- 2										
4	नीमराना-II सब/स्टेशन पर 400 केवी गुडगांव (पीजी) - सोहना रोड (जीपीटीएल) डी/सी लाइन (क्वाड) के दोनों सर्किटों का लिलो	लंबाई: 85 किमी										
<p><b>टिप्पणी:</b></p> <ol style="list-style-type: none"> <li>उक्तवर्णित लाइनों की लंबाईयां अनुमानित हैं क्योंकि सटीक लंबाई विस्तृत सर्वेक्षण के बाद प्राप्त की जाएगी।</li> <li>नीमराना-II सब/स्टेशनपर शॉर्ट सर्किट स्तर को सीमित करने के लिए 400 केवी स्तर पर उपयुक्त सेक्शनलाइजेशन का प्रावधान रखा जाएगा।</li> <li>पावरग्रिड को कोटपुतली सब/स्टेशन पर 400 केवी की 2 लाइन बे के लिए स्थान उपलब्ध कराना है।</li> <li>इस पैकेज का कार्यान्वयन पैकेज 'क' के अनुरूप आरंभ किया जाएगा।</li> </ol> <p><b>कार्यान्वयन समय-सीमा:</b> सफल बोलीदाता को एसपीवी के अंतरण की तारीख से 24 महीने।</p>												
3	<p>राजस्थान आरईजेड फेज-IV (भाग-1) (बीकानेर कॉम्प्लेक्स) - से विद्युत की निकासी के लिए पारेषण प्रणाली - भाग-ग</p> <table border="1"> <thead> <tr> <th>क्र.सं.</th> <th>पारेषण स्कीम का कार्यक्षेत्र</th> <th>क्षमता/किमी</th> </tr> </thead> <tbody> <tr> <td>1</td> <td>प्रत्येक सर्किट के लिए प्रत्येक छोर पर 330 एमवीएआर स्विचेबल लाइन रिएक्टर सहित बीकानेर-III - नीमराना-II 765 केवी डी/सी लाइन (द्वितीय)</td> <td> <p>लंबाई: 350 किमी</p> <ul style="list-style-type: none"> <li>बीकानेर-III पीएस पर 765 केवी, 330 एमवीएआर स्विचेबल लाइन रिएक्टर-2</li> <li>नीमराना-II पर 765 केवी, 330 एमवीएआर स्विचेबल लाइन रिएक्टर-2</li> <li>बीकानेर-III पीएस पर 765 केवी 330 एमवीएआर स्विचेबल लाइन रिएक्टरों के लिए स्विचिंग उपकरण-2</li> <li>नीमराना-II सब/स्टेशन पर 765 केवी 330 एमवीएआर स्विचेबल लाइन रिएक्टरों के लिए स्विचिंग उपकरण-2</li> </ul> </td> </tr> <tr> <td>2</td> <td>बीकानेर-III पीएस और नीमराना-II सब/स्टेशन, प्रत्येक पर 765 केवी लाइन बे 2</td> <td>765 केवी लाइन बे-4 (बीकानेर-III पीएस और नीमराना-II सब/स्टेशन पर प्रत्येक के लिए 2)</td> </tr> </tbody> </table>		क्र.सं.	पारेषण स्कीम का कार्यक्षेत्र	क्षमता/किमी	1	प्रत्येक सर्किट के लिए प्रत्येक छोर पर 330 एमवीएआर स्विचेबल लाइन रिएक्टर सहित बीकानेर-III - नीमराना-II 765 केवी डी/सी लाइन (द्वितीय)	<p>लंबाई: 350 किमी</p> <ul style="list-style-type: none"> <li>बीकानेर-III पीएस पर 765 केवी, 330 एमवीएआर स्विचेबल लाइन रिएक्टर-2</li> <li>नीमराना-II पर 765 केवी, 330 एमवीएआर स्विचेबल लाइन रिएक्टर-2</li> <li>बीकानेर-III पीएस पर 765 केवी 330 एमवीएआर स्विचेबल लाइन रिएक्टरों के लिए स्विचिंग उपकरण-2</li> <li>नीमराना-II सब/स्टेशन पर 765 केवी 330 एमवीएआर स्विचेबल लाइन रिएक्टरों के लिए स्विचिंग उपकरण-2</li> </ul>	2	बीकानेर-III पीएस और नीमराना-II सब/स्टेशन, प्रत्येक पर 765 केवी लाइन बे 2	765 केवी लाइन बे-4 (बीकानेर-III पीएस और नीमराना-II सब/स्टेशन पर प्रत्येक के लिए 2)	पीएफसी कंसल्टिंग लिमिटेड
क्र.सं.	पारेषण स्कीम का कार्यक्षेत्र	क्षमता/किमी										
1	प्रत्येक सर्किट के लिए प्रत्येक छोर पर 330 एमवीएआर स्विचेबल लाइन रिएक्टर सहित बीकानेर-III - नीमराना-II 765 केवी डी/सी लाइन (द्वितीय)	<p>लंबाई: 350 किमी</p> <ul style="list-style-type: none"> <li>बीकानेर-III पीएस पर 765 केवी, 330 एमवीएआर स्विचेबल लाइन रिएक्टर-2</li> <li>नीमराना-II पर 765 केवी, 330 एमवीएआर स्विचेबल लाइन रिएक्टर-2</li> <li>बीकानेर-III पीएस पर 765 केवी 330 एमवीएआर स्विचेबल लाइन रिएक्टरों के लिए स्विचिंग उपकरण-2</li> <li>नीमराना-II सब/स्टेशन पर 765 केवी 330 एमवीएआर स्विचेबल लाइन रिएक्टरों के लिए स्विचिंग उपकरण-2</li> </ul>										
2	बीकानेर-III पीएस और नीमराना-II सब/स्टेशन, प्रत्येक पर 765 केवी लाइन बे 2	765 केवी लाइन बे-4 (बीकानेर-III पीएस और नीमराना-II सब/स्टेशन पर प्रत्येक के लिए 2)										

	<p><b>टिप्पणी:</b></p> <ol style="list-style-type: none"> <li>1. उक्तवर्णित लाइनों की लंबाईयां अनुमानित है क्योंकि सटीक लंबाई विस्तृत सर्वेक्षण के बाद प्राप्त की जाएगी।</li> <li>2. बीकानेर-II पीएस तथा नीमराना-II सब/स्टेशन के विकासकर्ता को बीकानेर-III-नीमराना-II 765 केवी डी/सी लाइन (द्वितीय) के समापन के लिए बीकानेर-III पीएस तथा नीमराना-II सब/स्टेशन पर प्रत्येक के लिए स्विचेबल लाइन रिएक्टर के लिए स्थानसहित 765 केवी की 2 लाइन बे के लिए स्थान उपलब्ध कराना है।</li> </ol> <p><b>कार्यान्वयन समय-सीमा:</b> सफल बोलीदाता को एसपीवी के अंतरण की तारीख से 24 महीने।</p>										
4	<p>राजस्थान आरईजेड फेज-IV (भाग-1) (बीकानेर कॉम्प्लेक्स)- से विद्युत की निकासी के लिए पारेषण प्रणाली - भाग-घ</p> <table border="1"> <thead> <tr> <th>क्र.सं.</th> <th>पारेषण स्कीम का कार्यक्षेत्र</th> <th>क्षमता/किमी</th> </tr> </thead> <tbody> <tr> <td>1</td> <td>प्रत्येक सर्किट के लिए प्रत्येक छोर पर 330 एमवीएआर स्विचेबल लाइन रिएक्टर सहित नीमराना-II- बरेली (पीजी) 765 केवी डी/सी लाइन</td> <td>           लंबाई: 350 किमी            • नीमराना-II सब/स्टेशन पर 765 केवी, 330 एमवीएआर स्विचेबल लाइन रिएक्टर-2            • बरेली (पीजी) पर 765 केवी, 330 एमवीएआर स्विचेबल लाइन रिएक्टर-2            • नीमराना-II सब/स्टेशन पर 765 केवी 330 एमवीएआर स्विचेबल लाइन रिएक्टरों के लिए स्विचिंग उपकरण-2            • बरेली (पीजी) सब/स्टेशन पर 765 केवी 330 एमवीएआर स्विचेबल लाइन रिएक्टरों के लिए स्विचिंग उपकरण-2         </td> </tr> <tr> <td>2</td> <td>नीमराना-द्वितीय और बरेली (पीजी) सब/स्टेशन पर प्रत्येक के लिए 765 केवी लाइन बे 2</td> <td>765 केवी लाइन बे- 4 (नीमराना-द्वितीय और बरेली (पीजी) सब/स्टेशन पर प्रत्येक के लिए 2)</td> </tr> </tbody> </table> <p><b>टिप्पणी:</b></p> <ol style="list-style-type: none"> <li>1) इस पैकेज का कार्यान्वयन पैकेज 'ग' के अनुरूप आरंभ किया जाएगा।</li> <li>2) उक्तवर्णित लाइनों की लंबाईयां अनुमानित है क्योंकि सटीक लंबाई विस्तृत सर्वेक्षण के बाद प्राप्त की जाएगी।</li> <li>3) नीमराना-II सब/स्टेशन के विकासकर्ता को नीमराना-II- बरेली (पीजी) 765 केवी डी/सी लाइन के समापन के लिए नीमराना-II सब/स्टेशन पर स्विचेबल लाइन रिएक्टर के लिए स्थानसहित 765 केवी की 2 लाइन बे के लिए स्थान उपलब्ध कराना है।</li> <li>4) पावरग्रिड को बरेली (पीजी) सब/स्टेशन पर स्विचेबल लाइन रिएक्टर के लिए स्थान सहित 765 केवी की 2 लाइन बे के लिए स्थान उपलब्ध कराना है।</li> </ol> <p><b>कार्यान्वयन समय-सीमा:</b> सफल बोलीदाता को एसपीवी के हस्तांतरण की तारीख से 24 महीने।</p>	क्र.सं.	पारेषण स्कीम का कार्यक्षेत्र	क्षमता/किमी	1	प्रत्येक सर्किट के लिए प्रत्येक छोर पर 330 एमवीएआर स्विचेबल लाइन रिएक्टर सहित नीमराना-II- बरेली (पीजी) 765 केवी डी/सी लाइन	लंबाई: 350 किमी • नीमराना-II सब/स्टेशन पर 765 केवी, 330 एमवीएआर स्विचेबल लाइन रिएक्टर-2 • बरेली (पीजी) पर 765 केवी, 330 एमवीएआर स्विचेबल लाइन रिएक्टर-2 • नीमराना-II सब/स्टेशन पर 765 केवी 330 एमवीएआर स्विचेबल लाइन रिएक्टरों के लिए स्विचिंग उपकरण-2 • बरेली (पीजी) सब/स्टेशन पर 765 केवी 330 एमवीएआर स्विचेबल लाइन रिएक्टरों के लिए स्विचिंग उपकरण-2	2	नीमराना-द्वितीय और बरेली (पीजी) सब/स्टेशन पर प्रत्येक के लिए 765 केवी लाइन बे 2	765 केवी लाइन बे- 4 (नीमराना-द्वितीय और बरेली (पीजी) सब/स्टेशन पर प्रत्येक के लिए 2)	पीएफसी कंसल्टिंग लिमिटेड
क्र.सं.	पारेषण स्कीम का कार्यक्षेत्र	क्षमता/किमी									
1	प्रत्येक सर्किट के लिए प्रत्येक छोर पर 330 एमवीएआर स्विचेबल लाइन रिएक्टर सहित नीमराना-II- बरेली (पीजी) 765 केवी डी/सी लाइन	लंबाई: 350 किमी • नीमराना-II सब/स्टेशन पर 765 केवी, 330 एमवीएआर स्विचेबल लाइन रिएक्टर-2 • बरेली (पीजी) पर 765 केवी, 330 एमवीएआर स्विचेबल लाइन रिएक्टर-2 • नीमराना-II सब/स्टेशन पर 765 केवी 330 एमवीएआर स्विचेबल लाइन रिएक्टरों के लिए स्विचिंग उपकरण-2 • बरेली (पीजी) सब/स्टेशन पर 765 केवी 330 एमवीएआर स्विचेबल लाइन रिएक्टरों के लिए स्विचिंग उपकरण-2									
2	नीमराना-द्वितीय और बरेली (पीजी) सब/स्टेशन पर प्रत्येक के लिए 765 केवी लाइन बे 2	765 केवी लाइन बे- 4 (नीमराना-द्वितीय और बरेली (पीजी) सब/स्टेशन पर प्रत्येक के लिए 2)									

5	राजस्थान में चरण-III भाग I के अंतर्गत आरईजेड में विद्युत(20 जीडब्ल्यू) की निकासी के लिए पारेषण प्रणाली		आरईसी पावर डवलपमेंट एवं कंसल्टेंसी लिमिटेड
क्र.सं.	पारेषण स्कीम का कार्यक्षेत्र	क्षमता/किमी	
1	भादला-3 सबस्टेशन के निकट किसी उपयुक्त स्थान पर 6000 मेगावाट, ± 800 केवी भादला (एचवीडीसी) [एलसीसी] टर्मिनल स्टेशन (4x1500 मेगावाट) की स्थापना	<ul style="list-style-type: none"> <li>एचवीडीसी टर्मिनल को आनुषंगिक विद्युत की विशिष्ट आपूर्ति के लिए 400/33 केवी, 2x50 एमवीए ट्रांसफार्मर।</li> <li>भादला (एचवीडीसी) स्टेशन पर 400 केवी बस सेक्शन लाइजर-2(1 सेट)</li> </ul>	
2	फतेहपुर (यूपी) के निकट किसी उपयुक्त स्थान पर 6000 मेगावाट, ±800 केवी फतेहपुर (एचवीडीसी) [एलसीसी] टर्मिनल स्टेशन (4x1500 मेगावाट) की स्थापना		
3	भादला-3 - भादला (एचवीडीसी) 400 केवी 2xडी/सी क्राड मूज लाइन के साथ-साथ दोनों सबस्टेशनों पर लाइन बे	<ul style="list-style-type: none"> <li>लाइन की लंबाई- 2 किमी</li> <li>400 केवी लाइन बे -8</li> </ul>	
4	भादला (एचवीडीसी) और फतेहपुर (एचवीडीसी) के बीच ±800 केवी एचवीडीसी लाइन (हेक्सा लैपविंग) (डेडिकेटेड मैटेलिक रिटर्न के साथ)	<ul style="list-style-type: none"> <li>लाइन की लंबाई- 950 किमी</li> </ul>	
5	<p>फतेहपुर (एचवीडीसी) में 2x330 एमवीएआर (765केवी) बस रिएक्टर के साथ 5x1500 एमवीए, 765/400 केवी आईसीटी की स्थापना</p> <p><b>भावी प्रावधान:निम्नलिखित के लिए स्थान-</b></p> <ul style="list-style-type: none"> <li>बे सहित 765/400 केवी आईसीटी: 1</li> <li>स्विचेबल लाइन रिएक्टर सहित 765 केवी लाइन बे: 4</li> <li>बे सहित 765 केवी बस रिएक्टर: 2</li> <li>बे सहित 400/220 केवी आईसीटी: 4</li> <li>स्विचेबल लाइन रिएक्टर सहित 400 केवी लाइन बे: 4</li> <li>बे सहित 400 केवी बस रिएक्टर: 1</li> <li>220 केवी लाइन बे: 6</li> </ul>	<ul style="list-style-type: none"> <li>765/400 केवी 1500 एमवीए आईसीटी: 5 (16x500 एमवीए, एक अतिरिक्त इकाई सहित)</li> <li>765 केवी आईसीटी बे- 5</li> <li>400 केवी आईसीटी बे- 5</li> <li>400 केवी बस सेक्शन लाइजर-2 (1 सेट)</li> <li>765 केवी लाइन बे-4</li> <li>330 एमवीएआर, 765 केवी बस रिएक्टर-2 (7x110 एमवीएआर, एक अतिरिक्त इकाई सहित)</li> <li>765 केवी रिएक्टर बे-2</li> </ul>	
6	फतेहपुर में 765 केवी वाराणसी-		

	<b>कानपुर (जीआईएस) डी/सी लाइन के दोनों सर्किट का लीलो - (30 किमी)</b>	
<b>टिप्पणी:</b>		
1. भदला-III सब/स्टेशन के विकासकर्ता को अपने सबस्टेशन पर 400 केवी के 4 बे के लिए स्थान उपलब्ध कराना है। 2. उक्तवर्णित लाइनों की लंबाईयां अनुमानित है क्योंकि सटीक लंबाई विस्तृत सर्वेक्षण के बाद प्राप्त की जाएगी।		
<b>कार्यान्वयन समय-सीमा:</b> सफल बोलीदाता को एसपीवी के हस्तांतरण की तारीख से 42महीने।		

2. बोली-प्रक्रिया समन्वयकों की नियुक्ति इस संबंध में विद्युत मंत्रालय द्वारा, समय-समय पर यथा संशोधित दिशा-निर्देशों में निर्धारित शर्तों के अधीन है।

[फा. सं. 15/3/2018-ट्रांस-भाग(1)]

मोहम्मद अफजल, संयुक्त सचिव (ट्रांस)

### NOTIFICATION

New Delhi, the 13th January, 2023

**S.O. 235(E).**—In exercise of the powers conferred by sub- para 3.2 of Para 3 of the Guidelines circulated under Section 63 of the Electricity Act, 2003 (no. 36 of 2003), the Central Government hereby appoints the following Bid-Process Coordinators (BPCs) for the Transmission Schemes, as shown against the name of the Transmission Schemes: -

Sl. No.	Name & Scope of the Transmission Scheme	Bid Process Coordinator						
1	<b>Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex)- Part-A</b>  <b>Scope:</b>	PFC Consulting Ltd.						
1	<table border="1" style="width: 100%;"> <thead> <tr> <th style="text-align: center;">Sl. No.</th> <th style="text-align: center;">Scope of Transmission Scheme</th> <th style="text-align: center;">Capacity /km</th> </tr> </thead> <tbody> <tr> <td style="text-align: center;">1</td> <td> Establishment of 6x1500 MVA (along with one spare unit of 500 MVA), 765/400 kV &amp; 5x500 MVA 400/220 kV Bikaner-III Pooling Station along with 2x330 MVA (765kV) Bus Reactor (along with one spare unit of 110 MVA) &amp; 2x125 MVA (420kV) Bus Reactor at a suitable location near Bikaner   <b>Future provisions: Space for</b> <ul style="list-style-type: none"> <li>• 765 kV line bays along with switchable line reactors – 6 nos.</li> <li>• 765kV Bus Reactor along with bay: 1 no.</li> <li>• 400 kV line bays along with switchable line reactor –4 nos.</li> <li>• 400 kV line bays –4 nos.</li> <li>• 400/220kV ICT along with bays -5 nos.</li> <li>• 400 kV Bus Reactor along with</li> </ul> </td> <td> <ul style="list-style-type: none"> <li>• 765/400kV 1500 MVA ICTs: 6 nos (19x500 MVA including one spare unit)</li> <li>• 765kV ICT bays – 6 nos.</li> <li>• 765kV line bays- 2 nos.</li> <li>• 330 MVA Bus Reactor-2 nos. (7x110 MVA, including one spare unit)</li> <li>• 765kV reactor bays- 2 nos.</li> <li>• 400/220 kV, 500 MVA ICTs – 5 nos</li> <li>• 400 kV ICT bays – 11 nos.</li> <li>• 420 kV reactor bays - 2 nos.</li> <li>• 125 MVA, 420kV bus reactor - 2 nos.</li> <li>• 400 kV line bays - 6 nos.(4 nos. for LILO of Bikaner-Bikaner-II D/c line &amp; 2 nos. for Bikaner-II D/c line)</li> <li>• 220 kV ICT bays - 5 nos.</li> </ul> </td> </tr> </tbody> </table>	Sl. No.	Scope of Transmission Scheme	Capacity /km	1	Establishment of 6x1500 MVA (along with one spare unit of 500 MVA), 765/400 kV & 5x500 MVA 400/220 kV Bikaner-III Pooling Station along with 2x330 MVA (765kV) Bus Reactor (along with one spare unit of 110 MVA) & 2x125 MVA (420kV) Bus Reactor at a suitable location near Bikaner  <b>Future provisions: Space for</b> <ul style="list-style-type: none"> <li>• 765 kV line bays along with switchable line reactors – 6 nos.</li> <li>• 765kV Bus Reactor along with bay: 1 no.</li> <li>• 400 kV line bays along with switchable line reactor –4 nos.</li> <li>• 400 kV line bays –4 nos.</li> <li>• 400/220kV ICT along with bays -5 nos.</li> <li>• 400 kV Bus Reactor along with</li> </ul>	<ul style="list-style-type: none"> <li>• 765/400kV 1500 MVA ICTs: 6 nos (19x500 MVA including one spare unit)</li> <li>• 765kV ICT bays – 6 nos.</li> <li>• 765kV line bays- 2 nos.</li> <li>• 330 MVA Bus Reactor-2 nos. (7x110 MVA, including one spare unit)</li> <li>• 765kV reactor bays- 2 nos.</li> <li>• 400/220 kV, 500 MVA ICTs – 5 nos</li> <li>• 400 kV ICT bays – 11 nos.</li> <li>• 420 kV reactor bays - 2 nos.</li> <li>• 125 MVA, 420kV bus reactor - 2 nos.</li> <li>• 400 kV line bays - 6 nos.(4 nos. for LILO of Bikaner-Bikaner-II D/c line &amp; 2 nos. for Bikaner-II D/c line)</li> <li>• 220 kV ICT bays - 5 nos.</li> </ul>	
Sl. No.	Scope of Transmission Scheme	Capacity /km						
1	Establishment of 6x1500 MVA (along with one spare unit of 500 MVA), 765/400 kV & 5x500 MVA 400/220 kV Bikaner-III Pooling Station along with 2x330 MVA (765kV) Bus Reactor (along with one spare unit of 110 MVA) & 2x125 MVA (420kV) Bus Reactor at a suitable location near Bikaner  <b>Future provisions: Space for</b> <ul style="list-style-type: none"> <li>• 765 kV line bays along with switchable line reactors – 6 nos.</li> <li>• 765kV Bus Reactor along with bay: 1 no.</li> <li>• 400 kV line bays along with switchable line reactor –4 nos.</li> <li>• 400 kV line bays –4 nos.</li> <li>• 400/220kV ICT along with bays -5 nos.</li> <li>• 400 kV Bus Reactor along with</li> </ul>	<ul style="list-style-type: none"> <li>• 765/400kV 1500 MVA ICTs: 6 nos (19x500 MVA including one spare unit)</li> <li>• 765kV ICT bays – 6 nos.</li> <li>• 765kV line bays- 2 nos.</li> <li>• 330 MVA Bus Reactor-2 nos. (7x110 MVA, including one spare unit)</li> <li>• 765kV reactor bays- 2 nos.</li> <li>• 400/220 kV, 500 MVA ICTs – 5 nos</li> <li>• 400 kV ICT bays – 11 nos.</li> <li>• 420 kV reactor bays - 2 nos.</li> <li>• 125 MVA, 420kV bus reactor - 2 nos.</li> <li>• 400 kV line bays - 6 nos.(4 nos. for LILO of Bikaner-Bikaner-II D/c line &amp; 2 nos. for Bikaner-II D/c line)</li> <li>• 220 kV ICT bays - 5 nos.</li> </ul>						

	bay: 1 no. <ul style="list-style-type: none"> <li>• 400kV Sectionalization bay: 2 sets</li> <li>• 220 kV line bays for connectivity of RE Applications -8 nos.</li> <li>• 220kV Sectionalization bay: 2 sets</li> <li>• 220 kV BC (2 no.) and 220 kV TBC (2 no.)</li> <li>• STATCOM (2x±300MVA) along with MSC (4x125 MVA) &amp; MSR (2x125 MVA)</li> </ul>	<ul style="list-style-type: none"> <li>• 220 kV line bays – 6 nos (for RE connectivity)</li> <li>• 220 kV BC (2 no.) and 220 kV TBC (2 no.)</li> <li>• 220kV Sectionalisation bay: 1 set</li> </ul>	
2	LILO of both ckts of 400kV Bikaner (PG)-Bikaner-II D/c line(Quad) at Bikaner-III PS	Length: 20 km	
3	Bikaner-II PS – Bikaner-III PS 400 kV D/c line (Quad)	Length: 30 km	
4	2 no. of 400 kV line bays at Bikaner-II	400 kV line bays - 2 nos.	
5	Bikaner-III - Neemrana-II 765 kV D/c line along with 330 MVA switchable line reactor for each circuit at each end	Length: 350 km <ul style="list-style-type: none"> <li>• 765 kV, 330 MVA switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• 765 kV, 330 MVA Switchable line reactors at Neemrana-II S/s – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVA switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVA switchable line reactors at Neemrana-II S/s – 2 nos.</li> </ul>	
6	2 no. of 765 kV line bays at Neemrana-II S/s	• 765 kV line bays at Neemrana-II S/s- 2nos.	
<p><b>Note:</b></p> <ol style="list-style-type: none"> <li>1) The line lengths mentioned above are approximate as the exact length shall be obtained after the detailed survey</li> <li>2) POWERGRID to provide space for 2 nos. of 400 kV line bays at Bikaner-II PS</li> <li>3) Developer of Neemrana-II S/s to provide space for 2 nos. of 765 kV line bays alongwith space for Switchable line reactor at Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line</li> <li>4) Provision of suitable sectionalization shall be kept at Bikaner-III PS at 400kV &amp; 220kV level to limit short circuit level</li> </ol> <p><b>Implementation timeframe:</b> 24 months from the date of transfer of SPV to the successful bidder.</p>			
2	<b>Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex)- Part-B</b>		<b>PFC Consulting Ltd.</b>
	<b>Sl.No.</b>	<b>Scope of Transmission Scheme</b>	<b>Capacity /km</b>
	1	Establishment of 765/400 kV, 4x1500 MVA (along with one spare unit of 500MVA)	• 765/400kV 1500 MVA ICTs – 4 nos (13x500 MVA including one spare unit)

	<p>Neemrana-II S/s along with 2x330 MVA (765kV) Bus Reactor (along with one spare unit of 110 MVA) &amp; 2x125 MVA (420kV) Bus Reactor at a suitable location near Neemrana</p> <p><b>Future provisions: Space for</b></p> <ul style="list-style-type: none"> <li>• 765/400kV ICT along with bays- 2</li> <li>• 765 kV line bays along with switchable line reactors – 12</li> <li>• 765kV Bus Reactor along with bay: 1 nos.</li> <li>• 400 kV line bays along with switchable line reactor –6</li> <li>• 400 kV Bus Reactor along with bays: 1 no.</li> <li>• 400kV Sectionalization bay: 2 sets</li> </ul>	<ul style="list-style-type: none"> <li>• 330 MVA Bus Reactor-2 nos (7x110 MVA, including one spare unit)</li> <li>• 765kV reactor bays- 2 nos.</li> <li>• 125 MVA, 420kV bus reactor - 2 nos.</li> <li>• 420 kV reactor bays - 2 nos.</li> <li>• 765kV ICT bays – 4 nos.</li> <li>• 400 kV ICT bays – 4 nos.</li> <li>• 400 kV line bays - 6 nos (4 nos. for LILO of Gurgaon -Sohna Road D/c line &amp; 2 nos. for Kotputli D/c line)</li> </ul>	
2	Neemrana-II -Kotputli 400 kV D/c line (Quad)	Length: 70 km	
3	2 no. of 400 kV line bays at Kotputli	400 kV line bays at Kotputli - 2 nos.	
4	LILO of both ckts of 400 kV Gurgaon (PG) - Sohna Road (GPTL) D/c line (Quad) at Neemrana-II S/s	Length: 85 km	
<p><b>Note:</b></p> <ol style="list-style-type: none"> <li>1) The line lengths mentioned above are approximate as the exact length shall be obtained after the detailed survey</li> <li>2) Provision of suitable sectionalization shall be kept at Neemrana-II S/s at 400kV level to limit short circuit level</li> <li>3) POWERGRID to provide space for 2 nos. of 400 kV line bays at Kotputli S/s</li> <li>4) The implementation of package shall be taken up matching with Package A</li> </ol> <p><b>Implementation timeframe:</b> 24 months from the date of transfer of SPV to the successful bidder.</p>			
3	<b>Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex)- Part-C</b>		<b>PFC Consulting Ltd.</b>
	<b>Sl.No.</b>	<b>Scope of Transmission Scheme</b>	<b>Capacity /km</b>
	1	Bikaner-III - Neemrana-II 765 kV D/c line (2 <sup>nd</sup> ) along with 330 MVA switchable line reactor for each circuit at each end	<p>Length: 350 km</p> <ul style="list-style-type: none"> <li>• 765 kV, 330 MVA Switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• 765 kV, 330 MVA Switchable line reactors at Neemrana-II – 2 nos.</li> <li>• Switching equipment for 765 kV 330 MVA switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• Switching equipment for 765 kV</li> </ul>

		330 MVAr switchable line reactors at Neemrana-II S/s – 2 nos.										
2	2 no. of 765 kV line bays each at Bikaner-III PS & Neemrana-II S/s	765kV line bays - 4 nos (2 nos. each at Bikaner-III PS & Neemrana-II S/s)										
<p><b>Note:</b></p> <ol style="list-style-type: none"> <li>The line lengths mentioned above are approximate as the exact length shall be obtained after the detailed survey</li> <li>Developer of Bikaner-III PS &amp; Neemrana-II S/s to provide space for 2 nos. of 765 kV line bays alongwith space for Switchable line reactor each at Bikaner-III PS &amp; Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2<sup>nd</sup>)</li> </ol> <p><b>Implementation timeframe:</b> 24 months from the date of transfer of SPV to the successful bidder.</p>												
4	<p><b>Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex)- Part-D</b></p> <table border="1"> <thead> <tr> <th>Sl.No.</th> <th>Scope of Transmission Scheme</th> <th>Capacity /km</th> </tr> </thead> <tbody> <tr> <td>1</td> <td>Neemrana-II- Bareilly (PG) 765 kV D/c line along with 330 MVAr switchable line reactor for each circuit at each end</td> <td>           Length: 350 km           <ul style="list-style-type: none"> <li>765 kV, 330 MVAr switchable line reactors at Neermna-II S/s– 2 nos.</li> <li>765 kV, 330 MVAr Switchable line reactors at Bareilly(PG) – 2 nos.</li> <li>Switching equipment for 765kV 330 MVAr switchable line reactors at Neermna-II S/s – 2 nos.</li> <li>Switching equipment for 765kV 330 MVAr switchable line reactors at Bareilly(PG) S/s – 2 nos.</li> </ul> </td> </tr> <tr> <td>2</td> <td>2 no. of 765 kV line bays each at Neemrana-II &amp; Bareilly (PG) S/s</td> <td>765kV line bays - 4 nos (2 nos. each at Neemrana-II &amp; Bareilly (PG) S/s)</td> </tr> </tbody> </table> <p><b>Note:</b></p> <ol style="list-style-type: none"> <li>The implementation of package shall be taken up matching with Package C.</li> <li>The line lengths mentioned above are approximate as the exact length shall be obtained after the detailed survey.</li> <li>Developer of Neermna-II S/s to provide space for 2 nos. of 765 kV line bays along with space for Switchable line reactor at Neermna-II S/s for termination of Neermna-II- Bareilly (PG) 765 kV D/c line</li> <li>POWERGRID to provide space for 2 nos. of 765 kV line bays alongwith space for Switchable line reactor at Bareilly (PG) S/s</li> </ol> <p><b>Implementation timeframe:</b> 24 months from the date of transfer of SPV to the successful bidder.</p>		Sl.No.	Scope of Transmission Scheme	Capacity /km	1	Neemrana-II- Bareilly (PG) 765 kV D/c line along with 330 MVAr switchable line reactor for each circuit at each end	Length: 350 km <ul style="list-style-type: none"> <li>765 kV, 330 MVAr switchable line reactors at Neermna-II S/s– 2 nos.</li> <li>765 kV, 330 MVAr Switchable line reactors at Bareilly(PG) – 2 nos.</li> <li>Switching equipment for 765kV 330 MVAr switchable line reactors at Neermna-II S/s – 2 nos.</li> <li>Switching equipment for 765kV 330 MVAr switchable line reactors at Bareilly(PG) S/s – 2 nos.</li> </ul>	2	2 no. of 765 kV line bays each at Neemrana-II & Bareilly (PG) S/s	765kV line bays - 4 nos (2 nos. each at Neemrana-II & Bareilly (PG) S/s)	PFC Consulting Ltd.
Sl.No.	Scope of Transmission Scheme	Capacity /km										
1	Neemrana-II- Bareilly (PG) 765 kV D/c line along with 330 MVAr switchable line reactor for each circuit at each end	Length: 350 km <ul style="list-style-type: none"> <li>765 kV, 330 MVAr switchable line reactors at Neermna-II S/s– 2 nos.</li> <li>765 kV, 330 MVAr Switchable line reactors at Bareilly(PG) – 2 nos.</li> <li>Switching equipment for 765kV 330 MVAr switchable line reactors at Neermna-II S/s – 2 nos.</li> <li>Switching equipment for 765kV 330 MVAr switchable line reactors at Bareilly(PG) S/s – 2 nos.</li> </ul>										
2	2 no. of 765 kV line bays each at Neemrana-II & Bareilly (PG) S/s	765kV line bays - 4 nos (2 nos. each at Neemrana-II & Bareilly (PG) S/s)										
5	<p><b>Transmission system for evacuation of power from REZ in Rajasthan (20 GW) under Phase-III Part I</b></p> <table border="1"> <thead> <tr> <th>Sl.No.</th> <th>Scope of Transmission Scheme</th> <th>Capacity /km</th> </tr> </thead> <tbody> </tbody> </table>		Sl.No.	Scope of Transmission Scheme	Capacity /km	REC Power Development and Consultancy Limited						
Sl.No.	Scope of Transmission Scheme	Capacity /km										

1	Establishment of 6000 MW, $\pm$ 800 kV Bhadla (HVDC) [LCC] terminal station (4x1500 MW) at a suitable location near Bhadla-3 substation	<ul style="list-style-type: none"> <li>• 400/33 kV, 2x50 MVA transformers for exclusively supplying auxiliary power to HVDC terminal.</li> <li>• 400kV bus sectionaliser -2 nos (1 Set) at Bhadla (HVDC) station</li> </ul>
2	Establishment of 6000 MW, $\pm$ 800 kV Fatehpur (HVDC) [LCC] terminal station (4x1500 MW) at suitable location near Fatehpur (UP)	
3	Bhadla-3 – Bhadla (HVDC) 400 kV 2xD/c quad moose line along with the line bays at both substations	<ul style="list-style-type: none"> <li>• Line length- 2 km</li> <li>• 400 kV line bays -8 nos</li> </ul>
4	$\pm$ 800 kV HVDC line (Hexa lapwing) between Bhadla (HVDC) & Fatehpur (HVDC) (with Dedicated Metallic Return)	<ul style="list-style-type: none"> <li>• Line length- 950 km</li> </ul>
5	Establishment of 5x1500 MVA, 765/400 kV ICTs at Fatehpur (HVDC) along with 2x330 MVA (765kV) bus reactor  <b>Future provisions: Space for-</b> <ul style="list-style-type: none"> <li>• 765/400 kV ICT along with bay: 1 no.</li> <li>• 765 kV line bay along with switchable line reactor: 4nos.</li> <li>• 765 kV Bus Reactor along with bays: 2 nos.</li> <li>• 400/220 kV ICTs along with bays: 4nos.</li> <li>• 400 kV line bays along with switchable line reactor: 4 nos.</li> <li>• 400 kV Bus Reactor along with bay: 1 no.</li> <li>• 220 kV line bays: 6 nos.</li> </ul>	<ul style="list-style-type: none"> <li>• 765/400kV 1500 MVA ICTs: 5 nos (16x500 MVA, including one spare unit)</li> <li>• 765 kV ICT bays – 5 nos.</li> <li>• 400 kV ICT bays – 5 nos.</li> <li>• 400 kV Bus sectionaliser-2 nos [1 Set]</li> <li>• 765 kV line bays – 4 nos.</li> <li>• 330 MVA, 765kV Bus Reactor -2 nos. (7x110 MVA, including one spare unit)</li> <li>• 765 kV reactor bays- 2 nos.</li> </ul>
6	LILO of both ckts of 765 kV Varanasi – Kanpur (GIS) D/c line at Fatehpur - (30 km)	

**Note:**

1. Developer of Bhadla-III S/s to provide space for 4 nos. of 400kV bays at their substation
2. The line lengths mentioned above are approximate as the exact length shall be obtained after the detailed survey

**Implementation timeframe:** 42 months from the date of transfer of SPV to the successful bidder.

2. The appointment of the Bid-Process Coordinators is subject to the conditions laid down in the Guidelines issued by Ministry of Power in this regard, as amended from time to time.

[F. No. 15/3/2018-Trans-Pt(1)]

MOHAMMAD AFZAL, Jt. Secy. (Trans)

**STANDARD SINGLE STAGE REQUEST FOR PROPOSAL  
DOCUMENT**

**FOR**

**SELECTION OF BIDDER AS TRANSMISSION SERVICE PROVIDER  
THROUGH TARIFF BASED COMPETITIVE BIDDING PROCESS**

**TO**

**ESTABLISH INTER-STATE TRANSMISSION SYSTEM**

**FOR**

**TRANSMISSION SYSTEM FOR EVACUATION OF POWER FROM  
RAJASTHAN REZ PH-IV (PART-1) (BIKANER COMPLEX): PART-C**

**ISSUED BY**



(A wholly owned subsidiary of Power Finance Corporation Ltd.)

**Registered Office:  
1st Floor, "Urjanidhi", 1, Barakhamba Lane,  
Connaught Place, New Delhi-110001**

**March 02, 2023**

**PFC CONSULTING LIMITED**  
**(A wholly owned subsidiary of Power Finance Corporation Limited)**

**Corporate Office:**  
**9th Floor, A-Wing, Statesman House**  
**Connaught Place, New Delhi-110001**

**Request for Proposal Document for selection of Bidder as Transmission Service Provider through tariff based competitive bidding process to establish Inter-State Transmission System for “Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C” is issued by PFC Consulting Limited.**

This RFP document is issued to -

M/s. \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

**General Manager**  
**PFC Consulting Limited**  
**9th Floor, A-Wing, Statesman House**  
**Connaught Place, New Delhi-110001**  
Email: pfcl.itp@pfcindia.com  
Place: New Delhi  
Date:  
Signature: .....

## REQUEST FOR PROPOSAL NOTIFICATION

**PFC Consulting Limited**  
(A wholly owned subsidiary of Power Finance Corporation Limited)

**Corporate Office:**  
**9th Floor, A-Wing, Statesman House**  
**Connaught Place, New Delhi-110001**

1. The Government of India, Ministry of Power, vide its Gazette Notification No. CG-DL-E-14012023-241990 dated 13.01.2023 has notified PFC Consulting Limited (PFCCL) to be the Bid Process Coordinator (BPC) for the purpose of selection of Bidder as Transmission Service Provider (TSP) to establish Inter-State transmission system for **“Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C”** through tariff based competitive bidding process.
2. PFC Consulting Limited (PFCCL) (hereinafter referred to as BPC) hereby invites all prospective Bidders for issue of Request for Proposal (RFP) for selection of Bidder as Transmission Service Provider (TSP) on the basis of international competitive bidding in accordance with the “Tariff Based Competitive Bidding Guidelines for Transmission Service” and “Guidelines for Encouraging Competition in Development of Transmission Projects” issued by Government of India, Ministry of Power under section – 63 of The Electricity Act, 2003 and as amended from time to time. The responsibility of the TSP would be to establish the following Inter-State Transmission System – **“Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C”** (hereinafter referred to as 'Project') on build, own, operate & transfer basis and to provide transmission service:

S. No.	Name of Transmission Element	Scheduled COD in months from Effective Date
1.	Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVar switchable line reactor for each circuit at each end <ul style="list-style-type: none"> <li>• 765 kV, 330 MVar Switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• 765 kV, 330 MVar Switchable line reactors at Neemrana-II – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVar switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVar switchable line reactors at Neemrana-II S/s – 2 nos.</li> </ul>	24 Months
2.	2 no. of 765 kV line bays each at Bikaner-III PS & Neemrana-II S/S <ul style="list-style-type: none"> <li>• 765kV line bays - 4 nos. (2 nos. each at Bikaner-III PS &amp; Neemrana-II S/S)</li> </ul>	

**Note:**

- (i) *Developer of Bikaner-III PS & Neemrana-II S/s shall provide space for 2 nos. of 765 kV line bays alongwith space for Switchable line reactor each at Bikaner-III*

*PS & Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2nd).*

3. The TSP shall ensure that design; construction and testing of all equipment, facilities, components and systems of the Project shall be in accordance with the provisions of the Transmission Service Agreement and applicable Rules/ Regulations, Orders and Guidelines issued by the Central Government.
4. **Transmission License:** The TSP shall obtain the Transmission License from the Commission.
5. **Bidding Process:** The Transmission Service Provider shall be selected through tariff based competitive bidding process for the Project based on meeting stipulated Qualification Requirements prescribed in Clause 2.1 of Section 2 of RFP and the lowest Quoted Transmission Charges discovered from Final Offers quoted during the e-reverse bidding. The selection of the TSP shall be subject to it obtaining Transmission License from the Commission, which, after expiry, may be further extended by such period as deemed appropriate by the Commission under powers vested with it to amend the conditions of the Transmission License.

The entire bidding process shall be conducted on electronic platform created by MSTC Limited.

The Bid shall be a single stage two envelope bid comprising the Technical Bid and the Financial Bid. The Bidders shall submit the Bid online through the electronic bidding platform. In addition to the online submission, the Bidder with lowest Final Offer will be required to submit original hard copies of Annexure 3, Annexure 4 (if applicable), Annexure 6 (if applicable) and Annexure 14 before issuance of Lol. There shall be no physical submission of the Financial Bid.

The Technical Bid shall be opened first and the Financial Bid of only the bidder who have qualified in the Technical Bid shall be opened. The Financial Bid will comprise of two rounds. In the first round the Initial Offer of the responsive bids would be opened and Quoted Transmission Charges of Initial Offer shall be ranked on the basis of ascending order. The Bidders, in the first fifty per cent of the ranking (with any fraction rounded off to higher integer) or four Bidders, whichever is higher, shall qualify for participating in the electronic reverse auction stage and submit their Final Offer.

6. The objective of the bidding process is to select a Successful Bidder pursuant to this RFP, who shall acquire one hundred percent (100%) of the equity shares of **SPV [which is under incorporation]** along with all its related assets and liabilities as per the provisions of the Share Purchase Agreement, at the Acquisition Price to be intimated by the BPC, twenty (20) days prior to the Bid Deadline.

The **SPV [which is under incorporation]**, of which one hundred percent (100%) equity shares will be acquired by the Selected Bidder, shall be responsible as the TSP, for ensuring that it undertakes ownership, financing, development, design, engineering, procurement, construction, commissioning, operation and maintenance of the Project, and to provide Transmission Service as per the terms of the RFP Project Documents.

The TSP shall ensure transfer of all project assets along with substation land, right of way and clearances to CTU or its successors or an agency as decided by the Central Government

after 35 years from COD of project at zero cost and free from any encumbrance and liability. The transfer shall be completed within 90 days after 35 years from COD of project failing which CTU shall be entitled to take over the project assets Suo moto.

7. **Commencement of Transmission Service:** The Bidder shall have to commence Transmission Service in accordance with the provisions of the Transmission Service Agreement.
8. **Transmission Charges:** The Transmission Charges shall be payable by the Designated ISTS Customers in Indian Rupees through the CTU as per Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations as amended from time to time. Bidders shall quote the Transmission Charges as per the pre-specified structure, as mentioned in the RFP.
9. **Issue of RFP document:** The detailed terms and conditions for qualification and selection of the Transmission Service Provider for the Project and for submission of Bid are indicated in the RFP document. All those interested in purchasing the RFP document may respond in writing to **General Manager, Tel. +91 11 23443996, Fax +91 11 23443990, Email: pfcl.itp@pfcindia.com** at the address given in para 12 below with a non-refundable fee of **Rs. 5,00,000/- (Rupees Five Lakh Only) or US\$ 7000/- (US Dollars Seven Thousand Only)** plus 18% GST, to be paid via electronic transfer to the following Bank Account latest by **May 04, 2023:**

**Bank Account Name : PFC Consulting Limited**  
**Account No. : 000705036117**  
**Bank Name : ICICI Bank**  
**IFSC : ICIC0000007**  
**Branch : Connaught Place, New Delhi-110001**

Immediately after issuance of RFP document, the Bidder shall submit the Pre-Award Integrity Pact in the format as prescribed in Annexure B, which shall be applicable for and during the bidding process, duly signed on each page by any whole-time Director / Authorized Signatory, duly witnessed by two persons, and shall be submitted by the Bidder in two (2) originals in a separate envelope, duly superscripted with Pre-Award Integrity Pact. The Bidder shall submit the Pre-Award Integrity Pact on non-judicial stamp paper of Rs. 100/- each duly purchased from the National Capital Territory of Delhi. In case the Bidder is in a consortium, the Pre-Award Integrity Pact shall be signed and submitted by each member of the Consortium separately.

The RFP document shall be issued to the Bidders on any working day from **March 02, 2023 to May 04, 2023, between 10:30 hours (IST) to 16:00 hours (IST)**. The BPC, on written request and against payment of the above mentioned fee by any Bidder shall promptly dispatch the RFP document to such Bidder by registered mail/ air mail. BPC shall, under no circumstances, be held responsible for late delivery or loss of documents so mailed.

10. **Receipt and opening of Bid:** The Bid must be uploaded online through the electronic bidding platform on or before **15:00 hours (IST) on May 08, 2023**. Technical Bid will be opened by the Bid Opening Committee on the same day at 15:30 hours (IST) in the office of Central Electricity Authority, in the online presence of Bidders' representatives who wish to attend. If the Bid Deadline is a public holiday at the place of submission of Bid, it shall be opened on the next working day at the same time and venue. In addition to the online

submission, the Bidder with lowest Final Offer will be required to submit original hard copies of Annexure 3, Annexure 4 (if applicable), Annexure 6 (if applicable) and Annexure 14 before issuance of Lol. Bidders meeting the Qualification Requirements, subject to evaluation as specified in Clause 3.2 to 3.4 shall be declared as “Qualified Bidders” and eligible for opening of Initial Offer.

11. The RFP document is not transferable. BPC reserves the right to reject all Bid and/or annul the process of tariff based competitive bidding for selection of Bidder as TSP to execute the Project without assigning any reason. BPC shall not bear any liability, whatsoever, in this regard.

#### 12. Nodal person for enquiries and clarifications

All correspondence and clarification in respect of RFP document shall be addressed to:

**General Manager**  
**PFC Consulting Limited**  
**9<sup>th</sup> Floor, A-Wing, Statesman House**  
**Connaught Place, New Delhi - 110001, India**  
**Tel. + 91-11-23443996**  
**Fax + 91-11-23443990**  
**Email: [pfcl.itp@pfcindia.com](mailto:pfcl.itp@pfcindia.com)**

**DISCLAIMER**

1. This Request for Proposal (RFP) document is not an agreement or offer by the BPC to the prospective Bidders or to any other party. The purpose of this RFP document is to provide interested parties with information to assist the formulation of their Bid. The RFP document is based on material and information available in public domain.
2. This RFP, along with its Annexures, is not transferable and the information contained therein are to be used only by the person to whom it is issued. It may not be copied or distributed by the recipient to third parties (other than in confidence to the recipient's professional advisors). In the event that the recipient does not continue with its involvement in the Project in accordance with this RFP, this RFP must be kept confidential.
3. While this RFP has been prepared in good faith, neither the BPC nor its employees or advisors/consultants make any representation or warranty expressed or implied as to the accuracy, reliability or completeness of the information contained in this RFP. The Bidders shall satisfy themselves, on receipt of the RFP document, that the RFP document is complete in all respects. Intimation of any discrepancy shall be given to this office immediately. If no intimation is received from any Bidder within ten (10) days from the date of issue of this RFP document on or before the date & time mentioned in this RFP, it shall be considered that the issued document, complete in all respects, has been received by the Bidders.

This bidding process is in accordance with the Bidding Guidelines issued by Ministry of Power, Government of India under Section 63 of the Electricity Act, 2003. Revisions or amendments in these Bidding Guidelines may cause the BPC to modify, amend or supplement this RFP document, including the RFP Project Documents to be in conformance with the Bidding Guidelines.

4. This RFP document includes statements, which reflect various assumptions arrived at by BPC in order to give a reflection of current status in the RFP. These assumptions should not be entirely relied upon by Bidders in making their own assessments. This RFP document does not purport to contain all the information each Bidder may require and may not be appropriate for all persons. It is not possible for BPC to consider the investment objectives, financial situation and particular needs of each party who reads or uses this RFP document. Certain Bidders may have a better knowledge of the Project than the others. Each Bidder should conduct its own investigations and analysis and should check the accuracy, reliability and completeness of the information in this RFP document and obtain independent advice from appropriate sources.
5. Neither BPC nor their employees or consultants make any representation or warranty as to the accuracy, reliability or completeness of the information in this RFP document.
6. Neither BPC, its employees nor its consultants will have any liability to any Bidder or any other person under the law of contract, tort, the principles of restitution or unjust enrichment or otherwise for any loss, expense or damage which may arise from or be incurred or suffered in connection with anything contained in this RFP document, any matter deemed to form part of this RFP document, the award of the Project, the information supplied by or on behalf of BPC or its employees, any consultants or otherwise arising in any way from the qualification process for the said Project.

7. By participating in the bidding process, each of the Bidder shall have acknowledged and accepted that it has not been induced to enter into such agreement by any representation or warranty, expressed or implied, or relied upon any such representation or warranty by or on behalf of BPC or any person working in the bidding process.
8. BPC may in its absolute discretion, but without being under any obligation to do so, update, amend or supplement this RFP document. Such updations, amendments or supplements, if any, will however be circulated to the Bidders not later than 15 days prior to the last date for submission of Bid.
9. Each Bidder unconditionally agrees, understands and accepts that the BPC reserves the rights to accept or reject any or all Bids without giving any reason. Neither the BPC nor its advisers shall entertain any claim of any nature, whatsoever, including without limitations, any claim seeking expenses in relation to the preparation of Bids.
10. This RFP may be withdrawn or cancelled by the BPC at any time without assigning any reasons thereof. BPC further reserves the right, at its complete discretion to reject any or all of the Bids without assigning any reasons whatsoever.

## INDEX

<b>SECTION</b>	<b>CONTENTS</b>	<b>PAGE NO.</b>
	<b>DEFINITIONS</b>	<b>11</b>
<b>1.</b>	<b>INTRODUCTION</b>	<b>17</b>
<b>2.</b>	<b>INFORMATION AND INSTRUCTIONS FOR BIDDERS</b>	<b>22</b>
<b>3.</b>	<b>EVALUATION OF THE TECHNICAL AND FINANCIAL BID</b>	<b>49</b>
<b>4.</b>	<b>ANNEXURES FOR BID</b>	<b>55</b>
	<b>ANNEXURES</b>	
<b>1</b>	<b>Format for the Covering Letter</b>	<b>57</b>
<b>2</b>	<b>Format for Letter of Consent from Consortium Members</b>	<b>61</b>
<b>3</b>	<b>Format for evidence of authorized signatory's authority (Power of Attorney)</b>	<b>63</b>
<b>4</b>	<b>Format for Power of Attorney to be provided by each of the other members of the Consortium in favor of the Lead Member</b>	<b>65</b>
<b>5</b>	<b>Format for Bidder's composition and ownership structure and Format for Authorization</b>	<b>67</b>
<b>6</b>	<b>Format for Consortium Agreement</b>	<b>70</b>
<b>7A</b>	<b>Format for Qualification Requirement – Net worth</b>	<b>75</b>
<b>7B</b>	<b>Format for Technical Requirement</b>	<b>78</b>
<b>7C</b>	<b>Format for Technical and Financial Requirement – Relationship &amp; Equity Shareholding</b>	<b>82</b>
<b>7D</b>	<b>Format for Additional Information for verification of Financial and Technical Capabilities of Bidders</b>	<b>84</b>
<b>8</b>	<b>Format for Undertaking and Details of Equity Investment</b>	<b>87</b>
<b>9</b>	<b>Format for Authorization from Parent / Affiliate of Bidding Company / Member of Bidding Consortium whose technical / financial capability has been used by the Bidding Company / Member of Bidding Consortium.</b>	<b>91</b>
<b>10</b>	<b>Format for Undertaking by Technically/Financially Evaluated Entity/Ultimate Parent Company</b>	<b>93</b>
<b>11</b>	<b>Format for Board Resolution</b>	<b>95</b>
<b>11A</b>	<b>Illustration for Applicable Board Resolution Requirements under Clause 2.5.2</b>	<b>98</b>
<b>12</b>	<b>Format for illustration of Affiliates</b>	<b>100</b>
<b>13</b>	<b>Format for disclosure</b>	<b>101</b>

<b>SECTION</b>	<b>CONTENTS</b>	<b>PAGE NO.</b>
<b>14</b>	<b>Format For Bid Bond</b>	<b>102</b>
<b>15</b>	<b>Format for Contract Performance Guarantee</b>	<b>104</b>
<b>16</b>	<b>Format for Checklist for Technical Bid Submission Requirements</b>	<b>106</b>
<b>17</b>	<b>List of Banks</b>	<b>109</b>
<b>18</b>	<b>Grid Map of the Project</b>	<b>110</b>
<b>19</b>	<b>Format for Clarifications / Amendments on the RFP / RFP Project Documents</b>	<b>111</b>
<b>20</b>	<b>Formats For RFP Project Documents</b>	<b>112</b>
<b>21</b>	<b>Format For Financial Bid</b>	<b>113</b>
<b>22</b>	<b>Format of Affidavit</b>	<b>114</b>
	<b>Annexure A</b>	<b>116</b>
	<b>Annexure-B</b>	<b>118</b>
	<b>Annexure-C</b>	<b>125</b>

## DEFINITIONS

Any capitalized term, used but not defined in this RFP, shall have the meaning ascribed to such term in the RFP Project Documents, or the Bidding Guidelines, in that order. In absence of availability of definitions in the foregoing references, the capitalized terms shall be interpreted in accordance with the Electricity Act 2003, Grid Code or any other relevant electricity law, rule or regulation prevalent in India, as amended or re-enacted from time to time, in that order.

The following terms are defined for use in this RFP:

**"Acquisition Price"** shall have the same meaning as defined in the Share Purchase Agreement;

**"Affiliate"** shall mean a company that either directly or indirectly

- i. controls or
- ii. is controlled by or
- iii. is under common control with

a Bidding Company (in the case of a single company) or a Member (in the case of a Consortium) and **"control"** means ownership by one entity of at least twenty six percent (26%) of the voting rights of the entity. As an illustration a chart is annexed hereto as Annexure – 12;

**"Bid"** shall mean Technical Bid and Financial Bid (Initial Offer and Final Offer) submitted by the Bidder, in response to this RFP, in accordance with the terms and conditions thereof;

**"Bidder"** shall mean either a single company (including its permitted successors and legal assigns) or a Consortium of companies (including its permitted successors and legal assigns) submitting a Bid in response to this RFP. Any reference to the Bidder includes Bidding Company, Bidding Consortium/ Consortium, Member in a Bidding Consortium and Lead Member of the Bidding Consortium jointly and severally, as the context may require;

**"Bidding Company"** shall refer to such single company (including its permitted successors and legal assigns) that has submitted a Bid for the Project;

**"Bidding Consortium/ Consortium"** shall refer to a group of companies (including their permitted successors and legal assigns) that has collectively submitted a Bid for the Project;

**"Bidding Guidelines"** shall mean the "Tariff Based Competitive-Bidding Guidelines for Transmission Service" and "Guidelines for Encouraging Competition in Development of Transmission Projects" issued by Government of India, Ministry of Power under Section – 63 of Electricity Act as amended from time to time;

**"Bid Bond"** shall mean the unconditional and irrevocable bank guarantee for **Rupees Twenty Eight Crore Only (Rs. 28 Crore)**, to be submitted along with the Technical Bid by the Bidder under Clause 2.11 of this RFP, as per the format prescribed in Annexure 14;

**"Bid Deadline"** shall mean the last date and time for submission of online Bid in response to this RFP, specified in Clause 2.7.1;

**"Bid Process Coordinator or BPC"** shall mean a person or its authorized representative as notified by the Government of India, responsible for carrying out the process for selection of Bidder who will acquire Transmission Service Provider;

**"CEA"** shall mean the Central Electricity Authority constituted under Section - 70 of the Electricity Act;

**"Commission" or "CERC"** shall mean the Central Electricity Regulatory Commission of India constituted under Section-76 of The Electricity Act, 2003 and any successors and assigns;

**"Conflict of Interest"** A Bidder shall be considered to be in a Conflict of Interest with one or more Bidders in the same bidding process if they have a relationship with each other, directly or through a common company, that puts them in a position to have access to information about or influence the Bid of another Bidder.

Provided that if two or more bidders in the bidding process have formed a Joint Venture Company or Consortium to execute another project, the Bidders will not be considered to have Conflict of Interest;

**"Commercial Operation Date (COD)"** shall mean the date as per Article 6.2 of the Transmission Service Agreement;

**"Consents, Clearances, Permits"** shall mean all authorizations, licenses, approvals, registrations, permits, waivers, privileges, acknowledgements, agreements, or concessions required to be obtained from or provided by any concerned authority for the development, execution and performance of Project including without any limitation on the construction, ownership, operation and maintenance of the transmission lines and/or sub-stations;

**"Contract Performance Guarantee"** shall have the meaning as per Clause 2.12 of this RFP;

**"Contract Year"** shall mean the period beginning on the Scheduled COD, and ending on the immediately succeeding March 31 and thereafter each period of 12 months beginning on April 1 and ending on March 31 provided that:

- (i) the last Contract Year shall end on the last day of the term of the Transmission Service Agreement;

**"Infrastructure sector"** shall mean such sectors notified by Department of Economic Affairs in its Gazette Notification No. 13/1/2017-INF dated 14<sup>th</sup> November, 2017 and as amended from time to time;

**"CTU/Central Transmission Utility"** shall have same meaning as defined in the Electricity Act, 2003;

**"Designated ISTS Customers" or "DICs"** shall have the meaning as ascribed in Regulation 2(l) of Central Electricity Regulatory Commission (Sharing of inter-State Transmission Charges and Losses) Regulation 2020 and as amended or modified from time to time;

**"Effective Date"** shall have the meaning as ascribed thereto in the Transmission Service Agreement;

**"Element"** shall mean each Transmission Line or each circuit of the Transmission Lines (where there are more than one circuit) or each bay of the Sub-station or switching station or HVDC terminal or inverter station of the Project, including ICTs, Reactors, SVC, FSC, etc. forming part of the ISTS which will be owned, operated and maintained by the concerned ISTS Licensee, and which may have a separate scheduled COD as per Schedule 2 of the Transmission Service Agreement and may have a separate percentage for recovery of Transmission Charges on achieving COD as per Schedule 5 of the Transmission Service Agreement;

**"Final Offer"** shall mean the Quoted Transmission Charges, required to be submitted as part of the Financial Bid on the electronic bidding platform during the e-reverse bidding stage. In case, no Final Offer is received during the e-reverse bidding stage then the lowest "Initial Offer" shall be deemed to be the Final Offer;

**"Financial Bid"** shall mean the Initial Offer and Final Offer, containing the Bidder's Quoted Transmission Charges, as per the format at Annexure – 21 of this RFP;

**"Financially Evaluated Entity"** shall mean the company which has been evaluated for the satisfaction of the financial requirement set forth in Clause 2.1.3 hereof;

**"Government"** shall mean the Central Government;

**"Grid Code" / "IEGC" or "State Grid Code"** shall mean the Grid Code specified by the Central Commission under clause (h) of sub-section (1) of Section 79 of the Electricity Act and/or the State Grid Code as specified by the concerned State Commission referred under clause (h) of sub-section (1) of Section 86 of the Electricity Act as applicable;

**"Initial Offer"** shall mean the Quoted Transmission Charges, required to be submitted as part of the Financial Bid on the electronic bidding platform along with the Technical Bid;

**"Inter State Generating Station" or "ISGS"** shall mean a Central / other generating station in which two or more states have shares and whose scheduling is to be coordinated by the Regional Load Despatch Centre;

**"Inter-State Transmission System"** shall have same meaning as defined in the Electricity Act, 2003;

**"Lead Member of the Bidding Consortium" or "Lead Member"** shall mean a company who commits at least twenty six percent (26%) equity stake in the Project, meets the technical requirement as per Clause 2.1.2 and so designated by other Member(s) in Bidding Consortium;

**"Letter of Intent" or "LoI"** shall mean the letter to be issued by the BPC to the Bidder, who has been identified as the selected bidder, for award of the Project to such Bidder;

**"Member in a Bidding Consortium/Member"** shall mean each company in the Bidding Consortium;

**"MOP"** shall mean the Ministry of Power, Government of India;

**"MOEF"** shall mean the Ministry of the Environment and Forests, Government of India;

**"Nodal Agency"** shall mean CTU, which shall execute and implement the Transmission Service Agreement (TSA);

Provided that while taking major decisions, CTU shall consult CEA on technical matters and any other matter it feels necessary.

**"Parent Company"** shall mean an entity that holds at least twenty six percent (26%) of the paid - up equity capital directly or indirectly in the Bidding Company or in the Member in a Bidding Consortium, as the case may be;

**"Qualification Requirements"** shall mean the qualification requirements as set forth in Section-2, Clause 2.1 of this RFP;

**"Quoted Transmission Charges"** shall mean the quoted single annual Transmission Charges submitted online through the electronic bidding platform by the Bidder as part of its Financial Bid as per the format in Annexure – 21 of this RFP;

**"RFP"** shall mean Request for Proposal document along with all schedules, formats, annexure and RFP Project Documents attached hereto, issued by BPC for tariff based competitive bidding process for selection of bidder who will acquire the TSP through e-reverse bidding to execute the Project, and shall include any modifications, amendments or alterations or clarifications thereto;

**"RFP Project Documents"** shall mean the following documents to be entered into in respect of the Project, by the parties to the respective agreements:

- a. Transmission Service Agreement (TSA),
- b. Share Purchase Agreement,
- c. Agreement(s) required, if any, under Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations as amended from time to time and
- d. Any other agreement, as may be required;

**"Scheduled COD"** shall have the meaning as ascribed hereto in Clause 2.6 of this RFP;

**"Statutory Auditor"** shall mean the auditor appointed under the provisions of the Companies Act, 1956 / Companies Act, 2013 (as the case may be) or under the provisions of any other applicable governing law;

**"Share Purchase Agreement"** shall mean the agreement amongst **PFC Consulting Limited, SPV [which is under incorporation]** and the Successful Bidder for the purchase of one hundred (100%) per cent of the shareholding of the **SPV [which is under incorporation]** for the Acquisition Price, by the Successful Bidder on the terms and conditions as contained therein;

**"Successful Bidder"** or **"Selected Bidder"** shall mean the Bidder selected pursuant to this RFP to acquire one hundred percent (100%) equity shares of **SPV [which is under incorporation]**, along with all its related assets and liabilities, which will be responsible as the TSP to establish the Project on build, own, operate and transfer basis as per the terms of the Transmission Service Agreement and other RFP Project Documents;

**"Survey Report"** shall mean the report containing initial information regarding the Project and other details provided as per the provisions of Clause 1.6.2.1.1 of this RFP;

**"Technical Bid"** shall mean the bid submitted online through the electronic bidding platform, containing the documents as listed out in Clause 2.5.2 of this RFP;

**"Technically Evaluated Entity"** shall mean the company which has been evaluated for the satisfaction of the technical requirement set forth in Clause 2.1.2 hereof;

**"Transmission Charges"** shall mean the Final Offer quoted by Selected Bidder and adopted by the Commission, and as computed in terms of the provisions of Schedule 4 of the TSA, payable to the ISTS Licensee by the Designated ISTS Customers, and collected / disbursed by the CTU, as per Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations as amended from time to time;

**"Transmission License"** shall mean the license granted by the Commission in terms of the relevant regulations for grant of such license issued under the Electricity Act, 2003;

**"Transmission Service Agreement" or "TSA"** shall mean the agreement entered into between Nodal Agency and the TSP, pursuant to which the TSP shall build, own, operate and transfer the Project and make available the assets of the Project on a commercial basis;

**"Transmission Service Provider" or "TSP"** shall mean **SPV [which is under incorporation]** which has executed the Transmission Service Agreement and which shall be acquired by the Selected Bidder;

**"Ultimate Parent Company"** shall mean an entity which owns at least twenty six percent (26%) equity in the Bidding Company or Member of a Consortium, (as the case may be) and in the Technically Evaluated Entity and/or Financially Evaluated Entity (as the case may be) and such Bidding Company or Member of a Consortium, (as the case may be) and the Technically Evaluated Entity and/or Financially Evaluated Entity (as the case may be) shall be under the direct control or indirectly under the common control of such entity.

# **SECTION – 1**

# **INTRODUCTION**

## SECTION 1

## 1. INTRODUCTION

- 1.1 The Government of India, Ministry of Power, vide its Gazette Notification No. CG-DL-E-14012023-241990 dated 13.01.2023 has notified PFC Consulting Limited to be the Bid Process Coordinator (BPC) for the purpose of selection of Bidder as Transmission Service Provider (TSP) to establish Inter-State transmission system for **“Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C”** through tariff based competitive bidding process.

The BPC hereby invites Bids from all prospective Bidders in accordance with this Request for Proposal (RFP) to select prospective Transmission Service Provider (TSP) in accordance with the “Tariff Based Competitive-Bidding Guidelines for Transmission Service” and “Guidelines for Encouraging Competition in Development of Transmission Projects” issued by Government of India, Ministry of Power under Section – 63 of the Electricity Act. The BPC shall select the Bidder having the prescribed technical and financial capability to become TSP and be responsible for establishing the Project in the state(s) of Rajasthan. The TSP will make the Project available against payment of Transmission Charges, as adopted by the Commission, payable to the TSP, as per Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations as amended from time to time.

- 1.2 The TSP will be required to establish the following Inter State Transmission System for **“Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C”** (hereinafter referred to as ‘Project’) on build, own, operate and transfer basis, and to provide transmission service.

S. No.	Name of Transmission Element	Scheduled COD in months from Effective Date
1.	Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end <ul style="list-style-type: none"> <li>• 765 kV, 330 MVAR Switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• 765 kV, 330 MVAR Switchable line reactors at Neemrana-II – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Neemrana-II S/s – 2 nos.</li> </ul>	24 Months
2.	2 no. of 765 kV line bays each at Bikaner-III PS & Neemrana-II S/S <ul style="list-style-type: none"> <li>• 765kV line bays - 4 nos. (2 nos. each at Bikaner-III PS &amp; Neemrana-II S/S)</li> </ul>	

**Note:**

- (i) *Developer of Bikaner-III PS & Neemrana-II S/s shall provide space for 2 nos. of 765 kV line bays alongwith space for Switchable line reactor each at Bikaner-III PS & Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2nd).*

### 1.3 Project Description

Renewable Energy Zones (REZs) were identified by MNRE/SECI with a total capacity of 181.5 GW for likely benefits by the year 2030 in eight states. This includes 75 GW REZ potential in Rajasthan comprising of 15 GW Wind and 60 GW Solar. In this regard, a Comprehensive transmission scheme for evacuation of 75GW RE potential from Rajasthan is already evolved which includes transmission scheme for total evacuation requirement of 7.7GW from Bikaner Complex (Bikaner-II: 3.7 GW, Bikaner-III: 4 GW).

As part of comprehensive system, 765/400/220kV Bikaner -III & 765/400kV Neemrana-II Substations are to be established along with interconnections of Bikaner-III PS with Bikaner (PG)/ Bikaner-II PS through 400kV lines. For further dispersal of power from Bikaner-III PS, 765kV high capacity corridor i.e. Bikaner-III-Neemrana-II -Bareilly (PG) as well as 400kV interconnections with Gurgaon (PG), Sohna Road and Kotputli is also being implemented.

The subject transmission scheme i.e. Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part C involves implementation of Bikaner-III - Neemrana-II 765 kV D/c line (2nd).

Above transmission system was agreed in the 8th CMETS-NR meeting held on 30.06.2022, 56th NRPC meeting held on 29.07.2022 and 9th National Committee on Transmission (NCT) held on 28.09.2022. Subsequently, Ministry of Power, Government of India, vide its Gazette Notification No. CG-DL-E-14012023-241990 dated 13.01.2023 declared establishment of Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part C through tariff based competitive bidding process route as part of "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex)".

### 1.4 Transmission Grid Map

Transmission Grid Map indicating the location of the Project is enclosed as Annexure 18 of this RFP for information and reference of the Bidders.

- 1.5 The objective of the bidding process is to select a Successful Bidder pursuant to this RFP, who shall acquire one hundred percent (100%) of the equity shares of **SPV [which is under incorporation]** along with all its related assets and liabilities as per the provisions of the Share Purchase Agreement, at the Acquisition Price to be intimated by the BPC, twenty (20) days prior to the Bid Deadline.

The **SPV [which is under incorporation]**, of which one hundred percent (100%) equity shares will be acquired by the Selected Bidder, shall be responsible as the TSP, for ensuring that it undertakes ownership, financing, development, design, engineering, procurement, construction, commissioning, operation and maintenance of the Project, and to provide Transmission Service as per the terms of the RFP Project Documents.

The TSP shall ensure transfer of all project assets along with substation land, right of way and clearances to CTU or its successors or an agency as decided by the Central Government after 35 years from COD of project at zero cost and free from any encumbrance and liability. The transfer shall be completed within 90 days after 35 years from COD of project failing which CTU shall be entitled to take over the project assets Suo moto.

## 1.6 Brief Scope of Work

### 1.6.1 Scope of Transmission Service Provider

The TSP's scope of work for the Project shall comprise, but not necessarily be limited to the following:

- 1.6.1.1 Establishment, operation and maintenance of the Project on build, own, operate and transfer basis and completion of all the activities for the Project, including survey, detailed project report formulation, arranging finance, project management, necessary Consents, Clearances and Permits (way leave, environment & forest, civil aviation, railway/ road/river/canal/power crossing/PTCC, etc.), land compensation, design, engineering, equipment, material, construction, erection, testing & commissioning. Further, the actual location of substations, switching stations or HVDC terminal or inverter stations in the scope of TSP shall not be beyond 3 Km radius of the location proposed by the BPC in the survey report.
- 1.6.1.2 The TSP shall ensure that design, construction and testing of all equipment, facilities, components and systems of the Project shall be in accordance with Transmission Service Agreement and applicable Rules/ Regulations, Orders and Guidelines issued by the Central Government.
- 1.6.1.3 The TSP shall ensure timely completion of entire scope of Project in all respects and its operation and maintenance, as shall be specified in the RFP documents.
- 1.6.1.4 The TSP shall seek Transmission License from the Commission, as per the provisions of the Electricity Act and regulations made thereunder.
- 1.6.1.5 The TSP shall seek approval under Section 164 of Electricity Act, from CEA after acquisition of **SPV [which is under incorporation]**. The approval shall be granted by CEA generally within 30 days but in no case later than 45 days from the date of receipt of application (complete in all aspects).

### 1.6.2 Scope of Bid Process Coordinator (BPC)

BPC's scope of work is briefly outlined hereunder:

- 1.6.2.1 The BPC has initiated development of the Project and shall be responsible for the tasks in this regard as specified hereunder:
  1. Provide to the Bidders a Survey Report for the Project at least forty five (45) days prior to the Bid Deadline. The Survey Report shall include the suggested route with approximate route length, type of terrain likely to be encountered and its likely implication in terms of Right of Way (ROW), statutory clearances, location of

substations or converter stations and land area to be acquired for the substation or converter station.

2. To obtain approval for laying of overhead transmission lines under Section 68 of Electricity Act, from the Government at least twenty (20) days prior to Bid Deadline.
3. To initiate acquisition of land for location specific substations, switching stations or HVDC terminal or inverter stations, if required.
4. To initiate process of seeking forest clearance, if required
5. The BPC shall intimate to the Bidders, the Acquisition Price payable by the Selected Bidder to the **PFC Consulting Limited** for the acquisition of one hundred percent (100%) of the equity shareholding of **SPV [which is under incorporation]**, along with all its related assets and liabilities at least twenty (20) days prior to the Bid Deadline.
6. The BPC shall ensure issuance of all finalized RFP Project Documents, at least fifteen (15) days prior to the Bid Deadline.

Provided that for any delay in meeting the above obligations of the BPC within the specified time period above, the Bid Deadline as per Clause 2.7.1 shall be extended on a day for day basis.

- 1.6.2.2 The details and documents as may be obtained by the BPC/ project specific SPV in relation to the Project shall be handed over to the TSP on an as-is-where-is basis, so that it may take further actions to obtain Consents, Clearances and Permits.
- 1.7 All costs (including direct and indirect) incurred by the BPC/ project specific SPV in connection with the activities concerning the Project shall be recovered from the TSP, which shall be included in the Acquisition Price.
- 1.8 The Project is required to be completed progressively in accordance with the schedule prescribed in this RFP.
- 1.9 A company under the Companies Act, 2013 by the name **SPV [which is under incorporation]** has been incorporated to initiate the activities for execution of the Project. The said company shall be acquired by the successful Bidder as per terms and conditions as may be prescribed in RFP.
- 1.10 The Ministry of Power and the appropriate state government(s) shall provide their support to the TSP, on best endeavor basis, in enabling the TSP to develop the Project.
- 1.11 All Bidders are required to submit their Bid in accordance with the instructions set forth in this RFP.
- 1.12 Once the Successful Bidder is selected, the details and documents as may be obtained by the BPC/ project specific SPV in relation to the Project, shall be handed over to the Successful Bidder on as is where basis, so that it may take further actions to obtain all necessary Consents, Clearances and Permits and the TSP shall not be entitled for any extensions in the Scheduled COD of the Project except as provided for in the TSA.
- 1.13 The assets of the Project shall be made available on a commercial basis as per the terms

and conditions of the Transmission Service Agreement and Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations as amended from time to time.

## **SECTION - 2**

# **INFORMATION AND INSTRUCTIONS FOR BIDDERS**

SECTION – 2**2. INFORMATION AND INSTRUCTIONS FOR BIDDERS****2.1 Qualification Requirements**

- 2.1.1 The Bidder should be a company duly incorporated under the relevant laws (Bidding Company) or a Consortium of companies (Bidding Consortium) with one of the companies acting as the Lead Member of the Bidding Consortium. The Bidder shall be selected on meeting the Qualification Requirements specified in Section 2 of this RFP, as demonstrated by the Bidder's Technical Bid and the lowest Quoted Transmission Charges discovered from Final Offers quoted during the e-reverse bidding. A Bidding Consortium can participate in the bidding process for the Project if any Member of the Consortium has purchased the RFP document for such Project. Bidder who agree and undertake to procure the products associated with the Transmission System as per provisions of Public Procurement (Preference to Make in India) orders issued by Ministry of Power vide orders No. 11/5/2018 - Coord. dated 28.07.2020 for transmission sector, as amended from time to time read with Department for Promotion of Industry and Internal Trade (DPIIT) orders in this regard, shall be eligible hereunder. Further, it is clarified that Procuring Entity as defined in orders shall deemed to have included Selected Bidder and/ or TSP.

Besides, Department of Expenditure, Ministry of Finance vide Order (Public Procurement No 1) bearing File No. 6/18/2019-PPD dated 23.07.2020, Order (Public Procurement No 2) bearing File No. 6/18/2019-PPD dated 23.07.2020 and Order (Public Procurement No. 3) bearing File No. 6/18/2019-PPD, dated 24.07.2020, as amended from time to time, have issued directions regarding public procurement from a bidder of a country, which shares land border with India are also applicable.

**2.1.2 Technical requirement to be met by the Bidding Company or Lead Member of Bidding Consortium**

The Bidder must fulfill any one of the following technical requirements:

- (i) Experience of development of projects in the Infrastructure Sector in the last five (5) years with aggregate capital expenditure of not less than **Rs.1400 Crore** or equivalent USD (calculated as per provisions in Clause 3.4.1). However, the capital expenditure of each project shall not be less than **Rs.280 Crore** or equivalent USD (calculated as per provisions in Clause 3.4.1).

For this purpose, capital expenditure incurred on projects that have been commissioned/ completed at least seven (7) days prior to Bid Deadline shall be considered. The capital expenditure discussed above shall be as capitalized and reflected in the audited books of accounts of the Technically Evaluated Entity. In case a clearly identifiable part of a project has been put into commercial operation, the capital expenditure on such part of the project shall be considered. The Technically Evaluated Entity must have either executed such projects itself or must have held directly or indirectly at least twenty six percent (26%) of the shareholding in the company that has executed the project(s) from the date of financial closure of the project(s) till the time of

commissioning/completion of such project(s).

OR

- (ii) Experience in construction of project in infrastructure sector: The Technically Evaluated Entity should have received aggregate payments not less than **Rs.1400 Crore** or equivalent USD (calculated as per provisions in Clause 3.4.1) from its client(s) for construction works fully completed during the last 5(five) financial years. However, the payment received from each project shall not be less than **Rs.280 Crore** or equivalent USD (calculated as per provisions in Clause 3.4.1).

For this purpose, payments received on projects that have been commissioned/ completed at least seven (7) days prior to Bid Deadline shall be considered. Further only the payments (gross) actually received, during such 5 (five) financial years shall qualify for purposes of computing the technical capacity. For the avoidance of doubt, construction works shall not include cost of land, supply of goods or equipment except when such goods or equipment form part of a turn-key construction contract/ EPC contract for the project. Further, in cases where different individual contracts are signed between same entities for the same project, the cumulative payments received under such individual contracts shall be considered for meeting the qualification requirement.

The Technically Evaluated Entity may be the Bidding Company or the Lead Member of a Consortium or an Affiliate or Parent of such Bidding Company or the Lead Member, as the case may be.

Bidders shall furnish documentary evidence duly certified by authorized signatory of the Bidder who has been issued Power of Attorney in support of their technical capability as defined in Clause 2.1.2 of this RFP.

### 2.1.3 Financial requirement to be met by the Bidding Company/Bidding Consortium

2.1.3.1 The Bidder must fulfill following financial requirements:

#### A. Networth:

Networth should be not less than **Rs.560 Crore** or equivalent USD (calculated as per provisions in Clause 3.4.1) computed as the Networth based on unconsolidated audited annual accounts (refer to Note below) of any of the last three (3) financial years as provided in Clause 2.2.3, immediately preceding the Bid Deadline. Also, the Networth of any of the last three (3) financial years should not be negative.

**Note:** Audited consolidated annual accounts of the Bidder may be used for the purpose of financial criteria provided the Bidder has at least 26% equity in each company whose accounts are merged in the audited consolidated accounts and provided further that the financial capability of such companies (of which accounts are being merged in the consolidated accounts) shall not be considered again for the purpose of evaluation of the Technical Bid. Bidders shall furnish prescribed Annexure 7(A) duly certified by authorized signatory of the Bidder who has been issued Power of Attorney and the

Statutory Auditor and separate computation sheet for Networth duly certified by Statutory Auditor in support of their financial capability as defined in Clause 2.1.3 of this RFP.

2.1.3.2 The Networth shall be computed in the following manner by the Bidder:

**A. Networth**

=	Equity share capital
Add:	Reserves
Subtract:	Revaluation Reserves
Subtract:	Intangible Assets
Subtract:	Miscellaneous expenditures to the extent not written off and carry forward losses

2.1.3.3 If the Technical Bid is submitted by a Bidding Consortium the financial requirement shall be met individually and collectively by all the Members in the Bidding Consortium. The financial requirement to be met by each Member of the Bidding Consortium shall be computed in proportion to the equity commitment made by each of them for investment in the Project.

2.1.4 The Bidder may seek qualification on the basis of technical and financial capability of its Parent and/ or its Affiliate(s) for the purpose of meeting the Qualification Requirements. However, in the case of the Bidder being a Consortium, the Lead Member has to meet the technical requirement on its own or by seeking the technical capability of its Parent and/or its Affiliate(s). Authorization for use of such technical or financial capability shall have to be provided from its Parent and/or Affiliate(s) as per Annexure 9. The technical and financial capability of a particular company/ particular project, including its Parents and/or Affiliates, shall not be used directly or indirectly by more than one Bidder/ Member of a Bidding Consortium/ Bidding Company. However, development and construction experience of a particular project may be used by more than one company.

The determination of the relationship of Parent or Affiliate with the Bidding Company or with the Member of the Bidding Consortium, including the Lead Member, shall be on the date at the most seven (7) days prior to the last date of submission of the Bid. Documentary evidence to establish such relationship shall be furnished by the Bidder along with the Technical Bid.

If the Technically Evaluated Entity and/or Financially Evaluated Entity is an entity other than the Bidding Company or a Member in a Bidding Consortium, the Bidding Company or Member relying on such Technically Evaluated Entity and/or Financially Evaluated Entity will have to submit a legally binding undertaking supported by a board resolution from the Technically Evaluated Entity and/or Financially Evaluated Entity or its Ultimate Parent Company, that all the equity investment obligations of the Bidding Company or the Member of the Consortium shall be deemed to be equity investment obligations of the Technically Evaluated Entity and/or Financially Evaluated Entity or its Ultimate Parent Company, and in the event of any default the same shall be met by such evaluated entity or by or the Ultimate Parent Company. The Bidding Company or the Consortium Member shall have to provide information and documents relating to its

relationship with such Technically Evaluated Entity and/or Financially Evaluated Entity including details about the equity shareholding between them as per Annexure 7(C).

- 2.1.5 A Bidder shall submit only one Bid in the same bidding process, either individually as Bidding Company or as a Member of a Bidding Consortium (including the Lead Member). It is further clarified that any of the Parent/ Affiliate/Ultimate Parent of the Bidder/ Member in a Bidding Consortium shall not separately participate directly or indirectly in the same bidding process. Further, if any Bidder is having a Conflict of Interest with other Bidders participating in the same bidding process, the Bids of all such Bidders shall be rejected.
- 2.1.6 Notwithstanding anything stated above, BPC reserves the right to verify the authenticity of the documents submitted for meeting the Qualification Requirements and request for any additional information and documents. BPC reserves the right at its sole discretion to contact the Bidder's bank and project references and verify the Bidder's information and documents for the purpose of bid evaluation.
- 2.1.7 The Qualified Bidder(s) will be required to continue to maintain compliance with the Qualification Requirements throughout the bidding process and till execution of the Transmission Service Agreement. Where the Technically Evaluated Entity and/or the Financially Evaluated Entity is not the Bidding Company or a Member in a Bidding Consortium, as the case may be, the Bidding Company or Member shall continue to be an Affiliate of the Technically Evaluated Entity and/or Financially Evaluated Entity till the execution of the Transmission Service Agreement. Failure to comply with the aforesaid provisions shall make the Bid liable for rejection at any stage.
- 2.1.8 The Selected Bidder will be required to continue to maintain compliance with the Qualification Requirements till the COD of the Project. Where the Technically Evaluated Entity and/or the Financially Evaluated Entity is not the Bidding Company or a Member in a Bidding Consortium, as the case may be, the Bidding Company or Member shall continue to be an Affiliate of the Technically Evaluated Entity and/or Financially Evaluated Entity till the COD of the Project. Failure to comply with the aforesaid provisions shall be dealt as per provisions of Transmission Service Agreement.
- 2.1.9 On the Bid Deadline, for the Bidder to be eligible to participate in the bidding process:
  - a. the Bidder & any of its Affiliate including any Consortium Member & any of its Affiliate, their directors or key personnel should not have been barred or included in the blacklist by any government agency or authority in India, the government of the jurisdiction of the Bidder or Members where they are incorporated or the jurisdiction of their principal place of business, any international financial institution such as the World Bank Group, Asian Development Bank, African Development Bank, Inter-American Development Bank, Asian Infrastructure Investment Bank etc or the United Nations or any of its agencies; or
  - b. the Bidder & any of its Affiliate including any Consortium Member & any of its Affiliate or their directors should not have been convicted of any offence in India or abroad.

In case any investigation is pending against the Bidder, including any Consortium Member or Affiliate, or CEO or any of the directors/ manager/key managerial personnel of the Bidder /Consortium /Member or their Affiliates, full details of such investigation including the name of the investigating agency, the charge/offence for which the investigation has been launched, name and designation of persons against whom the investigation has been launched and other relevant information should be disclosed while submitting the Bid.

The Bidders shall confirm the above through a notarized affidavit as per Annexure 22.

## **2.2 Submission of Bid by the Bidder**

- 2.2.1 The information and documents in Technical Bid will be submitted by the Bidder as per the formats specified in Section – 4 (Formats for RFP) of this document
- 2.2.2 Strict adherence to the formats wherever specified, is required. Wherever, information has been sought in specified formats, the Bidder shall refrain from referring to brochures/ pamphlets. Non-adherence to formats and/ or submission of incomplete information may be a ground for declaring the Technical Bid as non-responsive. Each format has to be duly signed and stamped by the authorized signatory of Bidder.
- 2.2.3 The Technical Bid shall contain unconsolidated/consolidated audited annual accounts (consisting of unabridged Balance Sheet, Profit and Loss Account, profit appropriation account, Auditors Report, etc.), as the case may be, of Bidding Company or each Member in Consortium including Lead Member or the Financially Evaluated Entity for the last three (3) financial years immediately preceding the last date for submission of Bid for the purpose of calculation of Networth.

In case the annual accounts for the financial year immediately preceding the Bid Deadline is not audited, the Bidder shall give declaration in this regard duly certified by its statutory auditor. In such a case, the Bidder shall provide the audited annual accounts for the three (3) financial years preceding the financial year as above for which the annual accounts have not been audited.

### **2.2.4 Bid submitted by a Bidding Consortium:**

- 2.2.4.1 The Technical Bid shall contain a legally enforceable Consortium Agreement entered amongst the Members in the Bidding Consortium, designating one of the Members to be the Lead Member (as per Annexure 6). There shall be only one Lead Member which shall continue to hold twenty six percent (26%) equity in the TSP and cannot be changed upto one (1) year from the Commercial Operation Date (COD) of the Project. Each Member in Bidding Consortium shall duly sign the Consortium Agreement making it liable for raising the required funds for its respective equity investment commitment as specified in the Consortium Agreement. In absence of Consortium Agreement, the Technical Bid will not be considered for evaluation and will be rejected.

Provided that the Lead Member of the Bidding Consortium will be required to be liable to the extent of 100% of the total proposed commitment of equity investment of the Bidding Consortium i.e. for both its own equity contribution as well as the equity contribution of other Members.

Provided further that the Consortium Agreement shall not be amended without the explicit approval of the BPC.

The Lead Member of the Consortium will be the single point of contact for the purposes of the bid process before the date of signing of Share Purchase Agreement. Settlement of any dispute amongst the Consortium Members shall not be the responsibility of the BPC and/or the CTU and the BPC and/or the CTU shall not bear any liability whatsoever on this account.

2.2.4.2 The Lead Member should designate at the most two persons to represent the Consortium in its dealings with the BPC. The person(s) designated by the Lead Member should be authorized through a Power of Attorney (as per Annexure 3) to perform all tasks including, but not limited to providing information, responding to enquiries, signing of Technical Bid on behalf of the Consortium, etc. The Bidding Consortium shall provide board resolutions from their respective Boards for committing their respective portion of equity requirement for the Project. Additionally, the Lead member shall provide a Board resolution committing to make good any shortfall in the equity for the project, in case of any member not meeting its equity commitment.

2.2.4.3 The Technical Bid should also contain signed Letter of Consent (as per Annexure 2) from each Member in Consortium confirming that the entire Technical and Financial Bids has been reviewed and each element of the Technical and Financial Bids is agreed to by them including investment commitment for the Project.

In addition, the Technical Bid should also contain Board Resolution from each Member of the Consortium other than the Lead Member in favour of their respective authorized representatives for executing the POA, Consortium Agreement and signing of the requisite formats.

#### 2.2.5 Bid submitted by a Bidding Company

2.2.5.1 The Bidding Company should designate at the most two persons to represent the Bidding Company in its dealings with BPC. The person(s) should be authorized to perform all tasks including, but not limited to providing information, responding to enquiries, signing of Technical and Financial Bids etc. The Bidding Company should submit, along with Technical Bid, a Power of Attorney (as per Annexure 3), authorizing the signatory of the Technical and Financial Bids. The Bidding Company shall submit the board resolution committing 100% of equity requirement for the Project, in the Technical Bid.

### 2.3 Clarifications & Pre-Bid Meeting

2.3.1 The Bidders may seek clarifications or suggest amendments to the RFP by sending an email to the BPC at the email id indicated in Clause 2.14 within the date and time mentioned in Clause 2.7.2. For any such clarifications or amendments, the Bidders should adhere to the format as per Annexure – 19.

2.3.2 Only those Bidders or their authorized representatives, who have purchased the RFP documents, are invited to attend the pre-bid meeting(s), which will take place on date as specified in Clause 2.7.2, or any such other date as notified by the BPC. The time and

address of this would be intimated later.

- 2.3.3 The purpose of the pre-bid meeting will be to clarify any issues regarding the RFP, including in particular, issues raised in writing by the Bidders as per the provisions of Clause 2.3.1.
- 2.3.4 Non-attendance at the pre-bid meeting will not be a cause for disqualification of a Bidder.
- 2.3.5 The BPC is not under any obligation to entertain / respond to suggestions made or to incorporate modifications sought for.
- 2.3.6 In case Bidders need any further clarifications not involving any amendments in respect of final RFP, they should ensure that request for such clarification is submitted through e-mail to the BPC at least ten (10) days prior to the Bid Deadline as mentioned in Clause 2.7.1. The BPC may issue clarifications only, as per its sole discretion, which is considered reasonable by it. Any such clarification issued shall be sent to all the Bidders to whom the RFP has been issued. Clarifications sought after this date shall not be considered in any manner and shall be deemed not to have been received. There shall be no extension in Bid Deadline on account of clarifications sought as per this clause 2.3.6.

## **2.4 Amendment of RFP**

- 2.4.1. At any time before the timeline mentioned in Clause 2.7.1, the BPC may, for any reason, whether at its own initiative or in response to clarifications requested by any Bidder modify or amend the RFP, including the timelines specified in Clause 2.7.2 by issuance of addendum/modification/errata and/or revised document. Such document shall be notified in writing through a letter or fax or e-mail to all the entities to whom the RFP has been issued and shall be binding on them. In order to ensure that Bidders have reasonable time to take the modification into account in preparing their Bid, or for any other reasons, BPC may at its discretion, extend the due date for submission of Bid. Late receipt of any addendum/modification/errata and/or revised document will not relieve the Bidder from being bound by that modification.
- 2.4.2. All modifications shall become part of the terms and conditions of this RFP. No interpretation, revision or communication regarding this RFP is valid, unless made in writing.
- 2.4.3. The amendment to the RFP shall be notified to all the Bidders through the electronic bidding platform and shall be binding on them.

## **2.5 The Bidding Process**

The entire bidding process shall be conducted on electronic bidding platform created by **MSTC Limited**. The Bid shall comprise of the Technical Bid and the Financial Bid. The Bidders shall submit the Technical Bid & Financial Bid through the electronic bidding platform. In addition to the online submission, the Bidder with lowest Final Offer will be required to submit original hard copies of Annexure 3, Annexure 4 (if applicable), Annexure 6 (if applicable) and Annexure 14 before issuance of Lol. There shall be no physical submission of the Financial Bid.

Evaluation of Technical Bid will be carried out considering the information and documents furnished by the Bidders as required under this RFP. This step would involve responsiveness check, technical and financial evaluation of the details/ documents furnished by the Bidding Company / Bidding Consortium in support of meeting the Qualification Requirements. Bidders meeting the Qualification Requirements, subject to evaluation as specified in Clause 3.2 to 3.4 shall be declared as "Qualified Bidders" and eligible for opening of Initial Offer. The BPC shall also upload the list of all Qualified Bidders and Non-Qualified Bidders on the bidding portal along with the reasons for non-qualification. Also, the Financial Bids of Qualified Bidders shall be opened after at least 24 hours from the date of declaration of the Technically Qualified Bidders.

The Financial Bid will comprise of two rounds. In the first round the Initial Offer (submitted online along with the Technical Bids) of the responsive bids would be opened and Quoted Transmission Charges of Initial Offer shall be ranked on the basis of ascending order for determination of the Qualified Bidders as provided in Section-III of RFP. The Qualified Bidders, in the first fifty per cent of the ranking (with any fraction rounded off to higher integer) or four Qualified Bidders, whichever is higher, shall qualify for participating in the electronic reverse auction stage and submit their Final Offer.

Provided however, in case only one Bidder remains after the evaluation of Technical Bid as per Clause 3.2, 3.3 and Clause 3.4, the Initial Offer of such Bidder shall not be opened and the matter shall be referred to the Government.

Provided that in the event the number of qualified Technical Bids is between two and four, then each of the qualified Bidder shall be considered as "Qualified Bidders".

Provided that in the event of identical Quoted Transmission Charges discovered from the Initial Offer having been submitted by one or more Bidders, all such Bidders shall be assigned the same rank for the purposes of determination of Qualified Bidders. In such cases, all the Qualified Bidders who share the same rank till 50% of the rank (with any fraction rounded off to higher integer) determined above, shall qualify to participate in the electronic e-reverse auction stage. In case 50% of the ranks (with any fraction rounded off to higher integer) is having less than 4 (four) Bidders and the rank of the fourth (4<sup>th</sup>) Bidder is shared by more than one (1) Bidder, then all such Bidders who share the rank of the fourth (4<sup>th</sup>) Bidder shall qualify to participate in the electronic reverse auction.

The applicable ceiling for electronic reverse bidding shall be the lowest Quoted Transmission Charges discovered from the Initial Offer received from the Qualified Bidders. The Qualified Bidders shall be permitted to place their Final Offer on the electronic bidding platform, which is lower than zero point two five (0.25) % of the prevailing lowest Quoted Transmission Charges.

The initial period for conducting the e-reverse bidding should be 2 hours which will be extended by 30 minutes from the last received bid time, if the bid is received during the last 30 minutes of the scheduled or extended bid time. Subsequently, it will be extended again by 30 minutes from the latest received bid time.

The technical details with respect to access to such electronic platform are provided in Annexure-A (Technical Details with respect to electronic reverse auction).

In case of any technical clarification regarding access to the electronic reverse auction platform or conduct of the auction process, the Bidders may contact MSTC directly at the address provided in Annexure-A.

### 2.5.1 Bid Formats

The Bids in response to this RFP will be submitted online through the electronic bidding platform by the Bidders in the manner provided in Clause 2.9. The Bids shall comprise of the following:

### 2.5.2 Technical Bid comprising of:

1. Covering Letter (as per prescribed format enclosed as **Annexure 1**);
2. Letter of Consent from Consortium Members in **Annexure 2**;
3. Power of attorney issued by the Bidding Company or the Lead Member of the Consortium, as the case may be, in favour of the person signing the Bid, in the format attached hereto as **Annexure 3**.

Additionally, in case of a Bidding Consortium, the power of attorney in favour of the Lead Member issued by the other Members of the Consortium shall be provided in as per format attached hereto as **Annexure 4**. Further, the Lead Member shall furnish Board resolution(s) from each Member of the Consortium other than the Lead Member in favour of their respective authorized representatives for executing the POA and signing of the requisite formats.

Provided that in the event the Bidding Company or the Lead Member of the Consortium or any Member of the Bidding Consortium, as the case may be, is a foreign entity, it may issue Board resolutions in place of power of attorney for the purpose of fulfilling these requirements.

4. Bidder's composition and ownership structure in **Annexure 5**
5. Format for Authorization submitted in Non-Judicial stamp paper duly notarized as per **Annexure 5** from the Bidding Company / each Member of the Consortium authorizing the BPC to seek reference from their respective bankers & others.
6. In case of Bidding Consortium, the Consortium Agreement shall be provided in as per format attached hereto as **Annexure 6**
7. Format of Qualification Requirement (**Annexures 7A, 7B, 7C and 7D**)
8. Bidders Undertakings and details of equity investment in Project (as per prescribed formats 1 and 2 of **Annexure 8**);
9. Authorization from Parent / Affiliate of Bidding Company / Member of Bidding Consortium whose technical / financial capability has been used by the Bidding Company / Member of Bidding Consortium (**Annexure 9**).

10. Undertaking from the Technically / Financially Evaluated Entity(ies) **OR** Undertaking from the Ultimate Parent Company, for total equity investment commitment, in the prescribed format in **Annexure – 10**, to meet any shortfall in the equity investment by the Selected Bidder in the **SPV [which is under incorporation]**.

**Note:** The effective Equity holding of the Selected Bidder in the **SPV [which is under incorporation]**, as specified in Clause 2.5.8.1 shall be computed as per the provisions of Clause 2.5.8.3 of this RFP.

Provided further, in case the Bidding Company or Member of a Consortium, (as the case may be) holds at least twenty six percent (26%) equity in such Technically/ Financially Evaluated Entities, whose credentials have been considered for the purpose of meeting the Qualification Requirements as per the RFP, no such Undertaking shall be required from the Technically / Financially Evaluated Entities.

11. Board resolutions, as per prescribed formats enclosed as Annexure – 11, duly certified by the Company Secretary or any Whole-time Director / Manager (supported by a specific Board Resolution), as applicable to the Bidder and mentioned hereunder,
- (a) Board resolution from the Bidding Company (and any investing Affiliate / Parent Company / Ultimate Parent Company) committing one hundred percent (100%) in aggregate of the equity requirement for the Project - Format-1 of **Annexure 11**;
  - (b) Board resolutions from each of the Consortium Member of the Bidding Consortium (and any investing Affiliate / Parent Company / Ultimate Parent Company) together committing to one hundred percent (100%) in aggregate of equity requirement for the Project, in case Bidder is a Bidding Consortium - Format-1 of **Annexure 11**;
  - (c) In either of the cases as in (a) or (b) above as applicable, Board resolutions as per Format 2 of **Annexure 11** for total equity investment commitment from the Technically / Financially Evaluated Entity(ies) whose technical / financial credentials had been considered for the purpose of meeting Qualification Requirements as per the RFP

**OR**

Board resolutions as per Format 2 of **Annexure 11** from the Parent Company or the Ultimate Parent Company for total equity investment commitment.

Provided that such Board resolutions, as specified in (a) or (b) or (c) above, in case of a foreign entity, shall be supported by an unqualified opinion issued by an independent legal counsel practicing in the relevant country, stating that the Board resolutions are in compliance with the applicable laws of the respective jurisdictions of the issuing company and the authorizations granted therein are true and valid.

For clarity sake, illustrations identifying which Board Resolution shall be applicable in typical cases are provided in **Annexure 11A**.

12. Format for Illustration of Affiliates at the most seven (7) days prior to Bid Deadline, duly certified by Company Secretary and supported by documentary evidence (**Annexure 12**).

Certified copy of the Register of Members / Demat Account Statement, Share Certificate, Annual Return filed with ROC etc. submitted as documentary evidence along with **Annexure 12**.

13. Disclosure as per **Annexure 13** regarding participation of any related companies in this bidding process.
14. Bid Bond, as per the prescribed format at **Annexure 14**.
15. Checklist for Technical Bid submission requirements as per **Annexure 16**.
16. Last three (3) financial years' unconsolidated / consolidated audited annual accounts / statements, as the case may be, of the Financially Evaluated Entity / Technical Evaluated Entity
17. Unconsolidated audited annual accounts of both the TEE and the Bidding Company/Lead member, as applicable, for the financial years in which financial closure was achieved and the financial year in which the said project was completed / commissioned.
18. Copy of the Memorandum and Articles of Association and certificate of incorporation or other organizational document (as applicable), including their amendments, certified by the Company Secretary of Bidding Company or each Member in case of a Consortium including Lead Member.
19. For each project listed in Annexure 7(D), certified true copy of the certificates of final acceptance and / or certificates of good operating performance duly issued by owners or clients for the project, duly signed by authorized signatory.

In addition to the online submission of above formats through the electronic platform, the Bidder with lowest Final Offer will be required to submit original hard copies of Annexure 3, Annexure 4 (if applicable), Annexure 6 (if applicable) and Annexure 14 before issuance of Lol. In case, there is a discrepancy between the online submission and physical documents, the bid would be out rightly rejected and the bidder shall be construed to have engaged in the fraudulent practice as defined in Clause 2.19.3 with consequences as mentioned in Clause 2.19.2.

### **2.5.3 Financial Bid (as per prescribed format at Annexure-21)**

Financial Bid shall comprise of: (i) the Initial Offer; and (ii) the Final Offer. The Initial Offer is required to be submitted along with the Technical Bid. It is hereby clarified that the Financial Bid will comprise of two rounds. In the first round the Initial Offer of the responsive bids would be opened and Quoted Transmission Charges of Initial Offer shall be ranked on the basis of ascending order for determination of the Qualified Bidders as provided in Section-III of RFP.

In accordance with clause 2.5 of this RFP, the qualified Bidders shall be eligible to participate in the electronic reverse auction and submit their Final Offer.

The applicable ceiling for electronic reverse bidding shall be the lowest Quoted Transmission Charges discovered from the Initial Offer received from the Qualified Bidders. The Qualified Bidders shall be permitted to place their Final Offer on the electronic bidding platform, which is lower than zero point two five (0.25) % of the prevailing lowest Quoted Transmission Charges.

The initial period for conducting the e-reverse bidding should be 2 hours which will be extended by 30 minutes from the last received bid time, if the bid is received during the last 30 minutes of the scheduled or extended bid time. Subsequently, it will be extended again by 30 minutes from the latest received bid time.

The Bidders shall inter-alia take into account the following while preparing and submitting the Initial Offer and Final Offer of Financial Bid:-

- a. The Bidders shall quote single annual Quoted Transmission Charges for a period of 35 years commencing from the Scheduled COD of the Project.
- b. The Quoted Transmission Charges as per the format at Annexure-21 shall be inclusive of all charges and no exclusions shall be allowed. The Bidders shall take into account all costs including capital and operating, statutory taxes, duties, levies. Availability of the inputs necessary for operation and maintenance of the Project should be ensured by the TSP at the Project site and all costs involved in procuring the inputs (including statutory taxes, duties, levies thereof) at the Project site must be included in the Quoted Transmission Charges.
- c. Annexure 21 duly digitally signed by authorized signatory.

2.5.4 Wherever information has been sought in specified formats, the Bidders shall fill in the details as per the prescribed formats and shall refrain from referring to any other document for providing any information required in the prescribed format.

### **2.5.5 Transmission Charges**

2.5.5.1. The Transmission Charges shall be specified in the Transmission Service Agreement and shall be payable to the TSP in Indian Rupees only. The Bidders shall quote single Transmission Charges as per the format at Annexure – 21.

2.5.5.2. The Transmission Charges of the Selected Bidder shall be inserted in Schedule 5 of the Transmission Service Agreement.

### **2.5.6 Bidders may note that:**

- a) All the information and documents in Bid shall be submitted in English language only.
- b) Bidders shall mention the name, designation, telephone number, fax number, email address of the authorized signatory and complete address of the Bidder in the covering letter.

- c) All pages of the Bid submitted shall be initialed and stamped by the authorized signatory on behalf of the Bidder.
- d) A Bidder shall submit only one Bid in the same bidding process, either individually as Bidding Company or as a Member of a Bidding Consortium.
- e) The technical and financial capability of a particular company / particular project (Parent and/ or Affiliate) shall not be used directly or indirectly by more than one Bidder/ Member of a Bidding Consortium including Lead Member / Bidding Company.
- f) This Request for Proposal (RFP) document is not transferable. The RFP document and the information contained therein is for the use only by the Bidder to whom it is issued. It may not be copied or distributed by the recipient to third parties (other than in confidence to the recipient's professional advisors). In the event that the recipient does not continue with its involvement in the Project, this RFP document must be kept confidential.
- g) Though adequate care has been taken while preparing this RFP document, the Bidder shall satisfy himself that the document is complete in all respects. Intimation of any discrepancy shall be given to the BPC immediately. If no intimation is received from any Bidder within ten (10) days from the date of issue of RFP document, it shall be considered that the RFP document is complete in all respects and has been received by the Bidder.
- h) Bids submitted by the Bidder and opened on scheduled date and time as stipulated in this RFP shall become the property of the BPC and BPC shall have no obligation to return the same to the Bidder.
- i) If any Bidder conceals any material information or makes a wrong statement or misrepresents facts or makes a misleading statement in its Bid, in any manner whatsoever, the BPC reserves the right to reject such Bid or cancel the Letter of Intent, if issued. If such event is discovered after the Effective Date, consequences specified in Transmission Service Agreement shall apply.
- j) If for any reason the Bid of the Bidder with the lowest Quoted Transmission Charges is not selected or Letter of Intent issued to such Selected Bidder is cancelled or such Bidder withdraws its Bids, the BPC may :-
  - i. Invite all the remaining Bidders to revalidate or extend their respective Bid Security, as necessary, and match the Bid of the Bidder with the lowest Quoted Transmission Charges (the "second round of bidding") with following cases:
    - If in the second round of bidding, only one Bidder matches the Bid of the Bidder with lowest Quoted Transmission Charges, it shall be the Selected Bidder.
    - If two or more Bidders match the Bid of the Bidder with the lowest Quoted Transmission Charges in the second round of bidding, then the Bidder whose Quoted Transmission Charges was lower as compared to other Bidder(s) in the first round of bidding shall be the Selected Bidder. For example, if the

third and fifth lowest Bidders in the first round of bidding offer to match the Bid of the Bidder with lowest Quoted Transmission Charges in the second round of bidding, the said third lowest Bidder shall be the Successful Bidder.

- In the event that no Bidder offers to match the Bid of the Bidder with the lowest Quoted Transmission Charges in the second round of bidding, the BPC may, in its discretion, invite fresh Bids (the “third round of bidding”) from all Bidders except the Bidder which quoted the lowest Quoted Transmission Charges in the first round of bidding. In case the Bidders are invited for the third round of bidding to revalidate or extend their Bid Security, as necessary, and offer fresh Bids, they shall be eligible for submission of fresh Bids provided, however, that in such third round of bidding only such Bids shall be eligible for consideration which are lower than the Quoted Transmission Charges of the second lowest Bidder in the first round of bidding; or;
  - ii. Annul the bid process; or
  - iii. Take any such measure as may be deemed fit in the sole discretion of the BPC<sup>1</sup>
- k) The BPC may, at its sole discretion, ask for additional information / document and/or seek clarifications from a Bidder after the Bid Deadline, inter alia, for the purposes of removal of inconsistencies or infirmities in its Bid. However, no change in the substance of the Quoted Transmission Charges shall be sought or permitted by the BPC.
- l) Non submission and/or submission of incomplete data/ information required under the provisions of RFP shall not be construed as waiver on the part of BPC of the obligation of the Bidder to furnish the said data / information unless the waiver is in writing.
- m) Bidders shall familiarize itself with the procedures and time frames required to obtain all Consents, Clearances and Permits.
- n) All Bidders are required to ensure compliance with the standards and codes mentioned in Clause 1.6.1.2.
- o) BPC reserves the right to reject all Bids and/or annul the process of tariff based competitive bidding for selection of Bidder as TSP to execute the Project without assigning any reason. BPC shall not bear any liability, whatsoever, in this regard.
- p) Foreign companies submitting the Bid are required to follow the applicable law in their country for execution of POA, Consortium Agreement and affixation of Common Seal (wherever required) and in such cases, their Bid should be supported by an unqualified opinion issued by an independent legal counsel practicing in the relevant country, stating that execution of such POA, Consortium Agreement and the authorizations granted therein are true and valid. Foreign companies executing POA outside India shall necessarily pay the adequate stamp charges in India as per the provisions of Stamp Act.

<sup>1</sup> BPC shall record reasons for the same.

## 2.5.7 Bidders to inform themselves fully

- 2.5.7.1. The Bidders shall make independent enquiry and satisfy themselves with respect to all the required information, inputs, conditions and circumstances and factors that may have any effect on his Bid. Once the Bidders have submitted their Bids, the Bidders shall be deemed to have inspected and examined the site conditions (including but not limited to its surroundings, its geological condition and the adequacy of transport facilities to the site), the laws and regulations in force in India, the transportation facilities available in India, the grid conditions, the adequacy and conditions of roads, bridges, railway sidings, ports, etc. for unloading and/or transporting heavy pieces of material and has based its design, equipment size and fixed its price taking into account all such relevant conditions and also the risks, contingencies and other circumstances which may influence or affect the transmission of power. Accordingly, each Bidder acknowledges that, on being selected as Successful Bidder and on acquisition of one hundred percent (100%) of the equity shares of the **SPV [which is under incorporation]**, the TSP shall not be relieved from any of its obligations under the RFP Project Documents nor shall the TSP be entitled to any extension in Scheduled COD mentioned in this RFP or financial compensation for any reason whatsoever.
- 2.5.7.2. In their own interest, the Bidders are requested to familiarize themselves with all relevant laws of India, including without limitation, the Electricity Act 2003, the Income Tax Act 1961, the Companies Act, 1956 / Companies Act, 2013 (as the case may be), Environment Protection Act 1986 and Forest (Conservation) Act, 1980, the Customs Act, the Foreign Exchange Management Act, Land Acquisition Act, 1894, the Indian Telegraph Act 1885, Labour & Employment Laws of India, [Insurance Act] the regulations/standards framed by the Commissions and CEA, all other related acts, laws, rules and regulations prevalent in India, as amended from time to time.

In addition to the above, the Bidders are required to familiarize themselves with all relevant technical codes and standards, including but not limited to the Grid Code / State Grid Code, Central Electricity Authority (Installation and Operations of Meters) Regulations, 2006, Central Electricity Authority (Technical Standards for Connectivity to the Grid) Regulations, 2007, Central Electricity Regulatory Commission Grant of Connectivity, Long-term Access and Medium - Term Open Access in Inter-State Transmission and related matters) Regulations, 2009, Central Electricity Authority (Technical Standards for construction of Electrical Plants and Electric Lines) Regulation, 2010, Central Electricity Authority (Technical Standards for Communication System in Power System Operation) Regulations, 2020, Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations, 2020 and other relevant Rules/ Regulations/ Guidelines issued by the Central Government, the CERC and the CEA and amendments thereof.

The BPC shall not entertain any request for clarifications from the Bidders regarding the above laws / acts / rules / regulations / standards. Non-awareness of the same shall not be a reason for the Bidder to request for extension in Bid Deadline. The Bidders undertake and agree that, before submission of their Bid, all such factors as generally brought out above, have been fully investigated and considered while submitting their Bids.

- 2.5.7.3. The Survey Report has been prepared in good faith, and on best endeavor basis. Neither BPC & Nodal Agency nor their employees or advisors/consultants make any

representation or warranty, express or implied, or accept any responsibility or liability, whatsoever, in respect of any statements or omissions made in the Survey Report, or the accuracy, completeness or reliability of information contained therein, and shall incur no liability under any law, statute, rules or regulations as to the accuracy, reliability or completeness of such Survey Report, even if any loss or damage is caused to the Bidders by any act or omission on their part.

- 2.5.7.4. Bidders shall make best efforts and carry out its own due diligence upon survey report provided by BPC and shall consider all possible techno-commercial factors before submission of Bid. Bidders may also visit the route of the Transmission Lines associated with the Project and the surrounding areas and obtain / verify all information which they deem fit and necessary for the preparation of their Bid. Bidders may also carry out required surveys and field investigation for submission of their Bid. Bidders may also opt for any other route and is not bound to follow the route suggested in survey report provided by BPC.
- 2.5.7.5. Failure to investigate, examine and to inspect site or subsurface conditions fully shall not be grounds for a Bidder to alter its Bid after the Bid Deadline nor shall it relieve a Bidder from any responsibility for appropriately eliminating the difficulty or costs of successfully completing the Project.
- 2.5.7.6. The Selected Bidder shall obtain all necessary Consents, Clearances and Permits as required. The Bidders shall familiarize itself with the procedures and time frame required to obtain such Consents, Clearances and Permits.
- 2.5.7.7. The technical requirements of integrated grid operation are specified in the Indian Electricity Grid Code (IEGC). The Bidders should particularly acquaint themselves with the requirements of connection conditions, operating code for regional grids, scheduling and dispatch instructions/codes, etc. The Bidders are also advised to fully familiarize themselves with the real time grid conditions in the country. Information regarding grid parameters such as voltage and frequency is available on the websites of Regional / State Load Despatch Centres.

## **2.5.8 Minimum Equity holding/Equity Lock-in**

- 2.5.8.1. (a) The aggregate equity share holding of the Selected Bidder, in the issued and paid up equity share capital of **SPV [which is under incorporation]** shall not be less than Fifty one percent (51%) up to a period of (1) one year after COD of the Project;
- (b) In case the Selected Bidder is a Bidding Consortium, then any Member (other than the Lead Member) of such Bidding Consortium shall be allowed to divest its equity as long as the other remaining Members (which shall always include the Lead Member) hold the minimum equity specified in (a) above.
- (c) If equity is held by the Affiliates, Parent Company or Ultimate Parent Company, then subject to the second proviso of this Clause 2.5.8.1 (c), such Affiliate, Parent Company or Ultimate Parent Company shall be permitted to transfer its shareholding in **SPV [which is under incorporation]** to another Affiliate or to the Parent Company / Ultimate Parent Company. If any such shareholding entity, qualifying as an Affiliate / Parent Company / Ultimate Parent Company, is likely to cease to meet the criteria to qualify as an Affiliate / Parent Company / Ultimate Parent Company, the shares held by

such entity shall be transferred to another Affiliate / Parent Company / Ultimate Parent Company.

Provided that in case the Lead Member or Bidding Company is holding equity through Affiliate/s, Ultimate Parent Company or Parent Company, such restriction shall apply to such entities.

Provided further, that the aggregate equity share holding of the Bidding Consortium or a Bidding Company in the issued and paid up equity share capital of **SPV [which is under incorporation]** shall not be less than fifty one percent (51%) up to a period of one (1) year after COD of the Project and the lead Member of the Consortium shall have the equity share holding not less than twenty six percent (26%). In case the Selected Bidder is a Bidding Consortium, then any Member (other than the Lead Member) of such Bidding Consortium shall be allowed to divest its equity as long as the other remaining Members (which shall always include the Lead Member) hold the minimum equity specified in (a) above.

(d) All transfer(s) of shareholding of **SPV [which is under incorporation]** by any of the entities referred to above, shall be after prior written intimation to the Nodal Agency.

2.5.8.2. The Selected Bidder may invest in the equity share capital of **SPV [which is under incorporation]** through its Affiliate(s) or Ultimate Parent Company or Parent Company. Details of such investment will have to be specified in the Technical Bid as per Format 2 of Annexure 8 of the RFP. If the Selected Bidder so invests through any Affiliate(s) or Ultimate Parent Company or Parent Company, the Selected Bidder shall be liable to ensure that minimum equity holding/lock-in limits specified in Clause 2.5.8.1 and as computed as per the provisions of Clause 2.5.8.3 are still maintained.

2.5.8.3. For computation of effective Equity holding, the Equity holding of the Selected Bidder or its Ultimate Parent Company in such Affiliate(s) or Parent Company and the equity holding of such Affiliate (s) or Ultimate Parent Company in **SPV [which is under incorporation]** shall be computed in accordance with the example given below:

If the Parent Company or the Ultimate Parent Company of the Selected Bidder A directly holds thirty percent (30%) of the equity in **SPV [which is under incorporation]** then holding of Selected Bidder A in **SPV [which is under incorporation]** shall be thirty percent (30%);

If Selected Bidder A holds thirty percent (30%) equity of the Affiliate and the Affiliate holds fifty percent (50%) equity in **SPV [which is under incorporation]**, then for the purposes of ascertaining the minimum equity/equity lock-in requirements specified above, the effective holding of Bidder A in **SPV [which is under incorporation]** shall be fifteen percent (15%), (i.e.,  $30\% * 50\%$ );

2.5.8.4. The provisions as contained in this Clause 2.5.8 and Article 19.1 of the Transmission Service Agreement shall override the terms of the Consortium Agreement submitted by the Bidder as part of the RFP.

## 2.6 Project Schedule

**2.6.1.** All Elements of the Project are required to be commissioned progressively as per the schedule given in the following table;

S. No.	Name of the Transmission Element	Scheduled COD	Percentage of Quoted Transmission Charges recoverable on Scheduled COD of the Element of the Project	Element(s) which are pre-required for declaring the commercial operation (COD) of the respective Element
1.	Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end	24 months from SPV transfer	100%	All elements of scheme are required to be commissioned simultaneously as their utilization is dependent on each other.
2.	2 no. of 765 kV line bays each at Bikaner-III PS & Neemrana-II S/s			

**Note:**

- (i) Developer of Bikaner-III PS & Neemrana-II S/s shall provide space for 2 nos. of 765 kV line bays alongwith space for Switchable line reactor each at Bikaner-III PS & Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2nd).

The payment of Transmission Charges for any Element irrespective of its successful commissioning on or before its Scheduled COD shall only be considered after successful commissioning of the Element(s) which are pre-required for declaring the commercial operation of such Element as mentioned in the above table.

**Scheduled COD for the Project: 24 Months from Effective Date.**

**2.7 Due dates**

2.7.1. The Bidders should submit the Bids online through the electronic bidding platform before the Bid Deadline i.e. on or before **15:00 hours (IST) on May 08, 2023**. In addition to the online submission, the Bidder with lowest Final Offer will be required to submit original hard copies of Annexure 3, Annexure 4 (if applicable), Annexure 6 (if applicable) and Annexure 14 before issuance of Lol.

2.7.2. Important timelines are mentioned below:

Date	Event
02.03.2023	Issuance of RFP
22.03.2023	Submission of written clarifications/amendments, if any, on the

Date	Event
	RFP / RFP Project Documents by Bidders so as to reach BPC by 1700 hours. Such written clarifications/amendments shall be in the format provided in Annexure-20.
29.03.2023	Pre-Bid meeting(s)
10.04.2023	Issue of written clarifications and revised RFP documents
20.04.2023	Issue of final RFP Project Documents
08.05.2023	Submission of Bid (Online submission of Bid through electronic bidding portal)
08.05.2023	Opening of Technical Bid
16.05.2023	Shortlisting and announcement of Qualified Bidders on bidding portal
17.05.2023	Opening of Financial Bid - Initial Offer
18.05.2023	Electronic reverse auction (Financial Bid – Final Offer) for the Qualified Bidders.
22.05.2023	Submission of original hard copies of Annexure 3, Annexure 4, Annexure 6, as applicable and Annexure 14 by the bidder with lowest Final Offer
26.05.2023	Selection of Successful Bidder and issue of LOI
05.06.2023	Signing of RFP Project Documents and transfer of SPV [which is under incorporation]

- 2.7.3. To enable BPC to meet the schedule, all Bidders are expected to respond expeditiously during the bidding process. If any milestone/activity falls on a day which is not a working day or which is a public holiday then the milestone/activity shall be achieved/ completed on the next working day.

## 2.8 Validity of the Bid

- 2.8.1. The Bid shall remain valid for a period of one hundred and eighty (180) days from the Bid Deadline. The BPC reserves the right to reject any Bid which does not meet aforementioned validity requirement.
- 2.8.2. The BPC may solicit the Bidders' consent for an extension of the period of validity of the Bid. The request and the response, thereafter, shall be in writing. In the event any Bidder refuses to extend its Bid validity as requested by the BPC, the BPC shall not be entitled to invoke the Bid Bond. A Bidder accepting the BPC's request for validity extension shall not be permitted to modify its Bid and such Bidder shall, accordingly, extend the validity of the Bid Bond as requested by the BPC within seven (7) days of such request, failing which the Bid shall not be considered as valid.

## 2.9 Method of Submission

- 2.9.1. Both the Technical and Financial Bids duly filled in, all formats and supporting shall be scanned and uploaded online through electronic bidding platform in the manner specified in Annexure A
- 2.9.2. It may be noted that Technical Bid shall not contain any information/document relating to Financial Bid. If Technical Bid contains any such information/documents, the BPC shall not be responsible for premature opening of the Financial Bid.

All pages of the Bid, except for the Bid Bond (Annexure 14) and any other document executed on non-judicial stamp paper, forming part of the Bid and corrections in the Bid, if any, must be signed by the authorized signatory on behalf of the Bidder. It is clarified that the same authorized signatory shall sign all pages of the Bid. However, any published document submitted in this regard shall be signed by the authorized signatory at least on the first and last page of such document.

- 2.9.3. No change or supplemental information to a Bid already submitted will be accepted after the Bid Deadline, unless the same is requested for by the BPC as per Clause 2.5.6 (k).

Provided that a Bidder shall always have the right to withdraw / modify its Bid before the Bid Deadline. No Technical Bid or Initial Offer shall be modified, substituted or withdrawn by the Bidder on or after the Bid Deadline.

## 2.10 Preparation cost

- 2.10.1. The Bidders shall be responsible for all the costs associated with the preparation of the Bid and participation in discussions and attending pre-bid meetings, and finalization and execution of the RFP Project Documents (other than the TSA), etc. BPC shall not be responsible in any way for such costs, regardless of the conduct or outcome of the process of tariff based competitive bidding for selection of Bidder as TSP as per Bidding Guidelines.
- 2.10.2. The cost of this RFP is **Rupees Five Lakh (Rs.5,00,000/-) or U.S. Dollar Seven Thousand Only (US\$7,000 /-) plus GST** as per applicable rate, which shall be non-refundable. This amount shall be paid via electronic transfer to the following Bank Account:

<b>Bank Account Name</b>	<b>: PFC Consulting Limited</b>
<b>Account No.</b>	<b>: 000705036117</b>
<b>Bank Name</b>	<b>: ICICI Bank</b>
<b>IFSC</b>	<b>: ICIC0000007</b>
<b>Branch</b>	<b>: Connaught Place, New Delhi-110001</b>

Immediately after issuance of RFP document, the Bidder shall submit the Pre-Award Integrity Pact in the format as prescribed in Annexure B, which shall be applicable for and during the bidding process, duly signed on each page by any whole-time Director / Authorized Signatory, duly witnessed by two persons, and shall be submitted by the Bidder in two (2) originals in a separate envelope, duly superscripted with Pre-Award Integrity Pact. The Bidder shall submit the Pre-Award Integrity Pact on non-judicial stamp paper of Rs. 100/- each duly purchased from the National Capital Territory of Delhi. In case the Bidder is in a consortium, the Pre-Award Integrity Pact shall be signed and submitted by each member of the Consortium separately.

## 2.11 Bid Bond

- 2.11.1. Each Bidder shall submit the Bid accompanied by Bid Bond issued by any of the Banks listed in Annexure-17. The Bid Bond shall be valid for a period of thirty (30) days beyond the validity of the Bid.
- 2.11.2. Subject to the provisions of Clause 2.15.5, the Bid Bond may be invoked by the BPC or its authorized representative, without any notice, demure, or any other legal process upon occurrence of any of the following:
- Bidder withdraws during the period of Bid Validity as specified in this RFP or as extended by mutual consent of the respective Bidder(s) and the BPC
  - Failure to execute the Share Purchase Agreement as per the provisions of Clause 2.15.2; or
  - Failure to furnish the Contract Performance Guarantee as per Clause 2.12; or
  - Failure to acquire one hundred percent (100%) equity shares of **SPV [which is under incorporation]**, along with all its related assets and liabilities, in accordance with the provisions of Clause 2.15.2; or
  - Failure to comply with the provisions of Clause 2.15.5 and Clause 2.15.6, leading to annulment of the award of the Project.
  - Bidders submitting any wrong information or making any misrepresentation in their Bid as mentioned in Clause 2.5.6.

Intimation of the reasons of the invocation of the Bid Bond shall be given to the Selected Bidder by the BPC within three (3) working days after such invocation.

- 2.11.3. The Bid Bond of the Selected Bidder shall be returned on submission of the Contract Performance
- 2.11.4. Guarantee as per Clause 2.12 and the relevant provisions of the Transmission Service Agreement.
- 2.11.5. The Bid Bond of all the Bidders, whose Bids are declared non-responsive, shall be returned within a period of thirty (30) days after the date on which the Financial Bids are opened.
- 2.11.6. The Bid Bond of all unsuccessful Bidders shall be returned and released by the BPC on the same day on which the **SPV [which is under incorporation]** is transferred to the Selected Bidder. The Bid Bond of the Successful Bidder shall be returned on submission of Contract Performance Guarantee as per Clause 2.12 of this RFP and the provisions of the Transmission Service Agreement.

## 2.12 Contract Performance Guarantee

- 2.12.1. Within ten (10) days from the date of issue of the Letter of Intent, the Selected Bidder, on behalf of the TSP, will provide to the Nodal Agency the Contract Performance Guarantee for an amount of **Rs 42 Crore (Rupees Forty Two Crore**

**Only).** The Contract Performance Guarantee shall be initially valid for a period up to three (3) months after the Scheduled COD of the Project and shall be extended from time to time to be valid for a period up to three (3) months after the COD of the Project and thereafter shall be dealt with in accordance with the provisions of the Transmission Service Agreement. The Contract Performance Guarantee shall be issued by any of the banks listed in Annexure-17.

- 2.12.2. In case the Selected Bidder is unable to obtain the Contract Performance Guarantee for the total amount from any one bank specified in Annexure-17, the Selected Bidder may obtain the same from not more than three (3) banks specified in Annexure-17.

## 2.13 Opening of Bids

- 2.13.1. Technical Bid will be opened by the Bid Opening Committee as per the following time schedule and in the office of Central Electricity Authority, in the online presence of Bidders' representatives who wish to attend:

Opening of Envelope (Technical Bid): **15:30 hours (IST) on May 08, 2023** or such other dates as may be intimated by BPC to the Bidders.

In the event of any of above dates falling on a day which is not a working day or which is a public holiday, then the bids shall be opened on the next working day at the same venue and time.

Opening of Initial Offer: Initial Offer shall be opened by the Bid Opening Committee in presence of the Bid Evaluation Committee at **15:00 hours (IST) on May 17, 2023** in the office of CEA.

- 2.13.2. The following information from each Bid will be read out to all the Bidders at the time of opening of Technical Bid:

- Name of the Bidding Company / Consortium Members in case of Bidding Consortium.

### **Information to be provided after opening of Initial Offer:**

Only the lowest Initial Offer (s) shall be communicated to all the Qualified Bidders to participate in the e-reverse bidding process. During the e-reverse bidding process only the lowest prevailing bid should be visible to all the bidders on the electronic platform.

## 2.14 Enquiries

Written clarifications on the RFP and other RFP Project Documents as per Clause 2.3 and 2.4 may be sought from:

### **General Manager**

### **PFC Consulting Limited**

9th Floor, Wing-A, Statesman House,

Connaught Place, New Delhi - 110001

Tel. + 91 11 23443996

Fax + 91 11 23443990

Email: [pfcl.itp@pfcindia.com](mailto:pfcl.itp@pfcindia.com)

## 2.15 Other Aspects

2.15.1. The draft of the Transmission Service Agreement has been attached to this RFP. In addition to above, the following documents have also been attached to this RFP:

- a) Share Purchase Agreement

When the drafts of the above RFP Project Documents are provided by the BPC, these RFP Project Documents shall form part of this RFP as per Formats – 1 & 2 of Annexure 20.

Upon finalization of the RFP Project Documents after incorporating the amendments envisaged in Clause 2.4 of this RFP, all the finalized RFP Project Documents shall be provided by BPC to the Bidders at least fifteen (15) days prior to the Bid Deadline.

The Transmission Service Agreement and Share Purchase Agreement shall be signed in required number of originals so as to ensure that one (1) original is retained by each party to the Agreement(s) on the date of transfer of SPV.

2.15.2. Within ten (10) days of the issue of the Letter of Intent, the Selected Bidder shall:

- a) provide the Contract Performance Guarantee in favour of the Nodal Agency as per the provisions of Clause 2.12;
- b) execute the Share Purchase Agreement and the Transmission Service Agreement;
- c) acquire, for the Acquisition Price, one hundred percent (100%) equity shareholding of **SPV [which is under incorporation]** from PFC Consulting Limited, who shall sell to the Selected Bidder, the equity shareholding of **SPV [which is under incorporation]**, along with all its related assets and liabilities;

Stamp duties payable on purchase of one hundred percent (100%) of the equity shareholding of **SPV [which is under incorporation]**, along with all its related assets and liabilities, shall also be borne by the Selected Bidder.

Provided further that, if for any reason attributable to the BPC, the above activities are not completed by the Selected Bidder within the above period of ten (10) days as mentioned in this Clause, such period of ten (10) days shall be extended, on a day for day basis till the end of the Bid validity period.

2.15.3. After the date of acquisition of the equity shareholding of **SPV [which is under incorporation]**, along with all its related assets and liabilities, by the Selected Bidder,

- i. the authority of the BPC in respect of this Bid Process shall forthwith cease and any actions to be taken thereafter will be undertaken by the Nodal Agency,
- ii. all rights and obligations of **SPV [which is under incorporation]**, shall be of the TSP,
- iii. any decisions taken by the BPC prior to the Effective Date shall continue to be binding on the Nodal Agency and

- iv. contractual obligations undertaken by the BPC shall continue to be fulfilled by the TSP.
  - v. Further, the TSP shall execute the Agreement(s) required, if any, under Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations as amended from time to time.
- 2.15.4. Within five (5) working days of the issue of the acquisition of the SPV by the Successful Bidder, the TSP shall apply to the Commission for grant of Transmission License and make an application to the Commission for the adoption of Transmission Charges, as required under Section – 63 of The Electricity Act 2003.
- 2.15.5. If the Selected Bidder / TSP fails or refuses to comply with any of its obligations under Clauses 2.15.2, 2.15.3 and 2.15.4, and provided that the other parties are willing to execute the Share Purchase Agreement and PFC Consulting Limited is willing to sell the entire equity shareholding of **SPV [which is under incorporation]**, along with all its related assets and liabilities, to the Selected Bidder, such failure or refusal on the part of the Selected Bidder shall constitute sufficient grounds for cancellation of the Letter of Intent. In such cases, the BPC / its authorized representative(s) shall be entitled to invoke the Bid Bond of the Selected Bidder.
- 2.15.6. If the TSP fails to obtain the Transmission License from the Commission, it will constitute sufficient grounds for annulment of award of the Project.
- 2.15.7. The annulment of award, as provided in Clauses 2.15.5 and 2.15.6 of this RFP, will be done by the Government on the recommendations of National Committee on Transmission. However, before recommending so, National Committee on Transmission will give an opportunity to the Selected Bidder / TSP to present their view point.
- 2.15.8. The annulment of the award, under Clause 2.15.5 or 2.15.6 of this RFP, shall be sufficient grounds for blacklisting the bidder, whose award has been annulled, for a period of five years or more, as decided by the National Committee on Transmission, provided that the blacklisting shall be done only after giving the bidder an opportunity for showing cause.

## **2.16 Confidentiality**

- 2.16.1. The parties undertake to hold in confidence this RFP and RFP Project Documents and not to disclose the terms and conditions of the transaction contemplated hereby to third parties, except:
- a) to their professional advisors;
  - b) to their officers, contractors, employees, agents or representatives, financiers, who need to have access to such information for the proper performance of their activities;
  - c) disclosures required under Law, without the prior written consent of the other parties of the concerned agreements.

Provided that the TSP agrees and acknowledges that the Nodal Agency may at any time, disclose the terms and conditions of the RFP and RFP Project Documents to any person, to the extent stipulated under the Law or the Bidding Guidelines.

## **2.17 Right of the BPC to reject any Bid**

BPC reserves the right to reject all or any of the Bids/ or cancel the RFP without assigning any reasons whatsoever and without any liability.

**2.18** Non submission and/or submission of incomplete data/ information required under the provisions of RFP shall not be construed as waiver on the part of BPC of the obligation of the Bidder to furnish the said data / information unless the waiver is in writing.

## **2.19 Fraudulent and Corrupt Practices**

2.19.1. The Bidders and their respective officers, employees, agents and advisers shall observe the highest standard of ethics during the Bid process and subsequent to the issue of the Lol Notwithstanding anything to the contrary contained herein, or in the Lol, the BPC shall reject a Bid, withdraw the Lol, as the case may be, without being liable in any manner whatsoever to the Bidder, if it determines that the Bidder has, directly or indirectly or through an agent, engaged in corrupt practice, fraudulent practice, coercive practice, undesirable practice or restrictive practice in the Bid process. In such an event, the BPC shall forfeit the Bid Bond, without prejudice to any other right or remedy that may be available to the BPC hereunder or otherwise.

2.19.2. Without prejudice to the rights of the BPC under Clause 2.19.1 hereinabove and the rights and remedies which the BPC may have under the Lol, if a Bidder is found by the BPC to have directly or indirectly or through an agent, engaged or indulged in any corrupt practice, fraudulent practice, coercive practice, undesirable practice or restrictive practice during the Bid process, or after the issue of the Lol, such Bidder & its Affiliates shall not be eligible to participate in any tender or RFP issued by any BPC for an indefinite period from the date such Bidder is found by the BPC to have directly or indirectly or through an agent, engaged or indulged in any corrupt practice, fraudulent practice, coercive practice, undesirable practice or restrictive practices, as the case may be.

2.19.3. For the purposes of this Clause 2.19, the following terms shall have the meaning hereinafter respectively assigned to them:

- a) **“corrupt practice”** means (i) the offering, giving, receiving, or soliciting, directly or indirectly, of anything of value to influence the actions of any person connected with the Bid process (for avoidance of doubt, offering of employment to or employing or engaging in any manner whatsoever, directly or indirectly, any official of the BPC who is or has been associated or dealt in any manner, directly or indirectly with the Bid process or the Lol or has dealt with matters concerning the Transmission Service Agreement or arising there from, before or after the execution thereof, at any time prior to the expiry of one year from the date such official resigns or retires from or otherwise ceases to be in the service of the BPC, shall be deemed to constitute influencing the actions of a person connected with the Bid Process); or (ii) engaging in any manner

whatsoever, whether during the Bid Process or after the issue of the Lol or after the execution of the Transmission Service Agreement, as the case may be, any person in respect of any matter relating to the Project or the Lol or the Transmission Service Agreement, who at any time has been or is a legal, financial or technical adviser of the BPC in relation to any matter concerning the Project;

- b) **"Fraudulent practice"** means a misrepresentation or omission of facts or suppression of facts or disclosure of incomplete facts, in order to influence the Bid process;
- c) **"Coercive practice"** means impairing or harming, or threatening to impair or harm, directly or indirectly, any person or property to influence any person's participation or action in the Bid process;
- d) **"undesirable practice"** means (i) establishing contact with any person connected with or employed or engaged by the BPC with the objective of canvassing, lobbying or in any manner influencing or attempting to influence the Bid process; or (ii) having a Conflict of Interest; and
- e) **"Restrictive practice"** means forming a cartel or arriving at any understanding or arrangement among Bidders with the objective of restricting or manipulating a full and fair competition in the Bid process.

## **SECTION - 3**

# **EVALUATION OF THE TECHNICAL AND FINANCIAL BID**

**SECTION 3****1. EVALUATION OF BID****3.1. The evaluation process of Technical Bid comprises the following five steps:**

- Step I – Responsiveness check
- Step II– Compliance with submission requirements
- Step III– Evaluation of Technical Bids
- Step IV– Evaluation of Financial Bids
- Step V – Bidder Selection

**3.2. STEP I – Responsiveness check**

The Technical Bid submitted by the Bidder shall be initially scrutinized to establish “Responsiveness”. Subject to clause 2.5.6 (k), any of the following conditions shall cause the Technical Bid to be “Non-responsive”:

- a) Technical Bid that are incomplete.
- b) Technical Bid not signed by authorized signatory and / or stamped in the manner indicated in this RFP.
- c) All pages of the Technical Bid submitted but not initialed by the authorized signatories on behalf of the Bidder.
- d) Technical Bid not including the covering letter as per Annexure 1.
- e) Technical Bid submitted by a Bidding Consortium not including the Consortium Agreement.
- f) Technical Bid contains material inconsistencies in the information and documents submitted by the Bidder, affecting the Qualification Requirements.
- g) Bidder submitting or participating in more than one Bid either as a Bidding Company or as a Member of Bidding Consortium.
- h) More than one Member of the Bidding Consortium or a Bidding Company using the credentials of the same Parent/Affiliate.
- i) Information not submitted in formats specified in the RFP.
- j) Applicable Board resolutions, or any other document, as provided in Clause 2.5.2, not being submitted;
- k) Bid not accompanied by a valid Bid Bond;
- l) Non submission of power of attorney, supported by a Board resolution;
- m) Bid validity being less than that required as per Clause 2.8 of this RFP;

- n) Bid not containing Format-1 (Bidders' Undertakings) of Annexure-8;
- o) Bidder having Conflict of Interest
- p) The Bidder has not submitted a disclosure as per Annexure 13.
- q) Bidders delaying in submission of additional information or clarifications sought by the BPC.
- r) If the Bidder makes any misrepresentation as specified in Clause 3.7.
- s) Bid being conditional in nature.
- t) More than one Member of the Bidding Consortium or a Bidding Company using the credentials of the same Parent/Affiliate.

### **3.3. STEP II - Compliance with submission requirements**

Each Bidder's Technical Bid shall be checked for compliance with the submission requirements set forth in this RFP before the evaluation of Technical Bid is taken up. Annexure 16 and Annexure 11A shall be used to check whether each Bidder meets the stipulated requirements.

### **3.4. STEP III -Evaluation of Technical Bid**

Evaluation of Technical Bid will be carried out considering the information and documents furnished by the Bidders as required under this RFP. This step would involve technical and financial evaluation of the details/ documents furnished by the Bidding Company / Bidding Consortium in support of meeting the Qualification Requirements

#### **3.4.1. Interpolation of financial data.**

For the Qualification Requirements data provided by the Bidders in foreign currency, equivalent rupees of Networth will be calculated using bills selling exchange rates (card rate) USD/INR of State Bank of India prevailing on the date of closing of the accounts for the respective financial year as certified by their Banker.

For the purpose of calculating the aggregate capital expenditure/construction experience of the projects completed/ commissioned where such projects are executed outside India and capital expenditure is denominated in foreign currency, bills selling exchange rates (card rate) USD/INR of State Bank of India prevailing on the date of closing of the financial year in which the projects were completed and as certified by their Banker shall be considered.

For the projects executed in the current financial year bills selling (card rate) USD/INR of State Bank of India prevailing on seven (7) days prior to the last date of submission of Technical Bid and as certified by their Banker shall be considered.

For currency other than USD, Bidders shall convert such currency into USD as per the

exchange rates certified by their Banker prevailing on the relevant date and used for such conversion. Such Bidders shall submit necessary certification from their Banker for the exchange rate used in the conversation.

If the exchange rate for any of the above dates is not available, the rate for the immediately available previous day shall be taken into account.

- 3.4.2. Bidders meeting the Qualification Requirements, subject to evaluation as specified in Clauses 3.2 to 3.4 shall be declared as Qualified Bidders and eligible for opening of Initial Offer.
- 3.4.3. The BPC shall upload the list of all Qualified Bidders and Non-Qualified Bidders on the bidding portal along with the reasons for non-qualification.

### **3.5. STEP IV - Evaluation of Financial Bids**

- 3.5.1. The Bids which have been found Qualified by the BPC, based on the Steps I to III as specified above in Clauses 3.2.to 3.4, shall be opened and Quoted Transmission Charges of such Initial Offer shall be ranked on the basis of the ascending Initial Offer submitted by each Qualified Bidder.

Based on such ranking of the Qualified Bidders, in the first fifty per cent of the ranking (with any fraction rounded off to higher integer) or four Qualified Bidders, whichever is higher, shall qualify for participating in the electronic reverse auction.

Provided however, in case only one Bidder remains after the Evaluation of Technical Bid (Steps 1 to III) as per Clause 3.2 to 3.4, the Initial Offer of such Bidder shall not be opened and the matter shall be referred to the Government.

Provided that in the event the number of Qualified Bidders is between two and four, then each of the responsive Bidder shall be considered as Qualified Bidders.

Provided that in the event of identical Quoted Transmission Charges discovered from the Initial Offer having been submitted by one or more Bidders, all such Bidders shall be assigned the same rank for the purposes of determination of Qualified Bidders. In such cases, all Qualified Bidders who shares the same rank till 50% of the rank (with any faction rounded off to higher integer) determined above, shall qualify to participate in the electronic reverse auction stage. In case 50% of the rank is having less than four (4) Bidders and the rank of the fourth (4<sup>th</sup>) Bidder is shared by more than one Bidder, then all such all such Bidders who share the rank of the fourth Bidder shall qualify to participate in the electronic reverse auction.

- 3.5.2. The Financial Bids comprising of both Initial Offer and Final Offer submitted by the Bidders shall be scrutinized to ensure conformity with the provisions of Clause 2.5.3 of this RFP. Any Bid not meeting any of the requirements as per Clause 2.5.3 of this RFP may cause the Bid to be considered "Non-responsive", at the sole decision of the BPC. Financial Bid not in conformity with the requirement of Sl. No. (c) of Clause 2.5.3 of this RFP shall be rejected.
- 3.5.3 The Bidders shall quote the single annual Quoted Transmission Charges as specified in

the format at Annexure – 21.

### **3.6. STEP V - Bidder Selection**

3.6.1. The prevailing lowest Quoted Transmission Charges discovered from Final Offers shall only be displayed during the e-reverse bidding and the Bidder quoting such Final Offer will always remain anonymous during the e-reverse bidding. The Bidder with the prevailing lowest Quoted Transmission Charges discovered from Final Offers at the close of the scheduled or extended period of e-reverse bidding as mentioned in clause 2.5 shall be declared as the Successful Bidder, subject to verification of the original hard copies of Annexure 3, Annexure 4 (if applicable), Annexure 6 (if applicable) and Annexure 14. The Letter of Intent shall be issued to such Successful Bidder in two (2) copies.

However, if no bid is received during the e-reverse bidding stage then the Bidder with lowest quoted initial transmission charges ("Initial Offer") during e-bidding stage shall be declared as the Successful Bidder, subject to verification of the original hard copies of Annexure 3, Annexure 4 (if applicable), Annexure 6 (if applicable) and Annexure 14. The Letter of Intent shall be issued to such Successful Bidder in two (2) copies.

In case, there is a discrepancy between the online submission and physical documents, the bid would be out rightly rejected and the bidder shall be construed to have engaged in the fraudulent practice as defined in Clause 2.19.3 with consequences as mentioned in Clause 2.19.2. Further, in such a case, the provisions of Clause 2.5.6 (j) shall apply.

3.6.2. The Selected Bidder shall unconditionally accept the Lol, and record on one (1) copy of the Lol, "Accepted unconditionally", under the signature of the authorized signatory of the Successful Bidder and return such copy to the BPC within seven (7) days of issue of Lol.

3.6.3. If the Successful Bidder, to whom the Letter of Intent has been issued, does not fulfill any of the conditions specified in Clauses 2.15.2, 2.15.3 and Clause 2.15.4, then subject to Clause 2.15.5, the BPC reserves the right to annul the award of the Project and cancel the Letter of Intent. Further, in such a case, the provisions of Clause 2.5.6 (j) shall apply.

3.6.4. The BPC, in its own discretion, has the right to reject all Bids if the Quoted Transmission Charges are not aligned to the prevailing prices.

### **3.7. Misrepresentation by the Bidder**

If the Bidder conceals any material information or makes a wrong statement or misrepresents facts or makes a misleading statement in the Technical Bid or Bid, as the case may be, in any manner whatsoever, in order to create circumstances for the acceptance of its Technical Bid/Bid, the BPC reserves the right to reject such Technical Bid/Bid, and/ or cancel the Letter of Intent, if issued. Further, in case Letter of Intent is cancelled, consequences as per provisions of the RFP shall follow.

### **3.8. Disposition of Technical Bid**

3.8.1. Technical Bid found to be Non-responsive as per Clause 3.2, due to any of the

following conditions, shall be liable for rejection.

- Technical Bid that is incomplete.
- Technical Bid not signed by authorized signatory and / or stamped in the manner indicated in this RFP.
- All pages of the Technical Bid submitted but not initialed by the authorized signatories on behalf of the Bidder.
- Technical Bid not including the covering letter as per Annexure 1.
- Technical Bid contains material inconsistencies in the information and documents submitted by the Bidder, affecting the Qualification Requirements.
- Information not submitted in formats specified in the RFP.
- The Bidder has not submitted a disclosure as per Annexure 13.
- Bidders delaying in submission of additional information or clarifications sought by the BPC.

3.8.2. Technical Bid found to be Non-responsive as per Clause **3.2**, due to any of the following conditions, shall be rejected.

- Technical Bid not received by the scheduled date and time.
- Technical Bid submitted by a Bidding Consortium not including the Consortium Agreement.
- Bidder submitting or participating in more than one response either as a Bidding Company or as a Member of Bidding Consortium.
- More than one Member of the Bidding Consortium or a Bidding Company using the credentials of the same Parent/Affiliate.
- Technical Bid having Conflict of Interest.
- If the Bidder makes any misrepresentation as specified in Clause **3.7**.

3.9. BPC reserves the right to interpret the Bid in accordance with the provisions of this RFP document and make its own judgment regarding the interpretation of the same. In this regard, BPC shall have no liability towards any Bidder and no Bidder shall have any recourse to BPC with respect to the qualification process.

BPC shall evaluate Bid using the process specified in Clause 3.1 to 3.6, at its sole discretion. BPC's decision in this regard shall be final and binding.

# **SECTION - 4**

# **ANNEXURES FOR BID**

## SECTION – 4

**I. Formats for Bid**

The following formats are required to be included in the Bidder's Technical and Financial Bid. These formats are designed to demonstrate the Bidder's compliance with the Qualification Requirements set forth in Clause 2.1 of Section – 2.

**Technical Bid**

1. Format for the Covering Letter
2. Format for Letter of Consent from Consortium Members
3. Format for evidence of authorized signatory's authority (Power of Attorney)
4. Format for Power of Attorney from to be provided by each of the other Members of the Consortium in favor of the Lead Member
5. Format for Bidder's composition and ownership structure and Format for Authorization
6. Format for Consortium Agreement
7. Formats for Qualification Requirement
8. Format of Bidders Undertaking and details of Equity Investment
9. Authorization from Parent/Affiliate of Bidding Company/Member of Bidding Consortium whose technical/financial capability has been used by the Bidding Company/Member of Bidding Consortium.
10. Undertaking from the Technically / Financially Evaluated Entity(ies) or from Ultimate Parent Company for equity investment
11. Format of Board Resolutions
12. Format for Illustration of Affiliates
13. Format for Disclosure
14. Format for Bid Bond
15. Format for Contract Performance Guarantee
16. Checklist for Technical Bid submission requirements
22. Format for Affidavit

In addition to the online submission, the Bidder with lowest Final Offer will be required to submit original hard copies of Annexure 3, Annexure 4 (if applicable), Annexure 6 (if applicable) and Annexure 14 before issuance of Lol.

**Financial Bid**

21. Format for Financial Bid

**II.** The following formats are for the information to the Bidders to enable them to submit their Bid.

- 11A. Illustration For Applicable Board Resolution Requirements Under Clause 2.5.2
17. List of Banks
18. GRID Map of the Project
19. Format for clarification/amendments on the RFP/RFP Project Documents
20. Formats for RFP Project Documents

Bidder may use additional sheets to submit the information for its detailed Bid.

## ANNEXURE 1 - COVERING LETTER

(The covering letter should be on the Letter Head of the Bidding Company/ Lead Member of the Consortium)

Date: .....

From: .....

.....

.....

Tel. No.: .....

Fax No.: .....

E-mail address: .....

To,  
**PFC Consulting Limited**  
**9thFloor, Wing-A, Statesman House,**  
**Connaught Place, New Delhi - 110001**

Dear Sir,

**Sub: Bid for selection of Bidder as Transmission Service Provider to establish Inter-State Transmission System for “Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C” through tariff based competitive bidding process.**

1. Being duly authorized to present and act on behalf of M/s ..... (insert name of Bidding Company / Bidding Consortium) (hereinafter called the “Bidder”) and having read and examined in detail the Request for Proposal (RFP) document, the undersigned hereby submit our Technical Bid with duly signed formats and Financial Bid (Initial Offer) as stipulated in RFP document for your consideration.
2. It is confirmed that our Bid is consistent with all the requirements of submission as stated in the RFP document and subsequent clarifications/amendments as per Clause 2.3 and 2.4 of RFP.
3. The information submitted in our Bid is complete, is strictly as per the requirements stipulated in the RFP document and is correct to the best of our knowledge and understanding. We would be solely responsible for any errors or omissions in our Bid.
4. We hereby agree and undertake to procure the products associated with the Transmission System as per provisions of Public Procurement (Preference to Make in India) orders issued by Ministry of Power vide orders No. 11/5/2018 - Coord. dated 28.07.2020 for transmission sector, as amended from time to time read with Department for Promotion of Industry and Internal Trade (DPIIT) orders in this regard.

We hereby also agree and undertake to comply with Department of Expenditure, Ministry of Finance vide Order (Public Procurement No 1) bearing File No. 6/18/2019-PPD dated 23.07.2020, Order (Public Procurement No 2) bearing File No. 6/18/2019-PPD dated 23.07.2020 and Order (Public Procurement No. 3) bearing File No.

6/18/2019-PPD, dated 24.07.2020, as amended from time to time, regarding public procurement from a bidder of a country, which shares land border with India.

5. We hereby agree to comply with Ministry of Power order no. 25-11/6/2018 – PG dated 02.07.2020 as amended from time to time.
6. We are herewith submitting legally binding board resolution for the total equity requirement of the Project.
7. We hereby confirm that in accordance with Clause 2.1.4 of the RFP, we are herewith submitting legally binding undertaking supported by a board resolution from the .....(Insert name of Technically Evaluated Entity and/or Financially Evaluated Entity or its Ultimate Parent Company, as the case may be) that all the equity investment obligations of ..... (Insert name of the Bidding Company) shall be deemed to be equity investment obligations of the ..... (Insert name of Technically Evaluated Entity and/or Financially Evaluated Entity or its Ultimate Parent Company, as the case may be) and in the event of any default by..... (Insert name of the Bidding Company), the same shall be met by ..... (Insert name of Technically Evaluated Entity and/or Financially Evaluated Entity or its Ultimate Parent Company, as the case may be).

**[Sl. No 7 to be inserted only in case the Bidder is a Bidding Company / Lead Member of a Consortium and has sought qualification on the basis of technical and financial capability of its Affiliate(s) and/or its Parent]**

8. We confirm that there are no litigations or disputes against us, which materially affect our ability to fulfill our obligations with regard to the Project.
9. We hereby confirm that we shall continue to maintain compliance with Qualification Requirements till the execution of the Transmission Service Agreement. Further, in case we emerge as Selected Bidder for the Project, we shall continue to maintain compliance with Qualification Requirements till the COD of the Project.
10. We confirm that we have studied the provisions of relevant Indian laws and regulations required to enable us to build, own, operate and transfer the said Project and to prepare this Bid.
11. We hereby confirm that we shall abide unreservedly with BPC's decision in the qualification process for selection of Qualified Bidder and further warrant that under no circumstances we shall challenge either the BPC's decision or its right to make such decision at any time in the future.
12. We confirm that the Bid shall remain valid for a period of one eighty (180) days from the Bid Deadline.
13. The details of contact person are furnished as under:
 

Name:	.....
Designation:	.....
Name of the Company:	.....
Address of the Bidder:	.....

Phone Nos.: .....

Fax Nos.: .....

E-mail address: .....

#### 14. Bid Bond

We have enclosed a Bid Bond of Rupees ..... Crores (Rs. ....) only or US\$ ..... (.....US Dollars), in the form of bank guarantee no.....[Insert number of the Bank Guarantee] dated.....[Insert Date of the Bank Guarantee] as per your proforma (Annexure-14) from.....[Insert name of bank providing Bid Bond] and valid up to .....in terms of Clause 2.11 of the RFP.

#### 15. Acceptance

We hereby unconditionally and irrevocably agree and accept that the decision made by the BPC on any matter regarding or arising out of the RFP shall be binding on us. We hereby expressly waive any and all claims in respect of Bid process.

#### 16. Familiarity With Relevant Indian Laws & Regulations

We confirm that we have studied the provisions of relevant Indian laws and regulations as required to enable us to submit this Bid and execute the RFP Project Documents (other than TSA), in the event of our selection as the TSP. We further undertake and agree that all such factors as mentioned in Clause 2.5.7 of RFP have been fully examined and considered while submitting the Bid.

It is confirmed that our Bid is consistent with all the requirements of submission as stated in the RFP and subsequent communications from BPC.

The information submitted in our Bid is complete, strictly as per the requirements stipulated in the RFP and is correct to the best of our knowledge and understanding. We would be solely responsible for any errors or omissions in our Bid.

We confirm that we have not taken any deviation so as to be deemed non-responsive with respect to the provisions stipulated at Clause 2.5.1, of this RFP.

Thanking you,

Yours sincerely,

.....

**(Name and Signature of the authorized signatory in whose name Power of Attorney/ Board Resolution as per Clause 2.5.2 is issued)**

Name: .....

Designation: .....

Address: .....

Date: .....

Place: .....

**Company Rubber Stamp**

## ANNEXURE 2 - LETTER OF CONSENT FROM CONSORTIUM MEMBERS

(On the letter head of each Member of the Consortium including Lead Member)

Date: .....

From: .....

.....

.....

Tel. No.: .....

Fax No.: .....

E-mail address: .....

To,

**PFC Consulting Limited**  
**9thFloor, Wing-A, Statesman House,**  
**Connaught Place, New Delhi - 110001**

Dear Sir,

**Sub: Bid for selection of Bidder as Transmission Service Provider to establish Inter-State Transmission System for “Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C” through tariff based competitive bidding process.**

We, the undersigned Member of ..... (Insert name of the Bidding Consortium) have read, examined and understood the RFP document for the short-listing of Bidders as prospective TSP to establish Inter-State Transmission System for “**Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C**” through tariff based competitive bidding process. We hereby confirm our concurrence with the Bid including in particular the Consortium Agreement submitted by ..... (Insert name of the Lead Member) in response to the RFP document.

We hereby confirm our commitment to participate in the said Bidding Consortium and invest ..... % of the total equity requirement for the Project as per the terms of the Consortium Agreement dated ..... and board resolution for such investment commitment is enclosed herewith.

We hereby confirm that in accordance with Clause 2.1.4 of the RFP, we are enclosing legally binding undertaking supported by a board resolution from the ..... (Insert name of Technically Evaluated Entity and / or Financially Evaluated Entity or its Ultimate Parent Company, as the case may be) that all the equity investment obligations of ..... (Insert name of the Member) shall be deemed to be equity investment obligations of the ..... (Insert name of Technically Evaluated Entity and / or Financially Evaluated Entity or its Ultimate Parent Company, as the case may be) and in the event of any default by..... (Insert name of the Member), the same shall be met by..... (Insert name of Technically Evaluated Entity and / or Financially Evaluated Entity or its Ultimate Parent Company, as the case may be). [Insert if applicable]

**[To be inserted by the Lead Member only]** We are also enclosing legally binding board resolution for the total equity requirement of the Project in case of any breach of any of the equity investment commitment by any of the Consortium Members, in line with the provisions of the Consortium Agreement dated ..... [Bidder to insert date of Consortium Agreement].

The details of contact person are furnished as under:

Name: .....  
Designation: .....  
Name of the Company: .....  
Address: .....  
Phone Nos.: .....  
Fax Nos.: .....  
E-mail address: .....

Dated the ..... day of ..... of 20...

Thanking you,

Yours faithfully,

.....  
**(Signature)**

**Name:** .....  
**Designation:** .....

(Signature, Name, Designation of Authorized Signatory of Consortium Member and Company's Seal)

**ANNEXURE 3 - FORMAT FOR EVIDENCE OF AUTHORIZED SIGNATORY'S AUTHORITY (POWER OF ATTORNEY)**

**POWER OF ATTORNEY**

**(To be on non-judicial stamp paper of appropriate value as per Stamp Act relevant to place of execution. Foreign companies submitting bids are required to follow the applicable law in their country)**

Know all men by these presents, We .....(name and address of the registered office of the Bidder) do hereby constitute, appoint and authorize Mr./Ms.....(name and residential address) who is presently employed with us and holding the position of ..... as our attorney, to do in our name and on our behalf, all such acts, deeds and things necessary in connection with or incidental to our Bid for selection of Bidder as Transmission Service Provider to establish Inter-State Transmission System for **“Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C”** through tariff based competitive bidding process in the country of India, including signing and submission of all documents related to the Bid, including, undertakings, letters, certificates, acceptances, clarifications, guarantees, etc., making representations to the BPC, and providing information / responses to the BPC, representing us in all matters before the BPC, and generally dealing with the BPC in all matters in connection with our Bid for the said Project till the completion of the bidding process in accordance with the RFP and signing of the Share Purchase Agreement by all the parties thereto.

We hereby agree to ratify all acts, deeds and things lawfully done by our said attorney pursuant to this Power of Attorney and that all acts, deeds and things done by our aforesaid attorney shall and shall always be deemed to have been done by us.

All the terms used herein but not defined shall have the meaning ascribed to such terms under the RFP.

**For ..... [Insert name of the Bidder on whose behalf PoA is executed]**

.....  
**(Signature)**

Name: .....

Designation: .....

**Accepted**

.....  
**(Signature of the Attorney)**

Name: .....

Designation: .....

Address: .....

.....  
**(Name, Designation and Address of the Attorney)**

Specimen signatures of attorney attested by the Executant

.....

**(Signature of the Executant)**

.....

**(Signature of Notary Public)**

Place: .....

Date: .....

**Notes:**

- 1) To be executed by Bidding Company or the Lead Member, in the case of a Bidding Consortium, as the case maybe.
- 2) The mode of execution of the Power of Attorney should be in accordance with the procedure, if any, laid down by the applicable law and the charter documents of the executant(s) and when it is so required, the same should be under common seal of the executant affixed in accordance with the applicable procedure. Further, the person whose signatures are to be provided on the power of attorney shall be duly authorized by the executant(s) in this regard.
- 3) Also, wherever required, the executant(s) should submit for verification the extract of the charter documents and documents such as a Board resolution / power of attorney, in favour of the Person executing this power of attorney for delegation of power hereunder on behalf of the executant(s).
- 4) In case of foreign Bidders, refer to clause 2.5.6 (p)

**ANNEXURE 4 - FORMAT FOR POWER OF ATTORNEY TO BE PROVIDED BY EACH OF THE  
OTHER MEMBERS OF THE CONSORTIUM IN FAVOUR OF THE LEAD MEMBER**

**POWER OF ATTORNEY**

**(To be on non-judicial stamp paper of appropriate value as per Stamp Act relevant to place of execution. Foreign companies submitting bids are required to follow the applicable law in their country)**

**KNOW ALL MEN BY THESE PRESENTS THAT** M/s....., having its registered office at ..... and M/s ..... having its registered office at ..... , (Insert names and registered offices of all Members of the Consortium), the Members of Consortium, have formed a Bidding Consortium named ..... (insert name of the Consortium) (hereinafter called the **“Consortium”**) vide Consortium Agreement dated..... and having agreed to appoint M/s..... as the Lead Member of the said Consortium do hereby constitute, nominate and appoint M/s.....a company incorporated under the laws of .....and having its Registered / Head Office at .....as our duly constituted lawful Attorney (hereinafter called as **“Lead Member”**) which is one of the Members of the Consortium, to act as the Lead Member and our true and lawful attorney, to do in our name and on our behalf, all such acts, deeds and things necessary in connection with or incidental to submission of Consortium's Bid for the Project, including signing and submission of the Bid and all documents related to the Bid, including, undertakings, letters, certificates, acceptances, clarifications, guarantees, etc, making representations to the BPC, and providing information / responses to the BPC, representing us and the Consortium in all matters before the BPC, and generally dealing with the BPC in all matters in connection with our Bid for the said Project, till completion of the bidding process in accordance with the RFP and signing of the Share Purchase Agreement by all the parties thereto.

It is expressly understood that in the event of the Consortium being selected as Successful Bidder, this Power of Attorney shall remain valid, binding and irrevocable until the Bidding Consortium achieves execution of all RFP Project Documents.

We, as the Member of the Consortium, agree and undertake to ratify and confirm all whatsoever the said Attorney/Lead Member has done on behalf of the Consortium Members pursuant to this Power of Attorney and the same shall bind us and deemed to have been done by us.

All the terms used herein but not defined shall have the meaning ascribed to such terms under the RFP.

**IN WITNESS WHEREOF** M/s ....., as the Member of the Consortium have executed these presents on this..... day of .....

For and on behalf of  
Consortium Member

.....  
**(Signature of the Authorized Signatory)**

Name: .....  
Designation: .....  
Place: .....  
Date: .....

Name: .....  
Designation: .....  
Place: .....  
Date: .....

**Accepted**

Specimen signatures of attorney attested

.....  
**(Signature)**

**(Signature of Notary Public)**

.....  
.....  
.....  
**(Name, Designation and Address  
of the Attorney)**

Place: .....  
Date: .....

**Notes:**

1. The mode of execution of the power of attorney should be in accordance with the procedure, if any, laid down by the applicable law and the charter documents of the executant(s) and when it is so required, the same should be under common seal of the executant affixed in accordance with the applicable procedure. Further, the person whose signatures are to be provided on the power of attorney shall be duly authorized by the executant(s) in this regard.
2. Also, wherever required, the executant(s) should submit for verification the extract of the charter documents and documents such as a Board resolution / power of attorney, in favour of the Person executing this power of attorney for delegation of power hereunder on behalf of the executant(s).
3. In case of foreign Bidders, refer to clause 2.5.6 (p)

## ANNEXURE 5 - FORMAT FOR BIDDER'S COMPOSITION AND OWNERSHIP STRUCTURE

1. **Corporate Details:**

Please provide the following information for the Bidder. If the Bidder is a Consortium, please provide this information for each Member including the Lead Member:

**a. Company's Name, Address, and Nationality:**

Name: .....

Address: .....

.....

.....

Website Address: .....

Country of Origin: .....

**b. Year Organized:** .....**c. Company's Business Activities:** .....

.....

**d. Status as a Bidder:**

- i. Bidding Company
- ii. Lead Member of the Bidding Consortium
- iii. Member of the Bidding Consortium

**Note: tick the applicable serial number**

**e. Company's Local Address in India (if applicable):**

.....

.....

.....

**f. Name of the Authorized Signatory:** .....**g. Telephone Number:** .....**h. Email Address:** .....**i. Telefax Number:** .....**j. Please provide the following documents:**

- i. Copy of the Memorandum and Articles of Association and certificate of incorporation or other equivalent organizational document (as applicable), including their amendments, certified by the Company Secretary as

**Attachment 1** for Bidding Company / each Member of Bidding Consortium including Lead Member.

- ii. Authority letter (as per format for authorization given below) in favour of BPC from the Bidder/every Member of the Consortium authorizing BPC to seek reference from their respective bankers & others as **Attachment 2** as per Clause 2.1.6 of the RFP.

**2. Details of Ownership Structure:**

Equity holding of Bidding Company/ each Member of Bidding Consortium including Lead Member owning 10% or more of total paid up equity.

Name of the Bidding Company / Consortium Member: .....

Status of equity holding as on .....

Name of the Equity Holder	Type and No. of Shares owned	Extent of Voting Control (%)
1. ....		
2. ....		
3. ....		
4. ....		
5. ....		
6. ....		
7. ....		
8. ....		
....		

**Notes:**

- The above table is to be filled in separately for each Consortium Member.
- Status of equity holding should be provided not earlier than thirty (30) days prior to Bid Deadline.

**For and on behalf of Bidding Company / Lead Member of the Bidding Consortium**

M/s.....

.....

**(Signature of authorized representative)**

Name: .....

Designation: .....

.....

**(Stamp)**

Date: .....

Place: .....

**FORMAT FOR AUTHORISATION**

**(In case of Bidding Consortium, to be given separately by each Member)  
(On Non – judicial stamp paper duly attested by notary public. Foreign companies submitting bids are required to follow the applicable law in their country)**

The undersigned hereby authorize(s) and request(s) all our Bankers, including its subsidiaries and branches, any person, firm, corporation or authority to furnish pertinent information deemed necessary and requested by **PFC Consulting Limited** to verify our Bid for selection of Bidder as Transmission Service Provider to establish Inter-State Transmission system for **“Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C”** through tariff based competitive bidding process or regarding our project development experience, financial standing and general reputation.

**For and on behalf of M/s..... (Insert Name of Bidding Company or Member of the Consortium)**

.....  
**(Signature)**

Name of Authorized Signatory: .....

**(Signature and Name of the authorized signatory of the Company)**

Place: .....

Date: .....

.....  
**(Company rubber stamp/seal)**

.....  
**(Signature of Notary Public)**

Place: .....

Date: .....

## ANNEXURE 6 - FORMAT FOR CONSORTIUM AGREEMENT

**(To be on non-judicial stamp paper of appropriate value as per Stamp Act relevant to place of execution. Foreign companies submitting bids are required to follow the applicable law in their country)**

**THIS CONSORTIUM AGREEMENT** executed on this..... day of .....Two thousand.....between M/s....., a company incorporated under the laws of ..... and having its Registered Office at ..... (hereinafter called the "Party 1", which expression shall include its successors, executors and permitted assigns) and M/s.....a Company incorporated under the laws of ..... and having its Registered Office at ..... (hereinafter called the "Party n", which expression shall include its successors, executors and permitted assigns) and for the purpose of submitting the Bid, acquisition of **SPV [which is under incorporation]** (in case of award) and entering into other Agreement(s) as specified in the RFP (hereinafter referred to as "Agreements") as may be entered into with the Nodal Agency.

**WHEREAS**, the BPC had invited Bid in response to RFP issued to ..... (insert the name of purchaser of RFP) for selection of the bidder as the Transmission Service Provider to establish Inter-State Transmission System for **"Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C"**.

**AND WHEREAS**, Clause 2.2.4 of the RFP document stipulates that the Bidders qualifying on the strength of a Bidding Consortium will have to submit a legally enforceable Consortium Agreement in a format specified in the RFP document wherein the Consortium Members have to commit equity of a specific percentage in the Project.

**AND WHEREAS**, Clause 2.2.4 of the RFP document also stipulates that the Bidding Consortium shall provide along with the Bid, a Consortium Agreement as per prescribed format whereby the Consortium Members undertake to be liable for raising the required funds for its respective equity investment commitment as specified in Consortium Agreement.

### **NOW THEREFORE, THIS INDENTURE WITNESSTH AS UNDER:**

In consideration of the above premises and agreement all the parties in this Consortium do hereby mutually agree as follows:

1. In consideration of the selection of the Consortium as the selected bidder by the BPC, we the Members of the Consortium and parties to the Consortium Agreement do hereby unequivocally agree that M/s..... (Insert name of the Lead Member), shall act as the Lead Member as defined in the RFP for self and agent for and on behalf of ....., ....., ....., ..... (the names of all the other Members of the Consortium to be filled in here).
2. The Lead Member is hereby authorized by the Members of Consortium and parties to the Consortium Agreement to bind the Consortium and receive instructions for and on behalf of the Members.

3. Notwithstanding anything contrary contained in this Consortium Agreement, the Lead Member shall always be liable for the equity investment obligations of all the Consortium Members, i.e., for both its own equity contribution as well as the equity contribution of other Members.
4. The Lead Member shall be liable and responsible for ensuring the individual and collective commitment of each of the Members of the Consortium in discharging all their respective equity obligations. Each Consortium Member further undertakes to be individually liable for the performance of its part of the obligations without in any way limiting the scope of collective liability envisaged in this agreement.
5. Subject to the terms of this agreement, the share of each Member of the Consortium in the “issued equity share capital of the project company” shall be in the following proportion: (if applicable)

Name	Percentage of equity holding in the Project
Party 1	.....
.....	.....
Party n	.....
<b>Total</b>	<b>100%</b>

[**Note:** The percentage equity holding for any Consortium Member in the Project cannot be zero in the above table]

6. The Lead Member shall inter alia undertake full responsibility for liaising with lenders and mobilizing debt resources for the Project and achieving financial closure.
7. In case of any breach of any of the equity investment commitment by any of the Consortium Members, the Lead Member shall be liable for the consequences thereof.
8. Except as specified in the Agreement, it is agreed that sharing of responsibilities as aforesaid and equity investment obligations thereto shall not in any way be a limitation of responsibility of the Lead Member under these presents.
9. It is further specifically agreed that the financial liability for equity contribution of Lead Member shall, not be limited in any way so as to restrict or limit its liabilities. The Lead Member shall be liable irrespective of their scope of work or financial commitments.
10. It is expressly understood and agreed between the Members that the responsibilities and obligations of each of the Members shall be as delineated as annexed hereto as **Appendix-I**, forming integral part of this Agreement. It is further agreed by the Members that the above sharing of responsibilities and obligations shall not in any way be a limitation of joint and several responsibilities and liabilities of the Members, with regards to all matters relating to the Project.
11. It is clearly agreed that the Lead Member shall ensure performance under the Agreements and if one or more Consortium Members fail to perform its /their respective

obligations under the Agreement(s), the same shall be deemed to be a default by all the Consortium Members.

12. This Consortium Agreement shall be construed and interpreted in accordance with the Laws of India and courts at **Delhi** alone shall have the exclusive jurisdiction in all matters relating thereto and arising there under.
13. It is hereby agreed that, the Lead Member shall furnish the bid bond, as stipulated in the RFP, on behalf of the Consortium Members.
14. It is hereby agreed that in case of selection of Bidding Consortium as the selected bidder, the parties to this Consortium Agreement do hereby agree that they shall furnish the contract performance guarantee on behalf of the TSP in favor of the Nodal Agency, as stipulated in the RFP and Transmission Service Agreement.
15. It is further expressly agreed that the Consortium Agreement shall be irrevocable and shall form an integral part of the RFP Project Document and shall remain valid till the execution of the Share Purchase Agreement, unless expressly agreed to the contrary by the Nodal Agency. Over the term of the Transmission Service Agreement, Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations as amended from time to time shall apply on the Consortium Members.
16. The Lead Member is authorized and shall be fully responsible for the accuracy and veracity of the representations and information submitted by the Consortium Members respectively from time to time in response to the RFP and for the purposes of the Project.
17. It is hereby expressly agreed between the parties to this Consortium Agreement that neither party shall assign or delegate its rights, duties or obligations under this Agreement except with the prior written consent of the Nodal Agency.

**THIS CONSORTIUM AGREEMENT:**

- a. has been duly executed and delivered on behalf of each party hereto and constitutes the legal, valid, binding and enforceable obligation of each such party,
- b. sets forth the entire understanding of the parties hereto with respect to the subject matter hereof;
- c. may not be amended or modified except in writing signed by each of the parties and with prior written consent of the Nodal Agency.

**IN WITNESS WHEREOF**, the parties to the Consortium Agreement have, through their authorized representatives, executed these present on the Day, Month and Year first mentioned above.

For and on behalf of Consortium Member 1 (Party 1)  
M/s.....

.....  
**(Signature of authorized signatory)**

Name: .....  
Designation: .....  
Place: .....  
Date: .....

For and on behalf of Consortium Member n (Party n)  
M/s.....

.....  
**(Signature of authorized signatory)**

Name: .....  
Designation: .....  
Place: .....  
Date: .....

**Attested:**

.....  
**(Signature)**  
**(Notary Public)**

Place: .....  
Date: .....

Note: In case of foreign Bidders, refer to clause 2.5.6 (p)

Appendix 1 to the Consortium Agreement:

<b>Name of the Consortium Member</b>	<b>Responsibilities under the Consortium Agreement</b>
M/s ..... (Party 1)	
M/s .....	
M/s ..... (Party n)	

## ANNEXURE 7 A - FORMAT FOR QUALIFICATION REQUIREMENT

## A. NET WORTH

To,  
**PFC Consulting Limited**  
**9thFloor, Wing-A, Statesman House,**  
**Connaught Place, New Delhi - 110001**

Dear Sir,

**Sub: Bid for selection of Bidder as Transmission Service Provider to establish Inter-State Transmission System for “Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C” through tariff based competitive bidding process**

**3. [Note: Applicable in case of Bidding Company]**

We certify that the Financially Evaluated Entity(ies) had a Networth of Rs. .... Crore or equivalent USD\* computed as per instructions in this RFP based on unconsolidated audited annual accounts (refer Note-2 below) of any of the last three (3) financial years as provided in Clause 2.2.3, immediately preceding the Bid Deadline. Also, the Networth of any of the last three (3) financial years is not negative.

Name of Financially Evaluated Entity(ies)	Relationship with Bidding Company**	Financial Year	Networth (Rs. Crore)
1. ....			
2. ....			
3. ....			
....			
<b>Total Networth</b>			

\*Equivalent USD shall be calculated as per provisions of Clause 3.4.1.

\*\* The column for “Relationship with Bidding Company” is to be filled in only in case financial capability of Parent/Affiliate has been used for meeting Qualification Requirements.

**4. [Note: Applicable in case of Bidding Consortium]**

We certify that the Financially Evaluated Entity(ies) had a minimum Networth of Rs. .... Crore or equivalent USD\* computed as per instructions in the RFP and based on unconsolidated audited annual accounts (refer Note-2 below) of any of the last three (3) financial years as provided in Clause 2.2.3, immediately preceding the Bid Deadline. Also, the Networth of any of the last three (3) financial years is not negative.

Name of Consortium Member	Equity Commitment in the Project (%)	Networth of Member (Rs. Crore)	Networth Requirement to be met by Member in proportion to the Equity Commitment (Rs. Crore)	Whether the Member meets the Networth Requirement
(1)	(2)	(3) (As per table below)	(4) = (2 x Total Networth requirement for the Project )	(5)
1. ....				Yes / No
2. ....				Yes / No
..				Yes / No
Total Networth for financial requirement				

### Member – I (Lead Member)

[Note: Similar particulars for each Member of the Consortium is to be furnished, duly certified by the Member's Statutory Auditors]

- i. Name of Member: .....
- ii. Total Networth requirement: Rs ..... Crore
- iii. Percentage of equity commitment for the Project by the Member: .....%
- iv. Networth requirement for the Member\*\*\*: Rs. .... Crore
- v. Financial year considered for the Member: .....

Name of Financially Evaluated Entity(ies)	Relationship** with Member of Consortium	Financial Year	Networth (Rs. Crore)
1. ....			
2. ....			
3. ....			
Total Networth			

\* Equivalent USD shall be calculated as per provisions of Clause 3.4.1;

\*\* The column for "Relationship with Member of Consortium" is to be filled in only in case the financial capability of Parent / Affiliate has been used for meeting Qualification Requirements;

\*\*\* Networth requirement to be met by Member should be in proportion to the equity commitment of the Member for the Project.

**Yours faithfully**

.....

**(Signature and name of the authorized signatory of the Company and Stamp)**

Name : .....

Date : .....

Place : .....

.....

**(Signature and Stamp of statutory Auditors of Bidding Company / each Member of Consortium)**

Name : .....

Date : .....

Place : .....

Date : .....

**Notes:**

1. Along with the above format, in a separate sheet, please provide details of computation of Networth of last three (3) financial years duly certified by Statutory Auditor.
2. Audited consolidated annual accounts of the Bidder may be used for the purpose of financial criteria provided the Bidder has at least 26% equity in each company whose accounts are merged in the audited consolidated accounts and provided further that the financial capability of such companies (of which accounts are being merged in the consolidated accounts) shall not be considered again for the purpose of evaluation of the Bid.
3. In case Bidder or a Member of Consortium takes recourse to its Parent/Affiliate for meeting technical / financial requirements, then the financial years considered for such purpose should be same for the Bidder / Member of Consortium and their respective Parent / Affiliate.

## ANNEXURE 7B - FORMAT FOR TECHNICAL REQUIREMENT

To,  
**PFC Consulting Limited**  
**9<sup>th</sup> Floor, Wing-A, Statesman House,**  
**Connaught Place, New Delhi - 110001**

Dear Sir,

**Sub: Bid for selection of Bidder as Transmission Service Provider to establish Inter-State Transmission System for “Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C” through tariff based competitive bidding process**

**1. To be used by Bidder using the development experience in infrastructure sector**

We certify that M/s. .... (Insert name of Technically Evaluated Entity(ies)) have experience of development of projects in the Infrastructure sector in the last five (5) years whose aggregate capital expenditure is Rs. .... Crore or equivalent USD\*. We further certify that the capital expenditure of any single project considered for meeting the technical Qualification Requirement is not less than **Rs. 280 Crore** or equivalent USD\*. For this purpose, capital expenditure incurred on projects which have been either wholly completed / commissioned or partly completed projects put under commercial operation and for which operation has commenced till at least seven (7) days prior to the Bid Deadline has been considered.

The project(s) considered for the purpose of technical experience (as per table given below) have been executed and owned to the extent as indicated in the table below (to be at least twenty – six percent (26%)) by the Bidding Company / Lead Member of the Consortium / our Parent / our Affiliate(s) [strike off whichever is not applicable] on operation of the projects.

This technical requirement has been calculated as per the instructions provided in the RFP on the basis of following projects:

Name of Company (which has executed the project at (3)) whose technical capability has been used for Qualification Requirement	Relationship* * with Bidding Company / Lead Member	Project name	Nature of Project (BOOT, BOT, BOOM , DBFOT etc.)	Relevant Infrastructure sector	Date of Financial Closure of the Project (in DD / MM / YYYY)	Date of Completion / Commissioning / Commercial Operation of partly completed projects	Project cost (Rs. Crore)	Percentage Equity Holding of Company at (1) in Completed project(s)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)
..... ...		..... (Project						

Name of Company (which has executed the project at (3)) whose technical capability has been used for Qualification Requirement	Relationship* * with Bidding Company / Lead Member	Project name	Nature of Project (BOOT, BOT, BOOM , DBFOT etc.)	Relevant Infrastructure sector	Date of Financial Closure of the Project (in DD / MM / YYYY)	Date of Completion / Commissioning / Commercial Operation of partly completed projects	Project cost (Rs. Crore)	Percentage Equity Holding of Company at (1) in Completed project(s)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)
		t 1)						
.....		.....						
...								
<b>Total (Rs. Crore)</b>								

\* Equivalent USD shall be calculated as per provisions of Clause \_\_\_\_\_

\*\* The column for "Relationship with Bidding Company / Lead Member" is to be filled in only in case technical capability of Parent/Affiliate has been used for meeting Qualification Requirements.

We further certify that the Company(ies) as indicated in column (1) of the above table, whose technical capability has / have been used for meeting the qualification requirement, has / have held shareholding respectively of at least twenty – six percent (26%) from the date of financial closure till the date of commissioning / completion of the above project(s).

## 2. To be used by Bidder using construction experience in infrastructure sector.

We certify that M/s. .... (Insert name of Technically Evaluated Entity(ies)) have received aggregate payments not less than Rs. .... Crore or equivalent USD (calculated as per provisions in Clause 3.4.1) from its client(s) for construction works fully completed during the last 5(five) financial years. We further certify that the payment received from each project shall not be less than Rs. .... Crore or equivalent USD (calculated as per provisions in Clause 3.4.1). For this purpose, payments received on projects that have been commissioned/completed at least seven (7) days prior to the Bid Deadline shall be considered. Further only the payments (gross) actually received, during such 5 (five) financial years shall qualify for purposes of computing the technical capacity.

We also confirm that construction works does not include cost of land supply of goods or equipment except when such goods or equipment form part of a turn-key construction contract/ EPC contract for the project.

This technical requirement has been calculated as per the instructions provided in the RFP on the basis of following projects:

Name of Company (which has executed the project at (3)) whose technical capability has been used for Qualification Requirement	Relationship ** with Bidding Company / Lead Member	Project name	Nature of Project (EPC, Turnkey etc)	Relevant Infrastructure sector	Date of award of contract (in dd/mm/yy)	Date of Completion / Commissioning	Payment received (Rs. Crore)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
.....		..... Project 1					
.....		.....					
.....		.....					
Total (Rs. Crore)							

Yours faithfully

.....

**(Signature and name of the authorized signatory of the Company and stamp)**

Name: .....

Date: .....

Place: .....

.....

**(Signature and Stamp of statutory Auditors of Bidding Company/ Lead Member of Consortium)**

Name: .....

Date: .....

Place: .....

Date: .....

**Notes:**

1. Along with the above format, in a separate sheet, please provide details of computation of capital expenditure of projects duly certified by Statutory Auditor of the project company. In addition, the Statutory Auditor of the project company should also certify that the capital expenditure of projects commissioned or completed 7 days prior to Bid Deadline has been capitalized in the books of accounts.

Additionally, in case construction experience is used, a certificate(s) from the statutory auditors stating the payments received and the concerned client(s) stating the works commissioned during the past 5 years in respect of the projects specified above. In case a particular job/ contract has been jointly executed by the Bidder (as part of a consortium), it should further support its claim for the share in work done for that particular job/ contract by producing a certificate from its statutory auditor or the client.

2. In case the accounts for the financial year in which the project claimed for meeting qualification requirement has been commissioned are not audited, the Bidder shall give declaration in this regard duly certified by its statutory auditor. In such a case, Bidder shall provide details of computation of capital expenditure of such project(s) duly certified by Statutory Auditor of the project company and the Statutory Auditor of the project company should also certify that the capital expenditure of projects commissioned or completed shall be capitalized in the books of accounts upon finalization.
3. The unconsolidated audited annual accounts of both the TEE and the Bidding Company / Lead Member for the respective financial years (financial years in which financial closure was achieved to the financial year in which the said project was completed / commissioned) should be submitted.

**ANNEXURE 7C - FORMAT FOR TECHNICAL & FINANCIAL REQUIREMENT – RELATIONSHIP & DETAILS OF EQUITY SHAREHOLDING**

**[To be filled by Bidding Company / each Member of the Bidding Consortium including Lead Member if credentials of Parent and / or Affiliates have been used by them]**

To,  
**PFC Consulting Limited**  
**9<sup>th</sup> Floor, Wing-A, Statesman House,**  
**Connaught Place, New Delhi - 110001**

Dear Sir,

**Sub: Bid for selection of Bidder as Transmission Service Provider to establish Inter-State Transmission System for “Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): PART-C” through tariff based competitive bidding process**

We certify that M/s. .... (insert name of the **Bidding Company / Consortium Members**) have considered the technical and financial capability of its Parent and / or Affiliates, for the purpose of meeting Qualification Requirements as per the instructions provided in the RFP. The name of Parent and / or Affiliate, nature of relationship(s) with such Parent and / or Affiliate and details of equity holding are as follows:

<b>Name of Company whose credentials considered</b>	<b>Type of credentials considered (technical and / or financial)</b>	<b>Relationship with Bidding Company / Consortium Member (Parent / Affiliate)</b>	<b>Details of equity shareholding (refer notes below)</b>
Company 1			
.....			
.....			
.....			
.....			

**NOTES:**

- i. In case of Parent, the equity holding of the Parent in the Bidding Company / Member of the Bidding Consortium, including the Lead Member of the Consortium, need to be specified.
- ii. In case of Affiliate under direct control of Bidder, the equity holding of the Bidding Company / Member of the Bidding Consortium, including the Lead Member of the Consortium in the Affiliate, needs to be specified.
- iii. In case of Affiliate under common control of Parent, the equity holding of the Parent in the Affiliate of the Bidding Company / Member of the Bidding Consortium, including the Lead Member of the Consortium, needs to be specified.
- iv. Relationship of Parent / Affiliate with Bidding Company / Member of Consortium to be at the most seven (7) days prior to the Bid Deadline (as per Clause 2.1.4 of RFP)

Yours faithfully

.....

**(Signature and name of the authorized signatory of the Company and stamp)**

Name: .....  
Date: .....  
Place: .....

.....

**(Signature and Stamp of statutory Auditors of Bidding Company / each Member of Bidding Consortium)**

Name: .....  
Date: .....  
Place: .....  
Date: .....

**ANNEXURE 7D - ADDITIONAL INFORMATION FOR VERIFICATION OF FINANCIAL AND  
TECHNICAL CAPABILITIES OF BIDDERS.**

<p>.....</p> <p><b>(Name of Bidder (Bidding Company/ Bidding Consortium or Technically/Financially Evaluated Entity(ies))</b></p> <p><b>(Note:</b> In case of Consortium, details to be filled in by Lead Member for each Member of the Consortium including the Lead Member and in case of the qualification requirements of Technically / Financially Evaluated Entity(ies) being used, to be filled by each of such entity(ies)</p>
--

**i. Financial capability (Attachment 1):**

1. Bidders shall attach unconsolidated / consolidated audited annual accounts, statements, as the case may be, (refer Clause 2.1.3) for the last three (3) financial years as Attachment 1. Such unconsolidated audited annual accounts shall include a Balance Sheet, Profit and Loss Account, Auditors Report and profit appropriation account.

**ii. Technical capability (Attachment 2):**

- a. This attachment shall include details of projects completed/commissioned or partly completed projects for which commercial operation has commenced to be considered for the purpose of meeting Qualification Requirements.

1. To be used by Bidder using development experience in infrastructure sector

Particulars	Year 1	Year 2	Year 3	Year 4	Year 5
Name(s) of project(s) from Infrastructure sectors					
Location(s) including country(s) where project was set up					
Nature of Project					
Voltage level (if any)					
Capital cost of project(s) Rs. in Crore					
*Status of the project					
% of equity owned in the project(s)					

**\*Note 1:** Date of completion/commissioning/commercial operation to be mentioned

**Note 2:** For each project listed in the table, the Bidder shall furnish an executive summary including the following information:

- Project model, i.e., BOO, BOOT, BOOM;

- Debt financing and equity raised and provided by Bidder/Bidder's Parent/Bidder's Affiliate for the project, including names of lenders and investors;
- Size and type of installation;
- Technical data/information on major equipment installed
- Description of role performed by the Bidder/Bidder's Parent/Bidder's Affiliate on the project
- Clearances taken by the Bidder/Bidder's Parent/Bidder's Affiliate including but limited to right-of-way (RoW), forest clearance and other statutory / Govt. clearances.
- Cost data (breakdown of major components)
- Name of EPC and/or other major contractor
- Construction time for the project
- Names, addresses and contact numbers of owners of the projects
- Operating reliability over the past five (5) years or since date of commercial operation
- Operating environmental compliance history
- Names of supervisory entities or consultant, if any
- Date of commercial operation
- Total duration of operation

2. To be used by Bidder using construction experience in infrastructure sector

Particulars	Year 1	Year 2	Year 3	Year 4	Year 5
Name(s) of project(s) from Infrastructure sectors					
Location(s) including country(s) where project was set up					
Nature of Project					
Voltage level (if any)					
Revenue received Rs. in Crore					
*Status of the project					
% of equity owned in the project(s)					

**\*Note 1:** Date of completion/commissioning/commercial operation to be mentioned

**Note 2:** For each project listed in the table, the Bidder shall furnish an executive summary including the following information:

- Project model, i.e., EPC, Turnkey;
- Size and type of installation;
- Technical data/information on major equipment installed
- Description of role performed by the Bidder/Bidder's Parent/Bidder's Affiliate on the project
- Cost data (breakdown of major components)
- Name of sub-contractor
- Construction time for the project
- Names, addresses and contact numbers of owners of the projects

- Operating reliability over the past five (5) years or since date of commercial operation
- Operating environmental compliance history
- Names of supervisory entities or consultant, if any
- Date of commercial operation
- Total duration of operation

**iii. Attachment-3:**

- a. For each project listed in Attachment 2 above, certificates of final acceptance and/or certificates of good operating performance duly issued by owners for the project and the same shall be certified as true by authorized signatory of the Bidding Company or the Lead Member of Consortium). In case the project listed in Attachment 2 is under BOOT / DBFOT mechanism, the certificates of final acceptance and/or certificates of good operating performance must be issued by the authority / independent engineer of the project as defined in the respective project agreement.

For and on behalf of Bidding Company/Consortium

M/s.....

.....  
**(Signature of authorized signatory)**

Name: .....

Designation: .....

Date: .....

Place: .....

## ANNEXURE 8 -UNDERTAKING AND DETAILS OF EQUITY INVESTMENT

## Format 1: Bidders' Undertakings

[On the Letter Head of the Bidding Company/Lead Member of Bidding Consortium]

Date: .....

To,

**PFC Consulting Limited**  
**9thFloor, Wing-A, Statesman House,**  
**Connaught Place, New Delhi - 110001**

Dear Sir,

**Sub: Bidders' Undertakings in respect of Bid for selection of Bidder as TSP to establish Inter-State transmission system for "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C"**

We hereby undertake on our own behalf and on behalf of the TSP, that if selected as the Successful Bidder for the Project:

1. The Project shall comply with all the relevant electricity laws, codes, regulations, standards and Prudent Utility Practices, environment laws and relevant technical, operational and safety standards, and we shall execute any agreements that may be required to be executed as per law in this regard.
2. We confirm that the Project shall also comply with the standards and codes as per Clause 1.6.1.2 of the RFP and the TSP shall comply with the provisions contained in the Central Electricity Regulatory Commission Grant of Connectivity, Long-term Access and Medium-term Open Access in inter-state Transmission and related matters (Open Access) Regulations, 2009.
3. We give our unconditional acceptance to the RFP dated **March 02, 2023** issued by the BPC and the RFP Project Documents, as amended, and undertake to ensure that the TSP shall execute all the RFP Project Documents, as per the provisions of this RFP.
4. We have submitted the Bid on the terms and conditions contained in the RFP and the RFP Project Documents. Further, the Financial Bid submitted by us is strictly as per the format provided in Annexure 21 of the RFP, without mentioning any deviations, conditions, assumptions or notes in the said Annexure.
5. Our Bid is valid up to the period required under Clause 2.8 of the RFP.
6. Our Bid has been duly signed by authorized signatory and stamped in the manner and to the extent indicated in this RFP and the power of attorney / Board resolution in requisite format as per RFP has been enclosed with this undertaking.

7. We have assumed that if we are selected as the Successful Bidder, the provisions of the Consortium Agreement, to the extent and only in relation to equity lock in and our liability thereof shall get modified to give effect to the provisions of Clause 2.5.8 of this RFP and Article 18.1 of the Transmission Service Agreement. **(Note: This is applicable only in case of a Bidding Consortium).**
8. We confirm that our Bid meets the Scheduled COD of each transmission Element and the Project as specified below:

S. No.	Name of the Transmission Element	Scheduled COD	Percentage of Quoted Transmission Charges recoverable on Scheduled COD of the Element of the Project	Element(s) which are pre-required for declaring the commercial operation (COD) of the respective Element
1.	Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end	24 months from SPV transfer	100%	All elements of scheme are required to be commissioned simultaneously as their utilization is dependent on each other.
2.	2 no. of 765 kV line bays each at Bikaner-III PS & Neemrana-II S/s			

**Note:**

- (i) Developer of Bikaner-III PS & Neemrana-II S/s shall provide space for 2 nos. of 765 kV line bays alongwith space for Switchable line reactor each at Bikaner-III PS & Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2nd).

We agree that the payment of Transmission Charges for any Element irrespective of its successful commissioning on or before its Scheduled COD shall only be considered after the successful commissioning of Element(s) which are pre - required for declaring the commercial operation of such Element as mentioned in the above table.

**Scheduled COD for the Project: 24 Months from Effective Date**

9. We confirm that our Financial Bid conforms to all the conditions mentioned in this RFP, and in particular, we confirm that:
- a. Financial Bid in the prescribed format of Annexure 21 has been submitted duly signed by the authorized signatory.
  - b. Financial Bid is unconditional.

- c. Only one Financial Bid has been submitted.
10. We have neither made any statement nor provided any information in this Bid, which to the best of our knowledge is materially inaccurate or misleading. Further, all the confirmations, declarations and representations made in our Bid are true and accurate. In case this is found to be incorrect after our acquisition of **SPV [which is under incorporation]**, pursuant to our selection as Selected Bidder, we agree that the same would be treated as a TSP's Event of Default under Transmission Service Agreement, and relevant provisions of Transmission Service Agreement shall apply.
11. We confirm that there are no litigations or other disputes against us which materially affect our ability to fulfill our obligations with regard to the Project as per the terms of RFP Project Documents.
12. Power of attorney/ Board resolution as per Clause 2.5.2 is enclosed.

**Signature and name of the authorized signatory of the Company and stamp of Bidding Company or Lead member of Consortium**

**Note:**

1. In case of foreign Bidders, refer to clause 2.5.6 (p)

**Format 2: Details of equity investment in Project**

1.1.a Name of the Bidding Company/ Bidding Consortium:

1.1.b Name of the Lead Member in the case of a Bidding Consortium:

1.2 Investment details of the Bidding Company/Member of the Bidding Consortium investing in **SPV [which is under incorporation]** as per Clause 2.5.8.2.

S. No.	Name of the Bidding Company/ Member in case of a Bidding Consortium	Name of the Company investing in the equity of the _____[Name of SPV]	Relationship with Bidding Company /Member of the Bidding Consortium	% of equity participation in the _____[Name of SPV]
(1)	(2)	(3)	(4)	(5)
TOTAL				100%

\* In case the Bidder proposes to invest through its Affiliate(s) / Parent Company / Ultimate Parent Company, the Bidder shall declare shareholding pattern of such Affiliate(s) / Parent Company / Ultimate Parent Company and provide documentary evidence to demonstrate relationship between the Bidder and the Affiliate(s) / Parent Company / Ultimate Parent Company. These documentary evidences could be, but not limited to, demat account statement(s) / Registrar of Companies' (ROC) certification / share registry book, etc duly certified by Company Secretary.

Members of the Consortium or the Bidding Company making investment in the equity of the \_\_\_\_\_[Name of SPV] themselves to fill in their own names in the column (3)

**Signature and Name of authorized signatory in whose name power of attorney has been issued**

Signature of authorized signatory

Name: .....

Designation: .....

Date.....

Company rubber stamp

**ANNEXURE 9 -AUTHORISATION FROM PARENT/ AFFILIATE OF BIDDING COMPANY/ MEMBER OF BIDDING CONSORTIUM WHOSE TECHNICAL/ FINANCIAL CAPABILITY HAS BEEN USED BY THE BIDDING COMPANY/ MEMBER OF BIDDING CONSORTIUM.**

**[On the Letter Head of the Parent /Affiliate]**

Name: .....  
 Full Address: .....  
 Telephone No.: .....  
 E-mail address: .....  
 Fax / No.: .....

**To**

**PFC Consulting Limited  
 9<sup>th</sup> Floor, Wing-A, Statesman House,  
 Connaught Place, New Delhi - 110001**

Dear Sir,

**Sub: Authorization for use of Technical / Financial Capability of M/s..... (Insert name of Parent / Affiliate) by M/s ..... (Insert name of Bidding Company / Member of Bidding Consortium).**

We refer to the RFP dated **March 02, 2023** ('RFP') issued by you for selection of Bidder as Transmission Service Provider for establishing the Inter-State Transmission System for **"Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C"**.

We confirm that M/s. .... (Insert name of Bidding Company/ Consortium Member) has been authorized by us to use our technical and/or financial capability [strikeout whichever is not applicable] for meeting the Qualification Requirements for **"Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C"**.

We have carefully read and examined in detail the RFP including in particular, Clause 2.1.4 of the RFP, and we are also submitting legally binding undertaking supported by a board resolution that all the equity investment obligations of M/s..... (Insert Name of Bidding Company / Consortium Member), shall be deemed to be our equity investment obligations and in the event of any default the same shall be met by us.

For and on behalf of M/s..... (Insert Name of Parent / Affiliate)

.....  
**(Signature and Name of the authorized signatory of the Company and stamp)**

Name: .....  
 Date: .....  
 Place: .....

**Notes:**

1. The above undertaking can be furnished by Ultimate Parent of Technically Evaluated Entity or Financially Evaluated Entity, as the case maybe, if legally binding undertaking is also furnished by the Ultimate Parent on behalf of such Financially Evaluated Entity/Technically Evaluated Entity.

**ANNEXURE 10- FORMAT OF UNDERTAKING BY TECHNICALLY / FINANCIALLY EVALUATED  
ENTITY / ULTIMATE PARENT COMPANY**

**[On the Letter Head of the Technically / Financially Evaluated Entity / Ultimate Parent Company]**

Name: .....

Full Address: .....

Telephone No.: .....

E-mail address: .....

Fax/No.: .....

**To:**

**Chief Executive Officer  
PFC Consulting Limited  
9thFloor, Wing-A, Statesman House,  
Connaught Place, New Delhi - 110001**

**Sub:        Undertaking for equity investment**

Dear Sir,

We refer to the Request for Proposal dated **March 02, 2023** ('RFP') issued by you regarding setting up of Inter-State transmission system for **“Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C”** Project on build, own, operate and transfer basis.

We have carefully read and examined in detail the RFP and the RFP Project Documents, including in particular, Clause 2.1.4 of the RFP and Clauses 2.5.2 and 2.5.8 of the RFP, regarding submission of an undertaking regarding the investment in the equity share capital of **SPV [which is under incorporation]** and provisions for minimum equity holding and equity lock-in. We have also noted the amount of the equity investment required to be made in **SPV [which is under incorporation]** by the ..... [Insert the name of the Bidder or the Consortium Member] for the Project.

In view of the above, we hereby undertake to you and confirm that in the event of failure of .....[Insert the name of the Bidder or the Consortium Member] to invest in full or in part, in the equity share capital of **SPV [which is under incorporation]** as specified in the Bid, we shall invest the said amount not invested by.....[Insert the name of the Bidder or the Consortium Member] in **SPV [which is under incorporation]** by purchase of existing shares or subscribing to the new shares of **SPV [which is under incorporation]**, as stipulated by you.

We have attached hereto certified true copy of the Board resolution whereby the Board of Directors of our Company has approved issue of this Undertaking by the Company.

All the terms used herein but not defined, shall have the meaning as ascribed to the said terms under the RFP.

Certified as true.

.....

**(Signature and Name of the authorized signatory of the Company and stamp)**

**Note:**

1. Wherever required, extract of the charter documents and documents such as a Board resolution should be submitted for verification.

## ANNEXURE 11 - FORMATS FOR BOARD RESOLUTIONS

Format 1**Format of the Board resolution for the Bidding Company / each Member of the Consortium / investing Affiliate / Parent Company / Ultimate Parent Company, where applicable**

[Reference Clause 2.5.2 of the RFP and the illustrations in Annexure 11A]

**[Note:** The following resolution no.1 needs to be passed by the Boards of each of the entity/(ies) making equity investment]

The Board, after discussion, at the duly convened Meeting on ..... [Insert date], with the consent of all the Directors present and in compliance of the provisions of the Companies Act, 1956/2013, passed the following Resolution:

**1. RESOLVED THAT** pursuant to the provisions of the Companies Act, 1956 / Companies Act 2013 (as the case may be) and compliance thereof and as permitted under the Memorandum and Articles of Association of the company, approval of the Board be and is hereby accorded for investment of.....% (.....per cent) of the total equity share capital of **SPV [which is under incorporation]** representing the entire amount proposed to be invested by the company for the transmission system for **“Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C”**, partly by acquisition of the existing equity shares from PFC Consulting Limited and / or partly by subscribing to the new equity shares, as per the terms of the RFP.

**[Note:** Equity investment obligations by the Bidding Company/each Member of the Bidding Consortium/investing Affiliate or Parent or Ultimate Parent should add up to 100%.]

**[Note:** In the event the Bidder is a Bidding Consortium, the following Board resolution no. 2 also needs to be passed by the Lead Member of the Bidding Consortium]

**2. RESOLVED THAT** approval of the Board be and is hereby accorded to contribute such further amount over and above the;..... percentage (\_\_\_%) limit to the extent becoming necessary towards the total equity share in the **SPV [which is under incorporation]**, obligatory on the part of the company pursuant to the terms and conditions contained in the Consortium Agreement dated .....executed by the company as per the provisions of the RFP.

**[Note:** In the event, the investing entity is an Affiliate or Parent or Ultimate Parent of the Bidder, the following Board resolution no. 3 shall also be passed by the Bidder]

**3. FURTHER RESOLVED THAT** the Board hereby acknowledges the Board Resolution(s) passed by the..... [Name of the Affiliate(s)/ Parent / Ultimate Parent] regarding the investment of.....(....%) of the equity share capital requirements of **SPV [which is under incorporation]**, which is to be invested by the .....[Name of the Affiliate(s)/ Parent / Ultimate Parent] for the **SPV [which is under incorporation]**, partly by acquisition of the existing equity shares from PFC Consulting Limited and partly by subscribing to the new equity shares, as per the terms of the RFP.

**[Note:** The following resolution no. 4 is to be provided by the Bidding Company / Lead Member of the Consortium only]

4. FURTHER RESOLVED THAT MR/MS .....be and is hereby authorized to take all the steps required to be taken by the Company for submission of the Bid, including in particular, signing of the Bid, making changes thereto and submitting amended Bid, all the documents related to the Bid, certified copy of this Board resolution or letter or undertakings etc, required to be submitted to BPC as part of the Bid or such other documents as may be necessary in this regard.

Certified True Copy

Company rubber stamp to be affixed

**[Notes:**

- 1) This certified true copy should be submitted on the letterhead of the Company, signed by the Company Secretary or any Whole Time Director/ Manager (supported by a specific board resolution) of the Bidding Company or the Lead Member of Consortium.
- 2) The contents of the format may be suitably re-worded indicating the identity of the entity passing the resolution, i.e., the Bidding Company, each Member of the Bidding Consortium.
- 3) This format may be modified only to the limited extent required to comply with the local regulations and laws applicable to a foreign entity submitting this resolution. For example, reference to Companies Act 1956 / Companies Act 2013 (as the case may be) may be suitably modified to refer to the law applicable to the entity submitting the resolution. However, in such case, the foreign entity shall submit an unqualified opinion issued by the legal counsel of such foreign entity, stating that the Board resolutions are in compliance with the applicable laws of the respective jurisdictions of the issuing company and the authorizations granted therein are true and valid.]

**Format 2****Format for the Board resolution of Technically / Financially Evaluated Entity / Ultimate Parent Company (in case credentials of such TEE/ FEE has been utilized by the Bidding Company or Bidding Consortium)**

The Board, after discussion, at the duly convened Meeting on ..... [Insert date], with the consent of all the Directors present and in compliance of the provisions of the Companies Act, 1956 / 2013, passed the following Resolution:

**RESOLVED THAT** pursuant to the provisions of the Companies Act, 1956 / Companies Act, 2013 (as the case may be) and compliance thereof and as permitted under the Memorandum and Articles of Association of the company, approval of the Board be and is hereby accorded for issuing an Undertaking to the BPC, in the format specified in the RFP issued by the BPC, draft of which is attached hereto and initialed by the Chairman whereby the company undertakes to invest .....percent (... %) of the total equity share capital of **SPV [which is under incorporation]** representing the entire amount proposed to be invested by .....[insert the name of the Bidder or Member] for the said Project, in case of failure of .....[Insert the name of the Bidder or Member] to make such investment".

**FURTHER RESOLVED THAT** .....,be and is hereby authorized to take all the steps required to be taken by the Company, including in particular, signing the said Undertaking, submitting the same to the BPC through .....[Insert name of Bidding Company/Lead Member of the Consortium] of all the related documents, certified copy of this Board resolution or letter, undertakings etc, required to be submitted to BPC as part of the Bid or such other documents as may be necessary in this regard.

**Certified True Copy****Company rubber stamp to be affixed****Note:**

1. This certified true copy should be submitted on the letterhead of the Company, signed by the Company Secretary or any Whole-time Director/Manager (supported by a specific board resolution) of Bidding Company or Lead Member of the Consortium.
2. The contents of the format may be suitably re-worded indicating the identity of the entity passing the resolution.
3. This format may be modified only to the limited extent required to comply with the local regulations and laws applicable to a foreign entity submitting this resolution. For example, reference to Companies Act 1956 / Companies Act 2013 (as the case may be) may be suitably modified to refer to the law applicable to the entity submitting the resolution. However, in such case, the foreign entity shall submit an unqualified opinion issued by the legal counsel of such foreign entity, stating that the Board resolutions are in compliance with the applicable laws of the respective jurisdictions of the issuing company and the authorizations granted therein are true and valid.

**ANNEXURE 11A – ILLUSTRATION FOR APPLICABLE BOARD RESOLUTION REQUIREMENTS  
UNDER CLAUSE 2.5.2**

Investor in the TSP	Entities (other than Bidder) whose credentials (financial and/or technical) used by the Bidder for meeting RFP criteria	Applicable Board Resolutions	Requirement of Undertaking (Annexure 10)
Bidder himself for 100% equity	None	a) Format 1 of Annexure 11 - Resolution: 1, 2 and 4 from the Bidder	None
Bidder himself for 100% equity	Affiliate and/or Parent Company and/or Ultimate Parent	<p>a) Format 1 of Annexure 11 - Resolution: 1, 2, and 4 from the Bidder</p> <p>b) Format 2 of Annexure 11 by either Technically/ Financially Evaluated Entity(ies) whose credentials have been used, or Ultimate Parent.</p> <p>Provided, if the Bidder himself is the Ultimate Parent, then Format 2 need not be provided.</p>	<p>Yes, by either Technically / Financially Evaluated Entity(ies) Affiliate(s) whose credentials have been used, or Ultimate Parent.</p> <p>Provided, if the Bidder himself is the Ultimate Parent, then the undertaking need not be provided.</p>
Bidder himself + others (Affiliate and/or Parent Company and/or Ultimate Parent) in aggregate holding 100% equity	None	<p>a) Format 1 of Annexure 11 - Resolution: 1,2, 3 and4 from the Bidder.</p> <p>b) Format 1 of Annexure 11 - Resolution: 1 from the Affiliate and /or Parent and /or Ultimate Parent</p>	None

Investor in the TSP	Entities (other than Bidder) whose credentials (financial and/or technical) used by the Bidder for meeting RFP criteria	Applicable Board Resolutions	Requirement of Undertaking (Annexure 10)
		investing in the equity	
Bidder himself + others (Affiliate and/or Parent Company and/or Ultimate Parent) in Aggregate holding 100% equity	Affiliate and/or Parent Company and/or Ultimate Parent	a) Format 1 of Annexure 11 - Resolution: 1,2, 3 and 4 from the Bidder. b) Format 1 of Annexure 11 - Resolution: 1 from the Affiliate and/or Parent and/or Ultimate Parent investing in the equity c) Format 2 of Annexure 11 by either Parent / Affiliate(s) whose credentials have been used and /or Ultimate Parent investing in the equity	Yes, by either Parent/ Affiliate(s) whose credentials have been used, or Ultimate Parent

**ANNEXURE 12 - FORMAT FOR ILLUSTRATION OF AFFILIATES**

**NOTE:** Bidder to provide the illustration, as applicable in their case, duly certified by the Company Secretary and supported by documentary evidence in this regard.

## ANNEXURE 13 - FORMAT FOR DISCLOSURE

[On the letter head of Bidding Company / Each Member in a Bidding Consortium]

Date: .....

**DISCLOSURE**

We hereby declare that the following companies with which we/ have direct or indirect relationship are also separately participating in this Bid process as per following details

S. No.	Name of the Company	Relationship
1.		
2.		
3.		

In case there is no such company please fill in the column “name of the company” as Nil.

Further we confirm that we don't have any Conflict of Interest with any other company participating in this bid process.

**Certified as True**

.....  
(Signature)

Name: .....

**Signature & Name of authorized signatory of the Company and Stamp**

The above disclosure should be signed and certified as true by the authorized signatory of the Bidding Company or of the Member, in case of a Consortium).

## ANNEXURE 14 - FORMAT OF THE BID BOND

**FORMAT OF THE UNCONDITIONAL AND IRREVOCABLE BANK  
GUARANTEE FOR BID BOND**

**(To be on non-judicial stamp paper of appropriate value as per Stamp Act relevant to place of execution.)**

In consideration of the ..... [Insert name of the Bidder] submitting the Bid inter alia for establishing the Inter-State transmission system for **Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C** on build, own, operate and transfer basis, in response to the RFP dated **March 02, 2023** issued by PFC Consulting Limited, and the Bid Process Coordinator (hereinafter referred to as BPC) agreeing to consider such Bid of ..... [Insert the name of the Bidder] as per the terms of the RFP, the [Insert name and address of the bank issuing the Bid Bond, and address of the Head Office] (hereinafter referred to as "Guarantor Bank") hereby agrees unequivocally, irrevocably and unconditionally to pay to PFC Consulting Limited or its authorized representative at \_\_\_\_\_ [Address of BPC] forthwith on demand in writing from PFC Consulting Limited or any representative authorized by it in this behalf, any amount up to and not exceeding Rupees \_\_\_\_\_ Only (Rs \_\_\_\_\_ Crore), on behalf of M/s..... [Insert name of the Bidder].

This guarantee shall be valid and binding on the Guarantor Bank up to and including ..... [Date to be inserted on the basis of Clause 2.11 of this RFP] and shall not be terminable by notice or any change in the constitution of the Guarantor Bank or by any other reasons whatsoever and our liability hereunder shall not be impaired or discharged by any extension of time or variations or alternations made, given, or agreed with or without our knowledge or consent, by or between concerned parties.

Our liability under this Guarantee is restricted to Rupees \_\_\_\_\_ Only (Rs \_\_\_\_\_ Crore). Our Guarantee shall remain in force until ..... [Date to be inserted on the basis of Clause 2.11 of this RFP]. PFC Consulting Limited or its authorized representative shall be entitled to invoke this Guarantee until ..... [Insert Date, which is three sixty five days (365) days after the date in the preceding sentence]. The Guarantor Bank hereby expressly agrees that it shall not require any proof in addition to the written demand from PFC Consulting Limited or its authorized representative, made in any format, raised at the above mentioned address of the Guarantor Bank, in order to make the said payment to PFC Consulting Limited or its authorized representative.

The Guarantor Bank shall make payment hereunder on first demand without restriction or conditions and notwithstanding any objection, disputes, or disparities raised by the Bidder or any other person. The Guarantor Bank shall not require PFC Consulting Limited or its authorized representative to justify the invocation of this BANK GUARANTEE, nor shall the Guarantor Bank have any recourse against PFC Consulting Limited or its authorized representative in respect of any payment made hereunder.

This BANK GUARANTEE shall be interpreted in accordance with the laws of India.

The Guarantor Bank represents that this BANK GUARANTEE has been established in such form and with such content that it is fully enforceable in accordance with its terms as against the Guarantor Bank in the manner provided herein.

This BANK GUARANTEE shall not be affected in any manner by reason of merger, amalgamation, restructuring or any other change in the constitution of the Guarantor Bank.

This BANK GUARANTEE shall be a primary obligation of the Guarantor Bank and accordingly PFC Consulting Limited or its authorized representative shall not be obliged before enforcing this BANK GUARANTEE to take any action in any court or arbitral proceedings against the Bidder, to make any claim against or any demand on the Bidder or to give any notice to the Bidder to enforce any security held by PFC Consulting Limited or its authorized representative or to exercise, levy or enforce any distress, diligence or other process against the Bidder.

Notwithstanding anything contained hereinabove, our liability under this Guarantee is restricted to Rupees \_\_\_\_\_ Only (Rs \_\_\_\_ Crore) and it shall remain in force until ..... [Date to be inserted on the basis of Clause 2.11 of RFP], with an additional claim period of three hundred sixty five (365) days thereafter. We are liable to pay the guaranteed amount or any part thereof under this BANK GUARANTEE only if PFC Consulting Limited or its authorized representative serves upon us a written claim or demand.

In witness whereof the Bank, through its authorized officer, has set its hand and stamp on this..... day of ..... at.....

**Witness:**

1.....  
Name and Address

Signature: .....  
Name: .....

2. ....  
Name and Address

Designation with Stamp:

Signature .....

Attorney as per power of attorney  
No.....

For:  
..... [Insert Name of the Bank]

**Banker's Stamp and Full Address:**

Dated this ..... day of ..... 20.....

**Notes:**

The Stamp Paper should be in the name of the Executing Bank.

## ANNEXURE 15 - FORMAT FOR CONTRACT PERFORMANCE GUARANTEE

**(To be on non-judicial stamp paper of appropriate value as per Stamp Act relevant to place of execution. Foreign entities submitting Bids are required to follow the applicable law in their country)**

In consideration of the ..... [Insert name of the SPV or Selected Bidder on behalf of SPV or Lead Member in case of the Consortium, with address] agreeing to undertake the obligations under the Transmission Service Agreement dated ..... and the other RFP Project Documents and the Nodal Agency and PFC Consulting Limited, agreeing to execute the RFP Project Documents with the Selected Bidder, regarding setting up the Project, the.....[Insert name and address of the bank issuing the guarantee and address of the head office] (hereinafter referred to as "Guarantor Bank") hereby agrees unequivocally, irrevocably and unconditionally to pay to the Nodal Agency at..... [Insert Place and Address of the Nodal Agency indicated in TSA] forthwith on demand in writing from the Nodal Agency or any Officer authorized by it in this behalf, any amount up to and not exceeding Rupees.....Crores (Rs.....) only [Insert the amount of the bank guarantee] on behalf of M/s..... [Insert name of the Selected Bidder / SPV].

This guarantee shall be valid and binding on the Guarantor Bank up to and including .....and shall not be terminable by notice or any change in the constitution of the Bank or the term of the Transmission Service Agreement or by any other reasons whatsoever and our liability hereunder shall not be impaired or discharged by any extension of time or variations or alternations made, given, or agreed with or without our knowledge or consent, by or between parties to the respective agreement.

Our liability under this Guarantee is restricted to Rupees ..... Crores (Rs.....) only. Our Guarantee shall remain in force until..... [Insert the date of validity of the Guarantee as per Clause 2.12.1 of the RFP]. The Nodal Agency shall be entitled to invoke this Guarantee up to three hundred sixty five (365) days of the last date of the validity of this Guarantee.

The Guarantor Bank hereby expressly agrees that it shall not require any proof in addition to the written demand from the Nodal Agency, made in any format, raised at the above mentioned address of the Guarantor Bank, in order to make the said payment to the Nodal Agency.

The Guarantor Bank shall make payment hereunder on first demand without restriction or conditions and notwithstanding any objection by **SPV [which is under incorporation]**, ..... [Insert name of the Selected Bidder], ..... [Insert name of the TSP] and/or any other person. The Guarantor Bank shall not require the Nodal Agency to justify the invocation of this BANK GUARANTEE, nor shall the Guarantor Bank have any recourse against the Nodal Agency in respect of any payment made hereunder.

**This BANK GUARANTEE** shall be interpreted in accordance with the laws of India.

The Guarantor Bank represents that this BANK GUARANTEE has been established in such form and with such content that it is fully enforceable in accordance with its terms as against the Guarantor Bank in the manner provided herein.

**This BANK GUARANTEE** shall not be affected in any manner by reason of merger, amalgamation, restructuring, liquidation, winding up, dissolution or any other change in the constitution of the Guarantor Bank.

**This BANK GUARANTEE** shall be a primary obligation of the Guarantor Bank and accordingly the Nodal Agency shall not be obliged before enforcing this BANK GUARANTEE to take any action in any court or arbitral proceedings against **SPV [which is under incorporation]** or the Selected Bidder, to make any claim against or any demand on **SPV [which is under incorporation]** or the Selected Bidder, as the case may be, or to give any notice to **SPV [which is under incorporation]** or the Selected Bidder, as the case may be, or to enforce any security held by the Nodal Agency or to exercise, levy or enforce any distress, diligence or other process against **SPV [which is under incorporation]** or the Selected Bidder, as the case may be.

The Guarantor Bank acknowledges that this BANK GUARANTEE is not personal to the Nodal Agency and may be assigned, in whole or in part, (whether absolutely or by way of security) by Nodal Agency to any entity to whom the Nodal Agency is entitled to assign its rights and obligations under the Transmission Service Agreement.

The Guarantor Bank hereby agrees and acknowledges that the Nodal Agency shall have a right to invoke this Bank Guarantee either in part or in full, as it may deem fit.

Notwithstanding anything contained hereinabove, our liability under this Guarantee is restricted to Rupees .....Crore (Rs .....) only and it shall remain in force until [Date to be inserted on the basis of Article 3.1.2 of TSA], with an additional claim period of three hundred sixty five (365) days thereafter. This BANK GUARANTEE shall be extended from time to time for such period, as may be desired by..... [Insert name of the Selected Bidder or Lead Member in case of the Consortium or SPV]. We are liable to pay the guaranteed amount or any part thereof under this Bank Guarantee only if the Nodal Agency serves upon us a written claim or demand.

**In witness where of:**

Signature.....

Name: .....

Power of attorney No.: .....

**For:**

..... [Insert Name of the Bank]

Banker's Seal and Full Address, including mailing address of the Head Office

**Notes:**

1. The Stamp Paper should be in the name of the Executing Bank.

**ANNEXURE 16 – FORMAT OF CHECKLIST FOR TECHNICAL BID SUBMISSION REQUIREMENTS**

**[This format needs to be duly filled in, signed by the authorized signatory of the Bidder (Bidding Company / Lead Member in case of a Bidding Consortium) and submitted along with the Bidder's Technical Bid]**

<b>Technical Bid Submission Requirements</b>	<b>Response (Yes / No)</b>
<ol style="list-style-type: none"> <li>1. Format for the Covering Letter on the letterhead of Bidding Company or Lead Member of the Consortium, as applicable;</li> <li>2. Format for Letter of Consent from each Consortium Member, including Lead Member, on their respective letterheads;</li> <li>3. Format for evidence of authorized signatory's authority ;</li> <li>4. Board resolution from the Bidding Company / Lead Member of the Consortium in favour of the person executing the Power of Attorney as per Annexure 3;</li> <li>5. Power of Attorney from each Consortium Member in favour of Lead Member to be provided by each of the other Members of the Consortium as per Annexure 4;</li> <li>6. Board Resolution from each Member of the Consortium, other than the Lead Member, in favour of their respective authorized representatives for executing the POA, Consortium Agreement and signing of the requisite formats;</li> <li>7. Format for Bidder's composition and ownership structure, along with status of equity holding (owning ten percent or more of the total paid up equity) not earlier than thirty (30) days prior to the Bid Deadline as per Annexure 5;</li> <li>8. Consortium Agreement duly signed as per Annexure 6, along with Appendix-1, indicating the responsibilities and obligations of each Member of the Consortium;</li> <li>9. Format for Qualification Requirement:               <ol style="list-style-type: none"> <li>a. Calculation sheets, detailing computation of Networth considered for meeting Qualifying Requirements, duly signed and stamped by the Statutory Auditor of the Bidding Company / each Member in case of a Bidding Consortium / FEE in cases where credentials of FEE is taken;</li> <li>b. Calculation sheets, detailing computation of capital expenditure of projects and revenue received in construction projects considered for meeting Qualification Requirements, duly signed and stamped by the Statutory Auditor of the Bidding Company / Lead Member in case of Bidding Consortium / TEE in cases where credentials of TEE is taken;</li> </ol> </li> </ol>	

Technical Bid Submission Requirements	Response (Yes / No)
<p>c. Last financial year unconsolidated / consolidated audited annual accounts / statements, as the case may be, of the Financially Evaluated Entity / Technical Evaluated Entity</p>	
<p>d. Unconsolidated audited annual accounts of both the TEE and the Bidding Company/Lead member, as applicable, from the financial years in which financial closure was achieved till the financial year in which the said project was completed / commissioned.</p>	
<p>10. Copy of the Memorandum and Articles of Association and certificate of incorporation or other organizational document (as applicable), including their amendments, certified by the Company Secretary of Bidding Company or each Member in case of a Consortium including Lead Member.</p>	
<p>11. Attachment of Annexure 7(D), detailing projects completed / commissioned and for which commercial operation has commenced including Executive Summary for each project.</p>	
<p>12. For each project listed in the attachment above, certified true copy of the certificates of final acceptance and / or certificates of good operating performance duly issued by owners or clients for the project, duly signed by authorized signatory in support of technical capability as defined in Clause 2.1.2 of RFP.</p>	
<p>13. Authority letter in favour of BPC from the Bidder/every Member of the Consortium authorizing the BPC to seek reference from their respective bankers &amp; others.</p>	
<p>14. Authorization from Parent / Affiliate of Bidding Company / Member of Bidding Consortium whose technical / financial capability has been used by the Bidding Company / Member of Bidding Consortium.</p>	
<p>15. Initialing of all pages of Technical Bid by the Authorized Signatory in whose favour the POA (Annexure 3) has been executed.</p>	
<p>16. Format for Illustration of Affiliates at the most seven (7) days prior to the Bid Deadline, duly certified by Company Secretary and supported by documentary evidence.</p>	
<p>17. Certified copy of the Register of Members / Demat Account Statement, Share Certificate, Annual Return filed with ROC etc. submitted as documentary evidence along with Annexure 12.</p>	
<p>18. Format for Disclosure by Bidding Company / each Member of the Consortium.</p>	
<p>19. Format for Affidavit by the Bidding Company / each Member of the Consortium</p>	

<b>Technical Bid Submission Requirements</b>	<b>Response (Yes / No)</b>
20. Format for Authorization submitted in Non-Judicial stamp paper duly notarized.	
21. Bidders Undertaking and details of Equity Investment	
22. Proof of Payment of RFP Fees	
23. Bid Bond	
24. Board Resolution as per Annexure 11 (If required)	

[**Note:** The checklist is not exhaustive. Bidders are required to submit all the information/documents as per requirement of RFP]

**For and on behalf of Bidder**

**M/s.** .....

.....  
**(Signature of authorized signatory)**

**ANNEXURE 17 – LIST OF BANKS**

The list of banks shall include all Scheduled Commercial Banks as per Second Schedule of RBI Act-1934 and any amendments thereof.

**Note:**

The above list of banks is indicative and can be modified by the BPC as required and any such change shall not be construed as a deviation from this document.



**ANNEXURE 19 - FORMAT FOR CLARIFICATIONS / AMENDMENTS ON THE RFP / RFP PROJECT DOCUMENTS**

<b>S. No.</b>	<b>Name of the Document</b>	<b>Clause No. and Existing provision</b>	<b>Clarification required</b>	<b>Suggested text for the amendment</b>	<b>Rationale for the Clarification or Amendment</b>

Signature .....

Name.....

For

**Bidder's Rubber Stamp and Full Address.**

(Note: This format shall be used for submission of requests for clarifications/ amendments on the draft RFP Project Documents as per the provisions of Clause 2.3.1)

**ANNEXURE 20 - LIST FOR RFP PROJECT DOCUMENTS**

**ENCLOSURE 1:           TRANSMISSION SERVICE AGREEMENT (Provided separately)**

**ENCLOSURE 2:           SHARE PURCHASE AGREEMENT (Provided Separately)**

.....

**ANNEXURE 21 - FORMAT FOR FINANCIAL BID****[To be uploaded online]****Quoted Transmission Charges .....****Notes**

1. The Bidders are required to ensure compliance with the provisions of Clause 2.5.3 of this RFP.
2. Quotes to be in Rupees Millions and shall be up to two (2) decimal points.
3. The contents of this format shall be clearly typed.
4. The Financial Bid shall be digitally signed by the authorized signatory in whose name power of attorney as per Clause 2.5.2 is issued.
5. Ensure only one value for annual Transmission Charges is quoted. The same charge shall be payable every year to TSP for the term of TSA.

## ANNEXURE 22 – FORMAT FOR AFFIDAVIT

**[On non-judicial stamp paper. Foreign companies submitting bids are required to follow the applicable law in their country]**

## AFFIDAVIT

We [including any of our Affiliate and Consortium Member & any of its Affiliate], hereby declare that as on Bid Deadline:

- a. the Bidder & any of its Affiliate including any Consortium Member & any of its Affiliate, their directors or key personnel have not been barred or included in the blacklist by any government agency or authority in India, the government of the jurisdiction of the Bidder or Members where they are incorporated or the jurisdiction of their principal place of business, any international financial institution such as the World Bank Group, Asian Development Bank, African Development Bank, Inter-American Development Bank, Asian Infrastructure Investment Bank etc. or the United Nations or any of its agencies; or
- b. the Bidder & any of its Affiliate including any Consortium Member & any of its Affiliate or their directors have not been convicted of any offence in India or abroad.

We further declare that following investigations are pending / no investigation is pending [strike off whichever is not applicable] against us [including any of our Consortium Member or Affiliate or Parent or Ultimate Parent or Affiliate] or CEO or any of our directors/manager/key managerial personnel of the Applicant /Consortium Member or their Affiliates.

We further undertake to inform the BPC of any such matter as mentioned above on its occurrence after the date of this affidavit till the Effective Date.

We undertake that, in case, any information provided in relation to this affidavit is found incorrect at any time hereafter, our BID / Letter of Intent / contract (if entered) would stand rejected / recalled / terminated, as the case may be.

.....

Signature and Name of the authorized signatory of the Company Bidding Company / Lead Member of the Bidding Consortium

.....

(Signature of Notary Public)

Place: .....

Date: .....

Note: In case any investigation is pending against the Applicant, including any Consortium Member or Affiliate, or CEO or any of the directors/ manager/key managerial personnel of the Applicant /Consortium /Member or their Affiliates, full details of such investigation including the name of the investigating agency, the charge/offence for which the investigation has been launched, name and designation of persons against whom the investigation has been launched and other relevant information should be disclosed under this affidavit.

## ANNEXURE A

### Technical Details with respect to electronic bidding

#### Registration Methodology

In order to submit online bids in the e-bidding process for selection of Transmission Service Provider, interested Bidders are required to register themselves with the e-procurement website of MSTC Limited namely [www.mstcecommerce.com/eprochome/tsp/index.jsp](http://www.mstcecommerce.com/eprochome/tsp/index.jsp). To register with the website, the Bidder is required to fill up the online form available under the link Register as Vendor in the above website and fill up the same and click on Submit.

During this process, the Bidder shall create his user id and password and keep note of the same. The Bidder shall ensure that the secrecy of his user id and password is maintained at all time and he/she shall alone be responsible for any misuse of the user id and password.

The Bidder may check the details entered by it before final submission. On successful submission of the online registration Form, the Bidder shall receive a confirmation mail in the registered email address advising the Bidder to submit the following documents.

- i. Self attested Income Tax PAN Card. In case of a registered Company or Firm, the Firm's PAN card and in case of a proprietorship firm, proprietor's personal PAN card is required. In case of partnership firm, PAN of the firm and that of the authorized partner are to be submitted.
- ii. Copy of the confirmation email Letter received from MSTC after successful completion of on-line registration.
- iii. A non-refundable registration fee of Rs.10,000/- plus GST as per applicable rate to be paid online. The account details will be available in the System generated email sent by MSTC post registration.

Please provide details of payment made like UTR No, remitting bank name, date of payment and amount in the covering letter.

The Bidder shall have to submit all the above documents to MSTC Limited for verification and activation of their login ids. The Bidders should send scanned copies of the above documents to the designated email id only which is given below.

[tsp@mstcindia.co.in](mailto:tsp@mstcindia.co.in)

It may be noted that Bidders need not visit any of the offices of MSTC Limited for submission of the documents.

Contact persons of MSTC Limited:

**Ms. Archana Juneja**

**9990673698**

**Mr. Setu Dutt Sharma**

**7878055855**

Once the complete set of documents and requisite registration fee are received from a Bidder, MSTC shall activate the Bidder's login after verification / scrutiny of the documents. MSTC Limited reserves the right to call for additional documents from the Bidder if needed and the Bidder shall be obliged to submit the same.

On completion of the above stated registration process, a Bidder shall be able to login to MSTC's website.

## ANNEXURE B

### Draft Pre-Award Integrity Pact

#### GENERAL

This pre-bid contract Agreement (herein after called the Integrity Pact) is made on ..... day of the month of ..... 20....., between, on one hand, ..... [Insert name of BPC] through Shri ..... [Insert Name & designation of representative of BPC] (hereinafter called the "Bid Process Coordinator/ BPC", which expression shall mean and include, unless the context otherwise requires, his successors in the office and assigns) of the First Part and M/s ..... represented by Shri ..... [Insert Name & Designation of Authorized Signatory of the Bidder/ Lead Member of Consortium] (hereinafter called the "Bidder" which expression shall mean and include, unless the context otherwise requires, his successors and permitted assigns) of the Second Part.

WHEREAS the BPC is conducting the bidding process for selection of bidder as Transmission Service Provider (TSP) for **“Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C”**, who will be responsible to set up the transmission project on build, own, operate and transfer (BOOT) basis and to provide Transmission Service.

WHEREAS the Bidder is a Private Company/Public Company/Government Undertaking/ Partnership, constituted in accordance with the relevant law in the matter and the BPC is a Public Sector Undertaking (PSU) performing its function on behalf of the Ministry of Power, Government of India.

NOW, THEREFORE,

To avoid all forms of corruption by following a system that is fair, transparent and free from any influence/prejudiced dealings during the complete bidding process with a view to:-

Enabling the BPC to select the bidder as TSP in conformity with the defined procedures by avoiding the high cost and the distortionary impact of corruption on public procurement, and

Enabling Bidder to abstain from bribing or indulging in any corrupt practice in order to emerge as selected bidder by providing assurance to them that their competitors will also abstain from bribing and other practices and the BPC will commit to prevent corruption, in

any form, by its officials by following transparent procedures.

The parties hereto hereby agree to enter into this Integrity Pact and agree as follows:

### **Commitments of BPC**

- 11 The BPC undertakes that no official of the BPC, connected directly or indirectly with the bidding process, will demand, take a promise for or accept, directly or through intermediaries, any bribe, consideration, gift, reward, favour or any material or immaterial benefit or any other advantage from the BIDDER, either for themselves or for any person, organization or third party related to the bidding process in exchange for an advantage in the bidding process, bid evaluation, contracting or implementation process related to the contract.
- 12 The BPC will, during the bidding stage, treat all bidders alike, and will provide to all bidders the same information and will not provide any such information to any particular bidder which could afford an advantage to that particular bidder in comparison to the other bidders.
- 13 All the officials of the BPC will report the appropriate Government office any attempted or completed breaches of the above commitments as well as any substantial suspicion of such a breach.
- 2 In case of any such preceding misconduct on the part of such official(s) is reported by the Bidder to the BPC with the full and verifiable facts and the same is *prima facie* found to be correct by the BPC, necessary disciplinary proceedings, or any other action as deemed fit, including criminal proceedings may be initiated by the BPC and such a person shall be debarred from further dealings related to the bidding process. In such a case while an enquiry is being conducted by the BPC the proceedings under the bidding process would not be stalled.

### **Commitments of Bidder**

3. The Bidder commits itself to take all measures necessary to prevent corrupt practices, unfair means and illegal activities during any stage of its bid or during any pre award stage in order to emerge as Selected Bidder or in furtherance to secure it and in particular commits itself to the following:-
- 3.1 The Bidder will not offer, directly or through intermediaries, any bribe, gift, consideration, reward, favour, any material or immaterial benefit or other advantage, commission, fees, brokerage or inducement to any official of the BPC,

connected directly or indirectly with the bidding process, or to any person, organization or third party related to the bidding process in exchange for any advantage in the bidding, evaluation, contracting and implementation of the bidding process.

- 32 The Bidder further undertakes that it has not given, offered or promised to give, directly or indirectly any bribe, gift, consideration, reward, favour, any material or immaterial benefit or other advantage, commission, fees, brokerage or inducement to any official of the BPC or otherwise in bidding process or for bearing to do or having done any act in relation to bidding process or any other contract with the Government for showing or forbearing to show favour or disfavour to any person in relation to the bidding process or any other contract with the Government.
- 33 The Bidder shall disclose the name and address of agents and representatives and Indian Bidder shall disclose their foreign principals or associates.
- 34 The Bidder shall disclose the payments to be made by them to agents/brokers or any other intermediary, in connection with this bid .
- 35 The Bidder further confirms and declares to the BPC that the Bidder has not engaged any individual or firm or company whether Indian or foreign to intercede, facilitate or in any way to recommend to the BPC or any of its functionaries, whether officially or unofficially for selection of Bidder as TSP, nor has any amount been paid, promised or intended to be paid to any such individual, firm or company in respect of any such intercession, facilitation or recommendation.
- 36 The Bidder, either while presenting the bid or during pre-award negotiations or before signing the Share Purchase Agreement, shall disclose any payments he has made, is committed to or intends to make to officials of the BPC or their family members, agents, brokers or any other intermediaries in connection with the bidding process and the details of services agreed upon for such payments.
- 37 The Bidder will not collude with other parties interested in the bidding process to impair the transparency, fairness and progress of the bidding process.
- 38 The Bidder will not accept any advantage in exchange for any corrupt practice, unfair means and illegal activities.
- 39 The Bidder shall not use improperly, for purpose of competition or personal gain, or pass on to others, any information provided by the BPC as part of the business

relationship, regarding plans, technical proposal and business details, including information contained in any electronic data carrier. The Bidder also undertakes to exercise due and adequate care lest any such information is divulged.

3.10 The Bidder commits to refrain from giving any complaint directly or through any other manner without supporting it with full and verifiable facts.

3.11 The Bidder shall not instigate or cause to instigate any third person to commit any of the actions mentioned above.

3.12 The Bidder shall not lend to or borrow any money from or enter into any monetary dealings or transactions, directly or indirectly, with any employee of the BPC.

#### **4. Previous Transgression**

4.1 The Bidder declares that no previous transgression occurred in the last three years immediately before signing of this Integrity Pact, with any other company in any country in respect of any corrupt practices envisaged hereunder or with any Public Sector Enterprise in India or any Government Department in India that could justify Bidder's exclusion from the bidding process.

4.2 The Bidder agrees that if it makes incorrect statement on this subject, Bidder can be disqualified from the tender process or the contract, if already awarded, can be terminated for such reason.

#### **5. Bid Bond (Security Deposit)**

5.1 Along with the technical bid, the Bidder shall submit Bid Bond for an amount of **Rs. 28 Crore (Rupees Twenty Eight Crore Only)** issued by any Banks from the list provided in RFP Document] as Earnest Money/Security Deposit, with the BPC.

5.2 The Earnest Money/Security Deposit shall be valid & retained by the BPC for such period as specified in the RFP Document.

5.3 No interest shall be payable by the BPC to the Bidder on Earnest Money/Security Deposit for the period of its currency.

#### **6. Sanctions for Violations**

6.1 Any breach of the aforesaid provisions by the Bidder or any one employed by it or

acting on its behalf (whether with or without the knowledge of the Bidder) shall entitle the BPC to take all or anyone of the following actions, wherever required:-

- (i) To immediately call off the pre-award negotiations without assigning any reason or giving any compensation to the Bidder. However, the proceedings with the other Bidder (s) would continue.
- (ii) The Bid Bond (in pre-award stage) shall stand forfeited either fully or partially, as decided by the BPC and the BPC shall not be required to assign any reason therefore.
- (iii) To immediately cancel the award, if already awarded, without giving any compensation to the Bidder.
- (iv) To cancel all or any other contracts with the Bidder. The Bidder shall be liable to pay compensation for any loss or damage to the BPC resulting from such cancellation/rescission.
- (v) To debar the Bidder from participation in any tender or RFP issued by any BPC for an indefinite period.
- (vi) To recover all sums paid in violation of this Pact by Bidder to any middleman or agent or broker with a view to securing the award.

62 The BPC will be entitled to take all or any of the actions mentioned at para 6.1 (i) to (vi) of this Pact also on the Commission by the Bidder or anyone employed by it or acting on its behalf (whether with or without the knowledge of the Bidder), of an offence as defined in Chapter IX of the Indian Penal code, 1860 or Prevention of Corruption Act, 1988 or any other statute enacted for prevention of corruption.

63 The decision of the BPC to the effect that a breach of the provisions of this Pact has been committed by the Bidder shall be final and conclusive on the Bidder. However, the Bidder can approach the Independent Monitor(s) appointed for the purposes of this Pact.

## **7. Independent Monitors**

7.1 The BPC has appointed Independent Monitors (hereinafter referred to as Monitors) for this Pact in consultation with the Central Vigilance Commission (Names and Addresses of the Monitors to be given).

**Sh. Atul Sobti (Ex-CMD, BHEL)**

**Director General SCOPE**

**F-497, Vikaspuri,**

**New Delhi-110018**

- 7.2 The task of the Monitors shall be to review independently and objectively, whether and to what extent the parties comply with the obligations under this Pact.
- 7.3 The Monitors shall not be subject to instructions by the representatives of the parties and perform their functions neutrally and independently.
- 7.4 Both the parties accept that the Monitors have the right to access all the documents relating to the project/procurement, including minutes of meetings.
- 7.5 As soon as the Monitor notices, or has reason to believe, a violation of this Pact, he will so inform the Authority designated by the BPC.
- 7.6 The Bidder accepts that the Monitors has the right to access without restriction to all Project documentation of the BPC including that provided by the Bidder. The Monitor shall be under contractual obligation to treat the information and documents of the Bidder /Subcontractors(s) with confidentiality. [As all the bid documents are with BPC only]
- 7.7 The BPC will provide to the Monitors sufficient information about all meetings among the parties related to the Project provided such meetings could have an impact on the contractual relations between the parties. The parties will offer to the monitor the option to participate in such meetings.
- 7.8 The Monitor will submit a written report to the designated Authority of the BPC/Secretary in the Department within 8 to 10 weeks from the date of reference or intimation to him by the BPC / Bidder and, should the occasion arise, submit proposals for correcting problematic situations.

## **8. Facilitation of Investigation**

In case of any allegation of violation of any provisions of this Pact or payment of commission, the BPC or its agencies shall be entitled to examine all the documents including the Books of Accounts of the Bidder and the Bidder shall provide necessary information and documents in English and shall extend all possible help for the purpose of such examination.

**9. Law and Place of Jurisdiction**

This Pact is subject to Indian Law. The place of performance and jurisdiction is the seat of the BPC.

**10. Other Legal Actions**

The actions stipulated in this Integrity Pact are without prejudice to any other legal action that may follow in accordance with the provisions of the any extent law in force relating to any civil or criminal proceedings.

**11. Validity**

11.1 The validity of this Integrity Pact shall be from date of its signing and upto 6 months from the date of transfer of project specific SPV i.e. signing of Share Purchase Agreement with BPC. In case Bidder is unsuccessful, this Integrity Pact shall expire after 15 days from the date of transfer of project specific SPV to successful bidder.

11.2 Should one or several provisions of this Pact turn out to be invalid, the remainder of this Pact shall remains valid. In this case, the parties will strive to come to an agreement to their original intentions.

12 The Parties hereby sign this Integrity Pact at \_\_\_\_\_ on \_\_\_\_\_

<p><b>Bid Process Coordinator (BPC)</b></p> <p>Name of the Officer Designation Name of the BPC with address</p> <p>Witness:</p> <p>1. _____</p> <p>2. _____</p>	<p><b>BIDDER</b></p> <p>Name of Whole time Director/Authorized Signatory Name of the Bidder with address</p> <p>Witness:</p> <p>1. _____</p>
---	--

<b>ANNEXURE-C</b>
<b>SPECIFIC TECHNICAL REQUIREMENTS FOR TRANSMISSION SYSTEM</b>

**SPECIFIC TECHNICAL REQUIREMENTS FOR TRANSMISSION LINE**

- A.1.0 The design, routing and construction of transmission lines shall be in accordance with Chapter V, Part-A of CEA (Technical Standards for Construction of Electrical Plants and Electric Lines) Regulations, as amended from time to time.
- A.2.0 Selection of tower type shall be made as per CEA Regulations, however in case lattice type towers are used, the following shall also be applicable:
- A.2.1 Steel section of grade E 250 and/or grade E 350 as per IS 2062, only are permitted for use in towers, extensions, gantry structures and stub setting templates. For towers in snowbound areas, steel sections shall conform to Grade-C of IS-2062.
- A.2.2 Towers shall be designed as per IS-802:2015, however the drag coefficient of the tower shall be as follows: -

<b>Solidity Ratio</b>	<b>Drag Coefficient</b>
Upto 0.05	3.6
0.1	3.4
0.2	2.9
0.3	2.5
0.4	2.2
0.5 and above	2.0

- A.3.0 Transmission Service Provider (TSP) shall adopt any additional loading/design criteria for ensuring reliability of the line, if so desired and /or deemed necessary.
- A.4.0 Transmission line shall be designed considering wind zones as specified in wind map given in National Building Code 2016, Vol.1. The developer shall also make his own assessment of local wind conditions and frequent occurrences of high intensity winds (HIW) due to thunderstorms, dust-storms, downburst etc. along the line route and wherever required, higher wind zone than that given in wind map shall be considered for tower design for ensuring reliability of line. Further, for transmission line sections passing within a distance of 50 km from the boundary of two wind zones, higher of the two wind zones shall be considered for design of towers located in such sections.
- A.5.0 Selection of reliability level for design of tower shall be as per CEA Regulation (Technical Standards for Construction of Electrical Plants and Electric Lines) Regulations, as amended from time to time.

- A.6.0 A) For power line crossing of 400 kV or above voltage level (if crossed over the existing line) large angle & dead end towers (i.e. D/DD/QD) shall be used on either side of power line crossing.
- B) For power line crossing of 132 kV and 220 kV voltage level, angle towers (B/C/D/DB/DC/DD/ QB/QC/QD) shall be used on either side of power line crossing depending upon the merit of the prevailing site condition and line deviation requirement.
- C) For power line crossing of 66 kV and below voltage level, suspension/tension towers shall be provided on either side of power line crossing depending upon the merit of the prevailing site condition and line deviation requirement.
- D) For crossing of railways, national highways and state highways, the rules/Regulations of appropriate authorities shall be followed.

A.7.0 The relevant conductor configuration shall be as follows: -

**Type of conductor: ACSR / AAAC / AL59**

**Basic parameters:**

Transmission line	ACSR Conductor specified	Equivalent AAAC conductor based on 53% conductivity of Al Alloy	Equivalent minimum size of AL59 conductor based on 59% conductivity of AL Alloy*	Sub-conductor Spacing
765 kV D/C (Hexa Zebra) transmission lines	Zebra: Stranding 54/3.18 mm-Al + 7/3.18 mm-Steel, 28.62 mm diameter 428 sq. mm, Aluminium area, Maximum DC Resistance at 20°C (Ω/km): 0.06868 Minimum UTS: 130.32 kN	Stranding details: 61/3.19mm, 28.71 mm diameter; 487.5 sq.mm Aluminium alloy area Maximum DC Resistance at 20°C (Ω/km) : 0.06815 Minimum UTS: 135.6 kN	Stranding details: 61/3.08mm, 27.72 mm diameter; 454 sq.mm Aluminium alloy area Maximum DC Resistance at 20°C (Ω/km) : 0.0653 Minimum UTS: 108 kN	457 mm

**Note:**

1. *\*To Select any size above the minimum, the sizes mentioned in the Indian standard IS-398(part-6) shall be followed.*
2. *The transmission lines shall have to be designed for a maximum operating conductor temperature of 85 deg C.*

A.8.0 The required phase to phase spacing and horizontal spacing for 765 kV line shall be governed by the tower design as well as minimum live metal clearances for 765 kV voltage level under different insulator swing angles. However, the phase to phase spacing for 765 kV line shall not be less than 15 m.

A.9.0 All electrical clearances including minimum live metal clearance, ground clearance and minimum mid span separation between earth wire and conductor shall be as per Central Electricity Authority (Measures Relating to Safety & Electric Supply) Regulations as amended from time to time and IS:5613. Since these clearances for 765kV are not included in CEA Regulation/ Indian Standard, following values shall be considered:

a) Minimum live metal clearances for 765 kV line:

(i) Under stationary conditions

From tower body: For 765 kV D/C: 6.1 m

For 765 kV S/C: 5.6 m

(ii) Under swing conditions

Wind pressure Condition	Minimum electrical clearance
a) Swing angle (25°)	4.4 m
b) Swing angle (55°)	1.3 m

b) Minimum ground clearance: 18 m

c) Minimum mid span separation between earthwire and conductor: 9.0 m

A.10.0 Shielding angle shall not exceed 10 degree for 765 kV D/C transmission line.

A.11.0 The Fault current for design of line shall be 50 kA for 1 second for 765 kV.

A.12.0 In case of 765 kV voltage class lines, at least one out of two earth wires shall be OPGW and second earth wire, if not OPGW, shall be either of galvanized standard steel (GSS) or AACSR or any other suitable conductor type depending upon span length and other technical consideration.

A.13.0 Each tower shall be earthed such that tower footing impedance does not exceed 10 ohms. Pipe type or Counterpoise type earthing shall be provided in accordance with relevant IS. Additional earthing shall be provided on every 7 to 8 km distance at

tension tower for direct earthing of both shield wires. If site condition demands, multiple earthing or use of earthing enhancement compound shall be used.

- A.14.0 Pile type foundation shall be used for towers located in river or creek bed or on bank of river having scourable strata or in areas where river flow or change in river course is anticipated, based on detailed soil investigation and previous years' maximum flood discharge of the river, maximum velocity of water, highest flood level, scour depth & anticipated change in course of river based on river morphology data of at least past 20 years to ensure availability and reliability of the transmission line.
- A.15.0 Transmission line route shall be finalized, in consultation with appropriate authorities so as to avoid the habitant zones of endangered species and other protected species. Bird diverters, wherever required, shall be provided on the line.
- A.16.0 A.17.0 The raised chimney foundation is to be provided in areas prone to flooding/water stagnation like paddy field /agricultural field & undulated areas to avoid direct contact of water with steel part of tower. The top of the chimney of foundation should be at least above HFL (High Flood Level) or the historical water stagnation/ logging level (based on locally available data) or above High Tide Level or 500 mm above Natural Ground level (whichever is higher).

### SPECIFIC TECHNICAL REQUIREMENTS FOR SUBSTATION

The proposed augmentation of **Bikaner-III (AIS) substation** and **Neemrana-II (AIS) substation** shall be generally conforming to the requirements of CEA (Technical Standards for Construction of Electrical Plants and Electric Lines) Regulations as amended from time to time. All other CEA Regulations/guidelines as amended upto date and MoP guidelines shall also be followed.

#### **B.1.0 Salient features of Substation Equipment and Facilities**

The design and specification of substation equipment are to be governed by the following factors:

##### **B.1.1 Insulation Coordination**

The system design parameters for substations/switchyards shall be as given below:

<b>S. No.</b>	<b>Description of parameters</b>	<b>Extn. of 765 kV Bikaner-III s/s</b>	<b>Extn. of 765 kV Neemrana-II s/s</b>
		<b>765 kV System</b>	<b>765 kV System</b>
1.	System operating voltage	765kV	765kV
2.	Maximum voltage of the system (rms)	800kV	800kV
3.	Rated frequency	50Hz	50Hz
4.	No. of phase	3	3
5.	Rated Insulation levels		
i)	Impulse withstand voltage for (1.2/50 micro sec.) - for Equipment other than Transformer and Reactors - for Insulator String	2100kVp  2100kVp	2100kVp  2100kVp
ii)	Switching impulse withstand voltage (250/2500 micro sec.) dry and wet	1550kVp	1550kVp
iii)	One minute power frequency dry withstand voltage (rms)	830kV	830kV
6.	Corona extinction voltage	508 kV	508 kV
7.	Max. radio interference voltage for frequency between 0.5 MHz and 2 MHz	2500 micro-volts at 508 kV rms	2500 micro-volts at 508 kV rms
8.	Minimum creepage distance for insulator string/ long rod insulators/ outdoor bushings	24800 mm (31mm/kV)	24800 mm (31mm/kV)

S. No.	Description of parameters	Extn. of 765 kV Bikaner-III s/s	Extn. of 765 kV Neemrana-II s/s
		<b>765 kV System</b>	<b>765 kV System</b>
9.	Minimum creepage distance for switchyard equipment	20000 mm (25 mm/kV)	20000 mm (25 mm/kV)
10.	Max. fault current	50 kA	50kA
11.	Duration of fault	1 sec	1 Sec

### B.1.2 Switching Scheme

The switching schemes, as mentioned below, shall be adopted at various voltage levels of substation/switchyard:

Substation	765 kV side
765 kV <b>Bikaner-III</b> S/s Extn	One & half breaker
765 kV <b>Neemrana-II</b> S/s Extn.	One & half breaker

Notes: -

- (i) At 765kV voltage level, each circuit of a double circuit transmission line shall be terminated in different diameters.
- (ii) Connection arrangement of Switchable Line reactors shall be such that it can be used as Line reactor as well as Bus reactor with suitable NGR bypass arrangement.

### B.2.0 Substation Equipment and facilities:

The switchgear shall be designed and specified to withstand operating conditions and duty requirements. All equipment shall be designed considering the following capacity.

S. No	Description of bay	765kV Bikaner-III S/s Extn	765kV Neemrana-II S/s Extn.
		<b>765kV</b>	<b>765kV</b>
1.	Bus Bar	4000A	4000A
2.	Line bay	3150A	3150A
3.	Line Reactor Bay	3150A	3150A

### B.2.1 Shunt Reactor

110 MVAR,  $765/\sqrt{3}$  kV, 1-Phase Reactor (including arrangement for 3-phase bank formation of 330 MVAR) shall conform to CEA's "Standard Specifications and Technical

Parameters for Transformers and Reactors (66 kV and above)” available on CEA website.

**Connection arrangement for utilization of existing Spare 1-phase Shunt Reactor unit:**

TSP shall make the arrangement in such a way that the existing spare unit can be utilized for line reactor banks under present scope without its physical movement.

**Neutral Grounding Reactor and Surge Arrester for 765 kV Line Reactors (as applicable):**

The neutral of the line reactors (wherever provided) shall be grounded through adequately rated Neutral Grounding Reactors (NGR) to facilitate single phase auto-reclosure, provided that the NGR shall be provided with bypass arrangement so that the line reactor can be used as Bus reactor as and when required. The neutral of bus reactor shall be solidly grounded. The ohmic value of NGR for each circuit at both ends of 765kV D/c (2nd) Bikaner-III– Neemrana-II S/s shall be 450 ohms.

NGR shall be oil filled or dry type air core for outdoor application. NGR shall conform to CEA’s “Standard specifications and technical parameters of transformers and reactors (66kV and above)”. Technical parameters of NGR shall be as specified in Annexure-A of abovementioned document.

The 145 kV surge arrester of suitable rating shall be provided & physically located between the neutral of shunt reactor (brought out at 145kV class bushing) and neutral grounding reactor. The surge arresters shall be of heavy duty station class gapless Metal oxide (ZnO) type conforming in general to IEC-60099-4. Arresters shall be hermetically sealed units, of self-supporting construction, suitable for mounting on structures.

**B.2.3 765 kV Substation equipment (AIS)**

**B.2.3.1 Circuit Breakers (AIS)**

The circuit breakers and accessories shall conform with IEC: 62271-100, IEC: 62271-1 and shall be of SF6 Type. The circuit breakers shall be of class C2-M2 (as per IEC) with regard to restrike probability during capacitive current breaking and mechanical endurance. The rated break time shall not exceed 40 ms for 765 kV circuit breakers. 765 kV Circuit breakers shall be provided with single phase and three phase auto reclosing. The Circuit breakers controlling 765 kV lines shall be provided either with pre-insertion closing resistor of about 450 ohms maximum with 9 ms minimum insertion time or with Controlled Switching Device. The short line fault capacity shall be same as the rated capacity and this is proposed to be achieved without use of opening resistors. Control switching device shall be provided in Circuit Breaker of

switchable line reactor bay and in Main & Tie bay circuit breakers of line with non-switchable line reactors, Bus reactors and 765/400 kV Transformers.

#### **B.2.3.2 Isolators (AIS)**

The isolators shall comply with IEC 62271-102 in general. 765 kV Isolator design shall be double break or vertical break or knee-type. All Isolators and earth switches shall be motor operated. Earth switches shall be provided at various locations to facilitate maintenance. Isolator rated for 765kV shall be of extended mechanical endurance class-M2 and suitable for bus transfer current switching duty as per IEC-62271-102. Main blades and earth blades shall be interlocked and interlock shall be fail safe type. 765 kV earth switch for line isolator shall be suitable for induced current switching duty as defined for Class-B.

#### **B.2.3.3 Current Transformers (AIS)**

Current Transformers shall comply with IEC 61869 in general. All ratios shall be obtained by secondary taps only. Generally, Current Transformers (CT) for 765 kV shall have six cores (four for protection and two for metering). The burden and knee point voltage shall be in accordance with the requirements of the system including possible feeds for telemetry. Accuracy class for protection core shall be PX and for metering core it shall be 0.2S. The rated burden of cores shall be closer to the maximum burden requirement of metering & protection system (not more than 20 VA for metering core) for better sensitivity and accuracy. The instrument security factor shall be less than 10 for CTs of 765 kV voltage class.

#### **B.2.3.4 Capacitive Voltage Transformers (AIS)**

Capacitive Voltage transformers shall comply with IEC 61869 in general. These shall have three secondaries out of which two shall be used for protection and one for metering. Accuracy class for protection cores shall be 3P and for metering core it shall be 0.2. The Capacitive voltage transformers on lines shall be suitable for Carrier Coupling. The Capacitance of CVT for 765 kV shall be 8800 pF. The rated burden of cores shall be closer to the maximum burden requirement of metering & protection system (not more than 50 VA for metering core) for better sensitivity and accuracy.

#### **B.2.3.5 Surge Arresters (AIS)**

624 kV Station High (SH) duty gapless type Surge arresters with thermal energy (Wth) of minimum 13 kJ/kV conforming to IEC 60099-4 in general shall be provided for 765

kV system. Other characteristics of Surge arrester shall be chosen in accordance with system requirements. Surge arresters shall be provided near line entrances, transformers & Reactor so as to achieve proper insulation coordination. Surge Arresters shall be provided with porcelain/ polymer housing fitted with pressure relief devices. A leakage current monitor with surge counter shall be provided with each surge arrester.

#### **B.2.4 Protection Relaying & Control System**

The protective relaying system proposed to be provided for transmission lines, auto-transformers, reactors and bus bars to minimize the damage to the equipment in the events of faults and abnormal conditions, is dealt in this section. All main protective relays shall be numerical type with IEC 61850 communication interface and should have interoperability during integration of numerical relays to communicate over IEC61850 protocol with RTU/SAS/IEDs of different OEMs. All numerical relays shall have built in disturbance recording feature.

The protection circuits and relays of transformer and reactor shall be electrically and physically segregated into two groups each being independent and capable of providing uninterrupted protection even in the event of one of the protection groups failing, to obtain redundancy, and to take protection systems out for maintenance while the equipment remains in service.

##### **a) Transmission Lines Protection**

765 kV lines shall have Main-I numerical three zone distance protection scheme with carrier aided inter-tripping feature. 765 kV lines shall also have Main-II numerical distance protection scheme like Main-I but from different make that of Main-I. The Main-I and Main-II protection relays of same make may be provided only if they are of different hardware & manufacturing platform or different principle of operation.

Further, all 765 kV lines shall be provided with single and three phase auto-reclosing facility to allow reclosing of circuit breakers in case of transient faults. These lines shall also be provided with distance to fault locators to identify the location of fault on transmission lines.

All 765 kV lines shall also be provided with two stages over voltage protection. Over voltage protection & distance to fault locator may be provided as in-built feature of Main-I & Main-II protection relays. Auto reclose as built in function of Bay Control Unit (BCU) is also acceptable.

The Main-I and Main-II protection relays shall be fed from separate DC sources and shall be mounted in separate panels.

For 765 kV transmission lines, directional IDMT earth fault relay should be provided as standalone unit or in-built feature of Main-I and Main -II feature.

**b) 765 kV Reactor Protection**

Reactor shall be provided with the following protections:

- i) Numerical Differential protection.
- ii) Numerical Restricted earth fault protection
- iii) Numerical Back-up impedance protection

Besides these, reactors shall also be provided with Buchholz relay, MOG with low oil level alarm, protection against oil and winding temperatures & pressure relief device, etc.

**c) Bus bar Protection**

The high speed low impedance type bus bar differential protection, which is essential to minimize the damage and maintain system stability at the time of bus bar faults, shall be provided for 765 kV buses. Duplicated bus bar protection is envisaged for 765 kV bus-bar protection. Bus bar protection scheme shall be such that it operates selectively for each bus and incorporate necessary features required for ensuring security. The scheme shall have complete bus bar protection for present as well as future bays envisaged i.e. input / output modules for future bays shall also be provided.

In case, the bus section is provided, then each side of bus section shall have separate set of bus bar protection schemes.

For existing substations, the existing bus bar protection shall be augmented as per requirement.

**d) Local Breaker Back up Protection**

This shall be provided for each 765 kV circuit breakers and will be connected to de-energize the affected stuck breaker from both sides.

*Notes:*

1. *LBB & REF relays shall be provided separately from transformer differential relay.*
2. *LBB relay may also be provided as built-in protection function of distributed bus bar protection scheme; however, in such case separate LBB relay shall be provided for tie bays (in case of One and Half breaker scheme).*

3. *Over fluxing & overload protection can be provided as built-in feature of differential relay.*
4. *In 765 kV switchyard, if spare bay of half diameter is identified as future, Tie CB relay panel shall be with Auto-reclosure feature.*

### **B.2.5 Substation Automation System**

- a) For all the new substations, state of art Substation Automation System (SAS) conforming to IEC-61850 shall be provided. The distributed architecture shall be used for Substation Automation system, where the controls shall be provided through Bay control units. The Bay control unit is to be provided bay wise for voltage level 220 kV and above. All bay control units as well as protection units are normally connected through an Optical fibre high speed network. The control and monitoring of circuit breaker, dis-connector, re-setting of relays etc. can be done from Human Machine Interface (HMI) from the control room.

The functions of control, annunciation, disturbance recording, event logging and measurement of electrical parameters shall be integrated in Substation Automation System.

At new substations, the Substation Automation System (SAS) shall be suitable for operation and monitoring of the complete substation including proposed future bays/elements.

In existing substations with Substation automation system (SAS), augmentation of existing SAS shall be done for bays under present scope.

In existing Substations where Substation automation is not provided, control functions shall be done through control panels.

Necessary gateway & modems (as required) shall be provided to send data to RLDC/SLDC as per their requirement. Any augmentation work at RLDC/SLDC is excluded from TSP's scope. However, all the configuration work at substation end required to send data to RLDC/SLDC shall be in the scope of TSP.

#### **b) Time synchronisation equipment**

Time synchronization equipment complete in all respect including antenna, cable, processing equipment required to receive time signal through GPS or from National Physical Laboratory (NPL) through INSAT shall be provided at new substations. This equipment shall be used to synchronize SAS & IEDs etc.

### **B.2.6 Phasor Measurement Units (PMUs)**

TSP shall supply, install & commission required no. of Phasor Measurement Units (PMUs) for all 400 kV and above voltage line bays under the scope of work and PMUs shall support latest IEEE C-37.118 protocols. The supplied PMUs may be mounted in the C&R/SAS panels. These PMUs shall be provided with GPS clock and LAN switch and shall connect with LAN switch of control room with Fibre Optic cable which shall further be interfaced with the FOTE. These PMUs shall be integrated with the existing PDC (Phasor Data Concentrator) located at respective RLDC. Configuration work in existing PDC at RLDC for new PMU integration is not in scope of TSP (shall be done by respective RLDC), however all the necessary co-ordination and support in this regard shall be ensured by TSP.

In case of bay extensions work, TSP shall also provide separate WAMS (PMU, switches, interface cabling and other associated accessories) required for extended bays at existing s/s.

### **B.3.0 Substation Support facilities**

Certain facilities required for operation & maintenance of substations as described below shall be provided at new substation. In existing substation, these facilities have already been provided and would be extended/ augmented as per requirement.

#### **B.3.1 AC & DC power supplies**

For catering the requirements of three phase & single phase AC supply and DC supply for various substation equipment, existing facilities shall be augmented as required.

#### **B.3.2 Fire Fighting System**

Fire-fighting system for substation including transformer & reactor shall conform to CEA (Measures Relating to Safety & Electric Supply) Regulations.

Further, adequate water hydrants and portable fire extinguishers shall be provided in the substations. The main header of firefighting system shall be suitable for extension to bays covered under the future scope; necessary piping interface in this regard shall be provided.

At existing substations, the fire-fighting systems as available shall be extended to meet the additional requirements.

### **B.3.3 Oil evacuating, filtering, testing & filling apparatus**

To monitor the quality of oil for satisfactory performance of transformers, shunt reactors and for periodical maintenance necessary oil evacuating, filtering, testing and filling apparatus would be provided at new substations. Oil storage tanks of adequate capacities for storage of transformer oil would be provided.

### **B.3.4 Illumination**

Normal & emergency AC & DC illumination shall be provided adequately in the switchyard panel room & other buildings of the substation. The switchyard shall also be provided with adequate illumination.

Lighting of the entire switchyard panel room building and other building (if any) and switchyard shall be done by LED based low power consumption luminaries.

### **B.3.5 Control Room**

For new substation, substation control room shall be provided to house substation work stations for station level control (SAS) alongwith its peripheral and recording equipment, AC & DC distribution boards, DC batteries & associated battery chargers, Fire Protection panels, Telecommunication panels & other panels as per requirements. Air conditioning shall be provided in the building as functional requirements. Main cable trenches from the control room shall have adequate space provision for laying of cables from control room for all the future bays also.

At existing substations, the adequacy of size of control room shall be ascertained and the same shall be augmented as per requirement.

### **B.3.7 Control Concept**

All the EHV circuit breakers in substation/switching stations shall be controlled and synchronized from the switchyard control room/remote control center. Each breaker would have two sets of trip circuits which would be connected to separate DC supplies for greater reliability. All the isolators shall have control from remote/local whereas the earth switches shall have local control only.

### **B.3.8 Visual monitoring system (VMS) for watch and ward of substation premises:**

Visual monitoring system for effective watch and ward of substation premises shall cover all the transformers and reactors, all other major AIS Equipment (such as CB,

isolators, CT, CVT, SA etc. as applicable), GIS bays, panel room, all the gates of switchyard and all entry and exit points of control room building and accordingly the location of cameras shall be decided. The camera shall be high definition color CCD camera with night vision feature. The VMS data partly/completely shall be recorded (minimum for 15 days) at least @25fps (or better) and stored on network video recorder. The system shall use video signals from various cameras installed at different locations, process them for viewing on workstations/monitors in the control room and simultaneously record all the cameras.

Mouse/keyboard controllers shall be used for pan, tilt, zoom and other functions of the desired camera. The Visual Monitoring System shall have provision of WAN connectivity for remote monitoring.

All camera recordings shall have Camera ID & location/area of recording as well as date/time stamp. The equipment should generally conform to Electromagnetic compatibility requirement for outdoor equipment in EHV substation.

At existing substations, the visual monitoring system if available shall be augmented as per existing or better specification as required.

#### **B.4.0 General Facilities**

- a) Line Gantry/Towers are envisaged for bays under present scope only. However, for adjacent future line bay, tower shall be designed for extension (considering Quad conductors for 765 kV) wherever applicable.
- b) Bay extension works at existing substation shall be executed by TSP in accordance with the requirement/provisions mentioned above. However, interface points shall be considered keeping in view the existing design/arrangement at the substation.
- c) TSP has to arrange for construction power and water on its own.
- d) All outdoor steel structures including anchor/foundation bolts shall be fully galvanized. The weight of the zinc coating shall be at least 610 gm/sq.m and 900 gm/sq.m for coastal/ creek regions (if applicable).
- e) In 765 kV switchyard, if spare bay of half diameter is identified as future, all the equipment for Tie bay and Future bay shall be designed considering the current rating of line bay i.e. 3150A.

All electrical equipment shall be installed above Highest Flood Level (HFL) and where such equipment is not possible to be installed above HFL, it shall be ensured that there is no seepage or leakage or logging of water.

#### B.5.0 EXTENSION OF EXISTING SUBSTATION

The following drawings/details of existing substation is attached with the RFP documents for further engineering by the bidder.

S. No.	Drawing Title	Drawing No./Details	Rev. No.
<b>A.</b>	<b>Bikaner-III s/s</b>		
1.0	Single Line Diagram	Developer yet to be finalized by BPC. The finalization of drawings is in the scope of developer. The same may be availed from the developer on finalization.	
2.0	General Arrangement		
3.0	Earthmat Layout		
4.0	Visual Monitoring System		
5.0	Bus Bar Protection (765kV System)		
6.0	Substation Automation System (SAS)		
<b>B.</b>	<b>Neemrana-II s/s</b>		
1.0	Single Line Diagram	Developer yet to be finalized by BPC. The finalization of drawings is in the scope of developer. The same may be availed from the developer on finalization.	
2.0	General Arrangement		
3.0	Earthmat Layout		
4.0	Visual Monitoring System		
5.0	Bus Bar Protection (765kV System)		
6.0	Substation Automation System (SAS)		

Bidder is also advised to visit the substation sites and acquaint themselves with the topography, infrastructure such as requirement of roads, cable trench, drainage etc. and also the design philosophy.

Annexure – D**SPECIFIC TECHNICAL REQUIREMENTS FOR COMMUNICATION**

The communication requirement shall be in accordance to CEA (Technical Standards for Communication System in Power System Operations) Regulations, 2020, CERC (Communication System for inter-State transmission of electricity) Regulations, 2017, and CEA (Cyber Security in Power Sector) Guidelines, 2021, all above documents as amended from time to time.

The protections for transmission line and the line compensating equipment shall have hundred percent back up communication channels i.e. two channels for tele-protection in addition to one channel for speech plus data for each direction.

In order to meet the requirement for grid management and operation of substations, Transmission Service Provider (TSP) shall provide the following:

**C.1.0 Bikaner-III – Neemrana -II 765 kV D/c line (2<sup>nd</sup>):**

On Bikaner-III – Neemrana-II 765 kV D/c line (2<sup>nd</sup>), TSP shall supply, install & commission one (1) no. OPGW cable containing 24 Fibres (24F) on one E/W peak and conventional earth wire on other E/W peak.

The TSP shall install this OPGW from gantry of Bikaner-III up to the gantry of Neemrana-II S/s with all associated hardware including Vibration Dampers, mid-way & gantry Joint Boxes (called **OPGW Hardware** hereafter) and finally terminate in Joint Boxes at end Substations. The transmission line length is 350 kms (approx.) where repeater/s are required to meet link budget requirement of Bikaner-III – Neemrana-II.

TSP shall finalize the location of repeater station depending upon the actual site conditions. Further TSP shall comply to the requirements mentioned as per **Appendix-D.1**.

**C.2.0 2 no. of 765 kV line bays at Bikaner-III for Bikaner-III – Neemrana-II 765 kV D/c line (2<sup>nd</sup>):**

- (i) TSP shall supply, install & commission 1 no. FODP (72 F or higher ) alongwith panel and required Approach Cable (24F) with all associated hardware fittings from gantry tower to Bay Kiosk and from the Bay Kiosk to Control room.
- (ii) TSP shall supply, install & commission One STM-16 (FOTE) equipment alongwith panel/s supporting minimum three (3) directions with MSP (Multiplex Section Protection – 1+1) with necessary interfaces to meet the voice and data

communication requirement between Bikaner-III, Neemrana-II S/s. The suitable DC Power Supply and backup to be provided for communication equipment.

- (iii) FOTE/FODP panel shall be installed in the new Bay Kiosk (Switchyard Panel Room (SPR)). The FOTE under present scope shall be integrated by TSP with the existing/proposed FOTE at control room of **Bikaner-III** S/s which shall be communicating with respective control center. TSP to provide necessary FODP sub rack / Splice trays/ Patch cords etc. and optical interfaces/equipment in the existing FOTE/FODP panels in control room for integration with the existing FOTE for onwards data transmission.

In case spare optical direction is not available in the existing FOTE at the control room, the TSP shall coordinate with station owner to reconfigure the directions in existing FOTE at control room. Alternatively, the TSP may integrate the FOTE under the present scope with FOTE in the nearby Kiosk connected to the control room (if available with spare direction). For this purpose, TSP shall provide necessary FODP sub rack / Splice trays/ Patch cords etc. and suitable optical interfaces/ equipment in the existing FOTE/FODP panels in another Kiosk (SPR).

- (iv) FOTE & FODP can be accommodated in same panel to optimize space.
- (v) The new communication equipment under the present scope shall be compatible for integration with existing regional level centralized NMS. The local configuration of the new communication equipment shall be the responsibility of TSP. The configuration work in the existing centralized NMS for integration of new Communication equipment shall be done by Regional ULDC Team, however all the necessary support in this regard shall be ensured by TSP.

The maintenance of all the communication equipment including FOTE, FODP, approach cable, DCPS alongwith Battery Bank shall be the responsibility of TSP.

### **C.3.0 2 no. of 765 kV line bays at Neemrana-II for Bikaner-III – Neemrana-II 765 kV D/c line (2nd)**

- (i) TSP shall supply, install & commission 1 no. FODP (72 F or higher) alongwith panel and required Approach Cable (24F) with all associated hardware fittings from gantry tower to Bay Kiosk and from the Bay Kiosk to Control room.
- (ii) TSP shall supply, install & commission One STM-16 (FOTE) equipment alongwith panel/s supporting minimum three (3) directions with MSP (Multiplex Section Protection – 1+1) with necessary interfaces to meet the voice and data

communication requirement between Bikaner-III, Neemrana-II S/s. The suitable DC Power Supply and backup to be provided for communication equipment.

- (iii) FOTE/FODP panel shall be installed in the new Bay Kiosk (Switchyard Panel Room (SPR)). The FOTE under present scope shall be integrated by TSP with the existing/proposed FOTE at control room of **Neemrana-II** S/s which shall be communicating with respective control center. TSP to provide necessary FODP sub rack / Splice trays/ Patch cords etc. and optical interfaces/equipment in the existing FOTE/FODP panels in control room for integration with the existing FOTE for onwards data transmission.

In case spare optical direction is not available in the existing FOTE at the control room, the TSP shall coordinate with station owner to reconfigure the directions in existing FOTE at control room. Alternatively, the TSP may integrate the FOTE under the present scope with existing FOTE in the nearby Kiosk connected to the control room FOTE (if available with spare direction). For this purpose, TSP shall provide necessary FODP sub rack / Splice trays/ Patch cords etc. and suitable optical interfaces/ equipment in the existing FOTE/FODP panels in another Kiosk (SPR).

- (iv) FOTE & FODP can be accommodated in same panel to optimize space.
- (v) The new communication equipment under the present scope shall be compatible for integration with existing regional level centralized NMS. The local configuration of the new communication equipment shall be the responsibility of TSP. The configuration work in the existing centralized NMS for integration of new Communication equipment shall be done by Regional ULDC Team, however all the necessary support in this regard shall be ensured by TSP.

The maintenance of all the communication equipment including FOTE, FODP, approach cable, DCPS alongwith Battery Bank shall be the responsibility of TSP.

## Appendix-D.1

## Repeater Requirements

- If the repeater location is finalized in the Control Room of a nearby substation, TSP shall provide 1 no. OPGW (48F) on a single Earthwire peak with OPGW Hardware & mid-way Joint Boxes etc. of the line crossing the main line and 1 no. Approach Cable (48F) with all associated hardware fittings, to establish connectivity between crossing point of main transmission line up to the repeater equipment in substation control room.

TSP shall co-ordinate for Space & DC power supply sharing for repeater equipment. TSP shall provide FODP, FOTE (with STM-16 capacity) with suitable interfaces require for link budget of respective link.

OR

- If the repeater location is finalized in the nearby substation premises, the TSP shall identify the Space for repeater shelter in consultation with station owner. Further TSP shall provide 1 no. OPGW (48F) on a single Earthwire peak with OPGW Hardware & mid-way Joint Boxes etc. of the line crossing the main line and 1 no. Approach Cable (48F) / UGFO (48F) with all associated hardware fittings, to establish connectivity between crossing point of main transmission line up to the substation where the repeater shelter is to be housed.

TSP shall provide repeater shelter along with FODP, FOTE (with STM-16 capacity) with suitable interfaces require for link budget of respective link, reliable power supply provisioning for AC and DC supply, battery bank, Air Conditioner and other associated systems.

OR

- If the repeater location is finalized on land near the transmission tower. TSP shall make the provisions for Land at nearby tower for repeater shelter. Further TSP shall provide 1 no. Approach Cable (48F) / UGFO (48F) with all associated hardware fittings to establish connectivity up to the location of repeater shelter.

TSP shall provide repeater shelter along with FODP, FOTE (with STM-16 capacity) with suitable interfaces require for link budget of respective link, reliable power supply provisioning for AC and DC supply, battery bank, Air Conditioner and other associated systems

Maintenance of OPGW Cable and **OPGW Hardware**, repeater equipment & items associated with repeater shelter shall be responsibility of TSP.

Note: Existing Station owner/s to provide necessary support to integrate different equipment & applications of new extended bays with the existing substation e.g. Communication (through FOTE), Voice etc. for smooth operation and monitoring of new added grid elements.

Proposed Communication for Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1), Part-C

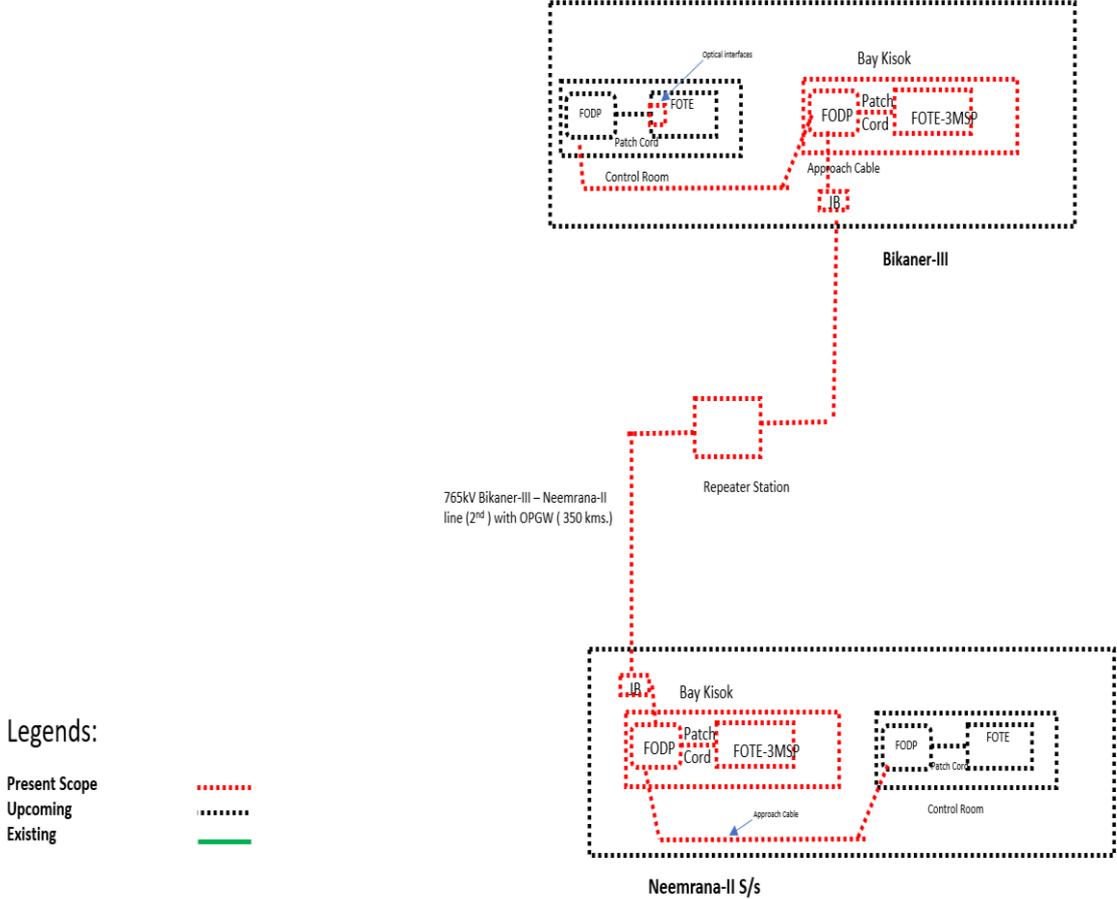


Figure D.1

**C.4.0 PLCC& PABX:**

Power line carrier communication (PLCC) equipment complete for speech, tele-protection commands and data channels shall be provided on each transmission line. The PLCC equipment shall in brief include the following: -

- Coupling device, line traps, carrier terminals, protection couplers, HF cables, PABX (if applicable) and maintenance and testing instruments.
- At new substation, a telephone exchange (PABX) of 24 lines shall be provided as a means of effective communication among various buildings of the substation, remote end substations and with control centres (RLDC/SLDC) etc.
- Coupling devices shall be suitable for phase to phase coupling for 765kV Transmission lines. The pass band of coupling devices shall have sufficient margin for adding communication channel in future if required. Necessary protection devices for safety of personnel and low voltage part against power frequency voltages and transient over voltage shall also be provided.
- The line traps shall be broad band tuned suitable for blocking the complete range of carrier frequencies. Line Trap shall have necessary protective devices such as lightning arresters for the protection of tuning device. Decoupling network consisting of line traps and coupling capacitors may also be required at certain substation in case of extreme frequency congestion.
- The carrier terminals shall be of single side-band (SSB) amplitude modulation (AM) type and shall have 4 kHz band width. PLCC Carrier terminals and Protection couplers shall be considered for both ends of the line.
- PLCC equipment for all the transmission lines covered under the scheme (consisting of one set of analog PLCC channel along with circuit protection coupler and one set of Digital protection coupler for both ends) shall be provided by TSP. CVT & Wave trap for all the line bays under present scope shall be provided by TSP.
- All other associated equipment like cabling, coupling device and HF cable shall also be provided by the TSP.

**Frequently Asked Queries:**

**1.0 Transmission Line:**

- 1.1 Please clarify that whether shutdowns for crossing of existing transmission lines of POWERGRID/STUs/ Power Evacuation Lines from Generation Plants/ Any other Transmission Licensee will be given to TSP on chargeable basis or free of cost.

**Reply:** Shutdowns for crossing of existing transmission lines of POWERGRID/STUs/ Power Evacuation Lines from Generation Plants/ Any other Transmission Licensee will be given to TSP by the concerned owner of the lines as per their own terms & conditions.

- 1.2 We understand that the suggested swing angle criteria are applicable for Suspension Insulator in Suspension Tower. Further, you are requested to provide similar swing angle and clearance criteria for Pilot Insulator with Jumper & Jumper.

**Reply:** It is clarified that the swing angle criteria (as mentioned in RFP) for transmission lines is applicable for Suspension Insulator in Suspension Tower. Further, as per Clause 3.0 of Specific Technical Requirements for transmission lines, Transmission service Provider (TSP) shall adopt any additional loading/design criteria for ensuring reliability of the line, if so desired and /or deemed necessary.

- 1.3 We request you to kindly allow that use of diamond configuration at Power line crossings and the existing owner of the lines may be directed to allow the same for the successful bidders.

**Reply:** Power line crossing including Diamond configuration is responsibility of the TSP. TSP shall formally submit the profile of the crossing section to the owner of the existing line suggesting proposed crossing alternatives. The crossing will have to be carried out as per approval of owner of the existing line.

- 1.4 It is requested you to kindly provide present status of Forest Clearances if any transmission line corridor area falling in wildlife forest / reserve forest/ mangroves.

**Reply:** Based on the preliminary route survey, the process of initiation of forest clearance for the forest stretches, if any, enroute the proposed line alignment will be initiated by way of writing letters to the concerned authority (ies). However, it may be noted that it will be the responsibility of TSP for obtaining

forest clearance for the forest stretches as provided in the survey report and also for any forest area encountered during detailed survey.

## 2.0 **Substation**

2.1 We understand that space for storage of O&M spare shall be provided by existing owner within the station boundary without any cost. Kindly confirm.

**Reply:** Space for storage of O&M spares shall be arranged by TSP on its own.

2.2 We presume that the O&M for the end Termination bays will be in the scope of the TSP and TSP shall not be liable for any payment towards O&M to the existing owner of the substation. Kindly confirm.

**Reply:** Operation and maintenance of the bays is solely responsibility of the TSP.

2.3 With reference to subject scheme of existing sub-station, we assumed following scope of work:

- (a) We assumed internal road is available and need not to consider in the present scope of work.
- (b) Drainage is available and need not to consider in the present scope of work.
- (c) Cable trench extension in adjacent to Main cable trench only under present scope of work.
- (d) Levelled area being provided by developer for bay extension.

**Reply:** Regarding requirement of internal road, drainage, cable trench, leveling of the bay extension area, bidder is advised to visit site and acquaint themselves with the provisions/facilities available at substation.

2.4 Kindly provide the soil investigation report of soil parameters of existing substation.

**Reply:** Bidder is advised to visit the substation site and ascertain the requisite parameters.

2.5 Kindly confirm, energy accounting of aux. power consumption. Whether it will be on chargeable basis or part of transmission loss.

**Reply:** It will be on chargeable basis.

2.6 We understand that VMS requirement is for unmanned stations only. For Manned stations VMS is not compulsory.

**Reply:** VMS shall be provided by TSP in line with requirements of RfP document.

- 2.7 It is understood that Construction water and power shall be provided free of cost to TSP by respective substation owner for construction of new bays.

**Reply:** Arrangement of construction power & water is in the scope of TSP.

- 2.8 It is understood that existing fire hydrant system shall be extended by the TSP for bay extension.

**Reply: Existing fire hydrant system shall be extended from existing system (if required)**

- 2.9 Please clarify that Status of land acquisition for Substations. Whether the lands have been acquired by BPC and will be transferred to TSP.

**Reply:** The acquisition of land for substation is in the scope of TSP.

- 2.10 We understood that no any dedicated metering CT & CVT required for Line/feeders. Further, we understood that requisite Energy meters for various 765kV, 400kV & 220kV Feeders shall be provided & installed by CTU free of cost to TSP.

**Reply:** Dedicated metering CT and CVT are not required for line/feeders. Metering core of existing CT/CVT can be used provided accuracy class is matching with metering requirement. Requisite Special Energy Meters shall be provided and installed by CTU in C&P panel subject to space availability, else, in separate metering panel (to be provided by TSP at its cost).

### 3.0 Communication

- 3.1 What are the usage of OPGW, FOTE, PMU etc. under communication requirement of RFP?

**Reply:** User shall be responsible for providing compatible equipment along with appropriate interface for uninterrupted communication with the concerned control center and shall be responsible for successful integration with the communication system provided by CTU.

Communication systems comprising OPGW, FOTE, PMU etc. are required for grid operation through RLDC/SLDC, speech communication, tele-protection and tele-metering.

- 3.2 Is space for installation of communication panels are provided to TSP in existing Substations incase new bays are in the scope of TSP?

**Reply:** The space related issues are deliberated in the RFP itself. TSP to carry out survey of the existing substation for physical space requirement. In case space is

not available in the existing substation then TSP shall accommodate the same in the respective bay SPR (Switchyard Panel Room)/Bay Kiosk/ Relay panel room in case of GIS s/s. Further, TSP to connect and integrate the proposed FOTE with the existing FOTE in the control room.

In Case 132kV Substation TSP shall accommodate the said panels either by extension of existing control room or other arrangements.

3.3 How is the OPGW laying done in case of LILO lines?

**Reply:** In case LILO lines are on same towers (e.g. both Line in and Line Out portion are on same towers, generally done LILO of S/C lines), then 2x24F OPGW shall be required to install by TSP on both earthwire peak on 400kV & 765kV lines where two E/W peaks are available. On 220 & 132kV lines where only one E/W peak is available TSP to install one no. 48F OPGW.

Incase LILO lines are on different towers (e.g. both Line In and Line Out portion are on different towers, generally done LILO of D/C lines), then 1x24F OPGW shall be required to install by TSP on one earthwire peak, on both Line In and Line Out portions of 400kV & 765kV lines. On 220 & 132kV lines where only one E/W peak is available TSP to install one no. 24F OPGW in place of conventional earthwire.

3.4 How is the OPGW laying done in case Multi circuit Towers?

**Reply:** In case two different lines are using common multi circuit portion for some distance (originating from different stations, may be terminating on same or on different stations), two no. 24F OPGW to be installed on both E/W peaks for common M/C portion of 765kV & 400kV lines.

In case 220/132kV lines using multi circuit portion where single E/W peak is available one no. 48F may be installed for common multi circuit portion.

-----X-----

# PFC CONSULTING LIMITED

(A wholly owned subsidiary of PFC Limited)

Regd. Office: First Floor, "Urjanidhi", 1, Barakhamba Lane, Connaught Place,  
New Delhi – 110001 (INDIA), Fax: 011-23443990

## GLOBAL INVITATION (THROUGH E-BIDDING ONLY)

### FOR SELECTION OF TRANSMISSION SERVICE PROVIDER ON BUILD, OWN, OPERATE AND TRANSFER (BOOT) BASIS FOR INTER-STATE TRANSMISSION PROJECTS

**PFC Consulting Limited**, a wholly owned subsidiary of Power Finance Corporation Limited (A Government of India Undertaking), invites proposals for setting up of transmission projects on Build, Own, Operate and Transfer (BOOT) basis following single stage two envelope process of "Request for Proposal" (RFP).

Interested bidders may refer to the RFP notification and RFP documents available on the website <https://www.mstcecommerce.com> and <https://www.pfcclindia.com>.

The Bidders may obtain the RFP documents on all working days between 10:30 hrs (IST) and 16:00 hrs (IST) from 02/03/2023 to one working day prior to bid submission for the projects mentioned below on payment of a non-refundable fee of Rs. 5,00,000/- or USD 7,000 plus applicable GST @18%, from 9<sup>th</sup> Floor, Wing –A, Statesman House, Connaught Place, New Delhi-110001, Tel.: 91-11-23443996; Fax: 91-11-23443990; e-mail: [pfcc, itp@pfcindia.com](mailto:pfcc, itp@pfcindia.com). The RFP documents can also be downloaded from <https://www.mstcecommerce.com> and <https://www.pfcclindia.com>, however, in such case, interested party can submit Response to RFP only on submission of non-refundable fee of Rs. 5,00,000/- or USD 7,000 plus applicable GST @18% separately. The survey report and clarification to RFP documents shall be issued to those bidders, who have obtained/ purchased RFP documents by paying requisite fee at least one working day prior to bid submission date. Bidders should regularly visit website to keep themselves updated regarding clarifications/ amendments/ time extensions etc., if any. The important timelines in this regard are as follows:

S. No.	Name of Transmission Scheme	Last Date for seeking clarifications (dd/mm/yyyy)	Last Date for submission of response to RFP (dd/mm/yyyy)	Date of opening of Response to RFP (dd/mm/yyyy)
1.	Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): PART-C	22/03/2023	08/05/2023 up to 15:00 hrs. (IST)	08/05/2023 up to 15:30 hrs. (IST)
2.	Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): PART-D	22/03/2023	08/05/2023 up to 16:00 hrs. (IST)	08/05/2023 up to 16:30 hrs. (IST)

**Note:** PFC Consulting Limited reserves the right to cancel or modify the process without assigning any reason and without any liability. This is not an offer.

Bid Process Coordinator

**PFC CONSULTING LTD.**

(A wholly owned subsidiary of PFC Ltd.)  
(A Govt. of India Undertaking)

An Initiative of



Ministry of Power  
Government of India

Initiative Partner



Central Electricity Authority

**Dated \_\_\_\_\_ [Insert date of the Agreement]**

---

**SHARE PURCHASE AGREEMENT**

**BETWEEN**

**PFC CONSULTING LIMITED**

**AND**

**SPV [which is under incorporation]**

**AND**

**\_\_\_\_\_ [INSERT NAME OF THE SELECTED BIDDER]**

---

## SHARE PURCHASE AGREEMENT

This **SHARE PURCHASE AGREEMENT** ('Agreement') made this \_\_\_\_\_ [Insert Date of the Agreement] at New Delhi by and between:

**PFC CONSULTING LIMITED** (a wholly owned subsidiary of Power Finance Corporation Ltd.), a company incorporated under the Companies Act, 1956, having its registered office at First Floor, "Urjanidhi", 1 Barakhamba Lane, Connaught Place, New Delhi 110001, (hereinafter referred to as "**PFCL**", which expression shall, unless it be repugnant to the context or meaning thereof, be deemed to mean and include its successors and permitted assigns) of the **FIRST PART**;

**AND**

**SPV [which is under incorporation]**, a company incorporated under the Companies Act, 2013, having its registered office at First Floor, "Urjanidhi", 1 Barakhamba Lane, Connaught Place, New Delhi 110001, (hereinafter referred to as "**Company**" which expression shall, unless repugnant to the context or meaning thereof, be deemed to mean and include its successors and permitted assigns) of the **SECOND PART**; and

**AND**

\_\_\_\_\_ [**Insert Name of the Selected Bidder**], a company incorporated under the Companies Act, 1956 having its registered office at \_\_\_\_\_ [**Insert the registered office address of the Selected Bidder**] (hereinafter referred to as "**Selected Bidder**" which expression shall, unless repugnant to the context or meaning thereof, be deemed to mean and include its successors and permitted assigns) of the **THIRD PART**.

**Note: [In case the Selected Bidder is a Bidding Consortium, the above immediate paragraph shall be replaced by the following:**

..... [**Insert Name of the Lead Member**], a company incorporated under the Companies Act, 1956 and having its registered office at ..... [**Insert the registered office address of Lead Member**], ..... [**Insert Name of the Member**], a company incorporated under the Companies Act, 1956 and having its registered office at ..... [**Insert the registered office address of Member**], ..... [**Insert Name of the Member**], a company incorporated under the Companies Act, 1956 and having its registered office at ..... [**Insert the registered office address of Member** ], (hereinafter individually referred to as "**Partner 1**" "**Partner 2**" and "**Partner 3**" respectively and collectively referred to as "**Selected Bidder**" which expression shall, unless repugnant to the context or meaning thereof, be deemed to mean and include its successors and permitted assigns) of the **THIRD PART**

**WHEREAS:**

- A. The Ministry of Power, Government of India, vide its Gazette no. CG-DL-E-14012023-241990 dated January 13, 2023 has notified PFC Consulting Ltd. to be the Bid Process Coordinator (BPC) for the purpose of selection of Bidder as Transmission Service Provider (TSP) to establish transmission system for "**Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1: Bikaner Complex) Part-C**"

through tariff based competitive bidding process (hereinafter referred to as the "Project").

- B. In accordance with the Bidding Guidelines, PFCCL had initiated a Bid Process through issuance of RFP documents for selecting a Successful Bidder to build, own, operate and transfer the Project in accordance with and on the terms and conditions mentioned in the RFP Project Documents (as defined hereinafter).
- C. PFCCL has incorporated the **Company** and PFCCL along with the Nominees hold One hundred per cent (100 %) of total issued and paid up equity share capital of the Company.
- D. PFCCL has initiated the development of the Project and has obtained survey report, certain clearances, consents and permits as specified in the RFP regarding the Project.
- E. Pursuant to the said Bid Process, \_\_\_\_\_ [Insert Name of the Selected Bidder] has been identified as the Selected Bidder vide Letter of Intent dated \_\_\_\_\_ [Insert Date of the Letter of Intent] issued by the PFCCL in favor of the Selected Bidder.
- F. As envisaged in the RFP, the Shares Seller (as defined hereinafter) has agreed to sell the Sale Shares (as defined hereinafter) to the Selected Bidder and the Selected Bidder has agreed to purchase the Sale Shares from the Shares Seller, subject to and on the terms and conditions set forth in this Agreement.

**NOW THEREFORE, IN CONSIDERATION OF THE MUTUAL COVENANTS AND AGREEMENTS SET FORTH IN THIS AGREEMENT AND FOR OTHER GOOD AND VALUABLE CONSIDERATION, THE PARTIES HEREBY AGREE AS FOLLOWS:**

## **1. DEFINITIONS**

- 1.1 Capitalised terms in this Agreement, unless defined in this Agreement shall, in so far as the context admits, have the same meaning in this Agreement as has been ascribed to them in the Transmission Service Agreement.
- 1.2 Additionally, the following terms shall have the meaning hereinafter respectively assigned to them herein below:
  - (i) **"Acquisition Price"** shall mean INR \_\_\_\_\_ (**Rupees** \_\_\_\_\_ **only**) [Insert the value of the Acquisition Price, both in figures and in words respectively], which is the aggregate consideration payable by the Selected Bidder towards purchase of the **Sale Shares at par** along with assets and liabilities of the Company as on the Closing Date subject to adjustment as per the audited accounts of the Company as on the Closing Date;
  - (ii) **"Agreement"** or **"the Agreement"** or **"this Agreement"** shall mean this Share Purchase Agreement and shall include the recitals and/or annexures attached hereto, and the contracts, certificates, disclosures and other documents to be executed and delivered pursuant hereto, if any, and any amendments made to this Agreement by Parties in writing;

- 
- (iii) **“Bid Process”** shall mean the competitive bidding process initiated by the Company, by issuance of RFP Documents for selecting a Successful Bidder to build, own, operate and transfer the Project in accordance with and on the terms and conditions mentioned in the RFP Project Documents;
- (iv) **“Board”** shall mean the board of directors of the Company
- (v) **“Closing Date”** shall mean a mutually agreed date between the Parties falling within the period as mentioned in Clause 2.4 of RFP or on failure of such mutual agreement between the Parties shall be the date falling on the last date of such period;
- (vi) **“CTU”** or **“Central Transmission Utility of India Limited”** shall have same meaning as defined in the Electricity Act, 2003;
- (vii) **“Encumbrance”** shall mean any mortgage, pledge, lien, charge, security assignment, hypothecation, trust, encumbrance or any other agreement having the effect of creating security interest;
- (viii) **“Letter of Intent”** shall have the meaning ascribed thereto under the RFP;
- (ix) **“Nominees”** shall mean the Persons, who are named in Annexure A, holding the Sale Shares as nominees of PFCCCL.
- (x) **“Party”** shall mean PFCCCL, Company and the Selected Bidder, referred to individually, and **“Parties”** shall mean PFCCCL, Company and the Selected Bidder collectively referred to, as relevant;
- (xi) **“Person”** shall include an individual, an association, a corporation, a partnership, a joint venture, a trust, an unincorporated organisation, a joint stock company or other entity or organisation, including a government or political subdivision, or an agency or instrumentality thereof, and/or any other legal entity;
- (xii) **“RfP Project Documents”** shall mean the following documents, referred to collectively:
- a) Transmission Services Agreement;
  - b) this Agreement; and
  - c) Any other agreement(s) as may be required.
- (xiii) **“Representations and Warranties”** shall mean the representations and warranties mentioned in **Clause 4** hereto;
- (xiv) **“Sale Shares”** shall mean \_\_\_\_\_ **[Insert total number of shares of the Company]** Shares, representing 100 percent of the total issued, subscribed and fully paid-up equity share capital of the Company held by the Shares Seller and Nominees as more particularly described in Annexure A attached hereto;
-

- (xv) **“Shares”** shall mean the fully paid-up equity shares of Company, of face value Rs. 10 each;
- (xvi) **“Shares Seller”** shall mean PFCCL;
- (xvii) **“Transmission Services Agreement”** or **“TSA”** means the agreement titled ‘Transmission Services Agreement’ dated \_\_\_\_\_ [Insert Date of the TSA] entered into between Central Transmission Utility of India Limited and the TSP pursuant to which the TSP shall build, own, operate and transfer the Project and make available the assets of the Project to Central Transmission Utility of India Limited on a commercial basis, as may be amended from time to time;
- (xviii) **Transmission Service Provider”** or **“TSP”** shall mean SPV [which is under incorporation] which has executed the Transmission Service Agreement and which shall be acquired by the Selected Bidder.

### 1.3 Interpretation Clause

Unless the context otherwise requires, the provisions of the TSA relating to the interpretation of the TSA shall apply to this Agreement as if they were set out in full in this Agreement and to this end are incorporated herein by reference.

## 2. TRANSFER OF SHARES

- 2.1 Subject to the terms and conditions of this Agreement, the Shares Seller agrees to sell and transfer to the Selected Bidder and the Selected Bidder hereby agrees to purchase from the Shares Seller, the Sale Shares of the Company free from Encumbrances with rights and benefits attached thereto in consideration of the Acquisition Price and the covenants, undertakings and the agreements of the Selected Bidder contained in this Agreement.
- 2.2 The Shares Seller hereby undertakes to cause the Nominees to transfer part of the Sale Shares held by them as Nominees of the Shares Seller to the Selected Bidder and execute any documents required to deliver good title to the Sale Shares to the Selected Bidder.

## 3. CLOSING

- 3.1 Prior to the Closing Date, the Selected Bidder shall provide to the Shares Seller, valid share transfer forms (“Share Transfer Forms”) duly stamped with requisite amount of stamp duty payable on the transfer of Sale Shares.
- 3.2 On the Closing Date, the Shares Seller shall hand over to the Selected Bidder or its authorised representative, the original share certificates representing the Sale Shares (“Sale Share Certificates”) along with the Share Transfer Forms duly executed by the Shares Seller and the Nominees in favour of the Selected Bidder, simultaneously against the Selected Bidder handing over to the Shares Seller demand drafts drawn in favour of the Shares Seller for the Acquisition Price payable to it.

Provided that prior to the handing over of the Sale Share Certificates to the Selected Bidder as mentioned above, the Selected Bidder shall provide satisfactory evidence to

PFCCCL that on or before the Closing Date, the Selected Bidder has furnished the Performance Bank Guarantee to Central Transmission Utility of India Limited and is in a position to comply with all other requirements of Clause 2.4 of the RFP.

3.3 The Selected Bidder shall immediately upon receiving the Sale Share Certificates and the Share Transfer Forms, duly execute the Share Transfer Forms and duly lodge the Share Transfer Forms and the Sale Share Certificates with the Company. The Selected Bidder may also propose the names of its nominees to be appointed on the Board of the Company and the address within the jurisdiction of the Registrar of Delhi and Haryana, which would be the new registered office of the Company. The Company shall, upon receipt of the said documents from the Selected Bidder, do the following:

- (i) Immediately on the Closing Date convene a meeting of the Board, wherein the Board shall pass the following necessary resolutions:
  - (a) approving the transfer of the Shares constituting the Sale Shares from the Shares Seller and the Nominees to the name of the \_\_\_\_\_ **[Insert Name of the Selected Bidder/respective member companies of the Selected Bidder]**;
  - (b) approving the \_\_\_\_\_ **[Insert Name of the Selected Bidder/respective member companies of the Selected Bidder]** as a member of the Company and entering the name of the \_\_\_\_\_ **[Insert Name of the Selected Bidder/respective member companies of the Selected Bidder]** and its **nominees** in the register of members.
  - (c) changing the address of the registered office of the Company to the new address, within the jurisdiction of the Registrar of Delhi and Haryana, as may be provided by the Selected Bidder.
  - (d) appointing the nominees of the Selected Bidder on the Board and accepting the resignations of the other existing Directors on the Board and the Chair of the meeting which was taken by one of the existing Directors shall be vacated and appointment of a new Chairman who shall be one of the newly appointed Director, for the rest of the meeting.

Immediately pursuant to the acceptance of resignation of the existing Directors and appointment of new Chairman, the newly constituted Board of Directors shall continue with the meeting and pass the following resolution:

- (e) terminating all the authorizations granted regarding the business and/or operations of the Company or the operations of the bank accounts of the Company, with prospective effect; and
- (f) acknowledging and accepting the terms and conditions as contained in the executed copies of the RFP Project Documents and to abide by the provisions contained therein.

- 
- (ii) Enter the name of the \_\_\_\_\_ **[Insert Name of the Selected Bidder/respective member companies of the Selected Bidder]** and its nominees as the legal and beneficial owner of the Sale Shares, free of all Encumbrances, in the register of members of the Company;
- (iii) Make the necessary endorsements on the Sale Share Certificates, indicating the name of the \_\_\_\_\_ **[Insert Name of the Selected Bidder/respective member companies of the Selected Bidder]** and its nominees as the legal and beneficial owner of the Sale Shares evidenced there under;
- (iv) Return the original Sale Share Certificates, duly endorsed in the name of the \_\_\_\_\_ **[Insert Name of the Selected Bidder/respective member companies of the Selected Bidder]** and its nominees, to the \_\_\_\_\_ **[Insert Name of the Selected Bidder/respective member companies of the Selected Bidder]** and its nominees, as the case may be or its authorised representative;
- (v) Handover all the statutory registers and records, if any, of the Company to the Selected Bidder.
- (vi) Handover certified true copies of the Board resolution passed by the Company as per (i)(a) to (i)(e) of Clause 3.3 (i) to Central Transmission Utility of India Limited.
- 3.4 The Parties to this Agreement agree to take all measures that may be required to ensure that all the events contemplated in the **Clauses 3.1 to 3.3** above on the Closing Date are completed on the same day.
- Notwithstanding the provisions of **Clause 3.3** hereto, all proceedings to be taken and all documents to be executed and delivered by the Parties at the Closing Date shall be deemed to have been taken and executed simultaneously and no proceedings shall be deemed to have been taken nor documents executed or delivered until all have been taken, executed and delivered.
- 3.5 The Selected Bidder hereby acknowledges and agrees that after the date of acquisition of one hundred percent (100%) of the equity shareholding of the Company, by the Selected Bidder as per Clause 3.3, (a) the authority, rights and obligations of the PFCCL/Company in respect of the Bid Process shall forthwith cease and any actions to be taken thereafter regarding the Bid Process will be undertaken by Central Transmission Utility of India Limited themselves or through their any other authorized representative(s), (b) all rights and obligations of the PFCCL/Company shall be of the Selected Bidder and (d) any decisions taken by the PFCCL/Company prior to the date of its acquisition by the Selected Bidder shall continue to be binding on the Selected Bidder. The Parties hereby agree that this provision shall survive the termination of this Agreement.
- 3.6 This agreement shall be effective from the date of its signing by the Parties and shall remain in force until all the obligations of the respective Parties under Clause 3.3 hereto are fulfilled.
-

#### 4. REPRESENTATIONS AND WARRANTIES

4.1 The Selected Bidder hereby represents and warrants to the Shares Seller that:

4.1.1 The Selected Bidder has full legal right, power and authority to enter into, execute and deliver this Agreement and to perform the obligations, undertakings and transactions set forth herein, and this Agreement has been duly and validly executed and delivered by the Selected Bidder and constitutes its legal, valid and binding obligations, enforceable against it in accordance with its terms;

4.1.2 The execution, delivery and performance of this Agreement by the Selected Bidder will not violate or contravene any provision of the Memorandum of Association or Articles of the Selected Bidder, (ii) will not violate or contravene any law, statute, rule, regulation, licensing requirement, order, writ, injunction or decree of any court, governmental instrumentality or other regulatory, governmental or public body, agency or authority by which the Selected Bidder are bound or by which any of its and/or their properties or assets are bound, and (iii) except to the extent that the same have been duly and properly completed or obtained, will not require any filing with, or permit, consent or approval of or license from, or the giving of any notice to, any court, governmental instrumentality or other regulatory, governmental or public body, agency or authority, joint venture party, or any other entity or person whatsoever; and

4.1.3 The Selected Bidder is not restricted in any manner whatsoever, including without limitation, on account of any judicial or governmental order, action or proceeding, or any contractual obligation assumed by the Selected Bidder, from purchasing the Sale Shares from the Shares Seller in the manner provided for in this Agreement.

4.2 The Shares Seller hereby represents and warrants to the Selected Bidder that;

4.2.1 The Shares Seller and the Nominees are the legal and beneficial owners of the Sale Shares, free and clear of any Encumbrance and the delivery to the Selected Bidder of the Sale Shares pursuant to the provisions of this Agreement will transfer to the Selected Bidder a good title to the Sale Shares.

4.2.2 The Shares Seller has full legal right, power and authority to enter into, execute and deliver this Agreement and to perform the obligations, undertakings and transactions set forth herein. The execution, delivery and performance of this Agreement will not violate the Memorandum and Articles of Association of the Shares Seller or contravene any contract by which it is bound.

4.2.3 The Shares Seller has obtained requisite authorizations to sell and transfer the Sale Shares to the Selected Bidder. The Shares Seller also represent that it is not prevented from transferring and selling the Sale Shares. Also, to the best of its knowledge, the Sale Shares are not the subject matter of any claim or pending proceeding or threatened by any legal proceeding made by any third party.

- 4.3 Except as specified in Clause 4.2, above the Shares Seller shall not be deemed to have, made any representation or warranty whatsoever, whether express or implied, in relation to the Sale Shares or Company, including but not limited to any implied warranty or representation as to the business or affairs of the Company.
- 4.4 The Representations and Warranties are given as at the date of this Agreement except that where a Representation and Warranty is expressed to be made as at another date, the Representation and Warranty is given with respect to that date only.
- 4.5 Each Representation and Warranty is to be construed independently of the others and is not limited by reference to any other Warranty. The Representations, Warranties and undertakings contained in this **Clause 4** hereto or in any document delivered pursuant to or in connection with this Agreement are continuing in nature and shall survive the Closing Date for one (1) year.
- 4.6 The Parties represent to each other that all Representations and Warranties provided herein by the respective Party shall be true as of Closing Date.

## 5. OBLIGATIONS OF THE SELECTED BIDDER

The Selected Bidder agrees that the Shares Seller shall not be liable in any manner, nor shall it assume any responsibility or liability whatsoever, in respect of the business of the Company and its operations or activities, arising after Closing Date, to any Person or any authority, central, state, local or municipal or otherwise and the same shall be the sole responsibility of the Selected Bidder.

## 6. MISCELLANEOUS

### 6.1 NOTICES

- a) All notices to be given under this Agreement shall be in writing and in the English language.
- b) All notices must be delivered personally or by registered or speed post or by recognised courier to the addresses below:

<b>Selected Bidder (Lead Member in case of Consortium)</b>	_____ <b>[Insert details of the address for correspondence of the Selected Bidder]</b>
<b>Name of the Holding Company of the SPV</b>	<b>[Insert details of the address for correspondence of the holding Company of the SPV]</b>
<b>Company (Before</b>	_____ <b>[Insert details of the address</b>

<b>Closing Date)</b>	<b>for correspondence of the SPV]</b>
<b>Company (After Closing Date)</b>	_____ <b>[Insert details of the address for correspondence of the Selected Bidder]</b>

- c) Any Party may by notice of at least fifteen (15) days to the other Parties change the address and / or addresses to which such notices and communications to it are to be delivered or mailed.

## 6.2 RESOLUTION OF DISPUTES

- 6.2.1 If any dispute arises between the Parties, in connection with the validity, interpretation, implementation or alleged breach of any provision of this Agreement (“Dispute”), the disputing Parties hereto shall endeavour to settle such Dispute amicably. The attempt to bring about an amicable settlement shall be considered to have failed if not resolved within 60 days from the date of the Dispute.
- 6.2.2 If the Parties are unable to amicably settle the Dispute in accordance with Clause 6.2.1 within the period specified therein, any of the Parties shall be entitled to within 30 days after expiry of the aforesaid period, refer the Dispute to the Company Secretary of PFCCL and Chief Executive/ Managing Director of the Selected Bidder for resolution of the said Dispute. The attempt to bring about such resolution shall be considered to have failed if not resolved within 30 days from the date of receipt of a written notification in this regard.
- 6.2.3 In the event the Dispute is not settled in accordance with Clause 6.2.2 above, any Party to the Dispute shall be entitled to serve a notice invoking this Clause and making a reference to a sole arbitrator. If the Parties to the Dispute cannot agree as to the appointment of the sole arbitrator within 30 days of receipt of the notice of the Party making the reference, then the Shares Seller along with the Company shall appoint one arbitrator and the Selected Bidder shall appoint one arbitrator and the two arbitrators, so appointed shall appoint a third arbitrator. However, after the Closing Date, in such an event the Shares Seller shall appoint one arbitrator and the Selected Bidder along with the Company shall appoint one arbitrator and the two arbitrators, so appointed shall appoint the third arbitrator.
- 6.2.4 The place of the arbitration shall be New Delhi. The Arbitration proceedings shall be governed by the Arbitration and Conciliation Act, 1996.
- 6.2.5 The proceedings of arbitration shall be in English language.

6.2.6 The arbitrator's award shall be substantiated in writing. The arbitrators shall also decide on the costs of the arbitration proceedings. In case the arbitrators have not decided on the costs of the arbitration proceedings, each Party to the Dispute shall bear its own costs, in relation to the arbitration proceedings.

### 6.3 AUTHORISED PERSON

For the purposes of this Agreement, the Selected Bidder is represented by \_\_\_\_\_ [Insert Name of the authorized representative of the Selected Bidder/ Lead Member, in case of Consortium], pursuant to an authorization granted to \_\_\_\_\_ [Insert Name of the authorized representative of the Selected Bidder/Lead Member, in case of Consortium] through necessary Board resolutions. Further, \_\_\_\_\_ [Insert Name of the authorized representative of the Selected Bidder/Lead Member, in case of Consortium] is also authorized by such resolutions to take any decision which may be required to be taken, do all acts and execute all documents which are or may be required by the Selected Bidder for the proper and effective fulfillment of the rights and obligations under this Agreement. Any action taken or document executed by \_\_\_\_\_ [Insert Name of the authorized representative of the Selected Bidder/Lead Member, in case of Consortium] shall be deemed to be acts done or documents executed by the Selected Bidder and shall be binding on the Selected Bidder.

### 6.4 RESERVATION OF RIGHTS

No forbearance, indulgence or relaxation or inaction by any Party at any time to require performance of any of the provisions of this Agreement shall in any way affect, diminish or prejudice the right of such Party to require performance of that provision, and any waiver or acquiescence by any Party of any breach of any of the provisions of this Agreement shall not be construed as a waiver or acquiescence of any continuing or succeeding breach of such provisions, a waiver of any right under or arising out of this Agreement or acquiescence to or recognition of rights other than that expressly stipulated in this Agreement.

### 6.5 CUMULATIVE RIGHTS

All remedies of either Party under this Agreement whether provided herein or conferred by statute, civil law, common law, custom or trade usage, are cumulative and not alternative and may be enforced successively or concurrently.

### 6.6 PARTIAL INVALIDITY

If any provision of this Agreement or the application thereof to any person or circumstance shall be invalid or unenforceable to any extent, the remainder of this

Agreement and the application of such provision to persons or circumstances other than those as to which it is held invalid or unenforceable shall not be affected thereby, and each provision of this Agreement shall be valid and enforceable to the fullest extent permitted by law. Any invalid or unenforceable provision of this Agreement shall be replaced with a provision, which is valid and enforceable and most nearly reflects the original intent of the unenforceable provision.

#### 6.7 TERMINATION

If (i) the Closing does not occur on the Closing Date for any reason whatsoever, or (ii) the Letter of Intent is withdrawn or terminated for any reason, or (iii) due to termination of the TSA by Central Transmission Utility of India Limited in accordance with Article 3.3.2 or Article 13 of the TSA thereof, PFCCL shall have a right to terminate this Agreement forthwith by giving a written notice to the other Parties hereto.

#### 6.8 AMENDMENTS

No modification or amendment of this Agreement and no waiver of any of the terms or conditions hereof shall be valid or binding unless made in writing and duly executed by all the Parties.

#### 6.9 ASSIGNMENT

This Agreement and the rights and liabilities hereunder shall bind and inure to the benefit of the respective successors of the Parties hereto, but no Party hereto shall assign or transfer its rights and liabilities hereunder to any other Person without the prior written consent of the other Parties, which will not be unreasonably withheld.

#### 6.10 ENTIRE AGREEMENT

This Agreement constitutes the entire Agreement between the Parties with respect to the subject matter herein and supersedes and cancels any prior oral or written agreement, representation, understanding, arrangement, communication or expression of intent relating to the subject matter of this Agreement.

#### 6.11 COSTS

Each of the Parties hereto shall pay their own costs and expenses relating to the negotiation, preparation and execution of this Agreement and the transactions contemplated by this Agreement.

The Selected Bidder shall be liable to bear and pay the stamp duty and other costs in respect of this Agreement and the Share Transfer Forms.

#### 6.12 RELATIONSHIP

None of the provisions of this Agreement shall be deemed to constitute a partnership between the Parties hereto and no Party shall have any authority to bind the other Party otherwise than under this Agreement or shall be deemed to be the agent of the other in any way.

#### 6.13 GOVERNING LAW AND JURISDICTION

This Agreement shall be governed by and construed in accordance with the laws of India and shall be subject to the exclusive jurisdiction of the courts of Delhi.

#### 6.14 COUNTERPARTS

This Agreement may be executed in counterparts by the Parties and each fully executed counterpart shall be deemed to be original.

#### 6.15 CONFIDENTIALITY

The Parties undertake to hold in confidence and not to disclose the terms and conditions of the transaction contemplated hereby to third parties, except:

- (a) to their professional advisors;
- (b) to their officers, employees, agents or representatives, who need to have access to such information for the proper performance of their activities;
- (c) disclosures required under Law;

without the prior written consent of the other Parties.

Provided that Central Transmission Utility of India Limited and PFCL may at any time, disclose the terms and conditions of transactions contemplated hereby to any person, to the extent stipulated under the law or the Bidding Guidelines.

#### 6.16 INDEMNIFICATION

- The Parties hereby agree that transfer of Sale Shares to the Selected Bidder shall vest all the rights, privileges, licenses, responsibilities, liabilities and other obligations pertaining to the Company in the Selected Bidder.
- The Selected Bidder hereby agrees that the Selected Bidder shall not be entitled to any claims or initiate any legal proceedings, by itself or through the Transmission Service Provider against the Share Sellers, its directors, officers, employees and the subscribers including the members of any committees appointed by them in respect of any actions or decisions taken by any of them up to the Closing Date in furtherance of the Project referred to in recital A of this Agreement.

- Further, the Selected Bidder hereby indemnifies and holds harmless at all times the Share Seller against all losses, damages, charges, and expenses which the Share Seller may sustain or incur towards contractual obligations with respect to the contracts awarded by the Share Seller or any other liability arising with regard to any action/ activity undertaken by the Share Seller for and on behalf of the Company in furtherance of the Project referred to above or otherwise concerning the Company. All such actions shall be defended by the Selected Bidder either itself or through the TSP at its own cost.
- The Parties hereby agree that the provisions of this clause shall survive the termination of this Agreement.

**IN WITNESS WHEREOF, THE PARTIES HERETO HAVE CAUSED THIS AGREEMENT TO BE DULY EXECUTED AND DELIVERED AS OF THE DAY AND YEAR FIRST ABOVE WRITTEN**

SIGNED AND DELIVERED  
BY THE WITHIN NAMED "PFCL"  
**PPC Consulting Limited**

BY THE HAND OF \_\_\_\_\_ [Insert Name, Signature and Designation of the Authorized Signatory]

PURSUANT TO THE RESOLUTION PASSED BY THE BOARD OF DIRECTORS ON \_\_\_\_\_ [Insert Date of the Board Resolution]

ON THE \_\_\_\_\_ DAY OF \_\_\_\_\_, \_\_\_\_\_ [Insert the date of the signing of this Agreement in Day, Month and Year respectively].

IN THE PRESENCE OF:  
WITNESS:  
NAME, SIGNATURE, DESIGNATION AND ADDRESS:

SIGNED AND DELIVERED  
BY THE WITHIN NAMED "Company"  
\_\_\_\_\_ [Insert Name and designation of the SPV]

BY THE HAND OF \_\_\_\_\_ [Insert Name, Signature and Designation of the Authorized Signatory of the Company]

PURSUANT TO THE  
RESOLUTION PASSED BY THE BOARD  
OF DIRECTORS ON \_\_\_\_\_ [Insert Date of the Board Resolution]

ON THE \_\_\_\_\_ DAY OF \_\_\_\_\_, \_\_\_\_\_ [Insert the date of the signing of this Agreement in Day, Month and Year respectively].

IN THE PRESENCE OF:  
WITNESS:  
NAME, SIGNATURE, DESIGNATION AND ADDRESS:

SIGNED AND DELIVERED

BY THE WITHIN NAMED "**Selected Bidder**"

\_\_\_\_\_ [Insert Name and designation of the Selected Bidder]

BY THE HAND OF \_\_\_\_\_ [Insert Name, Signature and Designation of the Authorized Signatory of the Selected Bidder]

PURSUANT TO THE

RESOLUTION PASSED BY THE BOARD

OF DIRECTORS ON \_\_\_\_\_ [Insert Date of the Board Resolution]

ON THE \_\_\_\_\_ DAY OF \_\_\_\_\_, \_\_\_\_\_ [Insert the date of the signing of this Agreement in Day, Month and Year respectively].

IN THE PRESENCE OF:

WITNESS:

NAME, SIGNATURE, DESIGNATION AND ADDRESS:

**OR (In case the Selected Bidder is a Bidding Consortium)**

SIGNED AND DELIVERED

BY THE WITHIN NAMED "**Partner 1**"

\_\_\_\_\_ [Insert Name and designation of Partner 1]

BY THE HAND OF \_\_\_\_\_ [Insert Name, Signature and Designation of the Authorized Signatory of the Partner 1]

PURSUANT TO THE

RESOLUTION PASSED BY THE BOARD

OF DIRECTORS ON \_\_\_\_\_ [Insert Date of the Board Resolution]

ON THE \_\_\_\_\_ DAY OF \_\_\_\_\_, \_\_\_\_\_ [Insert the date of the signing of this Agreement in Day, Month and Year respectively].

IN THE PRESENCE OF:

WITNESS:

NAME, SIGNATURE, DESIGNATION AND ADDRESS:

SIGNED AND DELIVERED

BY THE WITHIN NAMED "**Partner 2**"

\_\_\_\_\_ [Insert Name and designation of Partner 2]

BY THE HAND OF \_\_\_\_\_ [Insert Name, Signature and Designation of the Authorized Signatory of the Partner 1]

PURSUANT TO THE  
RESOLUTION PASSED BY THE BOARD  
OF DIRECTORS ON \_\_\_\_\_ [Insert Date of the Board Resolution]

ON THE \_\_\_\_\_ DAY OF \_\_\_\_\_, \_\_\_\_\_ [Insert the date of the signing of this Agreement in  
Day, Month and Year respectively].

IN THE PRESENCE OF:  
WITNESS:

NAME, SIGNATURE, DESIGNATION AND ADDRESS:

SIGNED AND DELIVERED  
BY THE WITHIN NAMED "**Partner 3**"  
\_\_\_\_\_ [Insert Name and designation of Partner 3]

BY THE HAND OF \_\_\_\_\_ [Insert Name, Signature and Designation of  
the Authorized Signatory of the Partner 1]

PURSUANT TO THE  
RESOLUTION PASSED BY THE BOARD  
OF DIRECTORS ON \_\_\_\_\_ [Insert Date of the Board Resolution]

ON THE \_\_\_\_\_ DAY OF \_\_\_\_\_, \_\_\_\_\_ [Insert the date of the signing of this Agreement in  
Day, Month and Year respectively].

IN THE PRESENCE OF:  
WITNESS:

NAME, SIGNATURE, DESIGNATION AND ADDRESS:

**ANNEXURE A****DESCRIPTION OF THE SALE SHARES**

<b>S. NO.</b>	<b>NAME OF THE SHAREHOLDER</b>	<b>NUMBER OF EQUITY SHARES HELD</b>	<b>PERCENTAGE OF THE TOTAL PAID UP EQUITY CAPITAL</b>
1.	PFC Consulting Limited		%
2.	[Insert Name of Nominee]		%
3.	[Insert Name of Nominee]		%
4.	[Insert Name of Nominee]		%
5.	[Insert Name of Nominee]		%
6.	[Insert Name of Nominee]		%
7.	[Insert Name of Nominee]		%
8.	[Insert Name of Nominee]		%
	<b>Total</b>		<b>100%</b>



पीएफसी कंसल्टिंग लिमिटेड  
(पावर फाइनेंस कॉर्पोरेशन लिमिटेड की पूर्णतःस्वामित्वाधीन सहायक कम्पनी)  
**PFC CONSULTING LIMITED**  
(A wholly owned subsidiary of Power Finance Corporation Limited)  
CIN U74140DL2008GOI175858

ORIGINAL FOR RECIPIENT

## TAX INVOICE

No. MISC/22-23/44

Date : March 24, 2023

Assignment: ITP60 - Transmission system for evacuation of power from Rajasthan REZ Ph-IV  
(Part-1) (Bikaner Complex)- Part-C

Reference: Gazette Notification - Ministry of Power dated January 13, 2023

HSN Code: 998399

Details of Provider		Details of Recipient	
GSTIN:	07AAECP6182F1ZC	Kind Attention:	The Tata Power Company Limited
PAN:	AAECP6182F	Name of the Recipient:	The Tata Power Company Limited
State:	Delhi	Address:	Corporate Center 'A' Block, 34, Sant Tukaram Road, Carnac Bunder, Mumbai, Maharashtra - 400009
Code:	7	GSTIN/UID:	27AAACT0054A1Z1
Date of Supply:	16.03.2023	PAN:	AAACT0054A
Place of Supply:	Maharashtra	State:	Maharashtra
		Code:	27
IRN:	258d39177fc335b9f2c1cc5b2082e8f030f3bceb3c681f67dcf2dad76359eab		

Reverse Charge: Not Applicable  
Mode of Payment : DD/Cheque/RTGS  
Bank Details: ICICI Bank  
A/C No. 000705036117  
IFSC Code: ICIC0000007  
9A, Phelps Building, Connaught Place,  
New Delhi-110001

Description of Supply/Services	Taxable Amount
Sale of RFP Documents	Rs.5,00,000/-
Fee Payable	Rs.5,00,000/-
Add: IGST 18%	Rs.90,000/-
<b>Total Amount Payable</b>	<b>Rs.5,90,000/-</b>
<b>Rupees Five Lakh Ninety Thousand Only</b>	

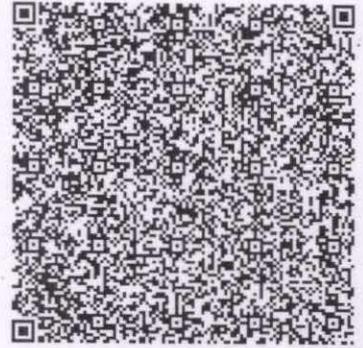
For PFC CONSULTING LTD.

V.N.D. MANAVALAN  
(Authorised Signatory)

Note: e-invoice w.r.t. IRN is enclosed

पंजीकृत कार्यालय : प्रथम तल "ऊर्जानिधि", 1, बाराखम्बा लेन, कनॉट प्लेस, नई दिल्ली-110001  
Regd. Office : First Floor, "Urjanidhi", 1, Barakhamba Lane, Connaught Place, New Delhi-110001  
कंपनी मुख्यालय: नौवाँ तल (ए विंग) स्टेट्समैन हाउस, कनॉट प्लेस, नई दिल्ली-110001 दूरभाष : 011-23443900 फ़ैक्स : 011-23443990  
Corporate Office : 9th Floor (A Wing) Statesman House, Connaught Place, New Delhi-110001 Phone : 011-23443900 Fax : 011-23443990  
ई-मेल/E-mail : pfcconsulting@pfcindia.com वैबसाईट/Website : www.pfcclindia.com

07AAECP6182F1ZC  
PFC CONSULTING LTD



## 1.e-Invoice Details

IRN : 258d39177fc335b9f2c1cc5b2082e8f030 Ack No. : 172312531392854  
f3bceb3c681f67dcf2dad76359eab

Ack Date : 24-03-2023 15:45:00

## 2.Transaction Details

Supply type Code : B2B

Document No. : MISC/22-23/44

IGST applicable despite Supplier and  
Recipient located in same State : No

Place of Supply : MAHARASHTRA

Document Type : Tax Invoice

Document Date : 24-03-2023

## 3.Party Details

Supplier :

GSTIN : 07AAECP6182F1ZC

PFC CONSULTING LTD

FIRST FLOOR, URJA NIDHI, 1 BARAKHAMBA ROAD, CONNAUGHT  
PLACE

NEW DELHI 110001 DELHI

Recipient :

GSTIN : 27AAACT0054A1Z1

The Tata Power Co. Ltd.

5th Floor, 34, Corporate Centre, B Wing, Sant Tukaram Road, Carnac  
Bunder

Mumbai City Place of Supply: MAHARASHTRA

400009 MAHARASHTRA

## 4.Details of Goods / Services

SINo	Item Description	HSN Code	Quantity	Unit	Unit Price(Rs)	Discount(Rs)	Taxable Amount(Rs)	Tax Rate(GST + Cess   State Cess + Cess Non.Advol)	Other charges	Total
1	Sale of RfP Document- ITP60	998399	1	OTH	500000	0	500000	18.00 + 0.00   0.00 + 0	0	590000

Tax'ble Amt	CGST Amt	SGST Amt	IGST Amt	CESS Amt	State CESS	Discount	Other Charges	Round off Amt	Tot Inv. Amt
500000.00	0.00	0.00	90000.00	0.00	0.00	0.00	0.00	0.00	590000.00

Generated By : 07AAECP6182F1ZC

Print Date : 24-03-2023 15:44:58



172312531392854

eSign

Digitally Signed by NIC-IRP

on : 2023-03-24 15:45:00



## पीएफसी कंसल्टिंग लिमिटेड

(पावर फाइनेंस कॉर्पोरेशन लिमिटेड की पूर्णतःस्वामित्वाधीन सहायक कम्पनी)  
**PFC CONSULTING LIMITED**  
 (A wholly owned subsidiary of Power Finance Corporation Limited)  
 CIN U74140DL2008GOI175858

Ref. No.: 04/22-23/ITP-60/Survey Report

May 04, 2023

To,  
 Mr. Nitin Kumar  
 Sr. Business Development Manager (T&D)  
 The Tata Power Company Limited,  
 Shatabdi Bhawan, B-12 & 13, Sector 4,  
 Noida, UP-201301

E-mail: nitin.kumar@tatapower.com

**Subject: Independent Transmission Project "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C" – Regarding Survey Report.**

Dear Sir,

This has reference to the RFP Documents issued for the subject project on March 02, 2023.

In line with the requirement of Clause 1.6.2.1 (1) of the RFP document, the survey report for the Project is enclosed herewith.

Further, Bidders in their own interest should carry out required surveys and field investigation for submission of their Bid. Failure to investigate, examine and to inspect site or subsurface conditions fully shall not be grounds for a Bidder to alter its Bid after the Bid Deadline nor shall it relieve a Bidder from any responsibility for appropriately eliminating the difficulty or costs of successfully completing the Project.

It is to mention that the Survey Report has been prepared in good faith, and on best endeavor basis. Neither BPC& Nodal Agency nor their employees or advisors/consultants make any representation or warranty, express or implied, or accept any responsibility or liability, whatsoever, in respect of any statements or omissions made in the Survey Report, or the accuracy, completeness or reliability of information contained therein, and shall incur no liability under any law, statute, rules or regulations as to the accuracy, reliability or completeness of such Survey Report, even if any loss or damage is caused to the Bidders by any act or omission on their part.

Thanking you,

Yours faithfully

(Sanjay Nayak)

General Manager

Encl.: As above



## Table of Contents

Sr. No.	Description
1.	Introduction
2.	Scope of Work
3.	Approach & Methodology
4.	Geographic Information
<b>SECTION: 1</b>	
5	<b>Bikaner-III - Neemrana-II 765 kV D/C line (2<sup>nd</sup>)</b>
5.1	Coordinates of Both End
5.2	Index Map of SOI Toposheet
5.3	Coordinates of Proposed Route
5.4	Summary of Proposed Route
5.5	Wind Zone Map
5.6	Result & Conclusions
5.7	Route Alignment Map on Digitized Toposheet

## **CHAPTER-1**

### **INTRODUCTION**

## 1.0 INTRODUCTION

Development of any country especially of any developing country depends solely on its power generation and proper distribution. The demand of power supply in proper way increases rapidly due to industrial demand and development of the area as a whole. India is developing fast and the demand - supply ratio of power distribution is unable to keep pace with the rapid industrial growth. Due to heavy urbanization and industrial demand the impact on power distribution has become an essential necessity of the day. Power generation, transmission and distribution is a long drawn process, which is being carried out essential by both the Govt.& Private sector organization.

In order to execute such magnitude of transmission system, which is of much higher order than those totally implemented in last 5 decades, precise planning, costing, scheduling etc, would be required. Optimum deployment of resources also would be of prime targets in implementing this transmission system. As transmission line have to traverse the length and breadth of country, for evacuation of power from generating stations to load centers and beneficiary states, the topographical & geographical nature of the terrains play significant influence in the project's cost and implementation time.

Hence, it is essential that at the planning stage itself that various alternative routes and technical solution for transmission line be examined in detail. For undertaking such studies, one of the major requirements is obtaining adequate information regarding the site location and identifies, subsequently, during implementation of the projects, it is required to obtain elaborate details about terrain, soil condition, constraints etc. of the route for proper resources planning, costing etc.as well as reducing the implementation time.

Presently, conventional methods of survey like walk over survey, preliminary survey and detailed survey are carried out at various stages from conceptualization of the projects to implementation, which are time consuming task. Presently, there are new means available to conduct survey using remote sensing, PS based survey etc.

M/s. Prasad Surveyors has been awarded by M/s PFC Consulting Limited to study and execute the survey of one suggested route, taking all logistic precaution and use most modern survey Techniques to survey the feasible routes and suggest the logically viable routes to erect the power line for distribution of power system.

## **CHAPTER-2**

### **SCOPE OF WORK**

## 2.0 SCOPE OF WORK

S. No.	Scope of the Transmission Scheme
1.	Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end <ul style="list-style-type: none"> <li>• 765 kV, 330 MVAR Switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• 765 kV, 330 MVAR Switchable line reactors at Neemrana-II – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Neemrana-II S/s – 2 nos.</li> </ul>
2.	2 no. of 765 kV line bays each at Bikaner-III PS & Neemrana-II S/S 765kV line bays - 4 nos. (2 nos. each at Bikaner-III PS & Neemrana-II S/S)

2.1 Identification of Tentative Routes: The route sighting and selection process began with an inventory of existing and planned land use. Proposed route corridors were identified largely by maximizing linear sighting opportunities, such as following existing roadways and power line corridors, negotiation with river, railway, road, electric power line and telephone line crossings and least crossing of notified forest area. All efforts have been made to provide minimum numbers of angle points and almost care have been taken to select the possible places for all angle points. The angle points have been fixed up on the ground with minimum possible angle of deviation. Rivers are mainly crossed with right angles and a minimum span. Crossings are located on high bank and are out of the maximum flood level. Similarly, power line crossings have been fixed as close as possible to the right angle but not less than the 60 deg. crossing.

Overall, the identified route minimize impacts to existing habitations, follow existing and planned roadways and achieves the goal of a more reliable and effective electrical system.

## 2.2 Selection Criteria for Transmission Line Route

- The alignment of the transmission line should be most economical from the point of view of construction and maintenance.
- The alignment of the transmission line selected should be the shortest possible one.
- Routing of transmission line through protected/reserved forest area should be avoided. In case it is not possible to avoid the forests or areas having large trees completely, and then keeping in view of the overall economy, the route should be aligned in such a way that cutting of trees is minimums.
- The route should have minimum crossings of Major rivers, Railway lines, National/State highways, overhead EHV power line and communication lines.
- The number of angle points shall be kept to a minimum.
- Marshy and low lying areas, river beds and earth slip zones shall be avoided to minimize risk to the foundations.
- It would be preferable to utilize level ground for the alignment.

- Crossing of power lines shall be minimums. Alignment will be kept at a minimum distance of 300 m from power lines to avoid induction problems on the lower voltage lines.
- Crossing of communication line shall be minimized and it shall be preferably at right angle. Proximity and parallelism with telecom lines shall be eliminated to avoid danger of induction to them.
- Areas subjected to flooding such as nalla shall be avoided.
- Restricted areas such as civil and military airfield shall be avoided. Care shall also be taken to avoid aircraft landing approaches.
- All alignment should be easily accessible both in dry and rainy seasons to enable maintenance throughout the year.
- Certain areas such as quarry sites, tea, tobacco and saffron fields and rich plantations, gardens & nurseries which will present the Owner problems in acquisition of right of way and way leave clearance during construction and maintenance should be avoided.
- Angle points should be selected such that shifting of the point within 100 m radius is possible at the time of construction of the line.
- The line routing should avoid large habitations, densely populated areas, Forest, Animal/Bird sanctuary, reserve coal belt areas, oil pipe line/underground inflammable pipe lines etc. to the extent possible.
- The areas requiring special foundations and those prone to flooding should be avoided.

## **CHAPTER-3**

# **APPROACH & METHODOLOGY**

## 3.0 METHODOLOGY

### 3.1 Data Collection & Digitization of Maps

Survey of India TOPO sheets on 1:50,000 scale. All the Survey of India TOPO sheets were geo-referenced with respect to Latitude Longitude of TOPO sheets under following projection system to keep uniformity with respect to GPS co-ordinates:

- Projection : UTM
- Spheroid : WGS84
- Datum : WGS84
- Zone : 43
- North or South : North

These were used to update the base map features extracted from TOPO sheets. The features extracted from SOI TOPO sheets.

- City and village sprawl
- Contours
- Spot Heights and Bench Marks
- Railway lines (MG/BG)
- Metalled Roads (National/State Highways),
- Major Rivers (width > 500 m)
- Canals
- Nallah/Drain crossings
- Forest (Reserved/Protected)
- Protected areas (Cantonments, Air fields)
- Main power lines (EHV) and other electrical power lines
- Telephone lines
- Angle points
- Lakes, Reservoirs and Ponds
- Swamp

## **CHAPTER-4**

# **GEOGRAPHICAL INFORMATION**

## 4.0 GEOGRAPHICAL INFORMATION

### **Bikaner**

Bikaner is a city in the northwest of the state of Rajasthan, India. It is located 330 kilometres (205 mi) northwest of the state capital, Jaipur. Bikaner city is the administrative headquarters of Bikaner District and Bikaner division. The Collector and District Magistrate of Bikaner is Sh. Bhagwati Prasad Kalal,[5] and the Superintendent of Police is TejaswiniGautam IPS.

Formerly the capital of the princely state of Bikaner, the city was founded by Rao Bika in 1488 CE and from its small origins it has developed into the fourth largest city in Rajasthan. The Ganges Canal, completed in 1928, and the Indira Gandhi Canal, completed in 1987, facilitated its development

### **Climate**

Bikaner is situated in the middle of the Thar desert and has a hot desert climate (Köppen climate classification BWh) with very little rainfall and extreme temperatures. In summer temperatures can exceed 48 °C, and during the winter they may dip below freezing.

The climate in Bikaner is characterized by significant variations in temperature. In the summer season it is very hot when the temperatures lie in the range of 28–53.5 °C (82.4–128.3 °F). In the winter, it is fairly cold with temperatures lying in the range of −4–23.2 °C (24.8–73.8 °F). Annual rainfall is in the range of 260–440 millimetres (10–17 in). The highest ever temperature recorded is 49.5 °C (121.1 °F) on 19 May 2016 and lowest ever recorded is −4.0 °C (24.8 °F) on 26 January 1964.

### **Transport**

Bikaner railway station is a major railway junction in the North Western Railway zone of Indian Railways. The first railway link to Bikaner was established on 9 December 1891 as part of Jodhpur State Railway[23] and it has undergone many administrative modifications since then.

Today Bikaner Railway Station is efficiently well connected to National Capital Delhi and Rajasthan State's capital Jaipur along with major Indian cities like Jodhpur, Sri Ganganagar, Rewari, Howrah, Kolkata, Mumbai, Kanpur, Agra, Allahabad, Surat, Ahmedabad, Vadodara, Pathankot, Bhatinda, Amritsar, Haridwar, Jammu, Chandigarh, Pune, Hisar, Bengaluru, Chennai, Hyderabad, Guwahati, Puri, Madurai, Coimbatore, Thiruvananthapuram, Bhubaneswar, Bilaspur, Indore, Jalandhar, Baroda, Ratangarh, Jaisalmer, Barmer, Alwar, Nagaur, etc.

Bikaner is well served with roads and is linked directly to Delhi, Jaipur, Agra, Sri Ganganagar, Jodhpur, Alwar, Rewari, Narnaul, Ludhiana, Bhatinda, Ambala, Panipat, Surat, Ahmedabad, Ajmer, Haridwar, Jaisalmer, Bhilwara, Churu, Sikar and many other cities.

Central Bus Stand is the main bus station in Bikaner. It connects Bikaner to other cities in Rajasthan and nearby states via road.

Bikaner has Domestic Civil Airport Nal Airport which is located 15 km west of the city. Regular flights to Jaipur JAI and Delhi DEL commenced in 2017-18 under UDAN scheme of NarendraModi Govt.

### **Neemrana**

Neemrana is an ancient historical town in Alwar district of Rajasthan, India, 66 km (41 mi) from Alwar city, 122 km (76 mi) from New Delhi and 150 km (93 mi) from Jaipur on the Delhi-Jaipur highway in Neemrana tehsil. It is between Behror and Shahajahanpur. Neemrana is an industrial hub.[citation needed]It is the site of a 15th-century hill-fort occupied by Chauhans till 1947. The erstwhile ruling family is considered to be of the direct lineage of Prithviraj Chauhan. Some distance from Neemrana is another fort, Kesroli in Alwar district that is one of the oldest heritage sites. Historians trace it to the MatsyaJanapada of the Mahabharata times. In Kesroli one gets to see the oldest remains of Buddhist Vihara at Viratnagar where the Pandavas spent the last year of their exile incognito; Pandupole, with the only reclining statue of Hanuman; the samadhi of the ruler saint Bhartrihari.

### **Industry**

The Rajasthan government, through Rajasthan Industrial Cooperation RIICO, has developed industrial zones in various stages in Neemrana in Alwar district in the past several years. Apart from the usual industrial areas, the Export Promotion Industrial Park (EPIP) and the Japanese Industrial Zone in Majra Kath are particularly noteworthy. Companies from India and abroad have set up their units in these industrial areas and many more new industries are arriving, creating new employment opportunities. The Japanese industrial zone developed by RIICO is an extension of a previously existing industrial zone. The Korean Zone is also coming up the silver wood township.

**SECTION: 1****CHAPTER-5****BIKANER-III TO NEEMRANA-II 765KV D/C LINE**

**CHAPTER-5.1****COORDINATES OF BOTH ENDS**

Details of the existing substation

## 1. Bikaner-III S/S

Latitude	28° 21' 58.6301" N
Longitude	73° 11' 26.5401" E

## 2. Neemrana -II S/S

Latitude	27° 49' 33.3798" N
Longitude	76° 09' 16.5315" E

**Note:- Bidders may note that the coordinates provided in the Survey Report are to facilitate the Bidders to locate the Sub Station/Switchyard and this coordinates should not be consider as the point of termination/emanation of transmission line. The TSP shall coordinate with the agency providing inter Connection facility for exact point of termination /emanation of transmission line.**

**CHAPTER-5.2****INDEX MAP SOI TOPOSHEETS**

TOPOINDEX

**CHAPTER-5.3**

**CO-ORDINATE OF PROPOSED ROUTE**

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-01	322694	3139109	28° 21' 58.6301" N	73° 11' 26.5401" E		0	0°00'00"	<b>Bikaner -III S/S</b>
					432			
AP-02	323125	3139118	28° 21' 59.1301" N	73° 11' 42.3602" E		432	3°0'41.8"	
					661			
AP-03	323784	3139167	28° 22' 1.0304" N	73° 12' 6.5302" E		1092	4°17'11.1"	
					918			
AP-04	324692	3139303	28° 22' 5.8802" N	73° 12' 39.7901" E		2010	13°54'28.9"	
					4874			
AP-05	329544	3138844	28° 21' 53.2910" N	73° 15' 38.2167" E		6884	2°45'19.1"	
					1684			
AP-06	331226	3138766	28° 21' 51.5526" N	73° 16' 40.0244" E		8568	32°34'27.5"	
					221			
AP-07	331407	3138639	28° 21' 47.4958" N	73° 16' 46.7226" E		8789	25°13'19.4"	
					4854			
AP-08	336187	3137796	28° 21' 22.3122" N	73° 19' 42.6906" E		13643	1°37'48.8"	
					2197			
AP-09	338361	3137477	28° 21' 12.9022" N	73° 21' 02.6590" E		15839	26°10'17.3"	
					1356			
AP-10	339652	3137891	28° 21' 26.9453" N	73° 21' 49.8683" E		17196	7°42'22.9"	
					1573			
AP-11	341072	3138569	28° 21' 49.5785" N	73° 22' 41.6709" E		18769	33°55'46.7"	
					212			
AP-12	341179	3138752	28° 21' 55.5548" N	73° 22' 45.5384" E		18981	32°3'4.5"	
					432			
AP-13	341563	3138950	28° 22' 02.1741" N	73° 22' 59.5188" E		19413	19°50'32.7"	
					2039			

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-14	343584	3139218	28° 22' 11.7477" N	73° 24' 13.6078" E		21451	2°34'40.8"	
					3453			
AP-15	346983	3139825	28° 22' 32.9171" N	73° 26' 18.1736" E		24905	9°41'44.5"	
					2628			
AP-16	349611	3139845	28° 22' 34.6547" N	73° 27' 54.6719" E		27532	1°47'2.2"	
					7056			
AP-17	356661	3140117	28° 22' 46.3591" N	73° 32' 13.5158" E		34588	38°4'4.5"	
					209			NH-62 SURATGARH TO BIKANER ROAD KM NO.47,48
AP-18	356831	3139995	28° 22' 42.4412" N	73° 32' 19.8054" E		34797	39°44'18.1"	
					618			
AP-19	357448	3140037	28° 22' 44.0442" N	73° 32' 42.4420" E		35416	26°26'0.3"	
					228			132KV S/C LINE TOWER NO.156,157
AP-20	357658	3139949	28° 22' 41.2867" N	73° 32' 50.2144" E		35644	39°50'27.4"	
					1549			
AP-21	359137	3140410	28° 22' 56.8156" N	73° 33' 44.3209" E		37192	17°59'58.1"	
					226			400KV D/C SUR TO BKN ROAD LINE (RVPNL) TOWER NO.253,254
AP-22	359363	3140407	28° 22' 56.8125" N	73° 33' 52.6366" E		37418	13°35'35.6"	
					1300			
AP-23	360631	3140697	28° 23' 06.7211" N	73° 34' 39.0713" E		38719	25°45'46.3"	
					2811			
AP-24	362826	3142453	28° 24' 04.5962" N	73° 35' 58.9758" E		41530	33°22'24.7"	
					216			
AP-25	363041	3142472	28° 24' 05.3211" N	73° 36' 06.8535" E		41746	31°16'41.3"	
					1981			

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-26	364633	3143652	28° 24' 44.2530" N	73° 37' 04.8320" E		43727	14°52'46.6"	
					1850			
AP-27	366352	3144336	28° 25' 07.0881" N	73° 38' 07.7225" E		45577	24°58'48"	
					225			
AP-28	366576	3144323	28° 25' 06.7494" N	73° 38' 15.9790" E		45802	10°34'39.1"	
					1681			
AP-29	368244	3144535	28° 25' 14.2703" N	73° 39' 17.1630" E		47483	9°21'7.3"	
					220			RAILWAY LINE , SINGLE TRCK, BROAD GAIDGE, ELECTRIFIED, SURATGARH TO BIKANER SECTION KM NO.256,257
AP-30	368464	3144527	28° 25' 14.0906" N	73° 39' 25.2412" E		47703	8°40'51.7"	
					2831			
AP-31	371245	3143999	28° 24' 57.9143" N	73° 41' 07.6594" E		50534	1°21'53.3"	
					4610			
AP-32	375752	3143030	28° 24' 28.0203" N	73° 43' 53.6721" E		55144	20°2'26.9"	
					217			220KV S/C LINE
AP-33	375936	3142915	28° 24' 24.3272" N	73° 44' 00.4711" E		55361	6°58'31.9"	
					404			
AP-34	376249	3142660	28° 24' 16.1553" N	73° 44' 12.0732" E		55765	13°26'0.5"	
					208			400KV S/C STP TO BKN LINE ( RVPNL) TOWER NO.264,265
AP-35	376437	3142569	28° 24' 13.2819" N	73° 44' 19.0077" E		55973	20°25'15.7"	
					1608			
AP-36	378039	3142421	28° 24' 09.0070" N	73° 45' 17.9135" E		57582	29°53'52.6"	
					240			765KV D/C BIKNER TO MOGA LINE TOWER NO.122,123

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-37	378235	3142283	28° 24' 04.5751" N	73° 45' 25.1806" E		57822	3°38'50.6"	
					669			
AP-38	378805	3141933	28° 23' 53.4009" N	73° 45' 46.2546" E		58491	6°12'30.1"	
					228			754A- BIKANER TO AMRITSAR EXPRESSWAY KM NO- 376,377
AP-39	379011	3141836	28° 23' 50.3062" N	73° 45' 53.8489" E		58718	21°57'1.1"	
					943			
AP-40	379650	3141143	28° 23' 28.0135" N	73° 46' 17.6097" E		59661	16°3'35.3"	
					4857			
AP-41	383804	3138625	28° 22' 07.5661" N	73° 48' 51.1299" E		64519	6°38'22.5"	
					3711			
AP-42	387179	3137081	28° 21' 18.4715" N	73° 50' 55.6360" E		68230	3°27'45.7"	
					4607			
AP-43	391245	3134916	28° 20' 09.3394" N	73° 53' 25.6989" E		72837	31°48'0.1"	
					232			SH-93 KALU TO DUNGARGARH ROAD
AP-44	391476	3134931	28° 20' 09.9015" N	73° 53' 34.1840" E		73068	27°53'58.8"	
					2083			
AP-45	393377	3134079	28° 19' 42.7749" N	73° 54' 44.2821" E		75152	12°44'46.6"	
					7402			
AP-46	400633	3132616	28° 18' 57.3022" N	73° 59' 11.1628" E		82553	8°30'49.4"	
					3860			
AP-47	404488	3132422	28° 18' 52.0230" N	74° 01' 32.7733" E		86414	2°51'14.5"	
					8206			
AP-48	412694	3132417	28° 18' 53.9430" N	74° 06' 34.0675" E		94619	4°39'35"	
					5221			
AP-49	417898	3131991	28° 18' 41.2826" N	74° 09' 45.2444" E		99841	12°24'7"	

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					1913			
AP-50	419726	3131428	28° 18' 23.4241" N	74° 10' 52.5105" E		101753	10°26'19.5"	
					1872			
AP-51	421386	3130563	28° 17' 55.6729" N	74° 11' 53.6633" E		103625	30°49'46.4"	
					3929			
AP-52	425308	3130789	28° 18' 03.8451" N	74° 14' 17.6120" E		107554	22°29'14.1"	
					1696			
AP-53	426910	3130232	28° 17' 46.0586" N	74° 15' 16.5398" E		109250	25°12'2.5"	
					1606			
AP-54	428507	3130400	28° 17' 51.8406" N	74° 16' 15.1265" E		110856	4°3'2.5"	
					1281			
AP-55	429787	3130444	28° 17' 53.5141" N	74° 17' 02.1051" E		112136	10°11'27.8"	
					837			
AP-56	430605	3130620	28° 17' 59.3932" N	74° 17' 32.0898" E		112973	8°14'39"	
					974			
AP-57	431577	3130687	28° 18' 01.7354" N	74° 18' 07.7651" E		113947	14°23'38.5"	
					1061			
AP-58	432584	3131020	28° 18' 12.7542" N	74° 18' 44.6915" E		115009	3°33'49.6"	
					1925			
AP-59	434446	3131510	28° 18' 29.0054" N	74° 19' 52.9306" E		116933	6°21'40.6"	
					547			
AP-60	434987	3131589	28° 18' 31.6925" N	74° 20' 12.7866" E		117480	28°26'28"	
					240			SH-6 SARDAR SHAHAR TO DUNGARGARH ROAD KM NO. 113,114
AP-61	435212	3131507	28° 18' 29.0571" N	74° 20' 21.0809" E		117720	16°49'0.2"	
					873			

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-62	436084	3131458	28° 18' 27.6052" N	74° 20' 53.0777" E		118593	13°0'16.6"	
					255			220KV D/C LINE TOWER NO 116,117
AP-63	436335	3131501	28° 18' 29.0542" N	74° 21' 02.3002" E		118848	10°57'57.5"	
					598			
AP-64	436894	3131712	28° 18' 36.0223" N	74° 21' 22.7784" E		119446	17°35'22.1"	
					1666			
AP-65	438557	3131803	28° 18' 39.2664" N	74° 22' 23.8296" E		121111	22°9'42.1"	
					4527			
AP-66	442837	3130327	28° 17' 52.0037" N	74° 25' 01.2355" E		125638	15°48'29.2"	
					3766			
AP-67	446597	3130116	28° 17' 45.7017" N	74° 27' 19.3311" E		129405	2°12'42.4"	
					1961			
AP-68	448550	3129930	28° 17' 39.9511" N	74° 28' 31.0390" E		131366	6°2'49.6"	
					2470			
AP-69	450970	3129439	28° 17' 24.3161" N	74° 29' 59.9645" E		133835	18°24'4"	
					1056			
AP-70	452018	3129566	28° 17' 28.5911" N	74° 30' 38.4218" E		134891	12°7'0.7"	
					209			RAILWAY LINE , SINGLE TRACK, BROAD GAUGE , ELECTRIFIED, SARDARSHAHAR TO RATANGARH SECTION KM NO. 29,30
AP-71	452215	3129634	28° 17' 30.8278" N	74° 30' 45.6489" E		135100	20°15'50.5"	
					2206			
AP-72	454420	3129587	28° 17' 29.5791" N	74° 32' 06.6264" E		137306	4°52'49.2"	
					2201			
AP-73	456609	3129353	28° 17' 22.5445" N	74° 33' 35.5925" E		139507	8°10'45.1"	

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					234			SH-7 SARDAR SHAHAR TO RATANGARH ROAD KM NO.237,238
AP-74	456843	3129362	28° 17' 22.5445" N	74° 33' 35.5925" E		139741	14°31'29.5"	
					443			
AP-75	457276	3129266	28° 17' 19.4901"N	74° 33' 51.5001"E		140184	28°25'46.1"	
					229			132KV S/C LINE TOWER NO-78,79 / 220KV D/C LINE TOWER NO.76,77
AP-76	457496	3129329	28° 17' 21.5602"N	74° 33' 59.5701"E		140413	24°42'22.6"	
					239			
AP-77	457733	3129293	28° 17' 20.4094" N	74° 34' 08.2590" E		140652	21°20'23"	
					232			400KV S/C RTG TO STG LINE (RSEB) TOWER NO.354,355
AP-78	457959	3129343	28° 17' 22.0801" N	74° 34' 16.5552" E		140884	4°35'22.7"	
					221			400KV S/C STG TO RTG LINE (RSEB) TOWER NO.360,361
AP-79	458170	3129409	28° 17' 24.2277" N	74° 34' 24.2949" E		141105	24°16'30.1"	
					1647			
AP-80	459804	3129206	28° 17' 17.8239" N	74° 35' 24.3068" E		142752	15°58'22"	
					867			
AP-81	460660	3129340	28° 17' 22.2773" N	74° 35' 55.7417" E		143619	7°32'19.4"	
					559			
AP-82	461196	3129498	28° 17' 27.4719" N	74° 36' 15.3921" E		144177	21°55'27.8"	
					1067			
AP-83	462258	3129396	28° 17' 24.2699" N	74° 36' 54.3862" E		145244	21°56'28.3"	
					2872			
AP-84	464807	3128073	28° 16' 41.5340" N	74° 38' 28.1228" E		148116	20°25'14.7"	

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					3776			
AP-85	468555	3127613	28° 16' 26.9119" N	74° 40' 45.7273" E		151892	18°36'34.9"	
					548			
AP-86	469092	3127723	28° 16' 30.5412" N	74° 41' 05.4288" E		152440	24°15'19.3"	
					2727			
AP-87	471753	3127126	28° 16' 11.3457" N	74° 42' 43.1639" E		155167	7°47'25"	
					4350			
AP-88	476087	3126757	28° 15' 59.6768" N	74° 45' 22.2849" E		159517	8°56'55.5"	
					3826			
AP-89	479803	3125844	28° 15' 30.2230" N	74° 47' 38.7158" E		163343	11°40'55.1"	
					4114			
AP-90	483914	3125691	28° 15' 25.4632" N	74° 50' 09.6237" E		167458	17°31'44.9"	
					1340			SH-107 CHURU TO RATANGARH ROAD KM NO.33,34
AP-91	485176	3125240	28° 15' 08.5698" N	74° 51' 03.1719" E		168798	0°12'22.7"	
					209			
AP-92	485373	3125169	28° 15' 08.5698" N	74° 51' 03.1719" E		169007	11°20'14.6"	
					1604			
AP-93	486958	3124932	28° 15' 00.9038" N	74° 52' 01.3843" E		170610	18°29'36.2"	
					236			132KV S/C LINE
AP-94	487169	3124824	28° 14' 57.4253" N	74° 52' 09.1084" E		170846	26°45'25.2"	
					3611			
AP-95	490780	3124808	28° 14' 56.9973" N	74° 54' 21.6231" E		174457	4°40'30.3"	
					1674			
AP-96	492448	3124664	28° 14' 52.3524" N	74° 55' 22.8486" E		176132	22°55'14.8"	

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					1268			
AP-97	493654	3125055	28° 15' 05.1008" N	74° 56' 07.1128" E		177400	28°20'32.6"	
					220			RAILWAY LINE SINGLE TRACK, BROAD GAIDGE, ELECTRIFIED, CHURU TO RATANGARH SECTION KM NO.286,287
AP-98	493870	3125016	28° 15' 03.8216" N	74° 56' 15.0396" E		177620	31°48'21"	
					1438			
AP-99	495208	3125542	28° 15' 20.9253" N	74° 57' 04.1433" E		179057	28°42'12"	
					147			NH-52 CHURU TO FATEHPUR ROAD
AP-100	495354	3125523	28° 15' 14.6083" N	74° 58' 02.3335" E		179204	0°16'20.9"	
					1451			
AP-101	496794	3125347	28° 15' 14.6083" N	74° 58' 02.3335" E		180655	9°10'31.4"	
					1508			
AP-102	498243	3124927	28° 15' 00.9762" N	74° 58' 55.5064" E		182163	2°39'3.7"	
					226			NH-52 CHURU TO FATEHPUR ROAD KM NO.83,84
AP-103	498456	3124854	28° 14' 58.6100" N	74° 59' 03.3547" E		182389	21°11'17"	
					1234			
AP-104	499690	3124905	28° 15' 00.2772" N	74° 59' 48.6107" E		183623	6°17'8.8"	
					2034			
AP-105	501700	3125212	28° 15' 10.2286" N	75° 01' 02.3973" E		185657	6°54'17.2"	
					3242			
AP-106	504824	3126082	28° 15' 38.4807" N	75° 02' 57.0428" E		188899	34°6'25.3"	
					223			RAILWAY LINE , SINGLE TRACK , BROAD GAIDGE, ELECTRIFIED, CHURU TO

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
								FATEHPUR SECTION KM NO.80,81 / SH-37 CHURU TO JHUNJHUNO ROAD KM NO. 200,201
AP-107	504968	3126252	28° 15' 44.0040" N	75° 03' 02.3422" E		189122	31°19'33.4"	
					942			
AP-108	505862	3126548	28° 15' 53.6259" N	75° 03' 35.1578" E		190064	13°9'30.8"	
					4261			
AP-109	510106	3126934	28° 16' 06.0619" N	75° 06' 10.9380" E		194326	20°32'58.3"	
					1262			
AP-110	511323	3126600	28° 15' 55.1655" N	75° 06' 55.5877" E		195587	12°30'30.6"	
					958			
AP-111	512170	3126152	28° 15' 40.5851" N	75° 07' 26.6588" E		196546	21°15'10.9"	
					1414			
AP-112	513574	3125989	28° 15' 35.2445" N	75° 08' 18.1887" E		197959	1°14'8.5"	
					2250			
AP-113	515814	3125778	28° 15' 28.2994" N	75° 09' 40.4113" E		200210	4°27'52.2"	
					1609			
AP-114	517399	3125503	28° 15' 19.2898" N	75° 10' 38.5743" E		201818	21°46'39.5"	
					4217			
AP-115	521525	3126375	28° 15' 47.4087" N	75° 13' 10.0514" E		206035	7°39'3.4"	
					1743			
AP-116	523263	3126505	28° 15' 51.5323" N	75° 14' 13.8440" E		207778	10°31'31.9"	
					1102			
AP-117	524359	3126385	28° 15' 47.5663" N	75° 14' 54.0530" E		208880	14°12'44.5"	
					571			
AP-118	524925	3126465	28° 15' 50.1029" N	75° 15' 14.8282" E		209452	1°17'46.9"	

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					617			
AP-119	525533	3126564	28° 15' 53.2882" N	75° 15' 37.1762" E		210068	35°28'38.9"	
					858			
AP-120	526303	3126185	28° 15' 40.9188" N	75° 16' 05.3992" E		210926	15°47'56.6"	
					1489			
AP-121	527767	3125916	28° 15' 32.0690" N	75° 16' 59.1087" E		212415	8°5'4.1"	
					1274			
AP-122	529040	3125864	28° 15' 30.2887" N	75° 17' 45.8323" E		213689	35°49'14.2"	
					213			400KV D/C LINE U/C
AP-123	529218	3125982	28° 15' 34.0930" N	75° 17' 52.3600" E		213902	40°10'36.7"	
					612			
AP-124	529825	3125911	28° 15' 31.7296" N	75° 18' 14.6597" E		214514	14°5'1.5"	
					208			132KV S/C LINE
AP-125	530031	3125937	28° 15' 32.5822" N	75° 18' 22.2225" E		214722	5°9'17.8"	
					889			
AP-126	530920	3125972	28° 15' 33.6404" N	75° 18' 54.8394" E		215611	12°24'36"	
					223			SH-41 JHUNJHUNO TO SADULPUR ROAD KM NO.67,68
AP-127	531136	3126028	28° 15' 35.4536" N	75° 19' 02.7545" E		215834	11°52'38.8"	
					650			
AP-128	531785	3126060	28° 15' 36.4217" N	75° 19' 26.5915" E		216484	23°25'12.3"	
					4459			
AP-129	535958	3124488	28° 14' 44.9518" N	75° 21' 59.5685" E		220943	16°6'4"	
					3624			
AP-130	539570	3124201	28° 14' 35.2560" N	75° 24' 12.0918" E		224567	11°37'50"	
					605			

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-131	540151	3124033	28° 14' 29.7191" N	75° 24' 33.3859" E		225171	18°0'40.1"	
					358			SH-41B BANGAD TO MANDRELA ROAD KM NO.11,12
AP-132	540509	3124044	28° 14' 30.0534" N	75° 24' 46.5331" E		225530	8°25'36.1"	
					207			132KV S/C LINE
AP-133	540715	3124020	28° 14' 29.2581" N	75° 24' 54.0838" E		225737	16°57'56.2"	
					1949			
AP-134	542502	3123242	28° 14' 03.7461" N	75° 25' 59.5442" E		227686	30°29'50.6"	
					2457			
AP-135	544941	3123539	28° 14' 13.1098" N	75° 27' 29.0896" E		230143	18°12'31.8"	
					953			
AP-136	545876	3123353	28° 14' 06.9445" N	75° 28' 03.3593" E		231096	6°11'13.5"	
					1127			
AP-137	546998	3123253	28° 14' 03.5608" N	75° 28' 44.5383" E		232223	16°20'3.1"	
					1684			
AP-138	548566	3122638	28° 13' 43.3846" N	75° 29' 41.9555" E		233907	22°23'56.3"	
					927			
AP-139	549492	3122654	28° 13' 43.7795" N	75° 30' 15.9480" E		234834	29°8'4.7"	
					2108			
AP-140	551351	3121660	28° 13' 11.2080" N	75° 31' 23.9896" E		236942	32°10'42.5"	
					622			
AP-141	551971	3121704	28° 13' 12.5412" N	75° 31' 46.7551" E		237563	12°7'27.7"	
					1251			
AP-142	553209	3121527	28° 13' 06.6416" N	75° 32' 32.1557" E		238814	10°51'11.5"	
					1040			
AP-143	554193	3121190	28° 12' 55.5271" N	75° 33' 08.1787" E		239854	30°39'33.3"	

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					231			132KV S/C LINE
AP-144	554342	3121014	28° 12' 49.7995" N	75° 33' 13.6301" E		240085	14°0'24.6"	
					923			
AP-145	555093	3120477	28° 12' 32.2203" N	75° 33' 41.0834" E		241008	22°57'48.7"	
					214			NH-11 JHUNJHUNO TO REWADI ROAD
AP-146	555205	3120294	28° 12' 26.2656" N	75° 33' 45.1500" E		241222	48°49'38.6"	
					1538			
AP-147	556721	3120034	28° 12' 17.5839" N	75° 34' 40.7074" E		242760	5°38'55.9"	
					1850			
AP-148	558566	3119902	28° 12' 13.0098" N	75° 35' 48.3806" E		244610	1°18'47.6"	
					1383			
AP-149	559943	3119772	28° 12' 08.5593" N	75° 36' 38.8535" E		245993	4°14'52.5"	
					1338			
AP-150	561281	3119745	28° 12' 07.4644" N	75° 37' 27.9256" E		247331	28°5'41"	
					216			RAILWAY LINE , SINGLE TRACK, BROAD GAIDGE, ELECTRIFIED, LOHARU TO JHUNJHUNU SECTION, KM NO.328,329
AP-151	561469	3119640	28° 12' 04.0050" N	75° 37' 34.8161" E		247547	23°59'35.6"	
					768			
AP-152	562234	3119569	28° 12' 01.5898" N	75° 38' 02.8718" E		248316	23°32'35.6"	
					514			
AP-153	562684	3119322	28° 11' 53.4743" N	75° 38' 19.3325" E		248829	21°45'59.7"	
					228			132KV S/C LINE
AP-154	562910	3119294	28° 11' 52.5303" N	75° 38' 27.6144" E		249057	7°48'36.8"	

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					891			
AP-155	563771	3119066	28° 11' 44.9680" N	75° 38' 59.1532" E		249948	0°53'18.3"	
					818			
AP-156	564565	3118869	28° 11' 38.4227" N	75° 39' 28.2220" E		250765	12°45'46.3"	
					1235			
AP-157	565800	3118843	28° 11' 37.3708" N	75° 40' 13.5140" E		252001	11°37'11.6"	
					681			
AP-158	566464	3118692	28° 11' 32.3441" N	75° 40' 37.8447" E		252682	23°15'52"	
					1013			
AP-159	567461	3118876	28° 11' 38.1377" N	75° 41' 14.4293" E		253695	13°8'25.2"	
					1208			
AP-160	568667	3118820	28° 11' 36.0763" N	75° 41' 58.6574" E		254903	20°29'1.6"	
					1031			
AP-161	569615	3118414	28° 11' 22.7178" N	75° 42' 33.3328" E		255934	12°14'29"	
					913			
AP-162	570511	3118241	28° 11' 16.9241" N	75° 43' 06.1671" E		256846	53°51'54"	
					196			NH-13 JHUNJHUNU TO REWADI ROAD KM NO.128,129
AP-163	570655	3118375	28° 11' 21.2404" N	75° 43' 11.4651" E		257043	41°14'49.6"	
					817			
AP-164	571471	3118399	28° 11' 21.8655" N	75° 43' 41.4079" E		257859	8°41'33.3"	
					675			
AP-165	572141	3118317	28° 11' 19.0609" N	75° 44' 05.9605" E		258534	24°15'21.8"	
					1459			
AP-166	573388	3117560	28° 10' 54.2182" N	75° 44' 51.5229" E		259993	29°15'19"	
					637			

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-167	574024	3117537	28° 10' 53.3675" N	75° 45' 14.8566" E		260630	26°15'52.1"	
					1040			
AP-168	574940	3117045	28° 10' 37.1770" N	75° 45' 48.3358" E		261670	51°30'9.7"	
					202			132KV S/C LINE TOWER NO. 40,41
AP-169	575126	3117124	28° 10' 39.7255" N	75° 45' 55.1524" E		261872	31°57'50"	
					1323			
AP-170	576433	3116924	28° 10' 32.9342" N	75° 46' 43.0451" E		263194	20°9'32.7"	
					227			765KV S/C JAIPUR TO BHIWANI LINE (PGCIL) TOWER NO.555,556
AP-171	576632	3116814	28° 10' 29.3278" N	75° 46' 50.3110" E		263421	17°43'47.2"	
					1239			
AP-172	577847	3116574	28° 10' 21.2831" N	75° 47' 34.8212" E		264660	14°5'19.4"	
					828			
AP-173	578674	3116617	28° 10' 22.4824" N	75° 48' 05.1404" E		265488	45°15'31.2"	
					263			765KV S/C JAIPUR TO BHIWADI LINE (PGCIL) TOWER NO.542,543
AP-174	578868	3116440	28° 10' 16.6925" N	75° 48' 12.2197" E		265750	30°20'36.5"	
					709			
AP-175	579561	3116293	28° 10' 11.7603" N	75° 48' 37.6105" E		266459	7°31'5.8"	
					1538			
AP-176	581095	3116173	28° 10' 07.5340" N	75° 49' 33.8049" E		267997	3°31'39.2"	
					222			132KV S/C LINE
AP-177	581317	3116169	28° 10' 07.3667" N	75° 49' 41.9519" E		268219	25°56'16.9"	
					506			
AP-178	581775	3116383	28° 10' 14.2101" N	75° 49' 58.8126" E		268725	28°31'1.1"	

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					200			220KV S/C LINE
AP-179	581975	3116371	28° 10' 13.7676" N	75° 50' 06.1192" E		268925	3°30'11"	
					966			
AP-180	582933	3116253	28° 10' 09.7157" N	75° 50' 41.2491" E		269891	14°55'16.5"	
					1186			
AP-181	584034	3115810	28° 09' 55.0665" N	75° 51' 21.4708" E		271077	32°8'7.6"	
					233			
AP-182	584170	3115621	28° 09' 48.9079" N	75° 51' 26.4313" E		271310	11°42'6.5"	
					167			132KV S/C LINE
AP-183	584293	3115509	28° 09' 45.2245" N	75° 51' 30.9231" E		271477	7°25'8.8"	
					442			
AP-184	584579	3115171	28° 09' 34.1965" N	75° 51' 41.2909" E		271918	21°43'21.8"	
					1192			
AP-185	585630	3114610	28° 09' 15.7270" N	75° 52' 19.7050" E		273110	0°6'35.2"	
					266			220KV D/C LINE
AP-186	585866	3114485	28° 09' 11.6126" N	75° 52' 28.3004" E		273377	4°3'53.8"	
					795			
AP-187	586539	3114064	28° 08' 57.7602" N	75° 52' 52.8900" E		274172	46°15'24.8"	
					214			
AP-188	586747	3114117	28° 08' 59.4202" N	75° 53' 00.5061" E		274386	28°47'30.5"	
					887			
AP-189	587606	3113893	28° 08' 51.9691" N	75° 53' 31.9249" E		275273	4°37'36.1"	
					664			
AP-190	588260	3113779	28° 08' 48.0891" N	75° 53' 55.8790" E		275937	48°22'19.7"	
					281			500KV HVDC MUNDRA TO

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
								MAHENDRAGARH LINE (ADANI POWER) TOWER NO.2562,2563
AP-191	588407	3113540	28° 08' 40.2956" N	75° 54' 01.2186" E		276218	38°50'39.4"	
					230			
AP-192	588624	3113463	28° 08' 37.7491" N	75° 54' 09.1607" E		276448	34°11'46.8"	
					232			400KV D/C KHETRI TO NEEMRANA LINE
AP-193	588762	3113277	28° 08' 31.6481" N	75° 54' 14.1460" E		276680	33°37'30.8"	
					1099			
AP-194	589794	3112900	28° 08' 19.1665" N	75° 54' 51.8846" E		277779	46°17'27.5"	
					279			400KV D/C KHETRI TO BHIWADI LINE (PBTCL) TOWER NO-80,81
AP-195	589906	3112644	28° 08' 10.8250" N	75° 54' 55.9265" E		278058	17°4'17.2"	
					1429			
AP-196	590071	3111225	28° 07' 24.6529" N	75° 55' 01.5596" E		279487	35°12'56.4"	
					957			
AP-197	590709	3110511	28° 07' 01.3146" N	75° 55' 24.7563" E		280444	33°5'1"	
					169			NH-11 JHUNJHUNU TO REWARI ROAD
AP-198	590735	3110344	28° 06' 55.8871" N	75° 55' 25.6495" E		280613	33°43'47.8"	
					479			
AP-199	591058	3109991	28° 06' 44.3294" N	75° 55' 37.3993" E		281092	37°0'53.9"	
					209			765KV D/C JHATIKARA TO KHETRI LINE(PGCIL) TOWER NO.71,72
AP-200	591078	3109783	28° 06' 37.5542" N	75° 55' 38.0699" E		281301	21°44'31.8"	
					851			
AP-201	591467	3109026	28° 06' 12.8698" N	75° 55' 52.1055" E		282152	39°20'55"	

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					989			
AP-202	591258	3108059	28° 05' 41.4917" N	75° 55' 44.2007" E		283142	4°6'8.6"	
					2187			
AP-203	590952	3105893	28° 04' 31.2071" N	75° 55' 32.3727" E		285328	16°18'55.7"	
					891			
AP-204	591080	3105012	28° 04' 02.5299" N	75° 55' 36.8172" E		286219	49°13'51.1"	
					1612			
AP-205	592440	3104145	28° 03' 34.0370" N	75° 56' 26.3824" E		287832	2°18'29.2"	
					333			400KV D/C BABAI TO BHIWANI LINE TOWER NO-80,81
AP-206	592727	3103978	28° 03' 28.5286" N	75° 56' 36.8648" E		288164	49°27'40.8"	
					563			
AP-207	592828	3103425	28° 03' 10.5206" N	75° 56' 40.4065" E		288727	19°10'34.7"	
					1478			
AP-208	592601	3101964	28° 02' 23.1096" N	75° 56' 31.6757" E		290205	1°57'23.6"	
					642			
AP-209	592524	3101327	28° 02' 02.4209" N	75° 56' 28.6798" E		290847	13°40'40.8"	
					551			
AP-210	592590	3100779	28° 01' 44.6146" N	75° 56' 30.9154" E		291398	0°55'58.5"	
					1264			
AP-211	592719	3099522	28° 01' 03.7407" N	75° 56' 35.2884" E		292662	45°34'36.5"	
					600			
AP-212	593188	3099148	28° 00' 51.4724" N	75° 56' 52.3592" E		293262	15°42'38.8"	
					775			
AP-213	593902	3098848	28° 00' 41.5191" N	75° 57' 18.4094" E		294037	30°59'24.7"	
					380			

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-214	594126	3098541	28° 00' 31.5009" N	75° 57' 26.5251" E		294416	2°38'59.6"	
					1044			
AP-215	594702	3097671	28° 00' 03.0683" N	75° 57' 47.3789" E		295460	15°13'53.1"	
					1399			
AP-216	595141	3096342	27° 59' 19.7852" N	75° 58' 03.0623" E		296859	22°6'14.6"	
					564			
AP-217	595507	3095912	27° 59' 05.7249" N	75° 58' 16.3206" E		297424	31°16'52.7"	
					1760			
AP-218	597177	3095359	27° 58' 47.3066" N	75° 59' 17.2941" E		299183	40°6'18.7"	
					1076			
AP-219	597740	3094442	27° 58' 17.3729" N	75° 59' 37.6316" E		300259	24°42'15.9"	
					442			SH-13 Narnaul to Nijampur Road
AP-220	597793	3094003	27° 58' 03.0849" N	75° 59' 39.4344" E		300702	31°20'56.1"	
					518			
AP-221	598113	3093596	27° 57' 49.7739" N	75° 59' 51.0383" E		301220	18°2'22"	
					863			
AP-222	598411	3092786	27° 57' 23.3848" N	76° 00' 01.6791" E		302082	26°17'4.3"	
					187			RAILWAY LINE , FOUR TRACK, ELECTRIFIED, BROAD GAIDGE, NARNAUL TO TO RENGUS SECTION KM NO.1269,1270
AP-223	598546	3092657	27° 57' 19.1671" N	76° 00' 06.5948" E		302269	19°32'47"	
					1197			
AP-224	599088	3091590	27° 56' 44.3415" N	76° 00' 26.0926" E		303466	27°47'58.8"	
					1469			

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-225	600286	3090741	27° 56' 16.4460" N	76° 01' 09.6944" E		304934	48°42'18.3"	
					155			
AP-226	600437	3090777	27° 56' 17.5718" N	76° 01' 15.2154" E		305089	15°28'12.4"	
					374			
AP-227	600811	3090764	27° 56' 17.0337" N	76° 01' 28.8804" E		305463	39°4'46.1"	
					453			
AP-228	601152	3090466	27° 56' 07.2548" N	76° 01' 41.2735" E		305916	37°0'9.1"	
					359			
AP-229	601226	3090114	27° 55' 55.8147" N	76° 01' 43.8653" E		306275	39°51'25.7"	
					208			400KV S/C NMR TO SIKAR LINE (PGCIL) TOWER NO.145,146
AP-230	601128	3089931	27° 55' 49.8857" N	76° 01' 40.2437" E		306483	27°20'26.7"	
					318			
AP-231	601125	3089613	27° 55' 39.5550" N	76° 01' 40.0123" E		306801	21°17'48.2"	
					865			
AP-232	601429	3088804	27° 55' 13.1781" N	76° 01' 50.9130" E		307666	11°56'58"	
					837			
AP-233	601556	3087977	27° 54' 46.2676" N	76° 01' 55.2820" E		308502	31°43'54.2"	
					1711			
AP-234	602665	3086674	27° 54' 03.6262" N	76° 02' 35.4665" E		310214	35°30'27.1"	
					1839			
AP-235	604449	3086227	27° 53' 48.5987" N	76° 03' 40.5713" E		312053	24°42'46.4"	
					1182			
AP-236	605370	3085487	27° 53' 24.2893" N	76° 04' 14.0200" E		313234	22°27'28"	
					2608			
AP-237	607873	3084754	27° 52' 59.7504" N	76° 05' 45.3011" E		315842	5°4'38.5"	

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					600			
AP-238	608432	3084534	27° 52' 52.4668" N	76° 06' 05.6736" E		316443	47°16'55.7"	
					490			
AP-239	608610	3084078	27° 52' 37.5846" N	76° 06' 12.0350" E		316933	17°55'21.4"	
					1393			
AP-240	608693	3082687	27° 51' 52.3720" N	76° 06' 14.5903" E		318326	20°43'26.9"	
					1453			
AP-241	608260	3081300	27° 51' 07.4306" N	76° 05' 58.3087" E		319779	21°20'2.6"	
					312			
AP-242	608281	3080989	27° 50' 57.3145" N	76° 05' 59.0023" E		320091	49°7'10.6"	
					1177			
AP-243	609223	3080283	27° 50' 34.0852" N	76° 06' 33.1897" E		321268	20°10'47.5"	
					698			
AP-244	609603	3079697	27° 50' 14.9401" N	76° 06' 46.8695" E		321966	42°54'36.1"	
					277			400KV S/C HISSAR TO BASSI LINE (PGCIL) TOWER NO-409,410
AP-245	609871	3079629	27° 50' 12.6599" N	76° 06' 56.6681" E		322243	2°59'47"	
					212			
AP-246	610079	3079588	27° 50' 11.2662" N	76° 07' 04.2561" E		322455	33°32'5.1"	
					229			400KV D/C SIKAR NEEMRANA LINE U/C
AP-247	610242	3079427	27° 50' 05.9962" N	76° 07' 10.1412" E		322683	14°28'19.3"	
					603			
AP-248	610762	3079124	27° 49' 55.9860" N	76° 07' 29.0763" E		323286	16°45'50.4"	
					1405			
AP-249	612129	3078797	27° 49' 44.9556" N	76° 08' 18.9159" E		324691	8°40'38.6"	
					1309			

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-250	613434	3078688	27° 49' 41.0195" N	76° 09' 06.5638" E		326000	35°27'11.5"	
					360			
AP-251	613709	3078456	27° 49' 33.3798" N	76° 09' 16.5315" E		326361	0°00'00"	Neemrana -II S/S

**Bikaner-III - Neemrana-II 765 kV D/C line (2nd)**  
**Power line Crossings**

SL No.	Circuit Details	Voltage Rating in KV / Crossing	Name of Owner (SEBs/DOT)	Remarks (Crossing in Between Loc. No.)
1.	S/C	132KV		AP19-AP20
2.	D/C	400 KV	RVPNL	AP21-AP22
3.	S/C	220KV		AP32-AP33
4.	S/C	400KV	RVPNL	AP34-AP35
5.	D/C	765KV	PGCIL	AP36-AP37
6.	D/C	220 KV		AP62-AP63
7.	S/C	132KV		AP75-AP76
8.	D/C	220KV		AP75-AP76
9.	S/C	400 KV	RSEB	AP77-AP78
10.	S/C	400 KV	RSEB	AP79-AP80
11.	S/C	132 KV		AP93-AP94
12.	D/C	400 KV		AP122-AP123
13.	S/C	132KV		AP124-AP125
14.	S/C	132 KV		AP132-AP133
15.	S/C	132KV		AP143-AP144
16.	S/C	132KV		AP153-AP154
17.	S/C	132KV		AP168-AP169
18.	S/C	765 KV	PGCIL	AP170-AP171
19.	S/C	765KV	PGCIL	AP173-AP174
20.	S/C	132KV		AP176-AP177
21.	S/C	220 KV		AP178-AP179
22.	S/C	132KV		AP182-AP183
23.	S/C	220 KV		AP185-AP186
24.	HVDC	500KV		AP190-AP191
25.	D/C	400KV		AP192-AP193
26.	D/C	400KV	PGCIL	AP194-AP195

27.	D/C	765KV	PGCIL	AP199-AP200
28.	D/C	400 KV		AP205-AP206
29.	S/C	400KV		AP229-AP230
30.	S/C	400KV	PGCIL	AP244-AP245
31.	D/C	400KV	PGCIL	AP246-AP247

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

## River Crossing

SL. No.	Name of River	Approximate Span in Meters (bank to bank width)	Perennial / Weathered Flow	Navigable / Non - Navigable	Remarks (Crossing in Between Loc. No.)
1.	NIL	NIL	NIL	NIL	NIL

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

## Railway Line Crossing

S. No.	Name of the Railway Line	Type of Gauge Broad / Metre / Narrow	Single/Double/Triple Line	Stone No.	Electrified / Non- Electrified	Remarks (Crossing in Between Locs.)
1.	SURATGARH TO BIKANER	Gauge Broad	Single	256,257	Electrified	AP29-AP30
2.	SARDARSHAHAR TO RATANGARH	Gauge Broad	Single	29,30	Electrified	AP70-AP71
3.	CHURU TO RATANGARH	Gauge Broad	Single	286,287	Electrified	AP97-AP98
4.	CHURU TO FATEHPUR	Gauge Broad	Single	80,81	Electrified	AP106-AP107
5.	LOHARU TO JHUNJHUNU	Gauge Broad	Single	328,329	Electrified	AP150-AP151
6.	NARNAUL TO TO RENGUS	Gauge Broad	Four	1269,1270	Electrified	AP222-AP223

**Bikaner-III - Neemrana-II 765 kV D/C line (2nd)  
Forest Details**

S. No.	Section AP to AP	Name of the Forest	Type of Forest (Reserved / Protected / Social)	Forest Stretches (M)	Affected Forest Area(sqm)
1	NIL	NIL	NIL	NIL	NIL

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

NH & SH Crossings

Sl.No.	Name of the Road	Type Of Road National Highway / State Highway	Nearest City / Town From Crossing	Approximate Both Side KMS. Stone of Crossing	Remarks (Crossing Between Loc. No.)
1	SURATGARH TO BIKANER	NH-62	Lunkaransar	47,48	AP17-AP18
2	BIKANER TO AMRITSAR	Expressway	Lunkaransar	376,377	AP38-AP39
3	KALU TO DUNGARGARH	SH-93	Kalu		AP43-AP44
4	SARDAR SHAHAR TO DUNGARGARH	SH-6	SardarShahar	113,114	AP60-AP61
5	SARDAR SHAHAR TO RATANGARH	SH-7	Sardar Shahar	237,238	AP73-AP74
6	CHURU TO RATANGARH	SH-107	Churu	286,287	AP90-AP91
7	CHURU TO FATEHPUR	NH-52	Churu		AP99-AP100
8	CHURU TO FATEHPUR	NH-52	Churu	83,84	AP102-AP103
9	CHURU TO JHUNJHUNO	SH-37	Churu	200,201	AP106-AP107
10	JHUNJHUNO TO SADULPUR	SH-41	Jhunjhunu	67,68	AP126-AP127
11	BANGAD TO MANDRELA	SH-41B	Jhunjhunu	11,12	AP131-AP132
12	JHUNJHUNO TO REWADI	NH-11	Chirwa		AP145-AP146
13	JHUNJHUNU TO REWADI	NH-13	Chirwa	128,129	AP162-AP163
14	JHUNJHUNU TO REWARI	NH-11	Singhana		AP197-AP198
15	NARNAUL TO NIZAMPUR	SH-13	Singhana		AP219-AP220

**CHAPTER-5.4****SUMMARY OF PROPOSED ROUTE**

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

## Detailed Summary of Proposed Route

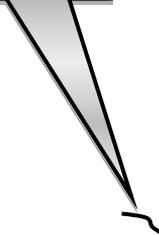
Sl. No.	Particulars	Outlook					
1.	Start Point	<b>Gantry Bikaner – III S/S</b>					
		<b>Latitude</b>			<b>Longitude</b>		
		<b>Deg.</b>	<b>Min.</b>	<b>Sec.</b>	<b>Deg.</b>	<b>Min.</b>	<b>Sec.</b>
		28°	21'	58.6301"	73°	11'	26.5401"
2.	END Point	<b>Gantry Neemrana – II S/S</b>					
		<b>Latitude</b>			<b>Longitude</b>		
		<b>Deg.</b>	<b>Min.</b>	<b>Sec.</b>	<b>Deg.</b>	<b>Min.</b>	<b>Sec.</b>
		27°	49'	33.3798"	76°	09'	16.5315"
3.	Route Particulars						
	(i) Bee Line (KM)	297.355 km					
	(ii) Length (KM)	326.361 km					
	(iii) Angle Points	249 Nos.					
	(iv) Wind Zone	Wind Zone 4					
4.	States	Rajasthan					
5.	Environmental Impact	Nil					
	(i) Houses within R.O.W.	Nil					
	(ii) Forest involvement	Nil					
	a) Length of forest area (km)						
	Reserved Forest (km)	Nil					
	Protected Forest (km)	Nil					
	Open Scrub (km)	Nil					
6.	Details of Crossing						
	a) Coal mines	Nil					
	a) Nos. Railway Crossing	6 Nos.					
	b) Nos. Power Line Crossing	31 Nos.					
	c) Nos. NH/SH Crossing	15 Nos.					
	e) Wild Life Sanctuary	Nil					
	f) Nos. River Crossing	Nil					
	g) Military Area (km)	Nil					
7.	Availability of Accommodation	Available					
	Airport	Jhunjhunu, Narnaul					
	Cities & Town	Bikaner, Churu , Jhunjhunu, Mahendragarh , Jaipur					
8.	Approaches along the route	Available					
9.	Monsoon	Medium Rainfall					
10.	Type of Soil	Mix Black Cotton					
11.	Type of standing crops	Wheat, Sarso&Chana					

**CHAPTER-1.5**  
**WIND ZONE MAP**

# WIND ZONE MAP

## Wind Zone-4

Bikaner-III - Neemrana-II  
765 kV D/C line (2nd)DC Line



**CHAPTER-5.6****RESULT & CONCLUSIONS**

## Results & Conclusions

Referring to angle point summary and after initial inspection of physical maps updated with satellite images and walk over survey, the proposed corridor was explored for the best route alignment. Special attention has been given to the existing EHV lines, forest, reserved forest, river crossings, national/state highways, minimum route length and habitation including plantation. After detailed analysis, the proposed transmission line route has been observed as viable route for alignment due to its good approach, for construction and maintenance of the transmission line after construction.

Finally, the Route marked Red in the route alignment drawing has been proposed as final route.

**CHAPTER-5.7****ROUTE ALIGNMENT MAP ON  
DIGITIZED TOPOSHEET**

**PFC Consulting Limited**  
**(A wholly owned subsidiary of PFC Limited)**

**May 04, 2023**

**Subject: Notice for extension of RFP bid submission for the Independent Transmission Project (ITP)  
“Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner  
Complex) - Part-C”**

The due date for submission of online RFP bids (Technical & Financial) through the electronic bidding platform for the subject project has been extended from May 08, 2023 till 15:00 hrs (IST) to **June 08, 2023 till 15:00 hrs (IST)**. The RFP (Technical) Bids will be opened on same day i.e. **June 08, 2023 at 15:30 hrs (IST)**

**PFC Consulting Limited**

**PFC CONSULTING LIMITED**  
**(A wholly owned subsidiary of PFC Limited)**

**Subject: Notice for extension of RFP bid submission for the Independent Transmission Project (ITP) “Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C”**

The due date for submission of online RFP bids (Technical & Financial) through the electronic bidding platform for the subject project has been extended from July 10, 2023 till 15:00 hrs (IST) to **July 31, 2023 till 15:00 hrs (IST)**. The RFP (Technical) Bids will be opened on same day i.e. **July 31, 2023, at 15:30 hrs (IST)**.

**PFC Consulting Limited**

**PFC CONSULTING LIMITED**  
**(A wholly owned subsidiary of PFC Limited)**

**Subject: Notice for extension of RFP bid submission for the Independent Transmission Project (ITP) “Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C”**

The due date for submission of online RFP bids (Technical & Financial) through the electronic bidding platform for the subject project has been extended from July 31, 2023 till 15:00 hrs (IST) to **August 21, 2023 till 15:00 hrs (IST)**. The RFP (Technical) Bids will be opened on same day i.e. **August 21, 2023, at 15:30 hrs (IST)**.

**PFC Consulting Limited**

**PFC CONSULTING LIMITED**  
**(A wholly owned subsidiary of PFC Limited)**

**Subject: Notice for extension of RFP bid submission for the Independent Transmission Project (ITP) “Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C”**

The due date for submission of online RFP bids (Technical & Financial) through the electronic bidding platform for the subject project has been extended from August 21, 2023 till 15:00 hrs (IST) to **September 04, 2023 till 15:00 hrs (IST)**. The RFP (Technical) Bids will be opened on same day i.e. **September 04, 2023, at 15:30 hrs (IST)**.

**PFC Consulting Limited**

**PFC CONSULTING LIMITED**  
**(A wholly owned subsidiary of PFC Limited)**

**Subject: Notice for extension of RFP bid submission for the Independent Transmission Project (ITP) “Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C”**

The due date for submission of online RFP bids (Technical & Financial) through the electronic bidding platform for the subject project has been extended from September 04, 2023 till 15:00 hrs (IST) to **September 18, 2023 till 15:00 hrs (IST)**. The RFP (Technical) Bids will be opened on same day i.e. **September 18, 2023, at 15:30 hrs (IST)**.

**PFC Consulting Limited**

**PFC CONSULTING LIMITED**  
**(A wholly owned subsidiary of PFC Limited)**

**Subject: Notice for extension of RFP bid submission for the Independent Transmission Project (ITP) “Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C”**

The due date for submission of online RFP bids (Technical & Financial) through the electronic bidding platform for the subject project has been extended from September 17, 2023 till 15:00 hrs (IST) to **September 27, 2023 till 15:30 hrs (IST)**. The RFP (Technical) Bids will be opened on same day i.e. **September 27, 2023, at 16:00 hrs (IST)**.

**PFC Consulting Limited**

**PFC CONSULTING LIMITED**  
**(A wholly owned subsidiary of PFC Ltd.)**

**Subject: Notice for extension of RFP bid submission for the Independent Transmission Project (ITP) “Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex)- Part-C”.**

The due date for submission of online RFP bids (Technical & Financial) through the electronic bidding platform for the subject project has been extended from September 27, 2023 till 15:00 hrs (IST) to **October 10, 2023 till 15:00 hrs (IST)**. The RFP (Technical) Bids will be opened on same day i.e. **October 10, 2023 at 15:30 hrs (IST)**.

**PFC Consulting Limited**



पीएफसी कंसल्टिंग लिमिटेड

(पावर फाइनेंस कॉर्पोरेशन लिमिटेड की पूर्णतःस्वामित्वाधीन सहायक कम्पनी)  
**PFC CONSULTING LIMITED**  
(A wholly owned subsidiary of Power Finance Corporation Limited)

CIN U74140DL2008GOI175858

June 06, 2023

Ref. No.: 04/22-23/ITP-60/RFP

To,  
Mr. Nitin Kumar  
Sr. Business Development Manager (T&D)  
The Tata Power Company Limited,  
Shatabdi Bhawan, B-12 & 13, Sector 4,  
Noida, UP-201301

E-mail: nitin.kumar@tatapower.com

**Subject: Independent Transmission Project "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C" – Regarding Clarifications to RFP documents.**

Dear Sir,

This has reference to the issuance of RFP documents on 02.03.2023 for the subject transmission project.

The queries raised by the bidders on RFP documents have been examined and clarifications are enclosed herewith at **Annexure-I** for your information and further necessary action please.

Thanking you,

Yours faithfully

(Sanjay Nayak)

General Manager

Encl.: As above

पंजीकृत कार्यालय : प्रथम तल "ऊर्जानिधि" , 1, बाराखम्बा लेन, कनॉट प्लेस, नई दिल्ली-110001

Regd. Office : First Floor, "Urjanidhi", 1, Barakhamba Lane, Connaught Place, New Delhi-110001

कंपनी मुख्यालय: नौवाँ तल (ए विंग) स्टेट्समैन हाउस, कनॉट प्लेस, नई दिल्ली-110001 दूरभाष : 011-23443900 फैक्स : 011-23443990  
Corporate Office : 9th Floor (A Wing) Statesman House, Connaught Place, New Delhi-110001 Phone : 011-23443900 Fax : 011-23443990

ई-मेल / E-mail : pfcconsulting@pfcindia.com वैबसाईट / Website : www.pfcclindia.com

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
1.	<p>RFP</p> <p>“Final Offer” shall mean the Quoted Transmission Charges, required to be submitted as part of the Financial Bid on the electronic bidding platform during the e-reverse bidding stage. In case, no Final Offer is received during the e-reverse bidding stage then the lowest “Initial Offer” shall be deemed to be the Final Offer;</p>	<p>Presently, details of L-1 bidder are not displayed on conclusion of e-RA if there is no receipt of counterbids.</p> <p>In case, two bidders have quoted the same L1, they would be under false impression of having L1 tariff of their own and may not offer further competitive offer. In such scenario, e-RA shall end resulting in premature conclusion of e-RA process.</p> <p>It is requested to update the e-RA platform accordingly to reflect the status of L1 bidder under the above scenario.</p> <p>For transparency of the competitive price discovery through e-RA</p>	<p>The e-RA will be conducted as per SBDs and the details of the successful bidder will be intimated only after conclusion of e-Reverse Auction (e-RA) process.</p> <p>In e-RA, two bidders cannot have same price bid as every bid has to be necessarily less than the previous bid. In case of Initial Offer as bids are encrypted, two bidders may quote the same initial price offer. But in e-RA even if a single bid is received, two bidders cannot be at the same price offer.</p> <p>If the Initial Offer for two or more bidders is same and no bids are quoted in e-RA, the instant case seems to be hypothetical however in such case the decision of the competent authority shall prevail.</p>
2.	<p><b>RFP document</b></p> <p><b>Clause 1.5</b></p> <p>....The TSP shall ensure transfer of all project assets along with substation land, right of way and clearances to CTU or its successors or an agency as decided by the Central Government after 35 years from COD of project at zero cost and free from any encumbrance and liability. The transfer shall</p>	<p>Treatment of tax application at the end of the life of assets.</p> <p>As per section 50C of Income tax act, in case sale consideration received or claimed to be received by seller on sale of land or building or both is less than value adopted by stamp valuation authority (SVA), such value adopted by SVA would become actual sale consideration received or accruing to the seller. Therefore, capital gain would be Valuation as per</p>	<p>The TSP shall ensure transfer of all project assets along with substation land, right of way and clearances to CTUIL or its successors or an agency as decided by the Central Government after 35 years from COD of project at zero cost and free from any encumbrance and liability.</p> <p>Any taxes, stamp duties and liabilities, as may be applicable, has to be borne by the TSP.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	be completed within 90 days after 35 years from COD of project failing which CTU shall be entitled to take over the project assets Suo moto.	stamp valuation authority reduced by cost/indexed cost of acquisition.  Treatment of Capital tax and applicable TDS to be clarified.	
3.	<p><b>RFP document</b> <b>Clause 1.5</b></p> <p>.... The TSP shall ensure transfer of all project assets along with substation land, right of way and clearances to CTU or its successors or an agency as decided by the Central Government after 35 years from COD of project at zero cost and free from any encumbrance and liability. The transfer shall be completed within 90 days after 35 years from COD of project failing which CTU shall be entitled to take over the project assets Suo moto.</p>	<p>Modality of transfer of assets to be defined.</p> <p>In case only assets to be transferred then application of stamp duty &amp; other taxes and its treatment to be clarified.</p>	<p>The TSP shall ensure transfer of all project assets along with substation land, right of way and clearances to CTUIL or its successors or an agency as decided by the Central Government after 35 years from COD of project at zero cost and free from any encumbrance and liability.</p> <p>Any taxes, stamp duties and liabilities, as may be applicable have to be borne by the TSP.</p>
4.	<p><b>RFP document</b> <b>Clause 1.5</b></p> <p>.... The TSP shall ensure transfer of all project assets along with substation land, right of way and clearances to CTU or its successors or an agency as decided by the Central Government after 35 years from COD of project at zero cost and free from any encumbrance and liability. The transfer shall</p>	<p>Modalities for O&amp;M, other expenditure etc. for the transition period of 90 days may be confirmed.</p> <p>Availability calculation for the said period?</p>	<p>The transfer of all project assets along with substation land, right of way and clearances shall be completed at the end of 35 years from COD of the Project.</p> <p>All the expenditure till the transfer of all project assets along with substation land, right of way and clearances shall be borne by TSP.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	be completed within 90 days after 35 years from COD of project failing which CTU shall be entitled to take over the project assets Suo moto.		
5.	<p><b>RFP document</b> 1.6.2.1 (2) To obtain approval for laying of overhead transmission lines under Section 68 of Electricity Act, from the Government at least twenty (20) days prior to Bid Deadline.</p>	<p>It is the responsibility of the BPC to provide approval for laying of overhead transmission lines under section 68 of Electricity Act.</p> <p>However, it is noted that approval under section 68 is furnished without incorporating the amendments in scope of the project. It is requested to provide section 68 approval incorporating all the amendments.</p> <p>Incomplete approved section-68 leads to delay in execution of project</p>	<p>The prior approval under Section 68 shall be shared with the successful bidder</p>
6.	<p><b>RFP document</b> 1.6.2.1 ... 4) To initiate process of seeking forest clearance, if required ....</p>	<p>Development of the project is largely dependent on obtaining the RoW through these forest stretches. Details of the status of the process initiated, the outcome and the feasibility of obtaining clearances without derailing the indicated project schedule may be furnished.</p> <p>To estimate the feasibility of the project in the timeline and the quantum of activity to be discharged by the bidder</p>	<p>Based on the route survey, the process of initiation of forest clearance for the stretches, if any, enroute the proposed line alignment will be initiated by way of writing letters to the concerned Authority (ies).</p> <p>However, it may be noted that it will be the responsibility of TSP for obtaining forest clearance for the forest stretches as provided in the Survey Report or any forest encountered during construction.</p>
7.	<p><b>RFP document</b> 1.6.2.1</p>	<p>Based on the past experience, it is noted that the acquisition price claimed is higher than the amount</p>	<p>The tentative acquisition price of the SPV shall be provided as per the provisions of the RFP</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p>5) The BPC shall intimate to the Bidders, the Acquisition Price payable by the Selected Bidder to the PFC Consultancy Limited for the acquisition of one hundred percent (100%) of the equity shareholding of SPV [which is under incorporation] , along with all its related assets and liabilities at least twenty (20) days prior to the Bid Deadline .</p>	<p>informed prior to bidding. Any variation in the Acquisition price post bid submission should be avoided.</p> <p>Further, it also noted that mandatory 20 days is not being adhered to by the BPC after furnishing the acquisition price.</p> <p>Based on the past experience, it is noted that the acquisition price claimed is higher than the amount informed prior to the bidding.</p> <p>Further, it also noted that mandatory 20 days is not being adhered to by the BPC after furnishing the acquisition price. Even for the current RE projects floated, the acquisition price has not been furnished by the BPC within the prescribed time limits</p>	<p>document.</p>
8.	<p><b>RFP document</b></p> <p>1.6.2.1</p> <p>6) The BPC shall ensure issuance of all finalized RFP Project Documents, at least fifteen (15) days prior to the Bid Deadline.</p> <p>2.4.2.</p> <p>All modifications shall become part of the terms and conditions of this RFP. No interpretation, revision or communication regarding this RFP is valid, unless made in writing.</p>	<p>BPC is requested to kindly provide the signed TSA incorporating all the amendments / clarifications.</p> <p>Since TSA is the base document for reference for more than 35 years, the TSA should be complete incorporating all the amendments issued by BPC to avoid any intentional and unintentional references to TSA.</p> <p>It is the responsibility of the BPC to provide finalized RFP Project Documents.</p> <p>However, it is noted that amendments in the bidding documents are not incorporated in signed TSA and</p>	<p>As per revised TBCB Guidelines and SBDs issued by MOP, GoI, TSP on the date of acquisition of SPV from the BPC will enter into a Transmission Service Agreement (TSA) with the Nodal Agency.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
		are merely appended to the TSA. It is requested to BPC to kindly provide signed TSA incorporating all the amendments and also confirm that no changes other than the notified amendments have been incorporated.	
9.	<p><b>RFP document</b> Clause 1.12</p> <p>Once the Successful Bidder is selected, the details and documents as may be obtained by the BPC/ project specific SPV in relation to the Project, shall be handed over to the Successful Bidder on as is where basis, so that it may take further actions to obtain all necessary Consents, Clearances and Permits and the TSP shall not be entitled for any extensions in the Scheduled COD of the Project except as provided for in the TSA</p>	BPC is requested to provide the list of details & documents to be handed over to the Successful Bidder.	BPC will provide all the requisite documents/ certifications under the Guidelines and the Standard Bidding Documents to the Successful Bidder at the time of transfer of SPV.
10.	<p><b>RFP document</b></p> <p><b>Clause 2.1.2</b> “...(i) Experience of development of projects in the Infrastructure Sector in the <b>last five (5) years</b> with aggregate capital expenditure of not less than...” <b>Or</b> “... Experience in construction of project in</p>	<p>Technical qualification as per <b>developer route</b> is considered from <b>last five years</b>, whereas for <b>construction experience</b>, the technical qualification is considered from <b>last five Financial Years</b>. The both technical qualifications should be considered from the same period for equity.</p> <p>Therefore, it is requested to align the timeline for both technical qualifications criteria.</p>	This is as per the Standard Bidding Documents. No change is envisaged.

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	infrastructure sector: The Technically Evaluated Entity should have received aggregate payments not less than Rs. 1480 Crore or equivalent USD (calculated as per provisions in Clause 3.4.1) from its client(s) for construction works fully completed during the <b>last 5(five) financial years....”</b>		
11.	<b>RFP document</b>  Clause 2.5.3  “....	What if two or more bidders quote the same Initial offer which turns out to be prevailing lowest levelized tariff and no further discount is offered by any bidder during e-reverse auction event?  For clarity and transparency.	If the Initial Offer for two or more bidders is same and no bids are quoted in e-RA, the instant case seems to be hypothetical however in such case the decision of the competent authority shall prevail.
12.	<b>RFP document</b>  Clause 2.7.2	The important timelines are mentioned in the table including proposed date of issuance of Lol, transfer of SPV etc.  It is observed in the past that in case, there is extension in bid submission date, the revised timelines are not being provided regarding issuance of Lol, transfer of SPV etc.  It is requested to kindly provide the updated table in case of extension in bid submission date.  For clarity	The important timelines are mentioned in the Clause 2.7.2 of RFP document. Further, in case of any extension in bid submission date, it is understood that the timelines of all the subsequent events is being extended accordingly.
13.	<b>RFP document</b>	The important timelines are mentioned in the table including shortlisting and announcement of Qualified	The timelines for shortlisting of qualified bidders and subsequent conduction of e-RA

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	Clause 2.7.2	<p>bidder etc.</p> <p>In case, there is delay in shortlisting of qualified bidders, it is requested to provide the updated dates of conduction of e-RA etc. to enable bidders to prepare for e-Reverse auction.</p> <p>To comply with SBD requirement</p>	shall be done as per timelines stipulated in the RfP.
14.	<p><b>RFP document</b></p> <p>2.8.1 The Bid shall remain valid for a period of one hundred and eighty (180) days from the Bid Deadline.</p>	As per 2.7.2, the Share Purchase Agreement is scheduled to be signed by within about 31 days from submission of Bid. Therefore, the validity of bids may be stipulated to be upto 2 months.	This is as per the Standard Bidding Documents. No change is envisaged.
15.	<p><b>RFP document</b></p> <p>2.15.3 After the date of acquisition of the equity shareholding of SPV [which is under incorporation], along with all its related assets and liabilities, by the Selected Bidder, i. the authority of the BPC in respect of this Bid Process shall forthwith cease and any actions to be taken thereafter will be undertaken by the Nodal Agency,</p>	<p>Role of BPC has to be complete.</p> <p>i. the authority of the BPC in respect of this Bid Process shall forthwith cease and any actions to be taken thereafter will be undertaken by the Nodal Agency, save for those which are related to and consequent to the bidding process adopted by the BPC</p> <p>The BPC shall not relinquish its role after the acquisition but shall have to undertake all activities including providing the certification from the Bid Evaluation Committee etc., and other requirements to enable the Bidder to obtain Transmission license and adoption of Transmission charges. Furthermore, any activity which has an origin traced to the BPC</p>	<p>The role of BPC ends with the transfer of SPV to the successful bidder.</p> <p>However, it may be noted that the BPC shall fulfil its responsibility of providing the certification from the Bid Evaluation Committee to enable the TSP to obtain Transmission license and adoption of Transmission charges.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
		activity/process has to be owned by BPC and the TSP / LTTC is neither aware nor can be made responsible.	
16.	<p><b>RFP document</b></p> <p>2.15.3 ii. all rights and obligations of SPV [which is under incorporation] , shall be of the TSP,</p>	<p>Kindly provide, in detail, the rights and obligations of SPV.</p> <p>To avoid unknown obligations / liabilities.</p>	The provision of RFP is amply clear.
17.	<p><b>RFP document</b></p> <p>2.15.3 iv. contractual obligations undertaken by the BPC shall continue to be fulfilled by the TSP.</p>	<p>What are the obligations that the BPC has undertaken which needs to be fulfilled by the TSP?</p> <p>2.15.3 iv. contractual obligations undertaken by the BPC shall continue to be fulfilled by the TSP if only such contractual obligations have been made available to the bidders 15 days prior to the bid deadline.</p> <p>Nature of contractual obligations cannot be left open as the same is to be fulfilled by the TSP.</p>	The details of the contractual obligations (if any) of BPC to be fulfilled by the TSP shall be intimated as per the provisions of RFP.
18.	<p><b>RFP document</b></p> <p>2.15.3 v.</p> <p>Further, the TSP shall execute the Agreement(s) required, if any, under Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations as amended from time to time</p>	<p>The agreements to be executed are required to be informed to the bidder prior to the bid submission date.</p> <p>Any such changes shall be treated as Change in Law.</p> <p>To avoid unknown obligations / liabilities.</p>	This is as per the Standard Bidding Documents. The provisions of RFP documents shall prevail.

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
19.	<p><b>RFP document</b></p> <p>2.15.4 <b>RFP document</b></p> <p>Within five (5) working days of the issue of the acquisition of the SPV by the Successful Bidder, the TSP shall apply to the Commission for grant of Transmission License and make an application to the Commission for the adoption of Transmission Charges, as required under Section – 63 of The Electricity Act 2003</p>	<p>We request you to consider at least 30 days' time for completion of these activities.</p> <p>Within thirty (30) working days of the issue of the acquisition of the SPV by the Successful Bidder, the TSP shall apply to the Commission for grant of Transmission License and make an application to the Commission for the adoption of Transmission Charges, as required under Section – 63 of The Electricity Act 2003</p>	<p>This is as per the Standard Bidding Documents. No change is envisaged.</p>
20.	<p><b>RFP document</b></p> <p>2.15.6 If the TSP fails to obtain the Transmission License from the Commission, it will constitute sufficient grounds for-annulment of award of the Project</p>	<p>In case TSP fails to obtain the Transmission License the reasons for the same have to be examined.</p> <p>2.15.6 If the TSP fails to obtain the Transmission License from the Appropriate Commission, the treatment shall be as per provisions 3.3 of the TSA.</p> <p>Provisions of 3.3 of TSA provides for consequences for non-fulfilment of conditions subsequent. The provisions of RFP as such have to be reflective of TSA.</p>	<p>This is as per the Standard Bidding Documents. The provisions of RFP documents shall prevail.</p>
21.	<p><b>RFP document</b></p> <p>Annexure 11A:</p>	<p>As against the category of "Bidder himself for 100% equity", it is stated that applicable Board Resolutions are 1,2 and 4 (of Format 1 Annexure-11)</p> <p>However, it is observed that Resolution 2 is not</p>	<p>It is amply clear that the resolution is required in case of consortium only</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
		<p>applicable since the same pertains to a Consortium. Accordingly, the applicable Board Resolutions be stated as 1 and 4 only (Format 1 of Annexure 11) and a suitable amendment be issued.</p> <p>Improper Board resolutions</p>	
22.	<b>General</b>	<p>Kindly confirm:</p> <p>i) whether the Project / Elements are covered under "Generation linked Project" or "System Strengthening Project"</p>	The scheme is generation linked.
23.	<b>General</b>	<p>Kindly confirm:</p> <p>i) Whether the Project/ Elements are eligible for early commissioning incentive as per MoP, GoI order dated 15.07.2015.</p>	The provisions in TSA pertaining to commissioning shall prevail which inter alia covers the matter of preponing of CoD. The TSP may approach the Committee constituted by MoP vide its OM No. 15/1/2013-Trans dated 14.12.2021 to ensure smooth operationalization of the Policy for early commissioning.
24.	General	<p>Kindly confirm, whether clearance for Transmission System under subject project are required from Supreme Court nominated committee as per the order of Hon'ble Supreme Court dated 19.4.2021 in IA No.85618/2020 in WP (Civil) No. 838 of 2019.</p> <p>In case, the same is applicable, the status of the requisite clearance may be furnished.</p> <p>For clarity</p>	<p>Bidders are required to familiarize themselves with all relevant Rules/ Regulations/ Guidelines issued by the Central Government, CERC, CEA or any relevant Authority and amendments thereof.</p> <p>Please refer clause 2.5.7.2 of RFP Document.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
25.	General	<p>Financial Bid opening date is specified in the RFP document. However, in most of the cases, the date is shifted beyond the schedule without any intimation to participant bidders.</p> <p>In such situations, BPC is required to inform the revised date for Financial Bid Opening at least 1 week before the bid opening to enable bidders to take appropriate action for participation in e-RA.</p> <p>For compliance with SBD</p>	The timelines for shortlisting of qualified bidders and subsequent conduction of e-RA shall be done as per timelines stipulated in the RfP.
26.	<p><b>RFP and TSA</b></p> <p>Transmissions License fee has to be paid during the entire validity of the Transmission Service Agreement</p>	<p>The Transmissions License fee which has to be paid during the entire validity of the Transmission Service Agreement is also not stated in the Regulations / Govt. Orders. The same may be furnished.</p> <p>To assess the risk and cost of the Project.</p>	<p>Bidders are advised to ascertain themselves with all the applicable fees, charges, etc.</p> <p>Please refer clause 2.5.7.2 of RFP Document</p>
27.	<p><b>RFP and TSA</b></p> <p><b>The definition of Contract Year in RFP is as under:</b></p> <p>"Contract Year" shall mean the period beginning on the <b>Scheduled COD</b>, and ending on the immediately succeeding March 31 and thereafter each period of 12 ...:</p> <p>And the definition of Contract Year in TSA is</p>	<p>As per RFP, the Contract Year shall start from the Scheduled CoD whereas as per TSA, the Contract Year shall start the CoD. As such, both the definitions are contradictory in nature.</p> <p>It is requested to clarify the correct definition of Contract Year.</p> <p>To avoid ambiguity</p>	The provisions of RFP and TSA are amply clear

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p>as under:</p> <p>“Contract Year”, for the purpose of payment of Transmission Charges, shall mean the period beginning on the COD, and ending on the immediately ...”</p>		
28.	<p>TSA</p> <p>Definitions:</p> <p>“Project Assets” shall mean all physical and other assets relating to and forming part of the Project including:</p> <p>(a) rights over the Site for substations, ROW for transmission lines;</p> <p>(b) tangible &amp; intangible assets such as civil works and equipment including foundations, embankments, pavements, electrical systems, communication systems, relief centres, administrative offices, Substations, software, tower and sub-stations designs etc;</p> <p>(c) project facilities situated on the Site;</p> <p>(d) all rights of the TSP under the project agreements;</p> <p><b>(e) financial assets, such as receivables, security deposits etc;</b></p> <p><b>(f) insurance proceeds; and</b></p>	<p>There could be delay in receipt of payment against receivables. Further, the TSP might have some pending claims against insurance company.</p> <p>How shall TSP receive these legitimate pending claim or charges after transfer of asset to CTU?</p> <p>For clarity</p>	<p>Definition of Project Assets is amply clear. The insurance proceeds will also be transferred by TSP</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p>(g) Applicable Permits and authorisations relating to or in respect of the Transmission System;”</p> <p><b>2.2.2</b> Post the Expiry Date of this Agreement, the TSP shall ensure transfer of Project Assets to CTU or its successors or an agency as decided by the Central Government at zero cost and free from any encumbrance and liability. The transfer shall be completed within 90 days of expiry of this Agreement failing which CTU shall be entitled to take over the Project Assets Suo moto</p>		
<p>29.</p>	<p>TSA</p> <p>“Project Assets” shall mean all physical and other assets relating to and forming part of the Project including:</p> <p>(a) rights over the Site for substations, ROW for transmission lines;</p> <p>(b) tangible &amp; intangible assets such as civil works and equipment including foundations, embankments, pavements, electrical systems, communication systems, relief centres, administrative offices, Substations, software, tower and sub-stations designs etc;</p>	<p>Please confirm that any taxes or charges or cost to be borne by the TSP at the transfer time including sale at value lower than fair value shall be reimbursed to the TSP.</p> <p>These cost are not known at this point of time and might be significant in amount. TSP cannot be exposed such charges.</p> <p>For clarity</p>	<p>Definition of Project Assets is amply clear. The Projects Assets have to be transferred by TSP at zero cost and free from any encumbrance and liability.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p>(c) project facilities situated on the Site;  (d) all rights of the TSP under the project agreements;  <b>(e) financial assets, such as receivables, security deposits etc;</b>  <b>(f) insurance proceeds; and</b>  (g) Applicable Permits and authorisations relating to or in respect of the Transmission System;”</p> <p><b>2.2.2</b> Post the Expiry Date of this Agreement, the TSP shall ensure transfer of Project Assets to CTU or its successors or an agency as decided by the Central Government at zero cost and free from any encumbrance and liability. The transfer shall be completed within 90 days of expiry of this Agreement failing which CTU shall be entitled to take over the Project Assets Suo moto</p>		
30.	<p>TSA</p> <p>A) In accordance with the Bidding Guidelines, the Bid Process Coordinator (hereinafter referred to as BPC) had initiated a competitive e-reverse bidding process through issue of RFP for selecting a Successful Bidder to build, own, operate and</p>	<p>Role of selected bidder and TSP needs to be clear.</p> <p>A) In accordance with the Bidding Guidelines, the Bid Process Coordinator (hereinafter referred to as BPC) had initiated a competitive e-reverse bidding process through issue of RFP for selecting a Successful Bidder who shall acquire the TSP. The TSP shall build, own, operate and transfer the Project comprising of the</p>	<p>This is as per the Standard Bidding Documents. No change is envisaged.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	transfer the Project comprising of the Elements mentioned in Schedule 1 (hereinafter referred to as the Project)	<p>Elements mentioned in Schedule 1 (hereinafter referred to as the Project).</p> <p>TSP is the entity to build, own, operate and transfer the project and not the selected 'Successful Bidder'. The anomaly is to be corrected / redrafted. Provisions have to be properly aligned to reflect the desired course of action.</p>	
31.	<p>TSA</p> <p>B) Pursuant to the said e-reverse bidding process, the BPC has identified the Successful Bidder, who will be responsible to set up the Project on build, own, operate and transfer basis to provide Transmission Service in accordance with the terms of this Agreement and the Transmission License.</p>	<p>Role of selected bidder and TSP needs to be clear.</p> <p>B) Pursuant to the said e-reverse bidding process, the BPC shall identify the Selected Bidder who shall acquire the TSP. The TSP will be responsible to set up the Project on build, own, operate and transfer basis and to provide Transmission Service on long term basis on the terms and conditions contained in this Agreement and the Transmission License.</p> <p>TSP is the entity to build, own, operate and transfer the project and not the selected 'Successful Bidder'.</p> <p>The anomaly is to be corrected / redrafted. Provisions have to be properly aligned to reflect the desired course of action.</p>	This is as per the Standard Bidding Documents. No change is envisaged.
32.	<p>TSA</p> <p>Cl. 2.2.2</p> <p>Post the Expiry Date of this Agreement, the</p>	<p>Modalities for O&amp;M, other expenditure etc. for the transition period of 90 days may be confirmed.</p>	<p>The transfer of all project assets along with substation land, right of way and clearances shall be completed at the end of 35 years from COD of the Project.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p>TSP shall ensure transfer of Project Assets to CTU or its successors or an agency as decided by the Central Government at zero cost and free from any encumbrance and liability. The transfer shall be completed within 90 days of expiry of this Agreement failing which CTU shall be entitled to take over the Project Assets Suo moto.</p>		<p>All the expenditure till the transfer of all project assets along with substation land, right of way and clearances shall be borne by TSP.</p>
33.	<p>TSA            Clause no 2.3: Conditions prior to the expiry of the Transmission License            2.3.1 In order to continue the Project beyond the expiry of the Transmission License, the TSP shall be obligated to make an application to the Commission at least two (2) years before the date of expiry of the Transmission License, seeking the Commission's approval for the extension of the term of the Transmission License up to the Expiry Date.            2.3.2 The TSP shall timely comply with all the requirements that may be laid down by the Commission for extension of the term of the Transmission License beyond the initial term of twenty-five (25) years &amp; upto the Expiry Date and the TSP shall keep the Nodal Agency fully informed about the progress on its application for extension of the term of the Transmission License.</p>	<p>There should be a provision in the TSA to cover the revenue loss that may be incurred by the TSP, in the case of the Appropriate Commission not granting extension of the Transmission License beyond the period of 25 years.</p> <p>The Transmission Charges to be quoted by the bidders would be based on the cash flow generated from the Project for 35 years and if, for any reason not attributable to the TSP (including any change in law), the Transmission License is not extended by the Appropriate Commission beyond 25 years the TSP will suffer significant losses.</p> <p>The RFP / TSA should be suitably modified to provide security of continuation of the transmission business for at least 35 years.</p>	<p>This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
34.	<p>TSA</p> <p>3.1.1 Within ten (10) days from the date of issue of Letter of Intent, the Selected Bidder, shall:</p> <p>a. Provide the Contract Performance Guarantee, and</p> <p>b. Acquire, for the Acquisition Price, one hundred percent (100%) equity shareholding of SPV [which is under incorporation]</p> <p>c. Execute this Agreement;</p> <p>.....</p>	<p>Given the past experience, after the issuance of Lol, the clearance for signing the SPA by the BPC itself takes about one month (30 days). During this period approvals have to be obtained from the competent authority for furnishing inputs to signing of the SPA. The timeline of 10 days is unworkable and as such at least 30 days have to be provided.</p> <p>33.1.1 Within thirty (30) days from the date of issue of Letter of Intent, the Selected Bidder, shall:</p> <p>a. Provide the Contract Performance Guarantee, and</p> <p>b. Acquire, for the Acquisition Price, one hundred percent (100%) equity shareholding of SPV [which is under incorporation]</p> <p>c. Execute this Agreement;</p> <p>.....</p> <p>Non fulfilling of the conditions have ramifications on the selected bidder as per the TSA and accordingly, the time period has to be realistic.</p>	<p>This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.</p> <p>However, the provision for extension provided in clause 2.15.2 of RfP shall be applicable.</p>
35.	<p>TSA</p> <p>3.1.1.....The TSP shall, within five (5) working days from the date of acquisition of SPV by the Selected Bidder, undertake to apply to the Commission for the grant of Transmission License and for the adoption of tariff as required under section-63 of the Electricity Act</p> <p>.....</p>	<p>Definition of working day is not defined in the TSA. Therefore, it is requested to define working day to avoid ambiguity and litigation later on.</p> <p>For clarity and avoiding ambiguity &amp; litigation</p>	<p>The definition working day shall be as per Department of Personnel &amp; Training, Gol.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
36.	<p>TSA</p> <p>3.1.3 The TSP agrees and undertakes to duly perform and complete the following activities <b>within six (6) months</b> from the Effective Date (except for c) below),</p> <p>.....</p> <p>c) To submit to the Nodal Agency, CEA &amp; Independent Engineer, the Project Execution Plan, immediately <b>after award of contract(s)</b> and maximum within <b>one hundred and twenty (120)</b> days from the Effective Date. ....</p> <p>h) <b>To award the Engineering, Procurement and Construction contract ("EPC contract") for the design and construction of the Project and</b> shall have given to such Contractor an irrevocable notice to proceed; an</p>	<p>As per clause 3.1.3 h, the EPC contracts to be awarded in 6 months. Whereas as per clause 3.1.3 c, TSP is required to submit Project Execution Plan after awards of Contracts within 120 days. TSP shall not be in a position to submit project plan within 120 days from effective date if the award of EPC contract is awarded after 120 days, but before 6 months period. As such, the timelines mentioned in above clauses are contradictory and the same may be reviewed.</p> <p>For clarity</p>	<p>Section 3.1.3 is clearly states that period of 6 months is not applicable to clause (c).</p>
37.	<p>TSA</p> <p>Clause 3.3.1: If any of the conditions specified in Article 3.1.3 is not duly fulfilled by the TSP even within three (3) Months..... in accordance with the provisions of this Agreement</p>	<p>Suggested text to be added at the end of this Article: "..... The additional Contract Performance Guarantee, if any provided by the TSP for delay in fulfilment of condition subsequent, shall be returned by the CTUIL on fulfilment of conditions subsequent by the TSP".</p> <p>The additional CPG is for specific default(s) and once such default(s) cease to exist, this additional amount of CPG should be returned.</p>	<p>This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
		Additional CPG cannot be held back by the CTUIL till COD of the Project.	
38.	<p>TSA</p> <p>Clause no 3.3.4: In case of inability of the TSP to fulfil the conditions specified in Article 3.1.3 due to any Force Majeure Event, the time period for fulfilment of the condition subsequent as mentioned in Article 3.1.3, may be extended for a period of such Force Majeure Event. Alternatively, if deemed necessary, this Agreement may be terminated by the Nodal Agency by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement and the Contract Performance Guarantee shall be returned as per the provisions of Article 6.5.1.</p> <p>.....</p>	<p>The terms and conditions for termination of the TSA under this Article, including the termination payment and status of the SPV, need to be provided in the TSA.</p> <p>In case the Force majeure event continues, the TSA will be terminated and the CPG will be returned.</p> <p>Other expenses that would have been incurred till the date of termination of the TSA including the Acquisition Price paid for Acquiring the SPV and other incurred costs shall also be explicitly stated. There should be an explicit provision for refund of the Acquisition Price, along with the other expenses incurred by the TSP / Selected Bidder till such date of termination.</p>	In such cases, provisions of Article 3.3.5 and Article 13.6.1 of TSA shall apply.
39.	<p>TSA</p> <p>3.3.4</p> <p>.....</p> <p>Provided, that due to the provisions of this Article 3.3.4, ..... If the Scheduled COD is extended beyond a period of one hundred eighty (180) days due to the provisions of this</p>	<p>In case project suffers from Force Majeure event for a period less than 6 months, interest cost during construction may be considered.</p> <p>For project viability.</p>	Force Majeure provisions under the TSA are amply clear and shall prevail.

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p>Article 3.3.4, the TSP will be allowed to recover the interest cost during construction corresponding to the period exceeding one hundred eighty (180) days by adjustment in the Transmission Charges in accordance with Schedule 9</p> <p>11.7 (e) Available Relief for a Force Majeure Event</p> <p>For avoidance of doubt, the TSP acknowledges that for extension of Scheduled COD a period up to one hundred eighty (180) days due to Force Majeure event, no compensation on the grounds such as interest cost,.....</p>		
40.	<p>TSA</p> <p>4.6 Interconnection Facilities:</p> <p>4.6.1 Subject to the terms and conditions of this Agreement, the TSP shall be responsible for connecting the Project with the interconnection point(s) specified in Schedule 1 of this Agreement. The Interconnection Facilities shall be developed as per the scope of work and responsibilities assigned in Schedule 1 of this Agreement. The Nodal Agency shall be responsible for coordinating to make available the Interconnection Facilities.</p>	<p>It is understood that if interconnection facilities at the interconnection point is not available, whereas TSP has completed rest of the scope of the project, the project shall be considered as deemed COD and TSP shall be entitled to all the benefits envisaged under the TSA.</p> <p>For clarity.</p>	<p>The provisions of TSA are amply clear and shall prevail.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p>4.6.2 In order to remove any doubts, it is made clear that the obligation of the TSP within the scope of the project is to construct the Project as per Schedule-1 of this Agreement and in particular to connect it to the Interconnection Facilities as specified in this Agreement.</p>		
41.	<p>TSA</p> <p><b>6.1 Connection with the Inter-connection Facilities:</b></p> <p>6.1.1 The TSP shall give the RLDC(s), CTU, / STU, as the case may be, and any other agencies as required, at least sixty (60) days advance written notice of the date on which it intends to connect an Element of the Project, which date shall not be earlier than its Scheduled COD or Schedule COD extended as per Article 4.4.1 &amp; 4.4.2 of this Agreement, unless mutually agreed to by Parties. Further, any preponing of COD of any element prior to Scheduled COD must be approved by the Nodal Agency.</p> <p>6.2.1 An Element of the Project shall be declared to have achieved COD twenty four (24) hours following the connection of the Element with the Interconnection Facilities pursuant to Article 6.1 or seven (7) days after</p>	<p>Reference is drawn to the Order of CERC 4/ADP/2016 dated 23.03.2016. Relevant extract of the Order is reproduced hereunder:</p> <p>“In the event the inter-connection facilities are not ready by SCOD or by revised SCOD (as may be revised by the petitioner and the LTTCS for the purpose of availing incentive as per MOP Policy) on account of non-readiness of the upstream or downstream transmission assets while the petitioner`s transmission system is ready for commissioning, the COD of the transmission assets of the petitioner may be declared in accordance with the provisions of Article 6.2 of the TSA (to be known as „deemed COD“) and the LTTCS/developers of the upstream and downstream assets shall be liable to pay the transmission charges from the deemed COD till the transmission assets are put into actual use.”</p> <p>From above, it is seen that even in case of SCOD when the systems are declared deemed COD as per Article 6.2 of TSA, till the transmission assets are put</p>	<p>This shall be treated as per applicable CERC Regulations/Orders/TSA.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p>the date on which it is declared by the TSP to be ready for charging but is not able to be charged for reasons not attributable to the TSP subject to Article 6.1.2.</p> <p>Provided that an Element shall be declared to have achieved COD only after all the Element(s), if any, which are pre-required to have achieved COD as defined in Schedule 2 of this Agreement, have been declared to have achieved their respective COD.</p> <p>6.2.2 Once any Element of the Project has been declared to have achieved deemed COD as per Article 6.2.1 above, such Element of the Project shall be deemed to have Availability equal to the Target Availability till the actual charging of the Element and to this extent, TSP shall be eligible for the Monthly Transmission Charges applicable for such Element.</p>	<p>into actual use, the transmission charges are liable to be paid by DICs/developers of the upstream and downstream assets.</p> <p>In such situations, it shall be construed that BPC has obtained consent of the DICs/ Upstream / Downstream / Generators (as applicable) for payment of transmission charges.</p> <p>Further, as per CERC order no. 104/MP/2018 dated 18<sup>th</sup> September 2018, downstream was directed to pay transmission charges to TSP.</p> <p>Order of CERC 4/ADP/2016 dated 23.03.2016.</p>	
42.	<p>TSA</p> <p>6.1.3</p> <p>b) it meets the Grid Code, Central Electricity Authority (Technical Standards for Connectivity to the Grid) Regulations, 2007 as amended <b>from time to time</b> and all other Indian legal requirements, and.</p>	<p>It is understood that the connectivity regulations at the time of bidding stage shall be complied with by the TSP, whereas any amendments, if any after bid submission having impact on tariff shall be construed under change in law.</p> <p>For clarity</p>	<p>Provisions of TSA are amply clear in this regard.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
43.	<p>TSA</p> <p><b>Clause 6.3.1 (b)</b></p> <p>In case of delay due to Indirect Non-Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency, TSP is entitled for payment for debt service which is due under the Financing Agreements, subject to a maximum of Transmission Charges calculated on Target Availability, for the period of such events in excess of three (3) continuous or non-continuous Months in the manner provided in (c) below.</p>	<p>Clause 6.3.1 (b) covers the loss on debt amount which includes, due to Indirect Non-Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency, TSP is entitled for payment for debt service which is due under the Financing Agreements. However, any loss on the equity is not covered in the above clause.</p> <p>In order to compensate for the loss due to Indirect Non-Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency, compensation to both equity as well as debt to be covered as per clause 6.3.1 (a).</p>	<p>This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.</p>
44.	<p>TSA</p> <p>7.1 The TSP shall be responsible for ensuring that the Project is operated and maintained in accordance with the regulations made by the <b>Commission</b> and <b>CEA from time to time</b> and provisions of the Act.</p>	<p>It is understood that the regulations of Commission and CEA at the time of bidding stage shall be complied with by the TSP, whereas any amendments, if any <b>after bid submission having impact on tariff shall be construed under change in law.</b></p> <p>For Clarity</p>	<p>Provisions of TSA are amply clear in this regard.</p>
45.	<p>TSA</p> <p>10 BILLING AND PAYMENT OF TRANSMISSION CHARGES</p> <p>10.3 Rebate &amp; Late Payment Surcharge</p>	<p>Any changes in CERC regulations, which have an implication on Billing cycle and/or cost implication to the TSP due to change in rebate and late payment surcharge, the same shall be allowed to be recovered under Change in law.</p>	<p>This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.</p>
46.	<p>TSA</p> <p>Clause no. 10.1: Subject to provisions of this Article 10, the Monthly Transmission Charges</p>	<p>Subject to provisions of this Article 10, the Monthly Transmission Charges shall be paid to the TSP, in Indian Rupees, on monthly basis as per the provisions</p>	<p>This is as per the Standard Bidding Documents. The provisions of TSA shall</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	shall be paid to the TSP, in Indian Rupees, on monthly basis as per the provisions of the Sharing Regulations, from the date on which an Element(s) has achieved COD until the Expiry Date of this Agreement, unless terminated earlier and in line with the provisions of Schedule 4 of this Agreement.	of the Sharing Regulations, from the date on which an Element(s) has achieved COD <b><u>or deemed to have achieved COD</u></b> until the Expiry Date of this Agreement, unless terminated earlier and in line with the provisions of Schedule 4 of this Agreement.  As per clause 6.2 of the TSA, the TSP is eligible for payment of Transmission charges from the date of deemed COD.	prevail.
47.	TSA 11.4 Force Majeure Exclusions 11.4.1 (g) Any error or omission in the survey report provided by BPC during the bidding process.	The survey report furnished by BPC has to be accurate and any error or omission has to be owned by the BPC. Professional fees including fees for survey report is also claimed by BPC.	As per the provisions of RFP, BPC prepares the Survey Report and furnish the same to bidders.  Bidders may note that the survey report prepared based on preliminary walk over survey and shared with bidders as reference only. Further, Bidders are advised to inform themselves fully as per clause 2.14.2 of RFP.  The provisions of Force Majeure Exclusions in TSA shall prevail.
48.	TSA 12.1.1 Change in law	Any change in acquisition price is a cost to the TSP and needs to be compensated under change in law. Alternatively, BPC should refrain from increasing the Acquisition price after bid submission.	The change in acquisition price to the extent as per Provisions under Clause No. 3.5 of Tariff Based Competitive Bidding Guidelines for Transmission Service issued on 10.08.2021 shall prevail.
49.	TSA Clause 12.1.1	It is mentioned that in case any change in law event occurs on bid submission date or just prior to bid	This is as per the Standard Bidding Documents. The provisions of TSA shall

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	Change in Law means the occurrence of any of the following <b>after the Bid Deadline</b> resulting into any additional recurring / non-recurring expenditure by the TSP or any savings of the TSP....	<p>submission date, the bidders shall not have adequate time to understand the cost implication of such change in law event. Bidders cannot be exposed to such uncertainties and thereafter it is requested to consider any event <b>after 7 days prior to bid deadline as Change in Law event.</b></p> <p>Furthermore, the bid submission is fixed at 12 noon. Whereas change in event could happen during the day even after 12 noon. Such clause can have serious implications on the viability of the project.</p>	prevail.
50.	<p>TSA 12.1.2 Notwithstanding anything contained in this Agreement, Change in Law shall not cover any change:</p> <p>a. Taxes on corporate income; and; and</p> <p>b. Withholding tax on income or dividends distributed to the shareholders of the TSP.</p>	<p>Any tax applied on the income or profits of the TSP need to be covered under change in law. Tax is an element beyond the control of the TSP.</p> <p>Change in tax or introduction of any tax is covered under change in law.</p> <p>Tax rate applicable on the income or profits of the TSP is beyond the control of the TSP and to assume the same for 35 years shall be a risk which is best assumed by the LTTCs accordingly this is to be reviewed.</p>	<p>This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.</p> <p>Further, please refer Clause 2.5.7 of RFP.</p>
51.	<p>TSA <b>Clause 13.7</b></p> <p>If Agreement is terminated on account of Force Majeure Events, nonrequirement of any Element or Project during Construction,</p>	<p>Kindly furnish the methodology of calculation of valuation of project asset.</p> <p>For clarity</p>	<p>Valuation of project assets shall be done as per the prevailing industry practices.</p> <p>Further, please refer Clause 18.2.e. of TSA.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	Nodal Agency's non-fulfilment of Role & TSP's Event of Default, the TSP shall be entitled for Termination Payment equivalent to valuation of Project Assets. Upon payment, the Nodal Agency shall take over the Project Assets		
52.	Connection Agreement	A draft copy of the Connection Agreement may be furnished.	Connection Agreement is available on the website of CTUIL and same may be referred.
53.	TSA <b>General</b>	Kindly inform when shall the TSA be signed?  Is it signed before Bid submission (pre-signed TSA) or before the signing of SPA or after the signing of SPA.  For clarity	As per revised TBCB Guidelines and SBDs issued by MOP, GoI, TSP on the date of acquisition of SPV from the BPC will enter into a Transmission Service Agreement (TSA) with the Nodal Agency.
54.	<b>RFP (TECHNICAL REQUIREMENTS FOR TRANSMISSION LINE)</b>  Transmission line route shall be finalized, in consultation with appropriate authorities so as to avoid the habitant zones of endangered species and other protected species. Bird diverters, wherever required, shall be provided on the line	Since the SPV is with BPC, Bidder can't finalize the route in consultation with the concerned authorities so as to avoid the habitant zones of endangered species and other protect species because it shall not be entertained at the time of bidding stage. Accordingly, BPC is requested to initiate all such actions for the route provided by BPC as part of Survey Report.  For realistic bid estimation	BPC shall complete its responsibilities as listed in the RFP documents Further, please refer Clause 2.5.7 of RFP document.
55.	RFP Specific Technical Requirements for Substation	We understand that Spare unit 1-Phase 110 MVAR, 765/V3 kV Shunt Reactor is existing at Bikaner-III & Neemrana-II end and shall be utilized for line reactor	It is envisaged that existing Auxiliary buses (765kV & 145kV) shall be extended under present scope. 1-ph CB required for switching

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p><b>Clause no. B.2.1</b> <b>Shunt Reactor</b> Connection arrangement for utilization of existing Spare 1-phase Shunt Reactor unit: TSP shall make the arrangement in such a way that the existing spare unit can be utilized for line reactor banks under present scope without its physical movement</p>	<p>banks under present scope without its physical movement.</p> <p>In this regard please clarify who will provide 1-Ph Circuit breaker for this spare reactor unit along with associated CB relay panel &amp; CT Switching scheme arrangement etc.</p> <p>Further we also understand that Aux buses (765kV &amp; 145kV) Shall be constructed for present scope only.</p> <p>For estimation purpose.</p>	<p>arrangement of spare reactor (for utilizing bus reactor as well as line reactor) shall be available at Bikaner-III &amp; Neemrana-II s/s.</p>
56.	<p>RFP Specific Technical Requirements for Substation</p> <p><b>B.3.3</b> <b>Oil evacuating, filtering, testing &amp; filling</b> To monitor the quality of oil for satisfactory performance of transformers, shunt reactors and for periodical maintenance necessary oil evacuating, filtering, testing and filling apparatus would be provided at new substations. Oil storage tanks of adequate capacities for storage of transformer oil would be provided</p>	<p>We understand that oil filtration machine &amp; oil storage tanks are applicable for new substations. Kindly confirm oil filtration machine &amp; oil storage tanks are not envisaged in present scope.</p> <p>For estimation purpose</p>	<p>Oil filtration machine &amp; oil storage tanks of adequate capacities shall be arranged by the TSP only.</p>
57.	<p><b>RFP &amp; TSA</b></p>	<p>We request you to clarify whether there are any deviations/addition in the RFP/TSA documents from</p>	<p>The RFP/ TSA Documents are as per the Standard Bidding Documents (SBDs) and</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	General	the Standard Bidding documents (SBD) and if any, whether approval for the same has been taken or not.  Please provide the list of the same, if any.	subsequent amendments issued by the Ministry of Power, GoI.
58.	<b>RFP</b>  General	Please let us know the status of Regulatory Approvals for the project.  SPV Acquisition is linked to regulatory approval and it is very important to get the clearance before RFP Submission as this will impact the initiation of projects.	Transmission system is approved as per MoP Electricity (Transmission System Planning, Development and Recovery of Inter-State Transmission Charges) Rules, 2021. Regulatory approval would not be required for implementation of any ISTS project after approval by MoP.
59.	<b>RFP</b>  General	We request you to let us know the status of TSA signing.  SPV Acquisition is linked to TSA Signing and it is very important to get the clearance before RFP Submission as this will impact the initiation of projects	As per revised TBCB Guidelines and SBDs issued by MOP, GoI, TSP on the date of acquisition of SPV from the BPC will enter into a Transmission Service Agreement (TSA) with the Nodal Agency.
60.	<b>RFP</b>  <b>Clause 1.6.2.1 (2):</b>  To obtain approval for laying of overhead transmission lines under Section 68 of Electricity Act, from the Government at least twenty (20) days prior to Bid Deadline.	It is requested you to kindly provide present status of process initiated by BPC with regard to section 68 approval.	The prior approval under Section 68 shall be shared with the successful bidder
61.	<b>RFP</b>	It is requested you to kindly provide present status of Forest Clearances if any transmission line corridor	Based on the route survey, the process of initiation of forest clearance for the forest

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p><b>Clause 1.6.2.1 (4):</b></p> <p>To initiate process of seeking forest clearance, if required.</p>	<p>area falling in wildlife forest / reserve forest/ mangroves.</p>	<p>stretches, if any, enroute the proposed line alignment will be initiated by way of writing letters to the concerned authority (ies).</p> <p>However, it may be noted that it will be the responsibility of TSP for obtaining forest clearance for the forest stretches as provided in the Survey Report or any forest encountered during construction.</p>
62.	<p><b>RFP, Clause 1.6.2.2:</b></p> <p>The details and documents as may be obtained by the BPC/ project specific SPV in relation to the Project shall be handed over to the TSP on an as-is-where-is basis, so that it may take further actions to obtain Consents, Clearances and Permits</p>	<p>Please provide copy of all such document available with you from the State Government and/or Ministry of Power and/or kindly facilitate for State Support Agreement.</p>	<p>The necessary support shall be provided on case to case basis.</p>
63.	<p><b>RFP</b></p> <p>Clause 1.10</p> <p>The Ministry of Power and the appropriate state government(s) shall provide their support to the TSP, on best endeavor basis, in enabling the TSP to develop the Project.</p>	<p>We request you to share all such documents or correspondence happened with MOP and State Government, this will help the TSP is taking further approvals for the project.</p>	<p>The necessary support shall be provided on case to case basis.</p>
64.	<p><b>RFP</b></p> <p>Clause 1.12</p>	<p>BPC is requested to provide the list of details &amp; documents to be handed over to the Successful Bidder.</p>	<p>BPC will provide all the requisite documents/ certifications under the Guidelines and the Standard Bidding Documents to the Successful Bidder at the time of transfer of SPV.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p>Once the Successful Bidder is selected, the details and documents as may be obtained by the BPC/ project specific SPV in relation to the Project, shall be handed over to the Successful Bidder on as is where basis, so that it may take further actions to obtain all necessary Consents, Clearances and Permits and the TSP shall not be entitled for any extensions in the Scheduled COD of the Project except as provided for in the TSA.</p>		
65.	<p><b>RFP</b></p> <p>Clause 2.15.2</p> <p>Within ten (10) days of the issue of the Letter of Intent, the Selected Bidder shall:</p> <p>a) provide the Contract Performance Guarantee in favour of the Nodal Agency as per the provisions of Clause 2.12</p> <p>b) execute the Share Purchase Agreement and the Transmission Service Agreement</p> <p>acquire, for the Acquisition Price, one hundred percent (100%) equity shareholding of [Insert the name of the SPV] from PFC Consultancy Limited, who shall sell to the Selected Bidder, the equity shareholding of [Insert the name of the SPV], along with all its related assets and liabilities;</p>	<p>BPC will appreciate that the completion of said activities by the Selected Bidder within ten (10) days after issuance of Lol is very stringent.</p> <p>Also, execution of SPV / signing of share purchase agreement is not within the control of TSP as it is dependent on certain regulatory approvals as well. We therefore request to consider at least 30 day's time for completion of these activities as well as provide a carve out for consequences if the delay is not on account of TSP.</p>	<p>This is as per the Standard Bidding Documents. The provisions of RFP shall prevail.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
66.	<p><b>RFP</b></p> <p>Clause 2.15.2</p> <p>Stamp duties payable on purchase of one hundred percent (100%) of the equity shareholding of [Insert the name of the SPV], along with all its related assets and liabilities, shall also be borne by the Selected Bidder.</p>	<p>We request you to provide Applicable Stamp Duty Charges and Amount of Stamp Paper for the following agreements:</p> <ul style="list-style-type: none"> <li>i. Transmission Service Agreement</li> <li>ii. Share Purchase Agreement</li> <li>iii. Power of Attorney</li> <li>iv. Share Transfer Form</li> </ul> <p>It will be helpful if you can specify the name of 1st party and 2nd party for purchase of stamp papers.</p>	<p>The value of stamp paper/stamp duty along with party for the following is given below:</p> <ul style="list-style-type: none"> <li>i) Transmission Service Agreement – Rs. 100/- (1st Party : LTTCs, 2nd Party : SPVs)</li> <li>ii) Share Purchase Agreement-Rs. 100/- (1st Party : BPC, 2nd Party : SPV, 3rd Party, TSP)</li> <li>iii) Power of Attorney – Rs. 100/-</li> <li>iv) Share Transfer Form – 0.25% of Share Value at par of Rs. 1,00,000/-</li> </ul>
67.	<p><b>RFP</b></p> <p>Clause 2.15.4</p> <p>Within five (5) working days of the issue of the acquisition of the SPV by the Successful Bidder, the TSP shall apply to the Commission for grant of Transmission License and make an application to the Commission for the adoption of Transmission Charges, as required under Section – 63 of The Electricity Act 2003.</p>	<p>Clause 2.15.4 may be reworded as below -</p> <p>Within ten (10) working days of the issue of the acquisition of the SPV by the Successful Bidder, the TSP shall apply to the Commission for grant of Transmission License and make an application to the Commission for the adoption of Transmission Charges, as required under Section – 63 of The Electricity Act 2003.</p> <p>The condition to apply for grant of transmission license and make application for adoption of transmission charges within 5 days is onerous. Request to please change the relevant provisions as per the suggested text in RFP and TSA</p>	<p>Documents. The provisions of RFP shall prevail.</p> <p>Further, the provision for extension provided in Clause 2.15.2 of RFP document shall be applicable.</p>
68.	<p><b>RFP</b></p> <p>Clause 2.15.5</p>	<p>It is requested to kindly clarify as to what will be the consequences if the Selected Bidders fails to comply with any of Its obligations under 2.15.2, 2.15.3 and</p>	<p>This is as per the Standard Bidding Documents. The provisions of RFP shall prevail.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p>If the Selected Bidder / TSP fails or refuses to comply with any of its obligations under Clauses 2.15.2, 2.15.3 and 2.15.4, and provided that the other parties are willing to execute the Share Purchase Agreement and PFC Consultancy Limited is willing to sell the entire equity shareholding of [Insert the name of the SPV], along with all its related assets and liabilities, to the Selected Bidder, such failure or refusal on the part of the Selected Bidder shall constitute sufficient grounds for cancellation of the Letter of Intent. In such cases, the BPC / its authorized representative(s) shall be entitled to invoke the Bid Bond of the Selected Bidder.</p>	<p>2.15.3 due to reasons beyond the control of or not attributable to Selected Bidder / TSP.</p> <p>As the consequences for failure to comply the obligations under 2.15.2, 2.15.3 and 2.15.3 is the cancellation of Letter of Intent (LOI). We request you to reconsider the same as it would be unfair if LOI of selected bidder is cancelled due to reasons beyond its control.</p>	<p>Further, the provision for extension provided in Clause 2.15.2 of RFP document shall be applicable.</p>
69.	<p><b>RFP</b></p> <p><b>Clause 2.4.3</b></p> <p>The amendment to the RFP shall be notified to all the Bidders through the electronic bidding platform and shall be binding on them.</p>	<p>We understand that the BPC will also continue to share amendments / corrigendum through emails as per the current practice.</p>	<p>This is as per the Standard Bidding Documents. The provisions of RFP shall prevail.</p>
70.	<p><b>RFP</b></p> <p><b>Clause 3.6.1</b></p> <p>However, if no bid is received during the e-</p>	<p>We request you to clarify, if two or more bidders quote the same initial offer which turns out to be prevailing lowest levelized tariff and no further discount is offered by any bidder during e-reverse</p>	<p>The Board Resolutions passed by the Management Committee with duly authorized from the Board of Directors may be considered as per the provisions of RFP.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	reverse bidding stage then the Bidder with lowest quoted initial transmission charges ("Initial Offer") during e-bidding stage shall be declared as the Successful Bidder,	<p>auction.</p> <p>In such case what will be the modality BPC will follow for award of project.</p> <p>BPC to confirm</p>	
71.	<p><b>RFP</b></p> <p>General</p>	<p>We request you to kindly accept the Board resolutions passed by Management Committees formed by the Board of Directors of Bidding Company and TEE / affiliate respectively and duly authorized by the Board of Directors for participation in various tenders issued by Govt. authorities in response to the RFP submission.</p> <p>The board meeting of Bidding Company / TEE may not be scheduled till RFP submission.</p> <p>Thus, we request you to kindly consider the board resolution passed by the management committee formed by the board of directors' w.r.t. Authorization from Bidding Company and TEE.</p>	<p>The Board Resolutions passed by the Management Committee with duly authorized from the Board of Directors may be considered as per the provisions of RFP.</p>
72.	<p><b>RFP ANNEXURE 22 – FORMAT FOR AFFIDAVIT</b></p>	<p>We understand that the declaration and details with respect to conviction and investigation is to be provided for Affiliate / Parent company of the Bidding company only if such an Affiliate / Parent company is being used for meeting financial / technical qualification requirements.</p>	<p>The declaration and details with respect to Clause 2.1.9 of RFP is to be provided by the bidding company including Affiliate / Parent company of the Bidding company being used for meeting financial/technical qualification requirements as per Annexure 22 of the RFP document.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
73.	<p><b>TSA</b></p> <p><b>Article 3.3.1</b></p> <p>If any of the conditions specified in Article 3.1.3 is not duly fulfilled by the TSP even within three (3) Months after the time specified therein, then on and from the expiry of such period and until the TSP has satisfied all the conditions specified in Article 3.1.3, the TSP shall, on a monthly basis, be liable to furnish to Central Transmission Utility of India Limited (being the Nodal Agency) additional Contract Performance Guarantee of Rs. 4.20 Crore (Rupees Four Crore Twenty Lakh Only) within two (2) Business Days of expiry of every such Month. Such additional Contract Performance Guarantee shall be provided to Central Transmission Utility of India Limited (being the Nodal Agency) in the manner provided in Article 3.1.1 and shall become part of the Contract Performance Guarantee and all the provisions of this Agreement shall be construed accordingly. Central Transmission Utility of India Limited (being the Nodal Agency) shall be entitled to hold and / or invoke the Contract Performance Guarantee,</p>	<p>In view of the rationale provided here, it is requested to amend the provision regarding refund of additional CPG on fulfillment of Conditions Subsequent.</p> <p>Additional CPG shall be recovered for the non-fulfillment of Conditions Subsequent. However, this additional CPG is then forming part of CPG and is being retained by Nodal Agency.</p> <p>Considering the fact that additional CPG is consequential guarantee for performance related to condition subsequent, it is requested to review the provision and amend the provision to refund the additional CPG on fulfillment of Conditions Subsequent.</p>	<p>This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	including such additional Contract Performance Guarantee, in accordance with the provisions of this Agreement.		
74.	<p><b>TSA</b></p> <p><b>Clause 1.6.1.5</b></p> <p>The TSP shall seek approval under Section 164 of Electricity Act, from CEA after acquisition of [Insert the name of the SPV], The approval shall be granted by CEA generally within 30 days but in no case later than 45 days from the date of receipt of application (complete in all aspects).</p>	<p>It is requested you to kindly clarify whether process of obtaining authorization U/s 164 of Electricity Act, 2003 would be initiated by BPC.</p> <p>It is suggested that BPC may initiate the process for obtaining approval U/s 164 based on the survey undertaken by BPC.</p> <p>It may be appreciated that obtaining approval U/s 164 takes considerable time. In the interest of timely completion of project, it is suggested that BPC may initiate the process U/s 164.</p>	<p>Approval under Section 164 is in the scope of TSP.</p> <p>Please also refer Clause 2.5.6 (m) &amp; 2.5.7 of the RFP document</p>
75.	<p><b>TSA</b></p> <p><b>Article 4.4 Extension of Time</b></p>	<p>TSP is required to obtain certain clearances/ approval such as authorization u/s 164, Forest clearance, Grant of Transmission License and approval for adoption of tariff etc. In case if there is any delay in these approvals beyond stipulated time, such delay shall be considered for extension of SCOD of the project and any consequential increase in cost shall be allowed through appropriate adjustment in the tariff.</p> <p>Clearances/ approval such as authorization u/s 164, Forest clearance, Grant of Transmission License and approval for adoption of tariff are not within the control of TSP once it has been applied after fulfilling</p>	<p>This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
		all the necessary compliance, any consequential delay is required to be allowed.	
76.	<p><b>TSA</b></p> <p><b>Article 5.1.2</b></p> <p>The TSP acknowledges and agrees that it shall not be relieved from any of its obligations under this Agreement or be entitled to any extension of time or any compensation whatsoever by reason of the unsuitability of the Site or Transmission Line route(s).</p>	<p>TSP cannot be burdened with impact of unsuitability of the site or transmission line route due to reasons beyond control. Therefore, suitable revision may be carried out in clause 5.1.2.</p> <p>There may be number of reasons for unsuitability of the site or transmission line route which are beyond control of the TSP.</p> <p>For such instances, suitable extension of time and appropriate adjustment in tariff shall be provided.</p>	This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.
77.	<p><b>TSA, Article 5.6</b></p> <p><b>Site regulations and Construction Documents</b></p> <p>The TSP shall abide by the Safety Rules and Procedures as mentioned in Schedule 3 of this Agreement</p> <p>The TSP shall retain at the Site and make available for inspection at all reasonable times copies of the Consents, Clearances and Permits, construction drawings and other documents related to construction.</p>	<p>Inspection of Construction drawings and other documents related to construction may be deleted from clause no. 5.6.</p> <p>Construction drawings and few specific documents may be proprietary/ confidential and is against commercial interest of the TSP.</p>	This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
78.	<p><b>TSA</b></p> <p><b>Article. 6.4.1</b></p> <p>Liquidated Damages for Delay in achieving COD of Project by TSP.</p>	<p>If the TSP fails to achieve COD for any Element of the Project or for the Project by SCOD, then the TSP is required to pay liquidated damages. It is noted that, Clause 6.4.1 of the TSA does not exclude delays caused due to a Force Majeure or Nodal Agency's default. This may well be a drafting oversight and may be clarified.</p> <p>The TSP should also not be liable to pay liquidated damages in the event the delay is not attributable to the TSP. Accordingly, it may be clarified that no damages will be payable in the event the delay is on account of Force Majeure or Nodal Agency's default.</p>	<p>This is as per the Standard Bidding Documents. The provisions of TSA shall prevail</p>
79.	<p><b>TSA</b></p> <p><b>Article 11.3 Force Majeure</b></p> <p>A 'Force Majeure' means any event or circumstance or combination of events and circumstances including those stated below that wholly or partly prevents or unavoidably delays an Affected Party in the performance of its obligations/ roles under this Agreement, but only if and to the extent that such events or circumstances are not within the reasonable control, directly or indirectly, of the Affected Party and could not have been avoided if the Affected Party had taken</p>	<p>Underlined text may be added under Article 11.3 :</p> <p>A 'Force Majeure' means any event or circumstance or combination of events and circumstances including those stated below that wholly or partly prevents or unavoidably delays an Affected Party or <b>makes performance of obligation commercially unviable for the Affected Party</b> in the performance of its obligations/ roles under this Agreement, but only if and to the extent that such events or circumstances are not within the reasonable control, directly or indirectly, of the Affected Party and could not have been avoided if the Affected Party had taken reasonable care or complied with Prudent Utility</p>	<p>This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	reasonable care or complied with Prudent Utility Practices:	Practices:  TSA	
80.	<p><b>TSA &amp; RFP</b></p> <p><b><u>Provisions in TSA</u></b></p> <p><i>(Provision related to non fulfilment of condition subsequent)</i></p> <p>3.3.6 The Nodal agency, on the failure of the TSP to fulfil its obligations, if it considers that there are sufficient grounds for so doing, apart from invoking the Contract Performance Guarantee under para 3.3.3 may also initiate proceedings for blacklisting the TSP as per provisions of Article 13.2 of TSA.</p> <p><i>(Termination procedure for TSP event of default)</i></p> <p><b>13.2</b> Further, the Nodal Agency may also initiate proceedings to blacklist the TSP &amp; its Affiliates from participation in any RFP issued by BPCs for a period of 5 years.</p> <p><b><u>Provisions in RFP</u></b></p> <p><i>(Non fulfilment of Obligations by TSP post issuance of Lol and post acquisition of SPV)</i></p>	<p>The blacklisting of TSP for a period of 5 years for default, failure to complete conditions subsequent &amp; annulment of award, and for indefinite period for error in online and physical submission is onerous and harsh on TSP.</p> <p>TSP's event of default covers a lot of activities, and if TSP fails to comply with even one activity, TSP is at risk of getting blacklisted.</p> <p>Further, TSA provides discretionary right to Nodal agency to decide whether TSP would be blacklisted.</p> <p>In case of discrepancy in submission, it is requested that BPC shall seek clarification from bidder and upon failure to provide clarification and complete investigation only, should construe such activity as fraudulent practice.</p> <p>Hence it is requested to include blacklisting only in extreme cases and provide definite guidelines on Nodal Agency's right to blacklist bidders. Also in RFP, blacklisting for annulment of project award would be done by government, while in other cases it would be done by Nodal Agency. It is requested that blacklisting rights shall only reside with government.</p>	This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p><b>2.15.8</b> The annulment of the award, under Clause 2.15.5 or 2.15.6 of this RFP, shall be sufficient grounds for blacklisting the bidder, whose award has been annulled, for a period of five years or more, as decided by the National Committee on Transmission, provided that the blacklisting shall be done only after giving the bidder an opportunity for showing cause.</p> <p><i>(Discrepancy in online and physical submission of selected bidder)</i></p> <p>3.6.1 In case, there is a discrepancy between the online submission and physical documents, the bid would be out rightly rejected and the bidder shall be construed to have engaged in the fraudulent practice as defined in Clause 2.19.3 with consequences as mentioned in Clause 2.19.2. Further, in such a case, the provisions of Clause 2.5.6 (j) shall apply.</p>		
81.	<p><b>TSA</b></p> <p><b>13.3 Procedure for Nodal Agency's non-fulfilment of Role</b></p> <p>a. Upon the Nodal Agency not being able to fulfil its role under Article 4.2. the TSP may serve notice on the Nodal Agency, with a copy to CEA and the Lenders' Representative (a "TSP's Preliminary Notice"), which notice</p>	<p><b>13.3 Procedure for Nodal Agency's non-fulfilment of Role</b></p> <p>a. Upon the Nodal Agency not being able to fulfil its role under Article 4.2. the TSP may serve <b>TERMINATION</b> notice on the Nodal Agency, with a copy to CEA and the Lenders' Representative (a "TSP's Preliminary <b>Termination</b> Notice").</p> <p>The contract clauses as per TSA favors the Nodal Agency. All the termination rights are provided to Nodal Agency and the agreement does not provide</p>	<p>This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	shall specify in reasonable detail the circumstances giving rise to such non-fulfillment of role by the Nodal Agency.	<p>the other party (TSP) right to terminate in case of default of Nodal Agency.</p> <p>In absence of termination right, TSP is at risk commercially, if Nodal agency fails to fulfill its assigned responsibilities, for example failure of Nodal Agency to pay the quoted transmission charges.</p> <p>Also, the methodology for computation of compensation to TSP, in case of mutual agreement to terminate, should be defined upfront.</p>	
82.	<p><b>TSA</b></p> <p>3.3.4 In case of inability of the TSP to fulfil the conditions specified in Article 3.1.3 due to any Force Majeure Event, the time period for fulfilment of the condition subsequent as mentioned in Article 3.1.3, may be extended for a period of such Force Majeure Event. Alternatively, if deemed necessary, this Agreement may be terminated by the Nodal Agency by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement and the Contract Performance Guarantee shall be returned as per the provisions of Article 6.5.1.</p> <p>4.4.2 In the event that an Element or the</p>	<p>3.3.4 In case of inability of the TSP to fulfil the conditions specified in Article 3.1.3 due to any Force Majeure Event, the time period for fulfilment of the condition subsequent as mentioned in Article 3.1.3, may be extended for a period of such Force Majeure Event.</p> <p><b><u>In case the Force Majeure Event continues even after a period of one hundred and eighty (180) days if deemed necessary, the Nodal Agency or TSP, upon mutual agreement may terminate the Agreement as per the provisions of Article 13.4 by giving a Termination Notice to the other party,</u></b> in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement and the Contract Performance Guarantee shall be returned as per the provisions of Article 6.5.1.</p> <p>4.4.2 In the event that an Element or the Project</p>	This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p>Project cannot be commissioned by its Scheduled COD on account of any Force Majeure Event as per Article11, the Scheduled COD shall be extended, by a 'day to day' basis for a period of such Force Majeure Event. <b>Alternatively, if deemed necessary, the Nodal Agency may terminate the Agreement</b> as per the provisions of Article 13.4 by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement.</p> <p>13.4 Termination due to Force Majeure</p> <p>13.4.1 In case the Parties could not reach an agreement pursuant to Articles 3.3.4 and 4.4.2 of this Agreement and the Force Majeure Event or its effects continue to be present, the Nodal Agency shall have the right to cause termination of the Agreement. In case of such termination, the Contract Performance Guarantee shall be returned to the TSP as per the provisions of Article 6.5.1.</p>	<p>cannot be commissioned by its Scheduled COD on account of any Force Majeure Event as per Article11, the Scheduled COD shall be extended, by a 'day to day' basis for a period of such Force Majeure Event. <b><u>In case the Force Majeure Event continues even after a period of one hundred and eighty (180) days if deemed necessary, the Nodal Agency or TSP, upon mutual agreement may terminate the Agreement</u></b> as per the provisions of Article 13.4 by giving a Termination Notice to <b>the other party</b>, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement.</p> <p>In case of delay in SCOD due to FM event, the provision gives discretionary right to Nodal Agency to terminate TSA after occurrence of FM event. There should be gestation period of at least 6 months after start of FM event. Post completion of 6 months, both parties may decide to terminate the contract on mutual agreement. In case of FM, there should not be any unilateral right to terminate. Also, the methodology for computation of compensation to TSP, in case of mutual agreement to terminate, should be defined upfront.</p>	
83.	<b>TSA</b>	This is very stringent clause and provides for agreement termination at the subjective discretion of	This is as per the Standard Bidding Documents. The provisions of TSA shall

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p>Clause 5.8 "Remedial Measures:</p> <p>The TSP shall take all necessary actions for remedying the shortfall in achievement of timely progress in execution of the Project, if any, as intimated by the Independent Engineer and/ or CEA and/ or the Nodal Agency. However, such intimation by the Independent Engineer and/ or CEA and/ or the Nodal Agency and the subsequent effect of such remedial measures carried out by the TSP shall not relieve the TSP of its obligations in the Agreement. Independent Engineer and/ or CEA and/ or the Nodal Agency may carry out random inspections during the Project execution, as and when deemed necessary by it. <b>If the shortfalls as intimated to the TSP are not remedied to the satisfaction of the CEA and/ or the Nodal Agency, this Agreement may be terminated by the Nodal Agency by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement ."</b></p>	<p>Nodal Agency. Request to modify the clause as:</p> <p><b>..... If the shortfalls as intimated to the TSP are not remedied to the satisfaction of the CEA and/ or the Nodal Agency, it may refer the same to the Appropriate Commission for appropriate action.</b></p>	<p>prevail.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
84.	<p><b>TSA</b></p> <p>13.7 Termination Payment</p> <p>13.7.1 If Agreement is terminated on account of Force Majeure Events, nonrequirement of any Element or Project during Construction, Nodal Agency's non-fulfilment of Role &amp; TSP's Event of Default, the TSP shall be entitled for Termination Payment equivalent to valuation of Project Assets. Upon payment, the Nodal Agency shall take over the Project Assets.</p>	<p>Guidelines on valuation of project assets conducted should be provided to ensure there is no ambiguity.</p> <p>Further if TSA is terminated during operating period of project, guidelines on valuation of assets in such event to be provided.</p>	<p>Valuation of project assets shall be done as per the prevailing industry practices. Please refer Clause No. 18.2.e. of TSA.</p>
85.	<p><b>TSA</b></p> <p>13.5 Termination or amendment due to non-requirement of any Element or Project during construction</p> <p>13.5.1 In case any Element or Project, which is under construction, is no longer required due to any reason whatsoever, the Nodal Agency may issue a notice to this effect to the TSP.</p> <p>13.5.2 Nodal agency may also issue notice to the TSP seeking their response to the proposed termination/ amendment (as the case may be) of the Agreement. The Nodal</p>	<p>Guidelines on amendment of TSA in case of non-requirement of any element during construction should be clearly specified, especially the treatment of Quoted Transmission Charges and capital cost of element no longer required.</p> <p>For example, if 50% construction of an element is completed and that element is not required, how would the TSP be compensated for the capital cost of the element.</p>	<p>Valuation of project assets shall be done as per the prevailing industry practices. Please refer Clause No. 18.2.e. of TSA.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p>Agency shall issue copy of such notice to Lenders. In the notice, Nodal Agency shall also include an assessment of the physical progress made by TSP in the Element/ Project (as the case may be) that is no longer required.</p> <p>13.5.3 The TSP shall neither carry out further Investment nor carry out any work on the Element/ Project (as the case may be) that is no longer required after delivery of the notice.</p> <p>13.5.4 After taking into account the comments of the TSP, the Nodal Agency may terminate the Agreement or amend it if both Parties agree to the amendment.</p>		
86.	<p><b>TSA</b></p> <p>12. Change in Law</p>	<p>Inclusion of change in acquisition price in Change in Law. As SPV acquisition price is part of capital cost of project, any change in Acquisition price after bidding would directly affect the bidder commercially and it is totally beyond the control of TSP. Hence, it is requested to kindly allow change in acquisition price under CIL event.</p>	<p>The change in acquisition price to the extent as per Provisions under Clause No. 3.5 of Tariff Based Competitive Bidding Guidelines for Transmission Service issued on 10.08.2021 shall prevail.</p>
87.	<p><b>TSA</b></p> <p>D)The TSP has agreed to make an application for a Transmission License to the Commission for setting up the Project on <b>build, own, operate and transfer basis</b>.</p>	<p>D)The TSP has agreed to make an application for a Transmission License to the Appropriate Commission for setting up the Project <b>on build, own, operate and maintain basis</b>.</p> <p>As per revised TSA, asset to be transferred to Nodal agency post 35 years (BOOT). The assets created would be <b>Financial assets instead of Fixed assets</b>. Under IndAS accounting rules, <b>depreciation</b> of financial assets is <b>not allowed</b>.</p>	<p>This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
		<p>Further, TSP would be at risk of authorities levying 18% GST upfront on construction revenue recognized on COD. <b>Higher taxation</b> would impact the project economics eventually leading to higher tariff for the Consumers.</p> <p>Under BOOT model, <b>asset condition may degrade</b> towards end of concession period due to lack of incentive for developer to maintain the asset by incurring some capex.</p> <p>Hence it is requested to continue with the BOOM model.</p>	
88.	<p><b>TSA</b></p> <p>5.5.6 For any delay in commissioning any critical Element(s), as identified in Schedule 1 &amp; Schedule 2 of this Agreement, <b>beyond a period of 45 days</b> shall lead to a sequestration of 10% of the Contract Performance Guarantee.</p> <p>6.4.5 For avoidance of doubt, it is clarified that amount payable by TSP under this Article is over and above the penalty payable by TSP under Article 5.5.6 of this Agreement.</p>	<p>5.5.6 For any delay in commissioning any critical Element(s), as identified in Schedule 1 &amp; Schedule 2 of this Agreement, <b>beyond a period of 6 months (as per clause 13.1.b) unless extended by Nodal Agency due to FM/CIL as per provisions of this agreement</b>, shall lead to a sequestration of 10% of the Contract Performance Guarantee.</p> <p>Clause 13.1.b of TSA allows upto 6 months delay in commissioning of element after SCOD.</p> <p>10% sequestration clause does not cover any delay due FM or CIL event. If in case all the elements of projects are declared as “critical elements”, TSP is liable for 10% CPG sequestration. It is requested to kindly extend period beyond which CPG sequestration shall occur to 6 months.</p> <p>Further, TSP should not be made liable for LD payments on account of delay in project / element commissioning more than as identified under clauses 6.4.1 and 6.4.2</p>	This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
89.	<p><b>TSA</b></p> <p>AA- Actual Availability ; MTC- Monthly transmission charges; Tmn = transmission charges for month "m" in contract year "n"  <i>For incentive</i></p> <p>a. <i>If 98% &lt; AA &lt; 98.5%; MTC= Tmn*1;</i></p> <p>b. <i>If 98.5% &lt; AA &lt; 99.75% ;</i></p> <p style="padding-left: 40px;"><i>MTC= Tmn* (AA / 98.5 %);</i></p> <p>c. <i>If AA &gt; 99.75%;</i></p> <p style="padding-left: 40px;"><i>MTC = Tmn* (99.75 % / 98.5 %);</i></p> <p><i>For Penalty</i></p> <p>d. <i>If 95 % &lt; AA &lt; 98 %</i></p> <p style="padding-left: 40px;"><i>MTC = Tmn* (AA / 98 %);</i></p> <p>e. <i>If AA &lt; 95 %</i></p> <p><i>MTC = Tmn* (AA/98 %) – 0.02* (Tmn* (AA/98%))</i></p>	<p><i>Incentive = 0.02 x Annual Transmission Charges x (Actual Annual Availability – Target Availability)</i></p> <p>Target Availability: AC -98% &amp; HVDC -95% <i>Incentive = 0.02 x Annual Transmission Charges x (Actual Annual Availability – Target Availability)</i></p> <p>Target Availability: AC -98% &amp; HVDC -95%</p> <p>The tariff for projects under TBCB has seen a reduction of 30%-50% as compared to RTM projects. The incentive for maintaining availability above target availability aids in increasing reliability of the transmission system. As the incentive is reduced as per revised provisions, developers may increase the Quoted tariffs to compensate which may result in increased cost of electricity to end consumer. Further there is no incentive for maintaining actual availability between 98% and 98.5%.</p> <p>Hence it is requested to continue with existing provisions for penalty and incentive calculation</p>	<p>This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.</p>
90.	<p><b>TSA</b></p> <p>3.3.4 Provided, that due to the provisions of Article 3.3.4, any increase in the time period for completion of conditions subsequent</p>	<p>3.3.4 Provided, that due to the provisions of Article 3.3.4, any increase in the time period for completion of conditions subsequent mentioned under Article 3.1 .3, shall lead to an equal increase in the time period for the Scheduled COD. <b>The TSP will be allowed to</b></p>	<p>This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p>mentioned under Article 3.1 .3, shall lead to an equal increase in the time period for the Scheduled COD. <b>If the Scheduled COD is extended beyond a period of one hundred eighty (180) days due to the provisions of this Article 3.3.4, the TSP will be allowed to recover the interest cost during construction corresponding to the period exceeding one hundred eighty (180) days by adjustment in the Transmission Charges in accordance with Schedule 9.</b></p>	<p><b>recover the interest cost during construction corresponding for the period of FM/CIL event by adjustment in the Transmission Charges in accordance with Schedule 9.</b></p> <p>In event of FM/CIL event, provisions under revised TSA do not provide for any adjustment in transmission charges for a period of 180 days. TSP is allowed to recover interest cost during construction for period exceeding 180 days.</p> <p>As large portion (70%) of project cost is funded through debt, repayment of which does not start till COD, any delay in SCOD leads to higher interest built up. This severely affects the project economics of developer. Hence it is requested to allow for recovery of interest cost during construction for entire period of FM/CIL event.</p>	
<p>91.</p>	<p><b>TSA</b></p> <p>18. 1 The Nodal Agency shall appoint an agency/ company as Independent Engineer (IE).....</p> <p>Responsibilities of IE include progress monitoring, ensuring quality, determine costs of works/services, determine valuation of project assets, assist parties in dispute resolution.</p>	<p>It is requested to not appoint an external agency (Independent Engineer-IE) and the Nodal Agency to execute the functions such as progress monitoring, quality assurance, determination of works/services, valuation of projects assets.</p> <p>Any delay in appointment of IE would delay the project execution.</p> <p>Further addition of an external agency would also be an additional expense which would eventually result in tariff increase.</p>	<p>Nodal Agency shall appoint the Independent Engineer as per the provisions of TSA.</p>
<p>92.</p>	<p>3.1 Satisfaction of Conditions Subsequent by the TSP</p>	<p>Since the execution of TSA will require coordination with the CTU, it is requested that the TSA be executed</p>	<p>As per revised TBCB Guidelines and SBDs</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	c. Execute this Agreement;	before project acquisition by the project SPV in the interest of saving time. This will also facilitate early completion of the project critical activities	issued by MOP, Gol, TSP on the date of acquisition of SPV from the BPC will enter into a Transmission Service Agreement (TSA) with the Nodal Agency.
93.	3.1.3 The TSP agrees and undertakes to duly perform and complete the following activities within six (6) months from the Effective Date .....  To obtain the Transmission License for the Project from the Commission;	While the TSP will apply to the respective commission for grant of license, time required for the issuance is beyond the control of TSP once the application is made. We request to modify the clause suitably to incorporate the above.	This is as per the Standard Bidding Documents. The provisions of TSA shall prevail.
94.	<b>SPA</b>  Clause 3.5  The Selected Bidder hereby acknowledges and agrees that after the date of acquisition of one hundred percent (100%) of the Shares of the Company by the Selected Bidder as per Clause 3.3, (a) the authority of the BPC in respect of the Bid Process shall forthwith cease and any actions to be taken thereafter regarding the Bid Process will be undertaken by the Central Transmission Utility of India Limited themselves, (b) all rights and obligations of the BPC shall cease forthwith, (c) all other rights and obligations of the Company shall be of the TSP and (d) any	We understand that acquisition price towards acquisition of one hundred percent (100%) of the equity shareholding of the Company, communicated to bidder would include all liabilities pertaining to SPV prior to closing date. Please confirm	The Acquisition Price includes all the assets and liabilities pertaining to SPV and details of the same will be intimated by the BPC as per the provisions of RFP

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	<p>decisions taken by the BPC on behalf of the Company prior to the date of acquisition, shall continue to be binding on the Company and/or Central Transmission Utility of India Limited as the case may be</p>		



पीएफसी कंसल्टिंग लिमिटेड  
(पावर फाइनेंस कॉर्पोरेशन लिमिटेड की पूर्णतःस्वामित्वाधीन सहायक कम्पनी)  
**PFC CONSULTING LIMITED**  
(A wholly owned subsidiary of Power Finance Corporation Limited)  
CIN U74140DL2008GOI175858

Ref. No.: 04/22-23/ITP-60/RFP

July 10, 2023

To,  
Mr. Nitin Kumar  
Sr. Business Development Manager (T&D)  
The Tata Power Company Limited,  
Shatabdi Bhawan, B-12 & 13, Sector 4,  
Noida, UP-201301

E-mail: nitin.kumar@tatapower.com

**Subject: Independent Transmission Project "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C" – Regarding Additional Clarifications and Amendment No. 1 to RfP documents.**

Dear Sir,

This is in continuation to PFCCL letter dated 06.06.2023 regarding issuance of clarifications to RFP documents for the subject transmission project.

The additional queries raised by the bidders on RFP documents have been examined and additional clarifications are enclosed herewith at **Annexure-I** for your information and further necessary action please.

Further, the Amendment No. 1 to the RFP documents is enclosed at **Annexure-II** for your information and necessary action.

Thanking you,

Yours faithfully

(Sanjay Nayak)

General Manager

Encl.: As above

पंजीकृत कार्यालय : प्रथम तल "ऊर्जा निधि" , 1, बाराखम्बा लेन, कनॉट प्लेस, नई दिल्ली-110001

**Regd. Office** : First Floor, "Urjanidhi" , 1, Barakhamba Lane, Connaught Place, New Delhi-110001

कंपनी मुख्यालय: नौवाँ तल (ए विंग) स्टेट्समैन हाउस, कनॉट प्लेस, नई दिल्ली-110001 दूरभाष : 011-23443900 फ़ैक्स : 011-23443990  
**Corporate Office** : 9th Floor (A Wing) Statesman House, Connaught Place, New Delhi-110001 Phone : 011-23443900 Fax : 011-23443990  
ई-मेल / E-mail : pfcconsulting@pfcindia.com वेबसाइट / Website : www.pfcclindia.com

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
1.	RFP 765kV Line Bay at Bikaner-III	We understand that in existing substation, for adjacent future bay, gantry/towers shall be suitable for extension. BPC to confirm.	Bidder may refer clause B.5.0 of specific technical requirement of s/s of RfP.
2.	RFP 765kV Line Bay at Bikaner-III	it is understood that existing busbar protection have provision for future bays and also PUs are available for future bays. BPC to confirm.	Refer clause B.2.4 (C) of specific requirement of s/s.
3.	RFP 765kV Line Bay at Bikaner-III	For SCADA, it is understood that necessary process I/O shall be available for future bays and accordingly license for same. BPC to confirm.	Refer clause B.2.5 of specific requirement of s/s.
4.	RFP 765kV Line Bay at Bikaner-III	BPC to confirm the availability of AC & DC feeders in existing ACDB/DCDB for future bays.	Refer clause B.3.1 of specific requirement of s/s.
5.	RFP 765kV Line Bay at Bikaner-III	We understand that existing equipment such as DG Set, LT Transformer, Battery & Battery charger have sufficient capacity to cater the requirements of bay under present scope of work, hence no need to consider new DG Set, LT Transformer, Battery & Battery charger in the existing sub stations. BPC to confirm the same.	It is clarified that new DG Set, LT Transformer, Battery & Battery charger in existing Bikaner-III substation is not envisaged as per RfP.
6.	RFP 765kV Line Bay at Bikaner-III	No separate FF system is envisaged under present scope of work. BPC to confirm	Refer clause B.3.2 of specific requirement of s/s.
7.	RFP 765kV Line Bay at Bikaner-III	It is understood that Line and Tie feeder need to develop under present scope of work. BPC to confirm.	At Bikaner-III s/s: It is clarified that 02 nos. tie bays shall be available for termination of Bikaner-III - Neemrana-II 765 kV D/C line (2nd).
8.	RFP 765kV Line Bay at Neemrana-II	We understand that in existing substation, for adjacent future bay, gantry/towers shall be suitable for extension. BPC to confirm.	Bidder may refer clause B.5 of specific technical requirement of s/s of RfP.

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
9.	RFP 765kV Line Bay at Neemrana-II	It is understood that existing busbar protection have provision for future bays and also PUs are available for future bays. BPC to confirm.	Refer clause B.2.4 (c) of specific requirement of s/s.
10.	RFP 765kV Line Bay at Neemrana-II	For SCADA, it is understood that necessary process I/O shall be available for future bays and accordingly license for same. BPC to confirm.	Refer clause B.2.5 of specific requirement of s/s.
11.	RFP 765kV Line Bay at Neemrana-II	BPC to confirm the availability of AC & DC feeders in existing ACDB/DCDB for future bays.	Refer clause B.3.1 of specific requirement of s/s.
12.	RFP 765kV Line Bay at Neemrana-II	We understand that existing equipment such as DG Set, LT Transformer, Battery & Battery charger have sufficient capacity to cater the requirements of bay under present scope of work, hence no need to consider new DG Set, LT Transformer, Battery & Battery charger in the existing substations.  BPC to confirm the same.	It is clarified that new DG Set, LT Transformer, Battery & Battery charger in existing Neemrana-II substation is not envisaged as per RfP.
13.	765kV Line Bay at Neemrana-II	No separate FF system is envisaged under present scope of work. BPC to confirm	Refer clause B.3.2 of specific requirement of s/s.

## Amendment No. 1 dated 10.07.2023

to

RFP documents for selection of Transmission Service Provider through tariff based competitive bidding process to establish transmission system for  
**“Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): PART-C”**

S. No.	Existing Provisions	Revised Provisions
1.	<p><b>All the relevant clauses of RFP, TSA and SPA</b></p> <p>“SPV [which is under incorporation]”</p>	<p><b>All the relevant clauses of RFP, TSA and SPA</b></p> <p>“SPV [which is under incorporation]” in the subject RFP, TSA and SPA may be read as <b>“BIKANER III NEEMRANA II TRANSMISSION LIMITED”</b></p>
2.	<p><b>Clause No. 1.6.1.1 of RFP</b></p> <p>Establishment, operation and maintenance of the Project on build, own, operate and transfer basis and completion of all the activities for the Project, including survey, detailed project report formulation, arranging finance, project management, necessary Consents, Clearances and Permits (way leave, environment &amp; forest, civil aviation, railway/ road/river/canal/power crossing/PTCC, etc.), land compensation, design, engineering, equipment, material, construction, erection, testing &amp; commissioning.</p> <p>Further, the actual location of substations, switching stations or HVDC terminal or inverter stations in the scope of TSP shall not be beyond 3 Km radius of the location proposed by the BPC in the survey report.</p>	<p><b>Clause No. 1.6.1.1 of RFP</b></p> <p>Establishment, operation and maintenance of the Project on build, own, operate and transfer basis and completion of all the activities for the Project, including survey, detailed project report formulation, arranging finance, project management, necessary Consents, Clearances and Permits (way leave, environment &amp; forest, civil aviation, railway/ road/river/canal/power crossing/PTCC, etc.), land compensation, design, engineering, equipment, material, construction, erection, testing &amp; commissioning.</p> <p><b>Further, the actual location of Greenfield substations (Switching Stations or HVDC Terminal or Inverter Stations) for a generation pooling substation and for load serving substations in the scope of TSP shall not be beyond 3 Km radius of the location proposed by the BPC in the survey report. However, actual location of any Greenfield intermediate Substations in the scope of TSP shall not be beyond 10 Km radius of the location proposed by the BPC in the Survey Report.</b></p>
3.	<p><b>Para 5.1.4 (a,b) of TSA</b></p> <p>The TSP shall be responsible for:</p> <p>(a) acquisition of land for location specific substations, switching stations or HVDC terminal or inverter stations. Also, the actual location of substations, switching stations or HVDC terminal or inverter stations shall not be beyond</p>	<p><b>Para 5.1.4 (a) of TSA</b></p> <p>The TSP shall be responsible for:</p> <p>(a) <b>deleted</b></p> <p>(b) <b>deleted</b></p> <p>(c) .....</p>

S. No.	Existing Provisions	Revised Provisions
	<p>3 Km radius of the location proposed by the BPC in the survey report;</p> <p>(b) final selection of Site including its geo-technical investigation;</p> <p>(c) .....</p> <p><b>Para 13.1 (k) of TSA</b></p> <p>TSP's Event of Default</p> <p>(a) .....</p> <p>.</p> <p>.</p> <p>.</p> <p>(k) the TSP fails to take the possession of the land required for location specific substations, switching stations or HVDC terminal or inverter stations and / or fails to pay the requisite price to the parties and / or any State Government authority from whom the land is acquired, within twelve (12) months from the Effective Date.</p>	<p><b>Para 13.1 (k) of TSA</b></p> <p>TSP's Event of Default</p> <p>(a) .....</p> <p>.</p> <p>.</p> <p>.</p> <p>(k) <b>deleted</b></p>



पीएफसी कंसल्टिंग लिमिटेड  
(पावर फाइनेंस कॉर्पोरेशन लिमिटेड की पूर्णतःस्वामित्वाधीन सहायक कम्पनी)  
**PFC CONSULTING LIMITED**  
(A wholly owned subsidiary of Power Finance Corporation Limited)  
CIN U74140DL2008GOI175858

Ref. No.: 04/22-23/ITP-60/Survey Report

July 31, 2023

To,  
Mr. Nitin Kumar  
Sr. Business Development Manager (T&D)  
The Tata Power Company Limited,  
Shatabdi Bhawan, B-12 & 13, Sector 4,  
Noida, UP-201301

E-mail: nitin.kumar@tatapower.com

**Subject: Independent Transmission Project "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C" – Regarding Revised Survey Report.**

Dear Sir,

This has reference to the RFP Documents issued for the subject project on March 02, 2023 and Survey Report issued on May 04, 2023.

In line with the requirement of Clause 1.6.2.1 (1) of the RFP document, the revised survey report for the Project is enclosed herewith.

Further, Bidders in their own interest should carry out required surveys and field investigation for submission of their Bid. Failure to investigate, examine and to inspect site or subsurface conditions fully shall not be grounds for a Bidder to alter its Bid after the Bid Deadline nor shall it relieve a Bidder from any responsibility for appropriately eliminating the difficulty or costs of successfully completing the Project.

It is to mention that the Survey Report has been prepared in good faith, and on best endeavor basis. Neither BPC& Nodal Agency nor their employees or advisors/consultants make any representation or warranty, express or implied, or accept any responsibility or liability, whatsoever, in respect of any statements or omissions made in the Survey Report, or the accuracy, completeness or reliability of information contained therein, and shall incur no liability under any law, statute, rules or regulations as to the accuracy, reliability or completeness of such Survey Report, even if any loss or damage is caused to the Bidders by any act or omission on their part.

Thanking you,

Yours faithfully

(Sanjay Nayak)

General Manager

Encl.: As above



## Table of Contents

Sr. No.	Description
1.	Introduction
2.	Scope of Work
3.	Approach & Methodology
4.	Geographic Information
<b>SECTION: 1</b>	
5	<b>Bikaner-III - Neemrana-II 765 kV D/C line (2<sup>nd</sup>)</b>
5.1	Coordinates of Both End
5.2	Index Map of SOI Toposheet
5.3	Coordinates of Proposed Route
5.4	Summary of Proposed Route
5.5	Wind Zone Map
5.6	Result & Conclusions
5.7	Route Alignment Map on Digitized Toposheet

## **CHAPTER-1**

### **INTRODUCTION**

## 1.0 INTRODUCTION

Development of any country especially of any developing country depends solely on its power generation and proper distribution. The demand of power supply in proper way increases rapidly due to industrial demand and development of the area as a whole. India is developing fast and the demand - supply ratio of power distribution is unable to keep pace with the rapid industrial growth. Due to heavy urbanization and industrial demand the impact on power distribution has become an essential necessity of the day. Power generation, transmission and distribution is a long drawn process, which is being carried out essential by both the Govt.& Private sector organization.

In order to execute such magnitude of transmission system, which is of much higher order than those totally implemented in last 5 decades, precise planning, costing, scheduling etc, would be required. Optimum deployment of resources also would be of prime targets in implementing this transmission system. As transmission line have to traverse the length and breadth of country, for evacuation of power from generating stations to load centers and beneficiary states, the topographical & geographical nature of the terrains play significant influence in the project's cost and implementation time.

Hence, it is essential that at the planning stage itself that various alternative routes and technical solution for transmission line be examined in detail. For undertaking such studies, one of the major requirements is obtaining adequate information regarding the site location and identifies, subsequently, during implementation of the projects, it is required to obtain elaborate details about terrain, soil condition, constraints etc. of the route for proper resources planning, costing etc.as well as reducing the implementation time.

Presently, conventional methods of survey like walk over survey, preliminary survey and detailed survey are carried out at various stages from conceptualization of the projects to implementation, which are time consuming task. Presently, there are new means available to conduct survey using remote sensing, PS based survey etc.

M/s. Prasad Surveyors has been awarded by M/s PFC Consulting Limited to study and execute the survey of one suggested route, taking all logistic precaution and use most modern survey Techniques to survey the feasible routes and suggest the logically viable routes to erect the power line for distribution of power system.

## **CHAPTER-2**

### **SCOPE OF WORK**

## 2.0 SCOPE OF WORK

S. No.	Scope of the Transmission Scheme
1.	Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end <ul style="list-style-type: none"> <li>• 765 kV, 330 MVAR Switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• 765 kV, 330 MVAR Switchable line reactors at Neemrana-II – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Neemrana-II S/s – 2 nos.</li> </ul>
2.	2 no. of 765 kV line bays each at Bikaner-III PS & Neemrana-II S/S 765kV line bays - 4 nos. (2 nos. each at Bikaner-III PS & Neemrana-II S/S)

2.1 Identification of Tentative Routes: The route sighting and selection process began with an inventory of existing and planned land use. Proposed route corridors were identified largely by maximizing linear sighting opportunities, such as following existing roadways and power line corridors, negotiation with river, railway, road, electric power line and telephone line crossings and least crossing of notified forest area. All efforts have been made to provide minimum numbers of angle points and almost care have been taken to select the possible places for all angle points. The angle points have been fixed up on the ground with minimum possible angle of deviation. Rivers are mainly crossed with right angles and a minimum span. Crossings are located on high bank and are out of the maximum flood level. Similarly, power line crossings have been fixed as close as possible to the right angle but not less than the 60 deg. crossing.

Overall, the identified route minimize impacts to existing habitations, follow existing and planned roadways and achieves the goal of a more reliable and effective electrical system.

## 2.2 Selection Criteria for Transmission Line Route

- The alignment of the transmission line should be most economical from the point of view of construction and maintenance.
- The alignment of the transmission line selected should be the shortest possible one.
- Routing of transmission line through protected/reserved forest area should be avoided. In case it is not possible to avoid the forests or areas having large trees completely, and then keeping in view of the overall economy, the route should be aligned in such a way that cutting of trees is minimums.
- The route should have minimum crossings of Major rivers, Railway lines, National/State highways, overhead EHV power line and communication lines.
- The number of angle points shall be kept to a minimum.
- Marshy and low lying areas, river beds and earth slip zones shall be avoided to minimize risk to the foundations.
- It would be preferable to utilize level ground for the alignment.

- Crossing of power lines shall be minimums. Alignment will be kept at a minimum distance of 300 m from power lines to avoid induction problems on the lower voltage lines.
- Crossing of communication line shall be minimized and it shall be preferably at right angle. Proximity and parallelism with telecom lines shall be eliminated to avoid danger of induction to them.
- Areas subjected to flooding such as nalla shall be avoided.
- Restricted areas such as civil and military airfield shall be avoided. Care shall also be taken to avoid aircraft landing approaches.
- All alignment should be easily accessible both in dry and rainy seasons to enable maintenance throughout the year.
- Certain areas such as quarry sites, tea, tobacco and saffron fields and rich plantations, gardens & nurseries which will present the Owner problems in acquisition of right of way and way leave clearance during construction and maintenance should be avoided.
- Angle points should be selected such that shifting of the point within 100 m radius is possible at the time of construction of the line.
- The line routing should avoid large habitations, densely populated areas, Forest, Animal/Bird sanctuary, reserve coal belt areas, oil pipe line/underground inflammable pipe lines etc. to the extent possible.
- The areas requiring special foundations and those prone to flooding should be avoided.

## **CHAPTER-3**

# **APPROACH & METHODOLOGY**

## 3.0 METHODOLOGY

### 3.1 Data Collection & Digitization of Maps

Survey of India TOPO sheets on 1:50,000 scale. All the Survey of India TOPO sheets were geo-referenced with respect to Latitude Longitude of TOPO sheets under following projection system to keep uniformity with respect to GPS co-ordinates:

- Projection : UTM
- Spheroid : WGS84
- Datum : WGS84
- Zone : 43
- North or South : North

These were used to update the base map features extracted from TOPO sheets. The features extracted from SOI TOPO sheets.

- City and village sprawl
- Contours
- Spot Heights and Bench Marks
- Railway lines (MG/BG)
- Metalled Roads (National/State Highways),
- Major Rivers (width > 500 m)
- Canals
- Nallah/Drain crossings
- Forest (Reserved/Protected)
- Protected areas (Cantonments, Air fields)
- Main power lines (EHV) and other electrical power lines
- Telephone lines
- Angle points
- Lakes, Reservoirs and Ponds
- Swamp

## **CHAPTER-4**

# **GEOGRAPHICAL INFORMATION**

## 4.0 GEOGRAPHICAL INFORMATION

### **Bikaner**

Bikaner is a city in the northwest of the state of Rajasthan, India. It is located 330 kilometres (205 mi) northwest of the state capital, Jaipur. Bikaner city is the administrative headquarters of Bikaner District and Bikaner division. The Collector and District Magistrate of Bikaner is Sh. Bhagwati Prasad Kalal,[5] and the Superintendent of Police is TejaswiniGautam IPS.

Formerly the capital of the princely state of Bikaner, the city was founded by Rao Bika in 1488 CE and from its small origins it has developed into the fourth largest city in Rajasthan. The Ganges Canal, completed in 1928, and the Indira Gandhi Canal, completed in 1987, facilitated its development

### **Climate**

Bikaner is situated in the middle of the Thar desert and has a hot desert climate (Köppen climate classification BWh) with very little rainfall and extreme temperatures. In summer temperatures can exceed 48 °C, and during the winter they may dip below freezing.

The climate in Bikaner is characterized by significant variations in temperature. In the summer season it is very hot when the temperatures lie in the range of 28–53.5 °C (82.4–128.3 °F). In the winter, it is fairly cold with temperatures lying in the range of –4–23.2 °C (24.8–73.8 °F). Annual rainfall is in the range of 260–440 millimetres (10–17 in). The highest ever temperature recorded is 49.5 °C (121.1 °F) on 19 May 2016 and lowest ever recorded is –4.0 °C (24.8 °F) on 26 January 1964.

### **Transport**

Bikaner railway station is a major railway junction in the North Western Railway zone of Indian Railways. The first railway link to Bikaner was established on 9 December 1891 as part of Jodhpur State Railway[23] and it has undergone many administrative modifications since then.

Today Bikaner Railway Station is efficiently well connected to National Capital Delhi and Rajasthan State's capital Jaipur along with major Indian cities like Jodhpur, Sri Ganganagar, Rewari, Howrah, Kolkata, Mumbai, Kanpur, Agra, Allahabad, Surat, Ahmedabad, Vadodara, Pathankot, Bhatinda, Amritsar, Haridwar, Jammu, Chandigarh, Pune, Hisar, Bengaluru, Chennai, Hyderabad, Guwahati, Puri, Madurai, Coimbatore, Thiruvananthapuram, Bhubaneswar, Bilaspur, Indore, Jalandhar, Baroda, Ratangarh, Jaisalmer, Barmer, Alwar, Nagaur, etc.

Bikaner is well served with roads and is linked directly to Delhi, Jaipur, Agra, Sri Ganganagar, Jodhpur, Alwar, Rewari, Narnaul, Ludhiana, Bhatinda, Ambala, Panipat, Surat, Ahmedabad, Ajmer, Haridwar, Jaisalmer, Bhilwara, Churu, Sikar and many other cities.

Central Bus Stand is the main bus station in Bikaner. It connects Bikaner to other cities in Rajasthan and nearby states via road.

Bikaner has Domestic Civil Airport Nal Airport which is located 15 km west of the city. Regular flights to Jaipur JAI and Delhi DEL commenced in 2017-18 under UDAN scheme of NarendraModi Govt.

### **Neemrana**

Neemrana is an ancient historical town in Alwar district of Rajasthan, India, 66 km (41 mi) from Alwar city, 122 km (76 mi) from New Delhi and 150 km (93 mi) from Jaipur on the Delhi-Jaipur highway in Neemrana tehsil. It is between Behror and Shahajahanpur. Neemrana is an industrial hub.[citation needed]It is the site of a 15th-century hill-fort occupied by Chauhans till 1947. The erstwhile ruling family is considered to be of the direct lineage of Prithviraj Chauhan. Some distance from Neemrana is another fort, Kesroli in Alwar district that is one of the oldest heritage sites. Historians trace it to the MatsyaJanapada of the Mahabharata times. In Kesroli one gets to see the oldest remains of Buddhist Vihara at Viratnagar where the Pandavas spent the last year of their exile incognito; Pandupole, with the only reclining statue of Hanuman; the samadhi of the ruler saint Bhartrihari.

### **Industry**

The Rajasthan government, through Rajasthan Industrial Cooperation RIICO, has developed industrial zones in various stages in Neemrana in Alwar district in the past several years. Apart from the usual industrial areas, the Export Promotion Industrial Park (EPIP) and the Japanese Industrial Zone in Majra Kath are particularly noteworthy. Companies from India and abroad have set up their units in these industrial areas and many more new industries are arriving, creating new employment opportunities. The Japanese industrial zone developed by RIICO is an extension of a previously existing industrial zone. The Korean Zone is also coming up the silver wood township.

**SECTION: 1**

**CHAPTER-5**

**BIKANER-III TO NEEMRANA-II 765KV D/C LINE**

**CHAPTER-5.1****COORDINATES OF BOTH ENDS**

Details of the existing substation

## 1. Bikaner-III S/S

Latitude	28° 21' 58.6301" N
Longitude	73° 11' 26.5401" E

## 2. Neemrana -II S/S

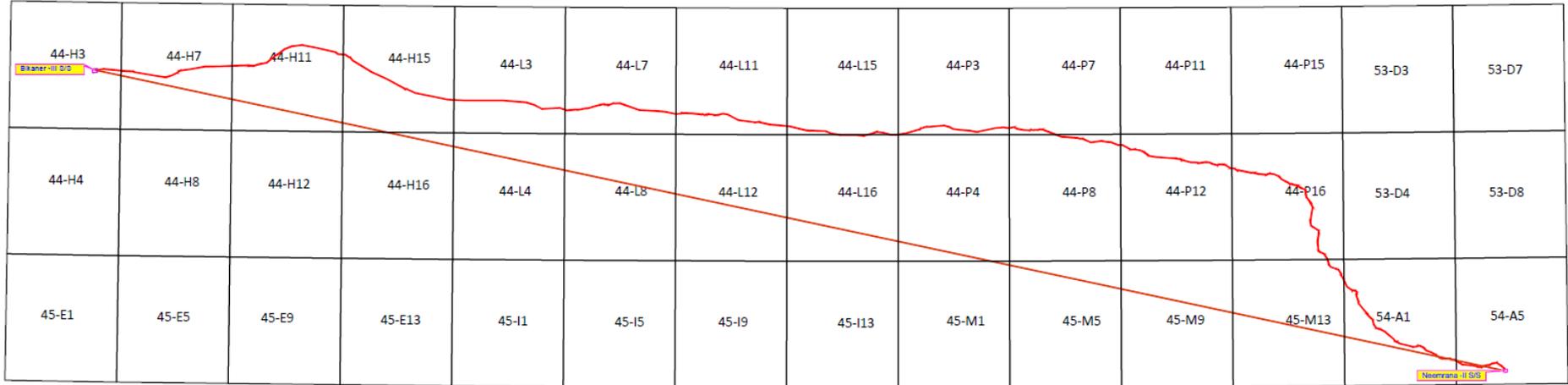
Latitude	27° 46' 35.9943" N
Longitude	76° 21' 26.8027" E

**Note:- Bidders may note that the coordinates provided in the Survey Report are to facilitate the Bidders to locate the Sub Station/Switchyard and this coordinates should not be consider as the point of termination/emanation of transmission line. The TSP shall coordinate with the agency providing inter Connection facility for exact point of termination /emanation of transmission line.**

**CHAPTER-5.2****INDEX MAP SOI TOPOSHEETS**

# TOPOINDEX

## TOPO INDEX



**CHAPTER-5.3****CO-ORDINATE OF PROPOSED ROUTE**

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-01	322694	3139109	28° 21' 58.6301" N	73° 11' 26.5401" E		0	0°00'00"	Bikaner -III S/S
					432			
AP-02	323125	3139118	28° 21' 59.1301" N	73° 11' 42.3602" E		432	3°0'41.8"	
					661			
AP-03	323784	3139167	28° 22' 1.0304" N	73° 12' 6.5302" E		1092	4°17'11.1"	
					918			
AP-04	324692	3139303	28° 22' 5.8802" N	73° 12' 39.7901" E		2010	13°54'28.9"	
					4874			
AP-05	329544	3138844	28° 21' 53.2910" N	73° 15' 38.2167" E		6884	2°45'19.1"	
					1684			
AP-06	331226	3138766	28° 21' 51.5526" N	73° 16' 40.0244" E		8568	32°34'27.5"	
					221			
AP-07	331407	3138639	28° 21' 47.4958" N	73° 16' 46.7226" E		8789	25°13'19.4"	
					4854			
AP-08	336187	3137796	28° 21' 22.3122" N	73° 19' 42.6906" E		13643	1°37'48.8"	
					2197			
AP-09	338361	3137477	28° 21' 12.9022" N	73° 21' 02.6590" E		15839	26°10'17.3"	
					1356			
AP-10	339652	3137891	28° 21' 26.9453" N	73° 21' 49.8683" E		17196	7°42'22.9"	
					1573			
AP-11	341072	3138569	28° 21' 49.5785" N	73° 22' 41.6709" E		18769	33°55'46.7"	
					212			
AP-12	341179	3138752	28° 21' 55.5548" N	73° 22' 45.5384" E		18981	32°3'4.5"	
					432			
AP-13	341563	3138950	28° 22' 02.1741" N	73° 22' 59.5188" E		19413	19°50'32.7"	
					2039			

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-14	343584	3139218	28° 22' 11.7477" N	73° 24' 13.6078" E		21451	2°34'40.8"	
					3453			
AP-15	346983	3139825	28° 22' 32.9171" N	73° 26' 18.1736" E		24905	9°41'44.5"	
					2628			
AP-16	349611	3139845	28° 22' 34.6547" N	73° 27' 54.6719" E		27532	1°47'2.2"	
					7056			
AP-17	356661	3140117	28° 22' 46.3591" N	73° 32' 13.5158" E		34588	38°4'4.5"	
					209			NH-62 SURATGARH TO BIKANER ROAD KM NO.47,48
AP-18	356831	3139995	28° 22' 42.4412" N	73° 32' 19.8054" E		34797	39°44'18.1"	
					618			
AP-19	357448	3140037	28° 22' 44.0442" N	73° 32' 42.4420" E		35416	26°26'0.3"	
					228			132KV S/C LINE TOWER NO.156,157
AP-20	357658	3139949	28° 22' 41.2867" N	73° 32' 50.2144" E		35644	39°50'27.4"	
					1549			
AP-21	359137	3140410	28° 22' 56.8156" N	73° 33' 44.3209" E		37192	17°59'58.1"	
					226			400KV D/C SUR TO BKN ROAD LINE (RVPNL) TOWER NO.253,254
AP-22	359363	3140407	28° 22' 56.8125" N	73° 33' 52.6366" E		37418	13°35'35.6"	
					1300			
AP-23	360631	3140697	28° 23' 06.7211" N	73° 34' 39.0713" E		38719	25°45'46.3"	
					2811			
AP-24	362826	3142453	28° 24' 04.5962" N	73° 35' 58.9758" E		41530	33°22'24.7"	
					216			
AP-25	363041	3142472	28° 24' 05.3211" N	73° 36' 06.8535" E		41746	31°16'41.3"	
					1981			
AP-26	364633	3143652	28° 24' 44.2530" N	73° 37' 04.8320" E		43727	14°52'46.6"	

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					1850			
AP-27	366352	3144336	28° 25' 07.0881" N	73° 38' 07.7225" E		45577	24°58'48"	
					225			
AP-28	366576	3144323	28° 25' 06.7494" N	73° 38' 15.9790" E		45802	10°34'39.1"	
					1681			
AP-29	368244	3144535	28° 25' 14.2703" N	73° 39' 17.1630" E		47483	9°21'7.3"	
					220			RAILWAY LINE , SINGLE TRCK, BROAD GAIDGE, ELECTRIFIED, SURATGARH TO BIKANER SECTION KM NO.256,257
AP-30	368464	3144527	28° 25' 14.0906" N	73° 39' 25.2412" E		47703	8°40'51.7"	
					2831			
AP-31	371245	3143999	28° 24' 57.9143" N	73° 41' 07.6594" E		50534	1°21'53.3"	
					4610			
AP-32	375752	3143030	28° 24' 28.0203" N	73° 43' 53.6721" E		55144	20°2'26.9"	
					217			220KV S/C LINE
AP-33	375936	3142915	28° 24' 24.3272" N	73° 44' 00.4711" E		55361	6°58'31.9"	
					404			
AP-34	376249	3142660	28° 24' 16.1553" N	73° 44' 12.0732" E		55765	13°26'0.5"	
					208			400KV S/C STP TO BKN LINE ( RVPNL) TOWER NO.264,265
AP-35	376437	3142569	28° 24' 13.2819" N	73° 44' 19.0077" E		55973	20°25'15.7"	
					1608			
AP-36	378039	3142421	28° 24' 09.0070" N	73° 45' 17.9135" E		57582	29°53'52.6"	
					240			765KV D/C BIKNER TO MOGA LINE TOWER NO.122,123
AP-37	378235	3142283	28° 24' 04.5751" N	73° 45' 25.1806" E		57822	3°38'50.6"	
					669			
AP-38	378805	3141933	28° 23' 53.4009" N	73° 45' 46.2546" E		58491	6°12'30.1"	

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					228			754A- BIKANER TO AMRITSAR EXPRESSWAY KM NO-376,377
AP-39	379011	3141836	28° 23' 50.3062" N	73° 45' 53.8489" E		58718	21°57'1.1"	
					943			
AP-40	379650	3141143	28° 23' 28.0135" N	73° 46' 17.6097" E		59661	16°3'35.3"	
					4857			
AP-41	383804	3138625	28° 22' 07.5661" N	73° 48' 51.1299" E		64519	6°38'22.5"	
					3711			
AP-42	387179	3137081	28° 21' 18.4715" N	73° 50' 55.6360" E		68230	3°27'45.7"	
					4607			
AP-43	391245	3134916	28° 20' 09.3394" N	73° 53' 25.6989" E		72837	31°48'0.1"	
					232			SH-93 KALU TO DUNGARGARH ROAD
AP-44	391476	3134931	28° 20' 09.9015" N	73° 53' 34.1840" E		73068	27°53'58.8"	
					2083			
AP-45	393377	3134079	28° 19' 42.7749" N	73° 54' 44.2821" E		75152	12°44'46.6"	
					7402			
AP-46	400633	3132616	28° 18' 57.3022" N	73° 59' 11.1628" E		82553	8°30'49.4"	
					3860			
AP-47	404488	3132422	28° 18' 52.0230" N	74° 01' 32.7733" E		86414	2°51'14.5"	
					8206			
AP-48	412694	3132417	28° 18' 53.9430" N	74° 06' 34.0675" E		94619	4°39'35"	
					5221			
AP-49	417898	3131991	28° 18' 41.2826" N	74° 09' 45.2444" E		99841	12°24'7"	
					1913			
AP-50	419726	3131428	28° 18' 23.4241" N	74° 10' 52.5105" E		101753	10°26'19.5"	
					1872			

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-51	421386	3130563	28° 17' 55.6729" N	74° 11' 53.6633" E		103625	30°49'46.4"	
					3929			
AP-52	425308	3130789	28° 18' 03.8451" N	74° 14' 17.6120" E		107554	22°29'14.1"	
					1696			
AP-53	426910	3130232	28° 17' 46.0586" N	74° 15' 16.5398" E		109250	25°12'2.5"	
					1606			
AP-54	428507	3130400	28° 17' 51.8406" N	74° 16' 15.1265" E		110856	4°3'2.5"	
					1281			
AP-55	429787	3130444	28° 17' 53.5141" N	74° 17' 02.1051" E		112136	10°11'27.8"	
					837			
AP-56	430605	3130620	28° 17' 59.3932" N	74° 17' 32.0898" E		112973	8°14'39"	
					974			
AP-57	431577	3130687	28° 18' 01.7354" N	74° 18' 07.7651" E		113947	14°23'38.5"	
					1061			
AP-58	432584	3131020	28° 18' 12.7542" N	74° 18' 44.6915" E		115009	3°33'49.6"	
					1925			
AP-59	434446	3131510	28° 18' 29.0054" N	74° 19' 52.9306" E		116933	6°21'40.6"	
					547			
AP-60	434987	3131589	28° 18' 31.6925" N	74° 20' 12.7866" E		117480	28°26'28"	
					240			SH-6 SARDAR SHAHAR TO DUNGARGARH ROAD KM NO. 113,114
AP-61	435212	3131507	28° 18' 29.0571" N	74° 20' 21.0809" E		117720	16°49'0.2"	
					873			
AP-62	436084	3131458	28° 18' 27.6052" N	74° 20' 53.0777" E		118593	13°0'16.6"	
					255			220KV D/C LINE TOWER NO 116,117
AP-63	436335	3131501	28° 18' 29.0542" N	74° 21' 02.3002" E		118848	10°57'57.5"	

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					598			
AP-64	436894	3131712	28° 18' 36.0223" N	74° 21' 22.7784" E		119446	17°35'22.1"	
					1666			
AP-65	438557	3131803	28° 18' 39.2664" N	74° 22' 23.8296" E		121111	22°9'42.1"	
					4527			
AP-66	442837	3130327	28° 17' 52.0037" N	74° 25' 01.2355" E		125638	15°48'29.2"	
					3766			
AP-67	446597	3130116	28° 17' 45.7017" N	74° 27' 19.3311" E		129405	2°12'42.4"	
					1961			
AP-68	448550	3129930	28° 17' 39.9511" N	74° 28' 31.0390" E		131366	6°2'49.6"	
					2470			
AP-69	450970	3129439	28° 17' 24.3161" N	74° 29' 59.9645" E		133835	18°24'4"	
					1056			
AP-70	452018	3129566	28° 17' 28.5911" N	74° 30' 38.4218" E		134891	12°7'0.7"	
					209			RAILWAY LINE , SINGLE TRACK, BROAD GAIDGE , ELECTRIFIED, SARDARSHAHAR TO RATANGARH SECTION KM NO. 29,30
AP-71	452215	3129634	28° 17' 30.8278" N	74° 30' 45.6489" E		135100	20°15'50.5"	
					2206			
AP-72	454420	3129587	28° 17' 29.5791" N	74° 32' 06.6264" E		137306	4°52'49.2"	
					2201			
AP-73	456609	3129353	28° 17' 22.5445" N	74° 33' 35.5925" E		139507	8°10'45.1"	
					234			SH-7 SARDAR SHAHAR TO RATANGARH ROAD KM NO.237,238
AP-74	456843	3129362	28° 17' 22.5445" N	74° 33' 35.5925" E		139741	14°31'29.5"	

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					443			
AP-75	457276	3129266	28° 17' 19.4901"N	74° 33' 51.5001"E		140184	28°25'46.1"	
					229			132KV S/C LINE TOWER NO-78,79 / 220KV D/C LINE TOWER NO.76,77
AP-76	457496	3129329	28° 17' 21.5602"N	74° 33' 59.5701"E		140413	24°42'22.6"	
					239			
AP-77	457733	3129293	28° 17' 20.4094" N	74° 34' 08.2590" E		140652	21°20'23"	
					232			400KV S/C RTG TO STG LINE (RSEB) TOWER NO.354,355
AP-78	457959	3129343	28° 17' 22.0801" N	74° 34' 16.5552" E		140884	4°35'22.7"	
					221			400KV S/C STG TO RTG LINE (RSEB) TOWER NO.360,361
AP-79	458170	3129409	28° 17' 24.2277" N	74° 34' 24.2949" E		141105	24°16'30.1"	
					1647			
AP-80	459804	3129206	28° 17' 17.8239" N	74° 35' 24.3068" E		142752	15°58'22"	
					867			
AP-81	460660	3129340	28° 17' 22.2773" N	74° 35' 55.7417" E		143619	7°32'19.4"	
					559			
AP-82	461196	3129498	28° 17' 27.4719" N	74° 36' 15.3921" E		144177	21°55'27.8"	
					1067			
AP-83	462258	3129396	28° 17' 24.2699" N	74° 36' 54.3862" E		145244	21°56'28.3"	
					2872			
AP-84	464807	3128073	28° 16' 41.5340" N	74° 38' 28.1228" E		148116	20°25'14.7"	
					3776			
AP-85	468555	3127613	28° 16' 26.9119" N	74° 40' 45.7273" E		151892	18°36'34.9"	
					548			
AP-86	469092	3127723	28° 16' 30.5412" N	74° 41' 05.4288" E		152440	24°15'19.3"	
					2727			

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-87	471753	3127126	28° 16' 11.3457" N	74° 42' 43.1639" E		155167	7°47'25"	
					4350			
AP-88	476087	3126757	28° 15' 59.6768" N	74° 45' 22.2849" E		159517	8°56'55.5"	
					3826			
AP-89	479803	3125844	28° 15' 30.2230" N	74° 47' 38.7158" E		163343	11°40'55.1"	
					4114			
AP-90	483914	3125691	28° 15' 25.4632" N	74° 50' 09.6237" E		167458	17°31'44.9"	
					1340			SH-107 CHURU TO RATANGARH ROAD KM NO.33,34
AP-91	485176	3125240	28° 15' 08.5698" N	74° 51' 03.1719" E		168798	0°12'22.7"	
					209			
AP-92	485373	3125169	28° 15' 08.5698" N	74° 51' 03.1719" E		169007	11°20'14.6"	
					1604			
AP-93	486958	3124932	28° 15' 00.9038" N	74° 52' 01.3843" E		170610	18°29'36.2"	
					236			132KV S/C LINE
AP-94	487169	3124824	28° 14' 57.4253" N	74° 52' 09.1084" E		170846	26°45'25.2"	
					3611			
AP-95	490780	3124808	28° 14' 56.9973" N	74° 54' 21.6231" E		174457	4°40'30.3"	
					1674			
AP-96	492448	3124664	28° 14' 52.3524" N	74° 55' 22.8486" E		176132	22°55'14.8"	
					1268			
AP-97	493654	3125055	28° 15' 05.1008" N	74° 56' 07.1128" E		177400	28°20'32.6"	
					220			RAILWAY LINE SINGLE TRACK, BROAD GAUGE, ELECTRIFIED, CHURU TO RATANGARH SECTION KM NO.286,287
AP-98	493870	3125016	28° 15' 03.8216" N	74° 56' 15.0396" E		177620	31°48'21"	
					1438			

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-99	495208	3125542	28° 15' 20.9253" N	74° 57' 04.1433" E		179057	28°42'12"	
					147			NH-52 CHURU TO FATEHPUR ROAD
AP-100	495354	3125523	28° 15' 14.6083" N	74° 58' 02.3335" E		179204	0°16'20.9"	
					1451			
AP-101	496794	3125347	28° 15' 14.6083" N	74° 58' 02.3335" E		180655	9°10'31.4"	
					1508			
AP-102	498243	3124927	28° 15' 00.9762" N	74° 58' 55.5064" E		182163	2°39'3.7"	
					226			NH-52 CHURU TO FATEHPUR ROAD KM NO.83,84
AP-103	498456	3124854	28° 14' 58.6100" N	74° 59' 03.3547" E		182389	21°11'17"	
					1234			
AP-104	499690	3124905	28° 15' 00.2772" N	74° 59' 48.6107" E		183623	6°17'8.8"	
					2034			
AP-105	501700	3125212	28° 15' 10.2286" N	75° 01' 02.3973" E		185657	6°54'17.2"	
					3242			
AP-106	504824	3126082	28° 15' 38.4807" N	75° 02' 57.0428" E		188899	34°6'25.3"	
					223			RAILWAY LINE , SINGLE TRACK , BROAD GAIDGE, ELECTRIFIED, CHURU TO FATEHPUR SECTION KM NO.80,81 / SH-37 CHURU TO JHUNJHUNO ROAD KM NO. 200,201
AP-107	504968	3126252	28° 15' 44.0040" N	75° 03' 02.3422" E		189122	31°19'33.4"	
					942			
AP-108	505862	3126548	28° 15' 53.6259" N	75° 03' 35.1578" E		190064	13°9'30.8"	
					4261			
AP-109	510106	3126934	28° 16' 06.0619" N	75° 06' 10.9380" E		194326	20°32'58.3"	
					1262			

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-110	511323	3126600	28° 15' 55.1655" N	75° 06' 55.5877" E		195587	12°30'30.6"	
					958			
AP-111	512170	3126152	28° 15' 40.5851" N	75° 07' 26.6588" E		196546	21°15'10.9"	
					1414			
AP-112	513574	3125989	28° 15' 35.2445" N	75° 08' 18.1887" E		197959	1°14'8.5"	
					2250			
AP-113	515814	3125778	28° 15' 28.2994" N	75° 09' 40.4113" E		200210	4°27'52.2"	
					1609			
AP-114	517399	3125503	28° 15' 19.2898" N	75° 10' 38.5743" E		201818	21°46'39.5"	
					4217			
AP-115	521525	3126375	28° 15' 47.4087" N	75° 13' 10.0514" E		206035	7°39'3.4"	
					1743			
AP-116	523263	3126505	28° 15' 51.5323" N	75° 14' 13.8440" E		207778	10°31'31.9"	
					1102			
AP-117	524359	3126385	28° 15' 47.5663" N	75° 14' 54.0530" E		208880	14°12'44.5"	
					571			
AP-118	524925	3126465	28° 15' 50.1029" N	75° 15' 14.8282" E		209452	1°17'46.9"	
					617			
AP-119	525533	3126564	28° 15' 53.2882" N	75° 15' 37.1762" E		210068	35°28'38.9"	
					858			
AP-120	526303	3126185	28° 15' 40.9188" N	75° 16' 05.3992" E		210926	15°47'56.6"	
					1489			
AP-121	527767	3125916	28° 15' 32.0690" N	75° 16' 59.1087" E		212415	8°5'4.1"	
					1274			
AP-122	529040	3125864	28° 15' 30.2887" N	75° 17' 45.8323" E		213689	35°49'14.2"	
					213			400KV D/C LINE U/C

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-123	529218	3125982	28° 15' 34.0930" N	75° 17' 52.3600" E		213902	40°10'36.7"	
					612			
AP-124	529825	3125911	28° 15' 31.7296" N	75° 18' 14.6597" E		214514	14°5'1.5"	
					208			132KV S/C LINE
AP-125	530031	3125937	28° 15' 32.5822" N	75° 18' 22.2225" E		214722	5°9'17.8"	
					889			
AP-126	530920	3125972	28° 15' 33.6404" N	75° 18' 54.8394" E		215611	12°24'36"	
					223			SH-41 JHUNJHUNO TO SADULPUR ROAD KM NO.67,68
AP-127	531136	3126028	28° 15' 35.4536" N	75° 19' 02.7545" E		215834	11°52'38.8"	
					650			
AP-128	531785	3126060	28° 15' 36.4217" N	75° 19' 26.5915" E		216484	23°25'12.3"	
					4459			
AP-129	535958	3124488	28° 14' 44.9518" N	75° 21' 59.5685" E		220943	16°6'4"	
					3624			
AP-130	539570	3124201	28° 14' 35.2560" N	75° 24' 12.0918" E		224567	11°37'50"	
					605			
AP-131	540151	3124033	28° 14' 29.7191" N	75° 24' 33.3859" E		225171	18°0'40.1"	
					358			SH-41B BANGAD TO MANDRELA ROAD KM NO.11,12
AP-132	540509	3124044	28° 14' 30.0534" N	75° 24' 46.5331" E		225530	8°25'36.1"	
					207			132KV S/C LINE
AP-133	540715	3124020	28° 14' 29.2581" N	75° 24' 54.0838" E		225737	16°57'56.2"	
					1949			
AP-134	542502	3123242	28° 14' 03.7461" N	75° 25' 59.5442" E		227686	30°29'50.6"	
					2457			
AP-135	544941	3123539	28° 14' 13.1098" N	75° 27' 29.0896" E		230143	18°12'31.8"	
					953			

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-136	545876	3123353	28° 14' 06.9445" N	75° 28' 03.3593" E		231096	6°11'13.5"	
					1127			
AP-137	546998	3123253	28° 14' 03.5608" N	75° 28' 44.5383" E		232223	16°20'3.1"	
					1684			
AP-138	548566	3122638	28° 13' 43.3846" N	75° 29' 41.9555" E		233907	22°23'56.3"	
					927			
AP-139	549492	3122654	28° 13' 43.7795" N	75° 30' 15.9480" E		234834	29°8'4.7"	
					2108			
AP-140	551351	3121660	28° 13' 11.2080" N	75° 31' 23.9896" E		236942	32°10'42.5"	
					622			
AP-141	551971	3121704	28° 13' 12.5412" N	75° 31' 46.7551" E		237563	12°7'27.7"	
					1251			
AP-142	553209	3121527	28° 13' 06.6416" N	75° 32' 32.1557" E		238814	10°51'11.5"	
					1040			
AP-143	554193	3121190	28° 12' 55.5271" N	75° 33' 08.1787" E		239854	30°39'33.3"	
					231			132KV S/C LINE
AP-144	554342	3121014	28° 12' 49.7995" N	75° 33' 13.6301" E		240085	14°0'24.6"	
					923			
AP-145	555093	3120477	28° 12' 32.2203" N	75° 33' 41.0834" E		241008	22°57'48.7"	
					214			NH-11 JHUNJHUNO TO REWADI ROAD
AP-146	555205	3120294	28° 12' 26.2656" N	75° 33' 45.1500" E		241222	48°49'38.6"	
					1538			
AP-147	556721	3120034	28° 12' 17.5839" N	75° 34' 40.7074" E		242760	5°38'55.9"	
					1850			

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-148	558566	3119902	28° 12' 13.0098" N	75° 35' 48.3806" E		244610	1°18'47.6"	
					1383			
AP-149	559943	3119772	28° 12' 08.5593" N	75° 36' 38.8535" E		245993	4°14'52.5"	
					1338			
AP-150	561281	3119745	28° 12' 07.4644" N	75° 37' 27.9256" E		247331	28°5'41"	
					216			RAILWAY LINE , SINGLE TRACK, BROAD GAIDGE, ELECTRIFIED, LOHARU TO JHUNJHUNU SECTION, KM NO.328,329
AP-151	561469	3119640	28° 12' 04.0050" N	75° 37' 34.8161" E		247547	23°59'35.6"	
					768			
AP-152	562234	3119569	28° 12' 01.5898" N	75° 38' 02.8718" E		248316	23°32'35.6"	
					514			
AP-153	562684	3119322	28° 11' 53.4743" N	75° 38' 19.3325" E		248829	21°45'59.7"	
					228			132KV S/C LINE
AP-154	562910	3119294	28° 11' 52.5303" N	75° 38' 27.6144" E		249057	7°48'36.8"	
					891			
AP-155	563771	3119066	28° 11' 44.9680" N	75° 38' 59.1532" E		249948	0°53'18.3"	
					818			
AP-156	564565	3118869	28° 11' 38.4227" N	75° 39' 28.2220" E		250765	12°45'46.3"	
					1235			
AP-157	565800	3118843	28° 11' 37.3708" N	75° 40' 13.5140" E		252001	11°37'11.6"	
					681			
AP-158	566464	3118692	28° 11' 32.3441" N	75° 40' 37.8447" E		252682	23°15'52"	
					1013			
AP-159	567461	3118876	28° 11' 38.1377" N	75° 41' 14.4293" E		253695	13°8'25.2"	
					1208			
AP-160	568667	3118820	28° 11' 36.0763" N	75° 41' 58.6574" E		254903	20°29'1.6"	

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					1031			
AP-161	569615	3118414	28° 11' 22.7178" N	75° 42' 33.3328" E		255934	12°14'29"	
					913			
AP-162	570511	3118241	28° 11' 16.9241" N	75° 43' 06.1671" E		256846	53°51'54"	
					196			NH-13 JHUNJHUNU TO REWADI ROAD KM NO.128,129
AP-163	570655	3118375	28° 11' 21.2404" N	75° 43' 11.4651" E		257043	41°14'49.6"	
					817			
AP-164	571471	3118399	28° 11' 21.8655" N	75° 43' 41.4079" E		257859	8°41'33.3"	
					675			
AP-165	572141	3118317	28° 11' 19.0609" N	75° 44' 05.9605" E		258534	24°15'21.8"	
					1459			
AP-166	573388	3117560	28° 10' 54.2182" N	75° 44' 51.5229" E		259993	29°15'19"	
					637			
AP-167	574024	3117537	28° 10' 53.3675" N	75° 45' 14.8566" E		260630	26°15'52.1"	
					1040			
AP-168	574940	3117045	28° 10' 37.1770" N	75° 45' 48.3358" E		261670	51°30'9.7"	
					202			132KV S/C LINE TOWER NO. 40,41
AP-169	575126	3117124	28° 10' 39.7255" N	75° 45' 55.1524" E		261872	31°57'50"	
					1323			
AP-170	576433	3116924	28° 10' 32.9342" N	75° 46' 43.0451" E		263194	20°9'32.7"	
					227			765KV S/C JAIPUR TO BHIWANI LINE (PGCIL) TOWER NO.555,556
AP-171	576632	3116814	28° 10' 29.3278" N	75° 46' 50.3110" E		263421	17°43'47.2"	
					1239			
AP-172	577847	3116574	28° 10' 21.2831" N	75° 47' 34.8212" E		264660	14°5'19.4"	

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					828			
AP-173	578674	3116617	28° 10' 22.4824" N	75° 48' 05.1404" E		265488	45°15'31.2"	
					263			765KV S/C JAIPUR TO BHIWADI LINE (PGCIL) TOWER NO.542,543
AP-174	578868	3116440	28° 10' 16.6925" N	75° 48' 12.2197" E		265750	30°20'36.5"	
					709			
AP-175	579561	3116293	28° 10' 11.7603" N	75° 48' 37.6105" E		266459	7°31'5.8"	
					1538			
AP-176	581095	3116173	28° 10' 07.5340" N	75° 49' 33.8049" E		267997	3°31'39.2"	
					222			132KV S/C LINE
AP-177	581317	3116169	28° 10' 07.3667" N	75° 49' 41.9519" E		268219	25°56'16.9"	
					506			
AP-178	581775	3116383	28° 10' 14.2101" N	75° 49' 58.8126" E		268725	28°31'1.1"	
					200			220KV S/C LINE
AP-179	581975	3116371	28° 10' 13.7676" N	75° 50' 06.1192" E		268925	3°30'11"	
					966			
AP-180	582933	3116253	28° 10' 09.7157" N	75° 50' 41.2491" E		269891	14°55'16.5"	
					1186			
AP-181	584034	3115810	28° 09' 55.0665" N	75° 51' 21.4708" E		271077	32°8'7.6"	
					233			
AP-182	584170	3115621	28° 09' 48.9079" N	75° 51' 26.4313" E		271310	11°42'6.5"	
					167			132KV S/C LINE
AP-183	584293	3115509	28° 09' 45.2245" N	75° 51' 30.9231" E		271477	7°25'8.8"	
					442			
AP-184	584579	3115171	28° 09' 34.1965" N	75° 51' 41.2909" E		271918	21°43'21.8"	
					1192			

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-185	585630	3114610	28° 09' 15.7270" N	75° 52' 19.7050" E		273110	0°6'35.2"	
					266			220KV D/C LINE
AP-186	585866	3114485	28° 09' 11.6126" N	75° 52' 28.3004" E		273377	4°3'53.8"	
					795			
AP-187	586539	3114064	28° 08' 57.7602" N	75° 52' 52.8900" E		274172	46°15'24.8"	
					214			
AP-188	586747	3114117	28° 08' 59.4202" N	75° 53' 00.5061" E		274386	28°47'30.5"	
					887			
AP-189	587606	3113893	28° 08' 51.9691" N	75° 53' 31.9249" E		275273	4°37'36.1"	
					664			
AP-190	588260	3113779	28° 08' 48.0891" N	75° 53' 55.8790" E		275937	48°22'19.7"	
					281			500KV HVDC MUNDRA TO MAHENDRAGARH LINE (ADANI POWER) TOWER NO.2562,2563
AP-191	588407	3113540	28° 08' 40.2956" N	75° 54' 01.2186" E		276218	38°50'39.4"	
					230			
AP-192	588624	3113463	28° 08' 37.7491" N	75° 54' 09.1607" E		276448	34°11'46.8"	
					232			400KV D/C KHETRI TO NEEMRANA LINE
AP-193	588762	3113277	28° 08' 31.6481" N	75° 54' 14.1460" E		276680	33°37'30.8"	
					1099			
AP-194	589794	3112900	28° 08' 19.1665" N	75° 54' 51.8846" E		277779	46°17'27.5"	
					279			400KV D/C KHETRI TO BHIWADI LINE (PBTCL) TOWER NO-80,81
AP-195	589906	3112644	28° 08' 10.8250" N	75° 54' 55.9265" E		278058	17°4'17.2"	
					1429			
AP-196	590071	3111225	28° 07' 24.6529" N	75° 55' 01.5596" E		279487	35°12'56.4"	

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					957			
AP-197	590709	3110511	28° 07' 01.3146" N	75° 55' 24.7563" E		280444	33°5'1"	
					169			NH-11 JHUNJHUNU TO REWARI ROAD
AP-198	590735	3110344	28° 06' 55.8871" N	75° 55' 25.6495" E		280613	33°43'47.8"	
					479			
AP-199	591058	3109991	28° 06' 44.3294" N	75° 55' 37.3993" E		281092	37°0'53.9"	
					209			765KV D/C JHATIKARA TO KHETRI LINE(PGCIL) TOWER NO.71,72
AP-200	591078	3109783	28° 06' 37.5542" N	75° 55' 38.0699" E		281301	21°44'31.8"	
					851			
AP-201	591467	3109026	28° 06' 12.8698" N	75° 55' 52.1055" E		282152	39°20'55"	
					989			
AP-202	591258	3108059	28° 05' 41.4917" N	75° 55' 44.2007" E		283142	4°6'8.6"	
					2187			
AP-203	590952	3105893	28° 04' 31.2071" N	75° 55' 32.3727" E		285328	16°18'55.7"	
					891			
AP-204	591080	3105012	28° 04' 02.5299" N	75° 55' 36.8172" E		286219	49°13'51.1"	
					1612			
AP-205	592440	3104145	28° 03' 34.0370" N	75° 56' 26.3824" E		287832	2°18'29.2"	
					333			400KV D/C BABAI TO BHIWANI LINE TOWER NO-80,81
AP-206	592727	3103978	28° 03' 28.5286" N	75° 56' 36.8648" E		288164	49°27'40.8"	
					563			
AP-207	592828	3103425	28° 03' 10.5206" N	75° 56' 40.4065" E		288727	19°10'34.7"	
					1478			
AP-208	592601	3101964	28° 02' 23.1096" N	75° 56' 31.6757" E		290205	1°57'23.6"	
					642			

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-209	592524	3101327	28° 02' 02.4209" N	75° 56' 28.6798" E		290847	13°40'40.8"	
					551			
AP-210	592590	3100779	28° 01' 44.6146" N	75° 56' 30.9154" E		291398	0°55'58.5"	
					1264			
AP-211	592719	3099522	28° 01' 03.7407" N	75° 56' 35.2884" E		292662	45°34'36.5"	
					600			
AP-212	593188	3099148	28° 00' 51.4724" N	75° 56' 52.3592" E		293262	15°42'38.8"	
					775			
AP-213	593902	3098848	28° 00' 41.5191" N	75° 57' 18.4094" E		294037	30°59'24.7"	
					380			
AP-214	594126	3098541	28° 00' 31.5009" N	75° 57' 26.5251" E		294416	2°38'59.6"	
					1044			
AP-215	594702	3097671	28° 00' 03.0683" N	75° 57' 47.3789" E		295460	15°13'53.1"	
					1399			
AP-216	595141	3096342	27° 59' 19.7852" N	75° 58' 03.0623" E		296859	22°6'14.6"	
					564			
AP-217	595507	3095912	27° 59' 05.7249" N	75° 58' 16.3206" E		297424	31°16'52.7"	
					1760			
AP-218	597177	3095359	27° 58' 47.3066" N	75° 59' 17.2941" E		299183	40°6'18.7"	
					1076			
AP-219	597740	3094442	27° 58' 17.3729" N	75° 59' 37.6316" E		300259	24°42'15.9"	
					442			SH-13 Narnaul to Nijampur Road
AP-220	597793	3094003	27° 58' 03.0849" N	75° 59' 39.4344" E		300702	31°20'56.1"	
					518			
AP-221	598113	3093596	27° 57' 49.7739" N	75° 59' 51.0383" E		301220	18°2'22"	

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					863			
AP-222	598411	3092786	27° 57' 23.3848" N	76° 00' 01.6791" E		302082	26°17'4.3"	
					187			RAILWAY LINE , FOUR TRACK, ELECTRIFIED, BROAD GAIDGE, NARNAUL TO RENGUS SECTION KM NO.1269,1270
AP-223	598546	3092657	27° 57' 19.1671" N	76° 00' 06.5948" E		302269	19°32'47"	
					1197			
AP-224	599088	3091590	27° 56' 44.3415" N	76° 00' 26.0926" E		303466	27°47'58.8"	
					1469			
AP-225	600286	3090741	27° 56' 16.4460" N	76° 01' 09.6944" E		304934	48°42'18.3"	
					155			
AP-226	600437	3090777	27° 56' 17.5718" N	76° 01' 15.2154" E		305089	15°28'12.4"	
					374			
AP-227	600811	3090764	27° 56' 17.0337" N	76° 01' 28.8804" E		305463	39°4'46.1"	
					453			
AP-228	601152	3090466	27° 56' 07.2548" N	76° 01' 41.2735" E		305916	37°0'9.1"	
					359			
AP-229	601226	3090114	27° 55' 55.8147" N	76° 01' 43.8653" E		306275	39°51'25.7"	
					208			400KV S/C NMR TO SIKAR LINE (PGCIL) TOWER NO.145,146
AP-230	601128	3089931	27° 55' 49.8857" N	76° 01' 40.2437" E		306483	27°20'26.7"	
					318			
AP-231	601125	3089613	27° 55' 39.5550" N	76° 01' 40.0123" E		306801	21°17'48.2"	
					865			
AP-232	601429	3088804	27° 55' 13.1781" N	76° 01' 50.9130" E		307666	11°56'58"	
					837			
AP-233	601556	3087977	27° 54' 46.2676" N	76° 01' 55.2820" E		308502	31°42'12.5"	

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
					1709			
AP-234	602663	3086675	27° 54' 3.6679" N	76° 02' 35.3871" E		310211	0°41'42.8"	
					1424			
AP-235	603599	3085602	27° 53' 28.5406" N	76° 03' 9.2722" E		311635	28°26'19"	
					193			
AP-236	603641	3085414	27° 53' 22.4153" N	76° 03' 10.7573" E		311828	32°20'35.8"	
					928			
AP-237	604298	3084757	27° 53' 0.8957" N	76° 03' 34.5562" E		312756	5°48'34.9"	
					524			
AP-238	604704	3084426	27° 52' 50.0195" N	76° 03' 49.3027" E		313280	38°1'24.4"	
					1098			
AP-239	604947	3083355	27° 52' 15.1500" N	76° 03' 57.8448" E		314379	21°49'29.9"	
					1023			
AP-240	605527	3082513	27° 51' 47.6381" N	76° 04' 18.8080" E		315401	44°24'35.4"	
					596			
AP-241	606112	3082400	27° 51' 43.7834" N	76° 04' 40.1484" E		315997	15°0'4"	
					1345			
AP-242	607321	3081811	27° 51' 24.2934" N	76° 05' 24.1438" E		317341	13°40'7"	
					1273			
AP-243	608301	3080998	27° 50' 57.6062" N	76° 05' 59.7154" E		318615	1°50'43"	
					1167			
AP-244	609223	3080283	27° 50' 34.0853" N	76° 06' 33.1897" E		319782	19°14'54.1"	
					698			
AP-245	609603	3079697	27° 50' 14.9401" N	76° 06' 46.8695" E		320480	42°54'36.1"	
					277			400KV S/C HISSAR TO BASSI LINE (PGCIL) TOWER NO-409,410

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-246	609871	3079629	27° 50' 12.6599" N	76° 06' 56.6681" E		320757	2°59'47"	
					212			
AP-247	610079	3079588	27° 50' 11.2662" N	76° 07' 4.2561" E		320969	33°32'5.1"	
					229			400KV D/C SIKAR NEEMRANA LINE U/C
AP-248	610242	3079427	27° 50' 5.9962" N	76° 07' 10.1412" E		321197	14°28'19.3"	
					603			
AP-249	610762	3079124	27° 49' 55.9860" N	76° 07' 29.0763" E		321800	17°35'1.9"	
					3097			
AP-250	613784	3078447	27° 49' 33.0701" N	76° 9' 19.2901" E		324897	20°1'58.3"	
					637			
AP-251	614416	3078529	27° 49' 35.5442" N	76° 09' 42.4204" E		325534	31°51'6.5"	
					248			NH-48B KOTPUTLI TO MAHENDRAGARH ROAD
AP-252	614608	3078686	27° 49' 40.5761" N	76° 09' 49.4828" E		325782	41°48'42.7"	
					478			
AP-253	615086	3078664	27° 49' 39.7349" N	76° 10' 6.9358" E		326260	18°48'10.8"	
					733			
AP-254	615768	3078398	27° 49' 30.8528" N	76° 10' 31.7777" E		326993	22°21'57.8"	
					1164			
AP-255	616609	3077593	27° 49' 4.4523" N	76° 11' 2.2298" E		328156	26°33'8.4"	
					1057			
AP-256	617618	3077281	27° 48' 53.9976" N	76° 11' 39.0069" E		329213	10°47'36.5"	
					1257			
AP-257	618728	3076692	27° 48' 34.4955" N	76° 12' 19.3552" E		330470	19°33'50.7"	
					543			
AP-258	619095	3076291	27° 48' 21.3704" N	76° 12' 32.6012" E		331012	19°45'31.9"	
					659			

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-259	619678	3075984	27° 48' 11.2006" N	76° 12' 53.8066" E		331672	6°29'39.4"	
					380			
AP-260	620032	3075846	27° 48' 6.6018" N	76° 13' 6.7059" E		332052	18°43'27.5"	
					931			
AP-261	620962	3075805	27° 48' 4.9522" N	76° 13' 40.6714" E		332983	9°17'25.5"	
					893			
AP-262	621849	3075909	27° 48' 8.0647" N	76° 14' 13.1030" E		333876	43°33'2.5"	
					316			
AP-263	622102	3075720	27° 48' 1.8301" N	76° 14' 22.2801" E		334192	4°49'5.2"	
					183			NH-48 DELHI TO JAIPUR ROAD KM NO.145,146
AP-264	622258	3075623	27° 47' 58.5902" N	76° 14' 27.9001" E		334375	30°28'44.5"	
					330			
AP-265	622587	3075614	27° 47' 58.2273" N	76° 14' 39.9773" E		334705	12°53'8"	
					169			132KV S/C LINE TOWER NO.51,52
AP-266	622751	3075572	27° 47' 56.8058" N	76° 14' 45.9491" E		334874	15°43'35.6"	
					640			
AP-267	623305	3075250	27° 47' 46.1764" N	76° 15' 6.0697" E		335515	2°56'4.6"	
					600			
AP-268	623839	3074976	27° 47' 37.0944" N	76° 15' 25.4550" E		336114	7°16'46.1"	
					206			220KV D/C LINE TOWER NO.53,54
AP-269	624009	3074860	27° 47' 33.2467" N	76° 15' 31.6198" E		336320	1°56'57.5"	
					517			
AP-270	624445	3074582	27° 47' 24.0678" N	76° 15' 47.4439" E		336838	27°30'30.9"	
					869			
AP-271	625310	3074506	27° 47' 21.3081" N	76° 16' 19.0411" E		337707	0°59'1.8"	
					1016			

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-272	626321	3074399	27° 47' 17.5136" N	76° 16' 55.9335" E		338723	0°10'45.1"	
					644			
AP-273	626962	3074334	27° 47' 15.1736" N	76° 17' 19.3097" E		339367	7°51'48.4"	
					473			
AP-274	627421	3074222	27° 47' 11.3813" N	76° 17' 36.0536" E		339840	3°21'28.6"	
					734			
AP-275	628123	3074007	27° 47' 4.1512" N	76° 18' 1.6059" E		340574	17°1'42.2"	
					649			
AP-276	628772	3074007	27° 47' 3.9218" N	76° 18' 25.3158" E		341223	28°52'14.3"	
					383			
AP-277	629107	3074192	27° 47' 9.8068" N	76° 18' 37.6332" E		341605	11°17'1"	
					571			
AP-278	629651	3074364	27° 47' 15.2179" N	76° 18' 57.5847" E		342176	7°11'45.2"	
					952			
AP-279	630588	3074535	27° 47' 20.4622" N	76° 19' 31.8670" E		343129	16°25'21.7"	
					426			
AP-280	630968	3074727	27° 47' 26.5674" N	76° 19' 45.8312" E		343554	13°7'20.5"	
					841			
AP-281	631785	3074926	27° 47' 32.7383" N	76° 20' 15.7576" E		344395	0°46'1.7"	
					238			
AP-282	632017	3074979	27° 47' 34.3834" N	76° 20' 24.2533" E		344633	43°38'29.5"	
					763			
AP-283	632673	3074589	27° 47' 21.4753" N	76° 20' 48.0703" E		345397	7°53'18.6"	
					1055			
AP-284	633498	3073931	27° 46' 59.7828" N	76° 21' 17.9226" E		346452	19°37'33.5"	
					379			

## Bikaner -III - Neemrana -II 765kV D/C Line

AP No.	Easting	Northing	Latitude	Longitude	Span	Cum. Length	Angle of Dev	Remarks
AP-285	633697	3073609	27° 46' 49.2470" N	76° 21' 25.0744" E		346831	24°30'15.6"	
					411			
AP-286	633749	3073201	27° 46' 35.9943" N	76° 21' 26.8027" E		347241		Neemrana -II S/S

**Bikaner-III - Neemrana-II 765 kV D/C line (2nd)**  
**Power line Crossings**

SL No.	Circuit Details	Voltage Rating in KV / Crossing	Name of Owner (SEBs/DOT)	Remarks (Crossing in Between Loc. No.)
1.	S/C	132KV		AP19-AP20
2.	D/C	400 KV	RVPNL	AP21-AP22
3.	S/C	220KV		AP32-AP33
4.	S/C	400KV	RVPNL	AP34-AP35
5.	D/C	765KV	PGCIL	AP36-AP37
6.	D/C	220 KV		AP62-AP63
7.	S/C	132KV		AP75-AP76
8.	D/C	220KV		AP75-AP76
9.	S/C	400 KV	RSEB	AP77-AP78
10.	S/C	400 KV	RSEB	AP79-AP80
11.	S/C	132 KV		AP93-AP94
12.	D/C	400 KV		AP122-AP123
13.	S/C	132KV		AP124-AP125
14.	S/C	132 KV		AP132-AP133
15.	S/C	132KV		AP143-AP144
16.	S/C	132KV		AP153-AP154
17.	S/C	132KV		AP168-AP169
18.	S/C	765 KV	PGCIL	AP170-AP171
19.	S/C	765KV	PGCIL	AP173-AP174
20.	S/C	132KV		AP176-AP177
21.	S/C	220 KV		AP178-AP179
22.	S/C	132KV		AP182-AP183
23.	S/C	220 KV		AP185-AP186
24.	HVDC	500KV		AP190-AP191
25.	D/C	400KV		AP192-AP193
26.	D/C	400KV	PGCIL	AP194-AP195

27.	D/C	765KV	PGCIL	AP199-AP200
28.	D/C	400 KV		AP205-AP206
29.	S/C	400KV		AP229-AP230
30.	S/C	400KV	PGCIL	AP245-AP246
31.	D/C	400KV	PGCIL	AP247-AP248
32.	S/C	132KV		AP265-AP266
33.	D/C	220KV		AP268-AP269

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

## River Crossing

SL. No.	Name of River	Approximate Span in Meters (bank to bank width)	Perennial / Weathered Flow	Navigable / Non - Navigable	Remarks (Crossing in Between Loc. No.)
1.	NIL	NIL	NIL	NIL	NIL

## Bikaner-III - Neemrana-II 765 kV D/C line (2nd)

## Railway Line Crossing

S. No.	Name of the Railway Line	Type of Gauge Broad / Metre / Narrow	Single/Double/Triple Line	Stone No.	Electrified / Non- Electrified	Remarks (Crossing in Between Locs.)
1.	SURATGARH TO BIKANER	Gauge Broad	Single	256,257	Electrified	AP29-AP30
2.	SARDARSHAHAR TO RATANGARH	Gauge Broad	Single	29,30	Electrified	AP70-AP71
3.	CHURU TO RATANGARH	Gauge Broad	Single	286,287	Electrified	AP97-AP98
4.	CHURU TO FATEHPUR	Gauge Broad	Single	80,81	Electrified	AP106-AP107
5.	LOHARU TO JHUNJHUNU	Gauge Broad	Single	328,329	Electrified	AP150-AP151
6.	NARNAUL TO TO RENGUS	Gauge Broad	Four	1269,1270	Electrified	AP222-AP223

**Bikaner-III - Neemrana-II 765 kV D/C line (2nd)**  
**Forest Details**

S. No.	Section AP to AP	Name of the Forest	Type of Forest (Reserved / Protected / Social)	Forest Stretches (M)	Affected Forest Area(sqm)
1	NIL	NIL	NIL	NIL	NIL

**Bikaner-III - Neemrana-II 765 kV D/C line (2nd)**  
**NH & SH Crossings**

Sl. No.	Name of the Road	Type Of Road National Highway / State Highway	Nearest City / Town From Crossing	Approximate Both Side KMS. Stone of Crossing	Remarks (Crossing Between Loc. No.)
1	SURATGARH TO BIKANER	NH-62	Lunkaransar	47,48	AP17-AP18
2	BIKANER TO AMRITSAR	Expressway	Lunkaransar	376,377	AP38-AP39
3	KALU TO DUNGARGARH	SH-93	Kalu		AP43-AP44
4	SARDAR SHAHAR TO DUNGARGARH	SH-6	SardarShahar	113,114	AP60-AP61
5	SARDAR SHAHAR TO RATANGARH	SH-7	Sardar Shahar	237,238	AP73-AP74
6	CHURU TO RATANGARH	SH-107	Churu	286,287	AP90-AP91
7	CHURU TO FATEHPUR	NH-52	Churu		AP99-AP100
8	CHURU TO FATEHPUR	NH-52	Churu	83,84	AP102-AP103
9	CHURU TO JHUNJHUNO	SH-37	Churu	200,201	AP106-AP107
10	JHUNJHUNO TO SADULPUR	SH-41	Jhunjhunu	67,68	AP126-AP127
11	BANGAD TO MANDRELA	SH-41B	Jhunjhunu	11,12	AP131-AP132
12	JHUNJHUNO TO REWADI	NH-11	Chirwa		AP145-AP146
13	JHUNJHUNO TO REWADI	NH-13	Chirwa	128,129	AP162-AP163
14	JHUNJHUNO TO REWARI	NH-11	Singhana		AP197-AP198
15	NARNAUL TO NIZAMPUR	SH-13	Singhana		AP219-AP220
16	KOTPUTLI TO MAHENDRAGARH	NH-48B	Kotputli		AP251-AP252
17	DELHI TO JAIPUR	NH-48	Kotputli		AP263-AP264

**CHAPTER-5.4****SUMMARY OF PROPOSED ROUTE**

## Bikaner -III - Neemrana -II 765kV D/C Line

## Detailed Summary of Proposed Route

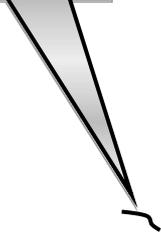
Sl. No.	Particulars	Outlook					
1.	Start Point	Gantry Bikaner – III S/S					
		Latitude			Longitude		
		Deg.	Min.	Sec.	Deg.	Min.	Sec.
		28°	21'	58.6301"	73°	11'	26.5401"
2.	END Point	Gantry Neemrana – II S/S					
		Latitude			Longitude		
		Deg.	Min.	Sec.	Deg.	Min.	Sec.
		27°	46'	35.9943"	76°	21'	26.8027"
3.	Route Particulars						
	(i) Bee Line (KM)	318.016 km					
	(ii) Length (KM)	347.241 km					
	(iii) Angle Points	286 Nos.					
	(iv) Wind Zone	Wind Zone 4					
4.	States	Rajasthan, Haryana					
5.	Environmental Impact	Nil					
	(i) Houses within R.O.W.	Nil					
	(ii) Forest involvement	Nil					
	a) Length of forest area (km)						
	Reserved Forest (km)	Nil					
	Protected Forest (km)	Nil					
	Open Scrub (km)	Nil					
6.	Details of Crossing						
	a) Coal mines	Nil					
	a) Nos. Railway Crossing	6 Nos.					
	b) Nos. Power Line Crossing	33 Nos.					
	c) Nos. NH/SH Crossing	17 Nos.					
	e) Wild Life Sanctuary	Nil					
	f) Nos. River Crossing	Nil					
	g) Military Area (km)	Nil					
7.	Availability of Accommodation	Available					
	Airport	Jhunjhunu, Narnaul					
	Cities & Town	Bikaner, Churu , Jhunjhunu, Mahendragarh , Jaipur, Alwar					
8.	Approaches along the route	Available					
9.	Monsoon	Medium Rainfall					
10.	Type of Soil	Mix Black Cotton					
11.	Type of standing crops	Wheat, Sarso & Chana					

**CHAPTER-1.5**  
**WIND ZONE MAP**

# WIND ZONE MAP

## Wind Zone-4

Bikaner-III - Neemrana-II 765  
kV D/C line (2nd)DC Line



**CHAPTER-5.6****RESULT & CONCLUSIONS**

## Results & Conclusions

Referring to angle point summary and after initial inspection of physical maps updated with satellite images and walk over survey, the proposed corridor was explored for the best route alignment. Special attention has been given to the existing EHV lines, forest, reserved forest, river crossings, national/state highways, minimum route length and habitation including plantation. After detailed analysis, the proposed transmission line route has been observed as viable route for alignment due to its good approach, for construction and maintenance of the transmission line after construction.

Finally, the Route marked Red in the route alignment drawing has been proposed as final route.

**CHAPTER-5.7****ROUTE ALIGNMENT MAP ON  
DIGITIZED TOPOSHEET**



पीएफसी कंसल्टिंग लिमिटेड

(पावर फाइनेंस कॉर्पोरेशन लिमिटेड की पूर्णतःस्वामित्वाधीन सहायक कम्पनी)

**PFC CONSULTING LIMITED**

(A wholly owned subsidiary of Power Finance Corporation Limited)

CIN U74140DL2008GOI175858

Ref. No.: 04/22-23/ITP-60/RFP

August 11, 2023

To,  
Mr. Nitin Kumar  
Sr. Business Development Manager (T&D)  
The Tata Power Company Limited,  
Shatabdi Bhawan, B-12 & 13, Sector 4,  
Noida, UP-201301

E-mail: nitin.kumar@tatapower.com

**Subject: Independent Transmission Project "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C" – Regarding Additional Clarifications to RFP documents.**

Dear Sir,

This is in continuation to PFCCL letter dated 06.06.2023 and 10.07.2023 regarding issuance of clarifications and amendments to RFP documents for the subject transmission project.

The additional queries raised by the bidders on RFP documents have been examined and additional clarifications are enclosed herewith at **Annexure-I** for your information and further necessary action please.

Thanking you,

Yours faithfully

(Sanjay Nayak)

General Manager

Encl.: As above

पंजीकृत कार्यालय : प्रथम तल "ऊर्जानिधि", 1, बाराखम्बा लेन, कनॉट प्लेस, नई दिल्ली-110001

Regd. Office : First Floor, "Urjanidhi", 1, Barakhamba Lane, Connaught Place, New Delhi-110001

कंपनी मुख्यालय: नौवॉ तल (ए विंग) स्टेट्समैन हाउस, कनॉट प्लेस, नई दिल्ली-110001 दूरभाष : 011-23443900 फ़ैक्स : 011-23443990

Corporate Office : 9th Floor (A Wing) Statesman House, Connaught Place, New Delhi-110001 Phone : 011-23443900 Fax : 011-2344 3990

ई-मेल/ E-mail : pfcconsulting@pfcindia.com वैबसाईट/Website : www.pfcclindia.com

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
1.	RFP for Selection of Bidder as Transmission Service Provider Clause 1.2 Scope of work 765 kV, 330 MVAr Switchable line reactors at Bikaner III SS – 2 nos. 765 kV, 330 MVAr Switchable line reactors at Neemrana-II SS – 2 nos	We understand that TSP has to supply only 6 nos of 110MVAR reactors at Bikaner III & Neemrana-II respectively. Spare reactor with associated breaker arrangement will already be present at existing SS. Please confirm. Bidder needs information for proper estimation.	It is clarified that TSP has to supply 6 nos. of 110MVAR reactors at each Bikaner III & Neemrana-II s/s as mentioned in the RfP. Further, spare reactor with associated breaker shall also be available at Bikaner III & Neemrana-II s/s. However, interconnection and associated works shall be in the scope of successful bidder.
2.	RFP for Selection of Bidder as Transmission Service Provider Clause 1.2 Scope of work 2 no. of 765 kV line bays at Bikaner III S/s 2 no. of 765 kV line bays at Neemrana-II S/s	We understand that TSP has to provide 2 nos of line bays only at Bikaner III & Neemrana-II S/S respectively and there are no tie bays under present scope of work. Please confirm.  Bidder needs the information for proper estimation.	It is clarified that Bikaner-III to Neemrana-II 765kV D/C line shall be terminated in existing diameter (where tie bays are available) by providing 02 nos. of line bays at each end.
3.	RFP for Selection of Bidder as Transmission Service Provider General	We understand that future substation i.e. Bikaner-III (under part-A) and Neemrana-II (under Part -B), will be planned with sufficient future capacity of following: i. Fire-fighting system, ii. battery and battery charger iii. Provision for space for control room and iv. Provision of feeder space in ACDB & DCDB panels for present scope  In view of the above, we understand that TSP of part-C project does not have to consider extension of these system in present scope of work. Please confirm.  Bidder needs the information for proper estimation	It is envisaged that Fire-fighting system, battery and battery charger and provision of feeder space in ACDB & DCDB panels have sufficient capacity for the extension works under present scope.  Further, switchyard panel room is envisaged as per RfP.

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
4.	RFP for Selection of Bidder as Transmission Service Provider General	<p>BPC is requested to confirm the availability of space in existing control room at Bikaner-III and Neemrana-II for the extension work under present scope.</p> <p>Bidder needs the information for proper estimation</p>	Bidders shall follow the requirements of RfP.
5.	RFP for Selection of Bidder as Transmission Service Provider General	<p>We understand that at Bikaner-III and Neemrana-II, there are spare feeders available in ACDB and DCDB panels for present scope of work. Please confirm.</p> <p>Bidder needs the information for proper estimation</p>	Refer reply at Sr. No. 4 above.
6.	RFP for Selection of Bidder as Transmission Service Provider General	<p>It is requested to BPC to provide the following additional information &amp; drawings for Bikaner-III and Neemrana-II Sub-station.</p> <ol style="list-style-type: none"> <li>i. Existing SDH equipment type, make &amp; mode.</li> <li>ii. Please confirm availability of optical direction existing SDH equipment for present project link.</li> <li>iii. Cable trench layout.</li> <li>iv. Soil test report.</li> <li>v. Marked 765KV Line Bay take-off gantry location for termination of Bikaner III &amp; Neemrana-II 765 kV D/c line at both end substations.</li> </ol> <p>Availability of AC &amp; DC Feeders in LT boards. Bidder needs the information for proper estimation.</p>	<ol style="list-style-type: none"> <li>i. Bikaner-III and Neemrana-II S/s is under bidding stage, SDH Make &amp; Model shall be finalized later on. Documents and drawings of FOTE may be collected by TSP during detailed survey from Bikaner-III &amp; Neemrana-II substation owner.</li> <li>ii. TSP to provide the FOTE at their bay Kiosk at Neemrana-II &amp; Bikaner-III and optically patch with existing FOTE at control room. In case spare optical direction is not available in the existing FOTE at the control room, the TSP shall coordinate with station owner to reconfigure the directions in existing FOTE at control room.</li> </ol> <p><u>iii, iv &amp; v :</u> For cable trench, soil test report, line bay takes off gantry location: refer clause B.5 of specific technical requirement of s/s.</p> <p>Further, regarding availability of AC &amp; DC Feeders, refer reply at Sr. N. 4 above.</p>

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
7.	RFP for Selection of Bidder as Transmission Service Provider General	BPC is requested to confirm, whether the Project / Elements are covered under "Generation linked Project" or "System Strengthening Project." Bidder needs information for proper estimation.	Transmission Project is part of "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part1) (Bikaner Complex)"
8.	RFP for Selection of Bidder as Transmission Service Provider General	BPC may kindly confirm availability of communication ports for integrating new PUs with the existing CUs at existing S/S (Bikaner-III and Neemrana-II). Bidder needs the information for proper estimation.	Refer clause B.5 of specific technical requirement of s/s.
9.	RFP for Selection of Bidder as Transmission Service Provider Clause 1.2 Notes i) Developer of Bikaner-III PS & Neemrana-II S/s shall provide space for 2 nos. of 765 kV line bays along with space for Switchable line reactor each at Bikaner-III PS & Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2nd)	i) We understand that the mentioned space for the extension work at Bikaner -III and Neemrana-II will be made available without any charges to selected TSP. ii) BPC is requested to confirm the timelines for handing over the space by Developer of Bikaner-III and Neemrana-II at Bikaner-III PS and Neemrana-II substation respectively. iii) We understand that levelled land shall be provided to TSP for extension work at Bikaner -III PS and Neemrana-II S/s. iv) We understand that construction of boundary wall is not in present scope for extension work at Bikaner -III and Neemrana-II. Please confirm.  Bidder needs the information for proper estimation.	i. No charge is envisaged for usage of land in substations at Bikaner -III and Neemrana-II for present scope of work.  ii. As per the Note of clause 1.2 of scope of work, it is amply clear that the developer of Bikaner-III and Neemrana-II shall provide the space for bays works at Bikaner-III PS and Neemrana-II substation respectively.  Bidders are advised to coordinate with respective substation owner. iii. Refer clause B.5 of specific technical requirement of s/s of RfP. iv. RfP is amply clear.
10.	RFP for Selection of Bidder as Transmission Service Provider Clause 1.2 Notes i) Developer of Bikaner-III PS & Neemrana-II S/s shall provide space for 2 nos. of 765 kV line bays along with	We understand that unfettered access will be provided to selected TSP for construction of present scope of work at Bikaner-III PS and Neemrana-II Substation respectively.  We also request BPC to clarify if there is any binding arrangement or agreement by which, developer of	As per the Note of clause 1.2 of scope of work, it is amply clear that the developer of Bikaner-III and Neemrana-II shall provide the space for bays works at Bikaner-III PS and Neemrana-II substation respectively.  Bidders are advised to coordinate with respective substation owner.

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
	space for Switchable line reactor each at Bikaner-III PS & Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2nd)	Bikaner-III PS and Neemrana-II S/s is obligated to provide unfettered access and space for 2 nos. of 765 kV line bays along with space for Switchable line reactor each at Bikaner-III PS & Neemrana-II S/s to the selected TSP? Please confirm.  Bidder needs the information for proper estimation.	
11.	RFP for Selection of Bidder as Transmission Service Provider Clause 1.2 Notes i) Developer of Bikaner-III PS & Neemrana-II S/s shall provide space for 2 nos. of 765 kV line bays along with space for Switchable line reactor each at Bikaner-III PS & Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2nd)	Please note that the construction of elements by the selected bidder would depend on provision of space provided by the Developer of Bikaner-III PS and Neemrana-II S/s. In case of any delay in providing space for construction of "2 nos. of 765 kV line bays along with space for Switchable line reactor each at Bikaner-III PS & Neemrana-II S/ by Developer of Bikaner-III PS and Neemrana-II. We request BPC to confirm following: BPC to clarify the following: i. A suitable time extension of SCOD will be provided to the selected TSP. ii. Extra costs incurred by the TSP on account of delays like IDC, Overheads etc. will be suitably adjusted for in Tariff. iii. Delay on the part of the Developer of Bikaner-III and Neemrana-II in providing the spaces will be covered under force majeure?  Bidder needs the information for proper estimation	Refer reply at S. No. 10 above.

S. No.	Clause No. and Existing provision	Clarification required	Clarifications
12.	<p>RFP for Selection of Bidder as Transmission Service Provider</p> <p>Clause 1.2 Notes</p> <p>i) Developer of Bikaner-III PS &amp; Neemrana-II S/s shall provide space for 2 nos. of 765 kV line bays along with space for Switchable line reactor each at Bikaner-III PS &amp; Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2<sup>nd</sup>)</p>	<p>As the space to be provided by Developer of Bikaner-III PS and Neemrana-II S/s at Bikaner-III and Neemrana-II respectively, we understand that if any unsuitability of the space occurs for the construction of present scope of work, then Developer of Bikaner-III and Neemrana-II shall be liable for same for their respective substation. Please confirm.</p> <p>Bidder needs the information for proper estimation</p>	<p>Extension of Bikaner-III PS &amp; Neemrana-II S/s substation shall be done by TSP as per requirement of RFP.</p> <p>Further, bidder is advised to visit the site and acquaint themselves with site conditions.</p>
13.	<p>RFP for Selection of Bidder as Transmission Service Provider</p> <p>Specific Technical requirements for Transmission Line</p>	<p>Please note that for transmission line, no special requirement is specified for type of Insulator and creepage in RFP document.</p> <p>Hence it is understood that bidder can decide the type of insulator along with creepage requirement based on general CEA regulations and relevant standards. Kindly confirm our understanding.</p> <p>Bidder needs information for proper estimation.</p>	<p>The minimum specific creepage distances shall be decided for the pollution condition in the area of installation. It shall be as per CEA regulations and relevant standards.</p>



पीएफसी कंसल्टिंग लिमिटेड  
(पावर फाइनेंस कॉर्पोरेशन लिमिटेड की पूर्णतः स्वामित्वाधीन सहायक कम्पनी)  
**PFC CONSULTING LIMITED**  
(A wholly owned subsidiary of Power Finance Corporation Limited)

Ref. No.: 04/22-23/ITP-58/RFP

September 20, 2023

To,  
Mr. Nitin Kumar  
Sr. Business Development Manager (T&D)  
The Tata Power Company Limited,  
Shatabdi Bhawan, B-12 & 13, Sector 4,  
Noida, UP-201301

E-mail: nitin.kumar@tatapower.com

**Subject: Independent Transmission Project "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C" – Regarding finalized Transmission Service Agreement (TSA).**

Dear Sir,

This has reference to the RFP dated 02.03.2023 for selection of Transmission Service Provider to establish transmission system for "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C" through Tariff Based Competitive Bidding process.

In terms of provisions of Clause 1.6.2.1 (6) of RFP document, please find attached a copy of finalized Transmission Service Agreement after incorporating amendments issued till date for the subject project.

Thanking you,

Yours faithfully

(Sanjay Nayak)

General Manager

Encl.: As above

पंजीकृत कार्यालय : प्रथम तल "ऊर्जानिधि", 1, बाराखम्बा लेन, कर्नाट प्लेस, नई दिल्ली-110001

**Regd. Office** : First Floor, "Urjanidhi", 1, Barakhamba Lane, Connaught Place, New Delhi-110001

कंपनी मुख्यालय: नौवाँ तल (ए विंग) स्टेट्समैन हाउस, कर्नाट प्लेस, नई दिल्ली-110001 दूरभाष : 011-23443900 फ़ैक्स : 011-23443990  
**Corporate Office** : 9th Floor, (A Wing) Statesman House, Connaught Place, New Delhi-110001 Phone : 011-23443900 Fax : 011-23443990

वेबसाइट/Website : www.pfcclindia.com • CIN : U74140DL2008GOI175858

**STANDARD  
TRANSMISSION SERVICE AGREEMENT**

**FOR**

**DEVELOPMENT AND OPERATION OF INTER-STATE  
TRANSMISSION SYSTEM**

**FOR TRANSMISSION OF ELECTRICITY THROUGH TARIFF  
BASED COMPETITIVE BIDDING FOR**

**TRANSMISSION SYSTEM FOR EVACUATION OF POWER  
FROM RAJASTHAN REZ PH-IV (PART-1) (BIKANER  
COMPLEX): PART-C**

**BETWEEN THE**

**CENTRAL TRANSMISSION UTILITY OF INDIA LIMITED  
(NODAL AGENCY)**

**AND**

**BIKANER III NEEMRANA II TRANSMISSION LIMITED**

\_\_\_\_\_.2023

**CONTENTS**

1	Definitions and Interpretations .....	5
2	Effectiveness and Term of Agreement .....	18
3	Conditions Subsequent .....	20
4	Development of the Project .....	24
5	Construction of the Project.....	28
6	Connection and commissioning of the Project.....	33
7	Operation and Maintenance of the Project.....	38
8	Availability of the project.....	39
9	Insurances .....	40
10	Billing And Payment of Transmission Charges.....	42
11	Force Majeure.....	43
12	Change in Law .....	48
13	Events of Default and Termination .....	51
14	Liability and Indemnification .....	56
15	Assignments and Charges .....	62
16	Governing Law and Dispute Resolution.....	64
17	Representation and Warranties .....	66
18	Independent Engineer .....	68
19	Miscellaneous Provisions.....	70

**THIS TRANSMISSION SERVICE AGREEMENT** (hereinafter referred to as "TSA" or "Agreement" or "the Agreement" or "this Agreement") is made on the ..... [Insert day] of..... [Insert month] of Two Thousand and..... [Insert Year]

**BETWEEN:**

The **Central Transmission Utility of India Limited**, "Saudamini", 1st Floor, Plot No. 2, Sector-29, Gurugram-122001, Haryana acting as a Nodal Agency (referred to as the "Nodal Agency"), which expression shall unless repugnant to the context or meaning thereof include its successors, and permitted assigns) as Party of the one part;

**AND**

**Bikaner III Neemrana II Transmission Limited**, incorporated under the Companies Act, 1956/ Companies Act, 2013 (as the case may be), having its registered office at First Floor, Urjanidhi, 1 Barakhamba Lane Cannought Place, New Delhi, Delhi Central Delhi DL 110001 (herein after referred to as "Transmission Service Provider" or "TSP" or "ISTS Licensee", which expression shall unless repugnant to the context or meaning thereof include its successors, and permitted assigns) as Party of the other part;

**("Nodal Agency" and "TSP" are individually referred to as "Party" and collectively as the "Parties")**

**AND WHEREAS:**

- A) In accordance with the Bidding Guidelines, the Bid Process Coordinator (hereinafter referred to as BPC) had initiated a competitive e-reverse bidding process through issue of RFP for selecting a Successful Bidder to build, own, operate and transfer the Project comprising of the Elements mentioned in Schedule 1 (hereinafter referred to as the Project)
- B) Pursuant to the said e-reverse bidding process, the BPC has identified the Successful Bidder, who will be responsible to set up the Project on build, own, operate and transfer basis to provide Transmission Service in accordance with the terms of this Agreement and the Transmission License.
- C) The Selected Bidder have submitted the Contract Performance Guarantee and acquired one hundred percent (100%) of the equity shareholding of Bikaner III Neemrana II Transmission Limited, along with all its related assets and liabilities in terms of the provisions of the Share Purchase Agreement.
- D) The TSP has agreed to make an application for a Transmission License to the Commission for setting up the Project on build, own, operate and transfer basis.

- E) The TSP has further agreed to make an application to the Commission for the adoption of the Transmission Charges under Section 63 of the Electricity Act, 2003, along with a certification from the Bid Evaluation Committee in accordance with the Bidding Guidelines issued by Ministry of Power, Government of India.
- F) The TSP has agreed to execute the agreement(s) required, if any, under Sharing Regulations within fifteen (15) days from the date of grant of Transmission License from the Commission.
- G) The TSP agrees to the terms and conditions laid down under Sharing Regulations, for making available the ISTS and charge the Transmission Charges in accordance with the terms and conditions of Sharing Regulations.
- H) The billing, collection and disbursement of the Transmission Charges by the CTU to the ISTS Licensee shall be governed as per Sharing Regulations.
- I) The terms and conditions stipulated in the Transmission License issued by the Commission to the TSP shall be applicable to this Agreement and the TSP agrees to comply with these terms and conditions. In case of inconsistency between the Transmission License terms & conditions and the conditions of this Agreement, the conditions stipulated in the Transmission License granted by the Commission shall prevail.

**NOW, THEREFORE, IN CONSIDERATION OF THE PREMISES AND MUTUAL AGREEMENTS, COVENANTS AND CONDITIONS SET FORTH HEREIN, IT IS HEREBY AGREED BY AND BETWEEN THE PARTIES HERETO AS FOLLOWS:**

## ARTICLE: 1

### 1. DEFINITIONS AND INTERPRETATIONS

#### 1.1 Definitions:

- 1.1.1 The words / expressions used in this Agreement, unless as defined below or repugnant to the context, shall have the same meaning as assigned to them by the Electricity Act, 2003 and the rules or regulations framed there under including those issued / framed by the Commission (as defined hereunder), as amended or re-enacted from time to time or the General Clauses Act, failing which it shall bear its ordinary English meaning.

The words/expressions when used in this Agreement shall have the respective meanings as specified below:

**“Acquisition Price”** shall have the same meaning as defined in the Share Purchase Agreement;

**“Act”** or **“Electricity Act”** or **“Electricity Act 2003”** shall mean the Electricity Act, 2003 and any amendments made to the same or any succeeding enactment thereof;

**“Affiliate”** shall mean a company that either directly or indirectly

- i. controls or
- ii. is controlled by or
- iii. is under common control with

a Bidding Company (in the case of a single company) or a Member (in the case of a Consortium) and **“control”** means ownership by one entity of at least twenty six percent (26%) of the voting rights of the other entity;

**“Availability”** in relation to the Project or in relation to any Element of the Project, for a given period shall mean the time in hours during that period the Project is capable to transmit electricity at its Rated Voltage and shall be expressed in percentage of total hours in the given period and shall be calculated as per the procedure contained in **Appendix –II to Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019**, attached herewith in Schedule 6;

**“Bid”** shall mean technical bid and financial bid submitted by the Bidder, in response to the RFP, in accordance with the terms and conditions of the RFP;

**“Bid Deadline”** shall mean the last date and time for submission of the Bid in response to RFP, as specified in the RFP;

**“Bidding Company”** shall refer to such single company that has made a Response to RFP for the Project;

**“Bidding Consortium / Consortium”** shall refer to a group of companies that has collectively made a Response to RFP for the Project;

**“Bid Documents”** or **“Bidding Documents”** shall mean the RFP, along with all attachments thereto or clarifications thereof;

**“Bidding Guidelines”** shall mean the “Tariff Based Competitive Bidding Guidelines for Transmission Service” and “Guidelines for Encouraging Competition in Development of Transmission Projects” issued by Government of India, Ministry of Power under Section – 63 of the Electricity Act as amended from time to time;

**“Bid Process Coordinator”** or **“BPC”** shall mean a person or its authorized representative as notified by the Government of India, responsible for carrying out the process for selection of Bidder who will acquire Transmission Service Provider;

**“Bill”** shall mean any bill raised by the CTU on the DICs to recover the Transmission Charges pursuant to the Sharing Regulations;

**“Business Day”** shall mean a day other than Sunday or a statutory holiday, on which the banks remain open for business in the State in which the Nodal Agency’s registered office is located and the concerned TSP are located;

**“CEA”** shall mean the Central Electricity Authority constituted under Section -70 of the Electricity Act;

**“Change in law”** shall have the meaning ascribed thereto in Article 12;

**“Commercial Operation Date”** or **“COD”** shall mean the date as per Article 6.2;

**“Commission”** or **“CERC”** shall mean the Central Electricity Regulatory Commission referred to in sub-section (1) of Section 76 of the Electricity Act, 2003 or its successors and assigns;

**“Competent Court of Law”** shall mean the Supreme Court or any High Court, or any tribunal or any similar judicial or quasi-judicial body in India that has jurisdiction to adjudicate upon issues relating to the Project;

**“Connection Agreement”** shall mean the agreement between the CTU or STU or any other concerned parties and the TSP, setting out the terms relating to the connection of the Project to the Inter-connection Facilities and use of the Inter State Transmission System as per the provisions of the IEGC, as the case may be;

**“Consultation Period”** shall mean the period of sixty (60) days or such longer period as the Parties may agree, commencing from the date of issue of a TSP’s Preliminary Notice or a Nodal Agency’s Preliminary Termination Notice, as provided in Article 13 of this Agreement, for consultation between the Parties to mitigate the consequence of the relevant event having regard to all the circumstances;

**“Consents, Clearances and Permits”** shall mean all authorizations, licenses, approvals, registrations, permits, waivers, privileges, acknowledgements, agreements, or concessions required to be obtained from or provided by any concerned authority for the development, execution and operation of Project including without any limitation for the construction, ownership, operation and maintenance of the Transmission Lines and/or sub-stations;

**“Construction Period”** shall mean the period from (and including) the Effective Date of the Transmission Service Agreement up to (but not including) the COD of the Element of the Project in relation to an Element and up to (but not including) the COD of the Project in relation to the Project;

**“Contractors”** shall mean the engineering, procurement, construction, operation & maintenance contractors, surveyors, advisors, consultants, designers, suppliers to the TSP and each of their respective sub-contractors (and each of their respective successors and permitted assigns) in their respective capacities as such;

**“Contract Performance Guarantee”** shall mean the irrevocable unconditional bank guarantee, submitted and to be submitted by the TSP or by the Selected Bidder on behalf of the TSP to the Nodal Agency from a bank mentioned in Annexure 17 of the RFP, in the form attached here to as Schedule 8, in accordance with Article 3 of this Agreement and which shall include the additional bank guarantee furnished by the TSP under this Agreement;

**“Contract Year”**, for the purpose of payment of Transmission Charges, shall mean the period beginning on the COD, and ending on the immediately succeeding March 31 and thereafter each period of 12 months beginning on April 1 and ending on March 31 provided that the last Contract Year shall end on the last day of the term of the TSA;

**“CTU” or “Central Transmission Utility”** shall have same meaning as defined in the Electricity Act, 2003;

**“Day”** shall mean a day starting at 0000 hours and ending at 2400 hours;

**“D/C”** shall mean Double Circuit;

**“Designated ISTS Customers” or “DICs”** shall have the meaning as ascribed in the Sharing Regulations;

**“Dispute”** shall mean any dispute or difference of any kind between the Parties, in connection with or arising out of this Agreement including any issue on the interpretation and scope of the terms of this Agreement as provided in Article 16;

**“Effective Date”** for the purposes of this Agreement, shall have the same meaning as per Article 2.1 of this Agreement;

**“Electrical Inspector”** shall mean a person appointed as such by the Government under sub-section (1) of Section 162 of the Electricity Act 2003 and also includes Chief Electrical Inspector;

**“Electricity Rules 2005”** shall mean the rules framed pursuant to the Electricity Act 2003 and as amended from time to time;

**“Element”** shall mean each Transmission Line or each circuit of the Transmission Lines (where there are more than one circuit) or each bay of Sub-station or switching station or HVDC terminal or inverter station of the Project, including ICTs, Reactors, SVC, FSC, etc. forming part of the ISTS, which will be owned, operated and maintained by the concerned ISTS Licensee, and which has a separate Scheduled COD as per Schedule 2 of this Agreement and has a separate percentage for recovery of Transmission Charges on achieving COD as per Schedule 5 of this Agreement;

**“Event of Default”** shall mean the events as defined in Article 13 of this Agreement;

**“Expiry Date”** shall be the date which is thirty five (35) years from the COD of the Project;

**“Financial Closure”** shall mean the first Business Day on which funds are made available to the TSP pursuant to the Financing Agreements;

**“Financially Evaluated Entity”** shall mean the company which has been evaluated for the satisfaction of the financial requirement set forth in the RFP;

**“Financing Agreements”** shall mean the agreements pursuant to which the TSP is to finance the Project including the loan agreements, security documents, notes, indentures, security agreements, letters of credit and other documents, as may be amended, modified, or replaced from time to time, but without in anyway increasing the liabilities of the Designated ISTS Customers / Nodal Agency;

**“Financial Year”** shall mean a period of twelve months at midnight Indian Standard Time (IST) between 1st April & 31st March;

**“Force Majeure”** and **“Force Majeure Event”** shall have the meaning assigned thereto in Article 11;

**“GOI”** shall mean Government of India;

**“Grid Code” / “IEGC”** shall mean the Grid Code specified by the Central Commission under Clause (h) of sub-section (1) of Section 79 of the Electricity Act;

**“Independent Engineer”** shall mean an agency/ company, appointed by Nodal Agency in accordance with the Guidelines for Encouraging Competition in Development of Transmission Projects.

**“Indian Governmental Instrumentality”** shall mean Government of India, Government of any State in India or any ministry, department, board, authority, agency, corporation, commission under the direct or indirect control of Government of India or any State Government or both, any political sub-division of any of them including any court or Commission or tribunal or judicial or quasi-judicial body in India but excluding the CTU, TSP and the Designated ISTS Customers;

**“Insurances”** shall mean the insurance cover to be obtained and maintained by the TSP in accordance with Article 9 of this Agreement;

**“Interconnection Facilities”** shall mean the facilities as may be set up for transmission of electricity through the use of the Project, on either one or both side of generating station’s / CTU’s / STU’s / ISTS Licensee’s / Designated ISTS Customer’s substations (as the case may be) which shall include, without limitation, all other transmission lines, gantries, sub-stations and associated equipments not forming part of the Project;

**“ISTS Licensee”** shall be the TSP under this Agreement, consequent to having been awarded a Transmission License by the CERC and shall be referred to as the TSP or the ISTS Licensee, as the context may require in this Agreement;

**“Law” or “Laws”** in relation to this Agreement, shall mean all laws including electricity laws in force in India and any statute, ordinance, rule, regulation, notification, order or code, or any interpretation of any of them by an Indian Governmental Instrumentality having force of law and shall include all rules, regulations, decisions and orders of the Commission;

**“Lead Member of the Bidding Consortium” or “Lead Member”** shall mean a company who commits at least 26% equity stake in the Project, meets the technical requirement as specified in the RFP and so designated by other Member(s) in Bidding Consortium;

**“Lenders”** means the banks, financial institutions, multilateral funding agencies, non banking financial companies registered with the Reserve Bank of India (RBI), insurance companies registered with the Insurance Regulatory & Development Authority (IRDA), pension funds regulated by the Pension Fund Regulatory & Development Authority (PFRDA), mutual funds registered with Securities & Exchange Board of India (SEBI), etc., including their successors and assigns, who have agreed on or before COD of the Project to provide the TSP with the debt financing described in the capital structure schedule, and any successor banks or financial institutions to whom their interests under the Financing Agreements may be transferred or assigned;

Provided that, such assignment or transfer shall not relieve the TSP of its obligations to the Nodal Agency under this Agreement in any manner and shall also does not lead to an increase in the liability of the Nodal Agency;

**“Lenders Representative”** shall mean the person notified by the Lender(s) in writing as being the representative of the Lender(s) or the Security Trustee and such person may from time to time be replaced by the Lender(s) pursuant to the Financing Agreements by written notice to the TSP;

**“Letter of Intent” or “LOI”** shall have the same meaning as in the RFP;

**“Member in a Bidding Consortium / Member”** shall mean each company in the Bidding Consortium;

**“Month”** shall mean a period of thirty (30) days from (and excluding) the date of the event;

**“Monthly Transmission Charges”** for any Element of the Project, after COD of the Element till COD of the Project, and for the Project after COD of the Project, shall mean the amount of Transmission Charges as specified in Schedule 5 of this Agreement multiplied by no. of days in the relevant month and divided by no. of days in the year;

**“National Load Despatch Centre”** shall mean the centre established as per sub-section (1) of Section 26 of the Electricity Act 2003;

**“Nodal Agency”** shall mean CTU, which shall execute and implement the Transmission Service Agreement (TSA);

Provided that while taking major decisions, CTU shall consult CEA on technical matters and any other matter it feels necessary.

**“Notification”** shall mean any notification, issued in the Gazette of India;

**“Operating Period”** for any Element of the Project shall mean the period from (and including) the COD of such Element of the Project, up to (and including) the Expiry Date and for the Project, shall mean the period from (and including) the COD of the Project, up to (and including) the Expiry Date;

**“Parent Company”** shall mean an entity that holds at least twenty six percent (26%) of the paid - up equity capital directly or indirectly in the Bidding Company or in the Member in a Bidding Consortium, as the case may be;

**“Preliminary Termination Notice”** shall mean a Nodal Agency’s Preliminary Termination Notice as defined in Article 13 of this Agreement;

**“Project”** shall mean **“Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C”**, as detailed in Schedule 1 of this Agreement;

**“Project Assets”** shall mean all physical and other assets relating to and forming part of the Project including:

- (a) rights over the Site for substations, ROW for transmission lines;
- (b) tangible & intangible assets such as civil works and equipment including foundations, embankments, pavements, electrical systems, communication systems, relief centres, administrative offices, Sub-stations, software, tower and sub-stations designs etc;
- (c) project facilities situated on the Site;
- (d) all rights of the TSP under the project agreements;
- (e) financial assets, such as receivables, security deposits etc;
- (f) insurance proceeds; and
- (g) Applicable Permits and authorisations relating to or in respect of the Transmission System;”

**“Project Execution Plan”** shall mean the plan referred to in Article 3.1.3(c) hereof;

**“Prudent Utility Practices”** shall mean the practices, methods and standards that are generally accepted internationally from time to time by electric transmission utilities for the purpose of ensuring the safe, efficient and economic design, construction, commissioning, operation, repair and maintenance of the Project and which practices, methods and standards shall be adjusted as necessary, to take account of:

- (i) operation, repair and maintenance guidelines given by the manufacturers to be incorporated in the Project,
- (ii) the requirements of Law, and
- (iii) the physical conditions at the Site;
- (iv) the safety of operating personnel and human beings;

**“Rated Voltage”** shall mean voltage at which the Transmission System is designed to operate or such lower voltage at which the line is charged, for the time being, in consultation with the Central Transmission Utility;

**“Rebate”** shall have the meaning as ascribed to in Article 10.3 of this Agreement;

**“RFP”** shall mean Request For Proposal dated **March 02, 2023** along with all schedules, annexures and RFP Project Documents attached thereto, issued by the BPC for tariff based competitive bidding process for selection of Bidder as TSP to execute the Project, including any modifications, amendments or alterations thereto;

**“RFP Project Documents”** shall mean the following documents to be entered into in respect of the Project, by the Parties to the respective agreements:

- a. Transmission Service Agreement,
- b. Share Purchase Agreement,
- c. Agreement(s) required under Sharing Regulations and
- d. Any other agreement as may be required;

**“RLDC”** shall mean the relevant Regional Load Dispatch Centre as defined in the Electricity Act, 2003, in the region(s) in which the Project is located;

**“RPC”** shall mean the relevant Regional Power Committee established by the Government of India for the specific Region(s) in accordance with the Electricity Act, 2003 for facilitating integrated operation of the Power System in that Region;

**“Scheduled COD”** in relation to an Element(s) shall mean the date(s) as mentioned in Schedule 2 as against such Element(s) and in relation to the Project, shall mean the date as mentioned in Schedule 2 as against such Project, subject to the provisions of Article 4.4 of this Agreement, or such date as may be mutually agreed among the Parties;

**“Scheduled Outage”** shall mean the final outage plan as approved by the RPC as per the provisions of the Grid Code;

**“Selected Bid”** shall mean the technical Bid and the Final Offer of the Selected Bidder submitted during e-reverse bidding, which shall be downloaded and attached in Schedule 7 on or prior to the Effective Date;

**“Share Purchase Agreement”** shall mean the agreement amongst **PFC Consulting Limited (PFCCL)**, Bikaner III Neemrana II Transmission Limited and the Successful Bidder for the purchase of one hundred (100%) per cent of the shareholding of the Bikaner III Neemrana II Transmission Limited for the

Acquisition Price, by the Successful Bidder on the terms and conditions as contained therein;

**“Sharing Regulations”** shall mean the Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations, 2020 and as amended from time to time;

**“Site”** in relation to a substation, switching station or HVDC terminal or inverter station, shall mean the land and other places upon which such station / terminal is to be established;

**“SLDC”** shall mean the State Load Despatch Centre established as per sub-section (1) of Section 31 of the Electricity Act 2003;

**“STU”** or **“State Transmission Utility”** shall be the Board or the Government company, specified as such by the State Government under sub-section (1) of Section 39 of the Electricity Act 2003;

**“Successful Bidder”** or **“Selected Bidder”** shall mean the Bidder selected pursuant to the RFP and who has to acquire one hundred percent (100%) equity shares of Bikaner III Neemrana II Transmission Limited, along with all its related assets and liabilities, which will be responsible as the TSP to establish the Project on build, own, operate and transfer basis as per the terms of the TSA and other RFP Project Documents;

**“TSP’s Preliminary Notice”** shall mean a notice issued by the TSP in pursuant to the provisions of Article 13.3 of this Agreement;

**“Target Availability”** shall have the meaning as ascribed hereto in Article 8.2 of this Agreement;

**“Technically Evaluated Entity”** shall mean the company which has been evaluated for the satisfaction of the technical requirement set forth in RFP;

**“Termination Notice”** shall mean a Nodal Agency’s Termination Notice given by the Nodal Agency to the TSP pursuant to the provisions of Articles 3.3.2, 3.3.4, 4.4.2, 5.8, 0 and 13.3 of this Agreement for the termination of this Agreement;

**“Term of Agreement”** for the purposes of this Agreement shall have the meaning ascribed thereto in Article 2.2 of this Agreement;

**“Transmission Charges”** shall mean the Final Offer of the Selected Bidder during the e-reverse bidding and adopted by the Commission, payable to the TSP as per Sharing Regulations;

**“Transmission License”** shall mean the license granted by the Commission in terms of the relevant regulations for grant of such license issued under the Electricity Act;

**“Transmission Service”** shall mean making the Project available as per the terms and conditions of this Agreement and Sharing Regulations;

**“Unscheduled Outage”** shall mean an interruption resulting in reduction of the Availability of the Element(s) / Project (as the case may be) that is not a result of a Scheduled Outage or a Force Majeure Event.

**“Ultimate Parent Company”** shall mean an entity which owns at least twenty six percent (26%) equity in the Bidding Company or Member of a Consortium, (as the case may be) and in the Technically Evaluated Entity and / or Financially Evaluated Entity (as the case may be) and such Bidding Company or Member of a Consortium, (as the case may be) and the Technically Evaluated Entity and / or Financially Evaluated Entity (as the case may be) shall be under the direct control or indirectly under the common control of such entity;

## 1.2 Interpretation:

***Save where the contrary is indicated, any reference in this Agreement to:***

**“Agreement”** shall be construed as including a reference to its Schedules, Appendices and Annexures;

**“Rupee”, “Rupees” and “Rs.”** shall denote lawful currency of India;

**“crore”** shall mean a reference to ten million (10,000,000) and a **“lakh”** shall mean a reference to one tenth of a million (1,00,000);

**“encumbrance”** shall be construed as a reference to a mortgage, charge, pledge, lien or other encumbrance securing any obligation of any person or any other type of preferential arrangement (including, without limitation, title transfer and retention arrangements) having a similar effect;

**“holding company”** of a company or corporation shall be construed as a reference to any company or corporation of which the other company or corporation is a subsidiary;

**"indebtedness"** shall be construed so as to include any obligation (whether incurred as principal or surety) for the payment or repayment of money, whether present or future, actual or contingent;

**"person"** shall have the meaning as defined in Section 2 (49) of the Act;

**"subsidiary"** of a company or corporation (the holding company) shall be construed as a reference to any company or corporation:

- (i) which is controlled, directly or indirectly, by the holding company, or
- (ii) more than half of the issued share capital of which is beneficially owned, directly or indirectly, by the holding company, or
- (iii) which is a subsidiary of another subsidiary of the holding company,

for these purposes, a company or corporation shall be treated as being controlled by another if that other company or corporation is able to direct its affairs and/or to control the composition of its board of directors or equivalent body;

**"winding-up", "dissolution", "insolvency", or "reorganization"** in the context of a company or corporation shall have the same meaning as defined in the Companies Act, 1956/ Companies Act, 2013 (as the case may be).

- 1.2.1 Words importing the singular shall include the plural and vice versa.
- 1.2.2 This Agreement itself or any other agreement or document shall be construed as a reference to this or to such other agreement or document as it may have been, or may from time to time be, amended, varied, novated, replaced or supplemented.
- 1.2.3 A Law shall be construed as a reference to such Law including its amendments or re-enactments from time to time.
- 1.2.4 A time of day shall, save as otherwise provided in any agreement or document be construed as a reference to Indian Standard Time.
- 1.2.5 Different parts of this Agreement are to be taken as mutually explanatory and supplementary to each other and if there is any inconsistency between or among the parts of this Agreement, they shall be interpreted in a harmonious manner so as to give effect to each part.

- 1.2.6 The tables of contents and any headings or sub-headings in this Agreement have been inserted for ease of reference only and shall not affect the interpretation of this Agreement.
- 1.2.7 All interest payable under this Agreement shall accrue from day to day and be calculated on the basis of a year of three hundred and sixty five (365) days.
- 1.2.8 The words “hereof” or “herein”, if and when used in this Agreement shall mean a reference to this Agreement.
- 1.2.9 The contents of Schedule 7 shall be referred to for ascertaining accuracy and correctness of the representations made by the Selected Bidder in Article 17.2.1 hereof.

## ARTICLE: 2

### 2. EFFECTIVENESS AND TERM OF AGREEMENT

#### 2.1 Effective Date:

This Agreement shall be effective from later of the dates of the following events:

- a. The Selected Bidder, on behalf of the TSP, has provided the Contract Performance Guarantee, as per terms of Article 3.1 of this Agreement; and
- b. The Selected Bidder has acquired for the Acquisition Price, one hundred percent (100%) of the equity shareholding of **PFC Consulting Limited** in Bikaner III Neemrana II Transmission Limited along with all its related assets and liabilities as per the provisions of the Share Purchase Agreement. and
- c. The Agreement is executed and delivered by the Parties;

#### 2.2 Term and Termination:

- 2.2.1 Subject to Article 2.2.3 and Article 2.4, this Agreement shall continue to be effective in relation to the Project until the Expiry Date, when it shall automatically terminate.
- 2.2.2 Post the Expiry Date of this Agreement, the TSP shall ensure transfer of Project Assets to CTU or its successors or an agency as decided by the Central Government at zero cost and free from any encumbrance and liability. The transfer shall be completed within 90 days of expiry of this Agreement failing which CTU shall be entitled to take over the Project Assets Suo moto.
- 2.2.3 This Agreement shall terminate before the Expiry Date in accordance with Article 13 or Article 3.3.2 or Article 3.3.4.

#### 2.3 Conditions prior to the expiry of the Transmission License

- 2.3.1 In order to continue the Project beyond the expiry of the Transmission License, the TSP shall be obligated to make an application to the Commission at least two (2) years before the date of expiry of the Transmission License, seeking the Commission's approval for the extension of the term of the Transmission License up to the Expiry Date.

2.3.2 The TSP shall timely comply with all the requirements that may be laid down by the Commission for extension of the term of the Transmission License beyond the initial term of twenty-five (25) years & upto the Expiry Date and the TSP shall keep the Nodal Agency fully informed about the progress on its application for extension of the term of the Transmission License.

#### **2.4 Survival:**

The expiry or termination of this Agreement shall not affect any accrued rights, obligations/ roles and liabilities of the Parties under this Agreement, including the right to receive liquidated damages as per the terms of this Agreement, nor shall it effect the survival of any continuing obligations/ roles for which this Agreement provides, either expressly or by necessary implication, which are to survive after the Expiry Date or termination including those under Articles 3.3.3, 3.3.5, Article 9.3 (Application of Insurance Proceeds), Article 11 (Force Majeure), Article 13 (Events of Default and Termination), Article 14 (Liability & Indemnification), Article 16 (Governing Law & Dispute Resolution), Article 19 (Miscellaneous).

#### **2.5 Applicability of the provisions of this Agreement**

2.5.1 For the purpose of Availability, Target Availability and the computation of Availability, Incentive, Penalty, the provisions provided in this Agreement shall apply and any future modifications in the relevant Rules and Regulations shall not be applicable for this Project.

2.5.2 For the purposes of this Agreement for ISTS systems developed under the tariff based competitive bidding framework, the provisions relating to the definitions (Availability and COD), Article 3 (Contract Performance Guarantee and Conditions Subsequent), Article 5 (Construction of the Project), Article 6 (Connection and Commissioning of the Project), Article 8 (Target Availability and calculation of Availability), Article 11 (Force Majeure), Article 12 (Change in Law), Article 13 (Event of Default), Article 14 (Indemnification), Article 15 (Assignment and Charges), Articles 0, 16.2 and 16.4 (Governing Laws and Dispute Resolution) and Article 17 (representation and warranties of the ISTS Licensee) of this agreement shall supersede the corresponding provisions under Sharing Regulations.

## ARTICLE: 3

### 3. CONDITIONS SUBSEQUENT

#### 3.1 Satisfaction of conditions subsequent by the TSP

3.1.1 Within ten (10) days from the date of issue of Letter of Intent, the Selected Bidder, shall:

- a. Provide the Contract Performance Guarantee, and
- b. Acquire, for the Acquisition Price, one hundred percent (100%) equity shareholding of Bikaner III Neemrana II Transmission Limited from **PFC Consulting Limited**, who shall sell to the Selected Bidder, the equity shareholding of Bikaner III Neemrana II Transmission Limited, along with all its related assets and liabilities.
- c. Execute this Agreement;

The TSP shall, within five (5) working days from the date of acquisition of SPV by the Selected Bidder, undertake to apply to the Commission for the grant of Transmission License and for the adoption of tariff as required under section-63 of the Electricity Act.

The Selected Bidder, on behalf of the TSP, will provide to the **Central Transmission Utility of India Limited** (being the Nodal Agency) the Contract Performance Guarantee for an amount of **Rs 42 Crore (Rupees Forty Two Crore Only)**.

3.1.2 The Contract Performance Guarantee shall be initially valid for a period up to three (3) months after the Scheduled COD of the Project and shall be extended from time to time to be valid for a period up to three (3) months after the COD of the Project. In case the validity of the Contract Performance Guarantee is expiring before the validity specified in this Article, the TSP shall, at least thirty (30) days before the expiry of the Contract Performance Guarantee, replace the Contract Performance Guarantee with another Contract Performance Guarantee or extend the validity of the existing Contract Performance Guarantee until the validity period specified in this Article.

3.1.3 The TSP agrees and undertakes to duly perform and complete the following activities within six (6) months from the Effective Date (except for c) below), unless such completion is affected due to any Force Majeure Event, or if any of the

activities is specifically waived in writing by the Nodal Agency:

- a. To obtain the Transmission License for the Project from the Commission;
- b. To obtain the order for adoption of Transmission Charges by the Commission, as required under Section 63 of the Electricity Act 2003;
- c. To submit to the Nodal Agency, CEA & Independent Engineer, the Project Execution Plan, immediately after award of contract(s) and maximum within one hundred and twenty (120) days from the Effective Date. Also, an approved copy each of Manufacturing Quality Plan (MQP) and Field Quality Plan (FQP) would be submitted to Independent Engineer & Nodal Agency in the same time period. The TSP's Project Execution Plan should be in conformity with the Scheduled COD as specified in Schedule 2 of this Agreement, and shall bring out clearly the organization structure, time plan and methodology for executing the Project, award of major contracts, designing, engineering, procurement, shipping, construction, testing and commissioning to commercial operation;
- d. To submit to the Nodal Agency, CEA & Independent Engineer a detailed bar (GANTT) chart of the Project outlining each activity (taking longer than one Month), linkages as well as durations;
- e. To submit to the Nodal Agency, CEA & Independent Engineer detailed specifications of conductor meeting the functional specifications specified in RFP;
- f. To achieve Financial Closure;
- g. To provide an irrevocable letter to the Lenders duly accepting and acknowledging the rights provided to the Lenders under the provisions of Article 15.3 of this Agreement and all other RFP Project Documents;
- h. To award the Engineering, Procurement and Construction contract ("EPC contract") for the design and construction of the Project and shall have given to such Contractor an irrevocable notice to proceed; and
- i. To sign the Agreement(s) required, if any, under Sharing Regulations.

### **3.2**

#### **Recognition of Lenders' Rights by the Nodal Agency**

3.2.1 The Nodal Agency hereby accepts and acknowledges the rights provided to the Lenders as per Article 15.3 of this Agreement and all other RFP Project Documents.

### 3.3 Consequences of non-fulfilment of conditions subsequent

3.3.1 If any of the conditions specified in Article 3.1.3 is not duly fulfilled by the TSP even within three (3) Months after the time specified therein, then on and from the expiry of such period and until the TSP has satisfied all the conditions specified in Article 3.1.3, the TSP shall, on a monthly basis, be liable to furnish to **Central Transmission Utility of India Limited (being the Nodal Agency)** additional Contract Performance Guarantee of **Rs. 4.20 Crore (Rupees Four Crore Twenty Lakh Only)** within two (2) Business Days of expiry of every such Month. Such additional Contract Performance Guarantee shall be provided to **Central Transmission Utility of India Limited (being the Nodal Agency)** in the manner provided in Article 3.1.1 and shall become part of the Contract Performance Guarantee and all the provisions of this Agreement shall be construed accordingly. **Central Transmission Utility of India Limited (being the Nodal Agency)** shall be entitled to hold and / or invoke the Contract Performance Guarantee, including such additional Contract Performance Guarantee, in accordance with the provisions of this Agreement.

3.3.2 Subject to Article 3.3.4, if:

- (i) the fulfilment of any of the conditions specified in Article 3.1.3 is delayed beyond nine (9) Months from the Effective Date and the TSP fails to furnish additional Contract Performance Guarantee to the Nodal Agency in accordance with Article 3.3.1 hereof; or
- (ii) the TSP furnishes additional Performance Guarantee to the Nodal Agency in accordance with Article 3.3.1 hereof but fails to fulfil the conditions specified in Article 3.1.3 within a period of twelve (12) months from the Effective Date,

the Nodal Agency shall have the right to terminate this Agreement, by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement.

3.3.3 If the Nodal Agency elects to terminate this Agreement as per the provisions of Article 3.3.2, the TSP shall be liable to pay to the Nodal Agency an amount of **Rs 42 Crore (Rupees Forty Two Crore Only)** as liquidated damages. The Nodal Agency shall be entitled to recover this amount of damages by invoking the Contract

Performance Guarantee to the extent of liquidated damages, which shall be required by the Nodal Agency, and the balance shall be returned to TSP, if any.

It is clarified for removal of doubt that this Article shall survive the termination of this Agreement.

- 3.3.4 In case of inability of the TSP to fulfil the conditions specified in Article 3.1.3 due to any Force Majeure Event, the time period for fulfilment of the condition subsequent as mentioned in Article 3.1.3, may be extended for a period of such Force Majeure Event. Alternatively, if deemed necessary, this Agreement may be terminated by the Nodal Agency by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement and the Contract Performance Guarantee shall be returned as per the provisions of Article 6.5.1.

Provided, that due to the provisions of this Article 3.3.4, any increase in the time period for completion of conditions subsequent mentioned under Article 3.1.3, shall lead to an equal increase in the time period for the Scheduled COD. If the Scheduled COD is extended beyond a period of one hundred eighty (180) days due to the provisions of this Article 3.3.4, the TSP will be allowed to recover the interest cost during construction corresponding to the period exceeding one hundred eighty (180) days by adjustment in the Transmission Charges in accordance with Schedule 9.

- 3.3.5 Upon termination of this Agreement as per Articles 3.3.2 and 3.3.4, the Nodal Agency may take steps to bid out the Project again.
- 3.3.6 The Nodal agency, on the failure of the TSP to fulfil its obligations, if it considers that there are sufficient grounds for so doing, apart from invoking the Contract Performance Guarantee under para 3.3.3 may also initiate proceedings for blacklisting the TSP as per provisions of Article 13.2 of TSA.

#### **3.4 Progress Reports**

The TSP shall notify the Nodal Agency and CEA in writing at least once a Month on the progress made in satisfying the conditions subsequent in Articles 3.1.3.

**ARTICLE: 4****4. DEVELOPMENT OF THE PROJECT****4.1 TSP's obligations in development of the Project:**

Subject to the terms and conditions of this Agreement, the TSP at its own cost and expense shall observe, comply with, perform, undertake and be responsible:

- a. for procuring and maintaining in full force and effect all Consents, Clearances and Permits, required in accordance with Law for development of the Project;
- b. for financing, constructing, owning and commissioning each of the Element of the Project for the scope of work set out in Schedule 1 of this Agreement in accordance with:
  - i. the Electricity Act and the Rules made thereof;
  - ii. the Grid Code;
  - iii. the CEA Regulations applicable, and as amended from time to time, for Transmission Lines and sub-stations:
    - the Central Electricity Authority (Technical Standards for Connectivity to the Grid) Regulations, 2007;
    - Central Electricity Authority (Technical Standards for construction of Electrical Plants and Electric Lines) Regulation, 2010;
    - Central Electricity Authority (Grid Standard) Regulations, 2010;
    - Central Electricity Authority (Safety requirements for construction, operation and maintenance of Electrical Plants and Electrical Lines) Regulation, 2011;
    - Central Electricity Authority (Measures relating to Safety and Electricity Supply) Regulation, 2010;
    - Central Electricity Authority (Technical Standards for Communication System in Power System Operation) Regulations, 2020.
  - iv. Safety/ security Guidelines laid down by the Government;

v. Prudent Utility Practices, relevant Indian Standards and the Law;

not later than the Scheduled COD as per Schedule 2 of this Agreement;

- c. for entering into a Connection Agreement with the concerned parties in accordance with the Grid Code.
- d. for owning the Project throughout the term of this Agreement free and clear of any encumbrances except those expressly permitted under Article 15 of this Agreement;
- e. to co-ordinate and liaise with concerned agencies and provide on a timely basis relevant information with regard to the specifications of the Project that may be required for interconnecting the Project with the Interconnection Facilities;
- f. for providing all assistance to the Arbitrators as they may require for the performance of their duties and responsibilities;
- g. to provide to the Nodal Agency and CEA, on a monthly basis, progress reports with regard to the Project and its execution (in accordance with prescribed form) to enable the CEA to monitor and co-ordinate the development of the Project matching with the Interconnection Facilities;
- h. to comply with Ministry of Power order no. 25-11/6/2018 – PG dated 02.07.2020 as well as other Guidelines issued by Govt. of India pertaining to this;
- i. to procure the products associated with the Transmission System as per provisions of Public Procurement (Preference to Make in India) orders issued by Ministry of Power vide orders No. 11/5/2018 - Coord. dated 28.07.2020 for transmission sector, as amended from time to time read with Department for Promotion of Industry and Internal Trade (DPIIT) orders in this regard (Procuring Entity as defined in above orders shall deemed to have included Selected Bidder and/ or TSP).

Also, to comply with Department of Expenditure, Ministry of Finance vide Order (Public Procurement No 1) bearing File No. 6/18/2019-PPD dated 23.07.2020, Order (Public Procurement No 2) bearing File No. 6/18/2019-PPD dated 23.07.2020 and Order (Public

Procurement No. 3) bearing File No. 6/18/2019-PPD, dated 24.07.2020, as amended from time to time, regarding public procurement from a bidder of a country, which shares land border with India;

- j. to submit to Nodal Agency information in the prescribed format [To be devised by Nodal Agency] for ensuring compliance to Article 4.1 i) above.
- k. to comply with all its obligations undertaken in this Agreement.

#### **4.2 Roles of the Nodal Agency in implementation of the Project:**

4.2.1 Subject to the terms and conditions of this Agreement, the Nodal Agency shall be the holder and administrator of this Agreement and shall inter alia:

- a. appoint an Independent Engineer within 90 days of the Effective Date
- b. provide letters of recommendation to the concerned Indian Governmental Instrumentality, as may be requested by the TSP from time to time, for obtaining the Consents, Clearances and Permits required for the Project;
- c. coordinate among TSP and upstream/downstream entities in respect of Interconnection Facilities; and
- d. monitor the implementation of the Agreement and take appropriate action for breach thereof including revocation of guarantees, cancellation of Agreement, blacklisting etc
- e. provide all assistance to the Arbitrators as required for the performance of their duties and responsibilities; and
- f. perform any other responsibility (ies) as specified in this Agreement.

#### **4.3 Time for Commencement and Completion:**

- a. The TSP shall take all necessary steps to commence work on the Project from the Effective Date of the Agreement and shall achieve Scheduled COD of the Project in accordance with the time schedule specified in Schedule 2 of this Agreement;
- b. The COD of each Element of the Project shall occur no later than the Scheduled COD or within such extended time to which the TSP shall be entitled under Article 4.4 hereto.

**4.4 Extension of time:**

- 4.4.1 In the event that the TSP is unable to perform its obligations for the reasons solely attributable to the Nodal Agency, the Scheduled COD shall be extended, by a 'day to day' basis, subject to the provisions of Article 13.
- 4.4.2 In the event that an Element or the Project cannot be commissioned by its Scheduled COD on account of any Force Majeure Event as per Article 11, the Scheduled COD shall be extended, by a 'day to day' basis for a period of such Force Majeure Event. Alternatively, if deemed necessary, the Nodal Agency may terminate the Agreement as per the provisions of Article 13.4 by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement.
- 4.4.3 If the Parties have not agreed, within thirty (30) days after the affected Party's performance has ceased to be affected by the relevant circumstance, on how long the Scheduled COD should be deferred by, any Party may raise the Dispute to be resolved in accordance with Article 16.

**4.5 Metering Arrangements:**

- 4.5.1 The TSP shall comply with all the provisions of the IEGC and the Central Electricity Authority (Installation and Operation of Meters) Regulations, 2006 as amended from time to time, with regard to the metering arrangements for the Project. The TSP shall fully cooperate with the CTU / STU / RLDC and extend all necessary assistance in taking meter readings.

**4.6 Interconnection Facilities:**

- 4.6.1 Subject to the terms and conditions of this Agreement, the TSP shall be responsible for connecting the Project with the interconnection point(s) specified in Schedule 1 of this Agreement. The Interconnection Facilities shall be developed as per the scope of work and responsibilities assigned in Schedule 1 of this Agreement. The Nodal Agency shall be responsible for coordinating to make available the Interconnection Facilities.
- 4.6.2 In order to remove any doubts, it is made clear that the obligation of the TSP within the scope of the project is to construct the Project as per Schedule-1 of this Agreement and in particular to connect it to the Interconnection Facilities as specified in this Agreement.

## ARTICLE: 5

### 5. CONSTRUCTION OF THE PROJECT

#### 5.1 TSP's Construction Responsibilities:

- 5.1.1 The TSP, at its own cost and expense, shall be responsible for designing, constructing, erecting, testing and commissioning each Element of the Project by the Scheduled COD in accordance with the Regulations and other applicable Laws specified in Article 4.1 of this Agreement.
- 5.1.2 The TSP acknowledges and agrees that it shall not be relieved from any of its obligations under this Agreement or be entitled to any extension of time or any compensation whatsoever by reason of the unsuitability of the Site or Transmission Line route(s).
- 5.1.3 The TSP shall be responsible for obtaining all Consents, Clearances and Permits related but not limited to road / rail / river / canal / power line / crossings, Power and Telecom Coordination Committee (PTCC), defence, civil aviation, right of way / way-leaves and environmental & forest clearances from relevant authorities required for developing, financing, constructing, maintaining/ renewing all such Consents, Clearances and Permits in order to carry out its obligations under this Agreement in general and shall furnish to the Nodal Agency such copy/ies of each Consents, Clearances and Permits, on demand. Nodal Agency shall provide letters of recommendation to the concerned Indian Governmental Instrumentality, as may be requested by the TSP from time to time, for obtaining the Consents, Clearances and Permits required for the Project.
- 5.1.4 The TSP shall be responsible for:
- a) deleted
  - b) deleted
  - c) survey and geo-technical investigation of line route in order to determine the final route of the Transmission Lines;
  - d) seeking access to the Site and other places where the Project is being executed, at its own risk and costs, including payment of any crop, tree compensation or any other compensation as may be required.

- 5.1.5 In case the Project involves any resettlement and rehabilitation, the resettlement and rehabilitation package will be implemented by the State Government authorities, for which the costs is to be borne by the TSP and no changes would be allowed in the Transmission Charges on account of any variation in the resettlement and rehabilitation cost. The TSP shall provide assistance on best endeavour basis, in implementation of the resettlement and rehabilitation package, if execution of such package is in the interest of expeditious implementation of the Project and is beneficial to the Project affected persons.

## **5.2 Appointing Contractors:**

- 5.2.1 The TSP shall conform to the requirements as provided in this Agreement while appointing Contractor(s) for procurement of goods & services.
- 5.2.2 The appointment of such Contractor(s) shall neither relieve the TSP of any of its obligations under this Agreement nor make the Nodal Agency liable for the performance of such Contractor(s).

## **5.3 Monthly Progress Reporting:**

The TSP shall provide to the CEA, Nodal Agency & Independent Engineer, on a monthly basis, progress reports along with likely completion date of each Element with regard to the Project and its execution (in accordance with prescribed form). The Nodal Agency/ CEA shall monitor the development of the Project for its timely completion for improving and augmenting the electricity system as a part of its statutory responsibility.

## **5.4 Quality of Workmanship:**

The TSP shall ensure that the Project is designed, built and completed in a good workmanship using sound engineering and construction practices, and using only materials and equipment that are new and manufactured as per the MQP and following approved FQP for erection, testing & commissioning and complying with Indian /International Standards such that, the useful life of the Project will be at least thirty five (35) years from the COD of the Project.

The TSP shall ensure that all major substation equipment / component (e.g. transformers, reactors, Circuit Breakers, Instrument Transformers (IT), Surge Arresters (SA), Protection relays, clamps & connectors etc.), equipment in terminal stations of HVDC installations including Thyristor/ IGBT valves, Converter Transformers, smoothing reactors, Transformer bushings and wall bushings, GIS

bus ducts, towers and gantry structures and transmission towers or poles and line materials (conductors, earthwire, OPGW, insulator, accessories for conductors, OPGW & earthwires, hardware fittings for insulators, aviation lights etc), facilities and system shall be designed, constructed and tested (Type test, Routine tests, Factory Acceptance Test (FAT)) in accordance with relevant CEA Regulations and Indian Standards. In case Indian Standards for any particular equipment/ system/ process is not available, IEC/ IEEE or equivalent International Standards and Codes shall be followed.

## **5.5 Progress Monitoring & Quality Assurance:**

- 5.5.1 The Project Execution Plan submitted by the TSP in accordance with Article 3.1.3 c) shall comprise of detailed schedule of all the equipments/items /materials required for the Project, right from procurement of raw material till the dispatch from works and receipt at the site. Further, it should also include various stages of the construction schedule up to the commissioning of the Project.
- 5.5.2 Nodal Agency, CEA & Independent Engineer shall have access at all reasonable times to the Site and to the Manufacturer's works and to all such places where the Project is being executed.
- 5.5.3 Independent Engineer shall ensure conformity of the conductor specifications with the functional specifications specified in RFP.
- 5.5.4 The Independent Engineer shall monitor the following during construction of the Project:
  - a) Quality of equipments, material, foundation, structures and workmanship etc. as laid down in Article 5.4 and 6.1.4 of the TSA. Specifically, quality of Sub-station equipments, transmission line material and workmanship etc. would be checked in accordance with the Article 5.4.
  - b) Progress in the activities specified in Condition Subsequent
  - c) Verification of readiness of the elements including the statutory clearances & completion of civil works, fixing of all components and finalisation of punch points (if any) prior to charging of the elements
  - d) Progress of construction of substation and Transmission Lines

5.5.5 The progress shall be reviewed by the Independent Engineer against the Project Execution Plan. The Independent Engineer shall prepare its report on monthly basis and submit the same to Nodal Agency highlighting the progress achieved till the end of respective month vis-à-vis milestone activities, areas of concern, if any, which may result in delay in the timely completion of the Project. Based on the progress, Nodal Agency and/ or CEA shall issue written instructions to the TSP to take corrective measures, as may be prudent for the timely completion of the Project. In case of any deficiency, the Nodal Agency would be at liberty to take action in accordance with the procedure of this Agreement.

5.5.6 For any delay in commissioning any critical Element(s), as identified in Schedule 1 & Schedule 2 of this Agreement, beyond a period of 45 days shall lead to a sequestration of 10% of the Contract Performance Guarantee.

#### **5.6 Site regulations and Construction Documents**

The TSP shall abide by the Safety Rules and Procedures as mentioned in Schedule 3 of this Agreement

The TSP shall retain at the Site and make available for inspection at all reasonable times, copies of the Consents, Clearances and Permits, construction drawings and other documents related to construction.

#### **5.7 Supervision of work:**

The TSP shall provide all necessary superintendence for execution of the Project and its supervisory personnel shall be available to provide full-time superintendence for execution of the Project. The TSP shall provide skilled personnel who are experienced in their respective fields.

#### **5.8 Remedial Measures:**

The TSP shall take all necessary actions for remedying the shortfall in achievement of timely progress in execution of the Project, if any, as intimated by the Independent Engineer and/ or CEA and/ or the Nodal Agency. However, such intimation by the Independent Engineer and/ or CEA and/ or the Nodal Agency and the subsequent effect of such remedial measures carried out by the TSP shall not relieve the TSP of its obligations in the Agreement. Independent Engineer and/ or CEA and/ or the Nodal Agency may carry out random inspections during the Project execution, as and when deemed necessary by it. If the shortfalls as

intimated to the TSP are not remedied to the satisfaction of the CEA and/ or the Nodal Agency, this Agreement may be terminated by the Nodal Agency by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement.

## ARTICLE: 6

### 6. CONNECTION AND COMMISSIONING OF THE PROJECT

#### 6.1 Connection with the Inter-Connection Facilities:

- 6.1.1 The TSP shall give the RLDC(s), CTU, / STU, as the case may be, and any other agencies as required, at least sixty (60) days advance written notice of the date on which it intends to connect an Element of the Project, which date shall not be earlier than its Scheduled COD or Schedule COD extended as per Article 4.4.1 & 4.4.2 of this Agreement, unless mutually agreed to by Parties. Further, any preponing of COD of any element prior to Scheduled COD must be approved by the Nodal Agency.
- 6.1.2 The RLDC / SLDC (as the case may be) or the CTU / STU (as the case may be), for reasonable cause, including non-availability of Interconnection Facilities as per Article 4.2, can defer the connection for up to fifteen (15) days from the date notified by the TSP pursuant to Article 6.1.1, if it notifies to the TSP in writing, before the date of connection, of the reason for the deferral and when the connection is to be rescheduled. However, no such deferment on one or more occasions would be for more than an aggregate period of thirty (30) days. Further, the Scheduled COD would be extended as required, for all such deferments on “day to day” basis.
- 6.1.3 Subject to Articles 6.1.1 and 6.1.2, any Element of Project may be connected with the Interconnection Facilities when:
- a. it has been completed in accordance with this Agreement and the Connection Agreement;
  - b. it meets the Grid Code, Central Electricity Authority (Technical Standards for Connectivity to the Grid) Regulations, 2007 as amended from time to time and all other Indian legal requirements, and
  - c. The TSP has obtained the approval in writing of the Electrical Inspector certifying that the Element is ready from the point of view of safety of supply and can be connected with the Interconnection Facilities.
  - d. It has satisfactorily met all the testing requirements as per Articles 6.1.4.

6.1.4 Site Acceptance Test (SAT)/ pre-commissioning tests of all major substation equipment, component, system, facilities shall be successfully carried out before commissioning. The Type tests, FAT and SAT reports should be available at the substation / terminal station of HVDC installations for ready reference of operation and maintenance staff and has to be made available to the Independent Engineer appointed for quality monitoring or their authorised representatives, as and when they wish to examine the same.

## **6.2 Commercial Operation:**

6.2.1 An Element of the Project shall be declared to have achieved COD twenty four (24) hours following the connection of the Element with the Interconnection Facilities pursuant to Article 6.1 or seven (7) days after the date on which it is declared by the TSP to be ready for charging but is not able to be charged for reasons not attributable to the TSP subject to Article 6.1.2.

Provided that an Element shall be declared to have achieved COD only after all the Element(s), if any, which are pre-required to have achieved COD as defined in Schedule 2 of this Agreement, have been declared to have achieved their respective COD.

6.2.2 Once any Element of the Project has been declared to have achieved deemed COD as per Article 6.2.1 above, such Element of the Project shall be deemed to have Availability equal to the Target Availability till the actual charging of the Element and to this extent, TSP shall be eligible for the Monthly Transmission Charges applicable for such Element.

## **6.3 Compensation for Direct Non Natural Force Majeure Event or Indirect Non Natural Force Majeure Event or Natural Force Majeure Event (affecting the Nodal Agency)**

6.3.1 If the TSP is otherwise ready to connect the Element(s) of the Project and has given due notice, as per provisions of Article 6.1.1, to the concerned agencies of the date of intention to connect the Element(s) of the Project, where such date is not before the Scheduled COD, but is not able to connect the Element(s) of the Project by the said date specified in the notice, due to Direct Non Natural Force Majeure Event or Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency, provided such Direct Non Natural Force Majeure Event or Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency has continued for a period of more

than three (3) continuous or non-continuous Months, the TSP shall, until the effects of the Direct Non Natural Force Majeure Event or of Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency no longer prevent the TSP from connecting the Element(s) of the Project, be deemed to have achieved COD relevant to that date and to this extent, be deemed to have been providing Transmission Service with effect from the date notified, and shall be treated as follows:

- a. In case of delay due to Direct Non Natural Force Majeure Event, TSP is entitled for Transmission Charges calculated on Target Availability for the period of such events in excess of three (3) continuous or non continuous Months in the manner provided in (c) below.
- b. In case of delay due to Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency, TSP is entitled for payment for debt service which is due under the Financing Agreements, subject to a maximum of Transmission Charges calculated on Target Availability, for the period of such events in excess of three (3) continuous or non continuous Months in the manner provided in (c) below.
- c. In case of delay due to Direct Non Natural Force Majeure Event or Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency, the TSP is entitled for payments mentioned in (a) and (b) above, after commencement of Transmission Service, in the form of an increase in Transmission Charges. These amounts shall be paid from the date, being the later of a) the date of cessation of such Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency and b) the completion of sixty (60) days from the receipt of the Financing Agreements by the Nodal Agency from the TSP.

Provided such increase in Transmission Charges shall be so as to put the TSP in the same economic position as the TSP would have been in case the TSP had been paid amounts mentioned in (a) and (b) above in a situation where the Force Majeure Event had not occurred.

For the avoidance of doubt, it is clarified that the charges payable under this Article 6.3.1 shall be recovered as per Sharing Regulations.

#### **6.4 Liquidated Damages for Delay in achieving COD of Project:**

6.4.1 If the TSP fails to achieve COD of any Element of the Project or the Project, by the Element's / Project's Scheduled COD or such Scheduled COD as extended under Articles 4.4.1 and 4.4.3, then the TSP shall pay to the Nodal Agency, a sum equivalent to 3.33% of Monthly Transmission Charges applicable for the Element of the Project [in case where no Elements have been defined, to be on the Project as a whole] / Project, for each day of delay up to sixty (60) days of delay and beyond that time limit, at the rate of five percent (5%) of the Monthly Transmission Charges applicable to such Element / Project, as liquidated damages for such delay and not as penalty, without prejudice to any rights of the Nodal Agency under the Agreement.

6.4.2 The TSP's maximum liability under this Article 6.4 shall be limited to the amount of liquidated damages calculated in accordance with Article 6.4.1 for and up to six (6) months of delay for the Element or the Project.

Provided that, in case of failure of the TSP to achieve COD of the Element of the Project even after the expiry of six (6) months from its Scheduled COD, the provisions of Article 13 shall apply.

6.4.3 The TSP shall make payment to the Nodal Agency of the liquidated damages calculated pursuant to Article 6.4.1 within ten (10) days of the earlier of:

- a. the date on which the applicable Element achieves COD; or
- b. the date of termination of this Agreement.

The payment of such damages shall not relieve the TSP from its obligations to complete the Project or from any other obligation and liabilities under the Agreement.

- 6.4.4 If the TSP fails to pay the amount of liquidated damages to the Nodal Agency within the said period of ten (10) days, the Nodal Agency shall be entitled to recover the said amount of the liquidated damages by invoking the Contract Performance Guarantee. If the then existing Contract Performance Guarantee is for an amount which is less than the amount of the liquidated damages payable by the TSP to the Nodal Agency under this Article 6.3 and the TSP fails to make payment of the balance amount of the liquidated damages not covered by the Contract Performance Guarantee, then such balance amount shall be deducted from the Transmission Charges payable to the TSP. The right of the Nodal Agency to encash the Contract Performance Guarantee is without prejudice to the other rights of the Nodal Agency under this Agreement.
- 6.4.5 For avoidance of doubt, it is clarified that amount payable by TSP under this Article is over and above the penalty payable by TSP under Article 5.5.6 of this Agreement.

## **6.5 Return of Contract Performance Guarantee**

- 6.5.1 The Contract Performance Guarantee as submitted by TSP in accordance with Article 3.1.1 shall be released by the Nodal Agency within three (3) months from the COD of the Project. In the event of delay in achieving Scheduled COD of any of the Elements by the TSP (otherwise than due to reasons as mentioned in Article 3.1.3 or Article 11) and consequent part invocation of the Contract Performance Guarantee by the Nodal Agency, Nodal Agency shall release the Contract Performance Guarantee, if any remaining unadjusted, after the satisfactory completion by the TSP of all the requirements regarding achieving the Scheduled COD of the remaining Elements of the Project. It is clarified that the Nodal Agency shall also return / release the Contract Performance Guarantee in the event of (i) applicability of Article 3.3.2 to the extent the Contract Performance Guarantee is valid for an amount in excess of **Rs 42 Crore (Rupees Forty Two Crore Only)**, or (ii) termination of this Agreement by the Nodal Agency as mentioned under Article 3.3.4 of this Agreement.
- 6.5.2 The release of the Contract Performance Guarantee shall be without prejudice to other rights of the Nodal Agency under this Agreement.

**ARTICLE: 7****7. OPERATION AND MAINTENANCE OF THE PROJECT****7.1 Operation and Maintenance of the Project:**

The TSP shall be responsible for ensuring that the Project is operated and maintained in accordance with the regulations made by the Commission and CEA from time to time and provisions of the Act.

## ARTICLE: 8

### 8. AVAILABILITY OF THE PROJECT

#### 8.1 Calculation of Availability of the Project:

Calculation of Availability for the Elements and for the Project, as the case may be, shall be as per **Appendix –II to Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019**, as applicable on the Bid Deadline and as appended in Schedule 6 of this Agreement.

#### 8.2 Target Availability:

The Target Availability of each Element and the Project shall be **98%**.

Payment of monthly Transmission charges based on actual availability will be calculated as per para 1.2 of Schedule 4 of this Agreement.

If the availability of any Element or the Project is below the Target Availability, for six consecutive months in a Contract Year, the DIC(s) or the Nodal Agency may issue a show cause notice to the TSP, asking them to show cause as to why the Transmission Service Agreement be not terminated, and if no satisfactory cause is shown it may terminate the Agreement. If the Nodal Agency is of the opinion that the transmission system is of critical importance, it may carry out or cause to carry the operation and maintenance of transmission system at the risk and cost of TSP.

## **ARTICLE: 9**

### **9. INSURANCES**

#### **9.1 Insurance:**

- 9.1.1 The TSP shall effect and maintain or cause to be effected and maintained during the Construction Period and the Operating Period, adequate Insurances against such risks, with such deductibles including but not limited to any third party liability and endorsements and co-beneficiary/insured, as may be necessary under
- a. any of the Financing Agreements,
  - b. the Laws, and
  - c. in accordance with Prudent Utility Practices.

The Insurances shall be taken effective from a date prior to the date of the Financial Closure till the Expiry Date.

#### **9.2 Evidence of Insurance cover:**

- 9.2.1 The TSP shall furnish to the Nodal Agency copies of certificates and policies of the Insurances, as and when the Nodal Agency may seek from the TSP as per the terms of Article 9.1

#### **9.3 Application of Insurance Proceeds:**

- 9.3.1 Save as expressly provided in this Agreement, the policies of Insurances and the Financing Agreements, the proceeds of any insurance claim made due to loss or damage to the Project or any part of the Project shall be first applied to reinstatement, replacement or renewal of such loss or damage.
- 9.3.2 If a Natural Force Majeure Event renders the Project no longer economically and technically viable and the insurers under the Insurances make payment on a “total loss” or equivalent basis, the portion of the proceeds of such Insurance available to the TSP (after making admissible payments to the Lenders as per the Financing Agreements) shall be allocated only to the TSP. Nodal Agency and / or concerned Designated ISTS Customers shall have no claim on such proceeds of the Insurance.
- 9.3.3 Subject to the requirements of the Lenders under the Financing Agreements, any dispute or difference between the Parties as to whether the Project is no longer

economically and technically viable due to a Force Majeure Event or whether that event was adequately covered in accordance with this Agreement by the Insurances shall be determined in accordance with Article 16.

**9.4 Effect on liability of the Nodal Agency / Designated ISTS Customers**

9.4.1 The Nodal Agency and / or the Designated ISTS Customers shall have no financial obligations or liability whatsoever towards the TSP in respect of this Article 9.

## **ARTICLE: 10**

### **10. BILLING AND PAYMENT OF TRANSMISSION CHARGES**

10.1 Subject to provisions of this Article 10, the Monthly Transmission Charges shall be paid to the TSP, in Indian Rupees, on monthly basis as per the provisions of the Sharing Regulations, from the date on which an Element(s) has achieved COD until the Expiry Date of this Agreement, unless terminated earlier and in line with the provisions of Schedule 4 of this Agreement.

#### **10.2 Calculation of Monthly Transmission Charges:**

The Monthly Transmission Charges for each Contract Year including Incentive & Penalty payment shall be calculated in accordance with the provisions of Schedule 4 of this Agreement.

#### **10.3 Rebate & Late Payment Surcharge:**

The rebate and late payment surcharge shall be governed as per Sharing Regulations.

#### **10.4 Disputed Bills, Default in payment by the Designated ISTS Customers & Annual Reconciliation:**

Any Disputed Bill, Default in payment by the Designated ISTS Customers & Annual Reconciliation shall be governed as per Sharing Regulations.

## ARTICLE: 11

### 11. FORCE MAJEURE

#### 11.1 Definitions

11.1.1 The following terms shall have the meanings given hereunder.

#### 11.2 Affected Party

11.2.1 An Affected Party means any Party whose performance has been affected by an event of Force Majeure.

11.2.2 Any event of Force Majeure shall be deemed to be an event of Force Majeure affecting the TSP only if the Force Majeure event affects and results in, late delivery of machinery and equipment for the Project or construction, completion, commissioning of the Project by Scheduled COD and/or operation thereafter;

#### 11.3 Force Majeure

A 'Force Majeure' means any event or circumstance or combination of events and circumstances including those stated below that wholly or partly prevents or unavoidably delays an Affected Party in the performance of its obligations/ roles under this Agreement, but only if and to the extent that such events or circumstances are not within the reasonable control, directly or indirectly, of the Affected Party and could not have been avoided if the Affected Party had taken reasonable care or complied with Prudent Utility Practices:

##### a) Natural Force Majeure Events:

- i. act of God, including, but not limited to drought, fire and explosion (to the extent originating from a source external to the Site), earthquake, volcanic eruption, landslide, flood, cyclone, typhoon, tornado, or exceptionally adverse weather conditions, which are in excess of the statistical measures for the last hundred (100) years; and
- ii. epidemic/ pandemic notified by Indian Governmental Instrumentality.

##### b) Non-Natural Force Majeure Events:

- i. Direct Non–Natural Force Majeure Events
  - Nationalization or compulsory acquisition by any Indian

Governmental Instrumentality of any material assets or rights of the Affected Party; or

- the unlawful, unreasonable or discriminatory revocation of, or refusal to renew, any Consents, Clearances and Permits required by the Affected Party to perform their obligations/ roles under the RFP Project Documents or any unlawful, unreasonable or discriminatory refusal to grant any other Consents, Clearances and Permits required for the development/ operation of the Project, provided that a Competent Court of Law declares the revocation or refusal to be unlawful, unreasonable and discriminatory and strikes the same down; or
- any other unlawful, unreasonable or discriminatory action on the part of an Indian Governmental Instrumentality which is directed against the Project, provided that a Competent Court of Law declares the action to be unlawful, unreasonable and discriminatory and strikes the same down.

ii. Indirect Non - Natural Force Majeure Events

- act of war (whether declared or undeclared), invasion, armed conflict or act of foreign enemy, blockade, embargo, revolution, riot, insurrection, terrorist or military action; or
- radio active contamination or ionising radiation originating from a source in India or resulting from any other Indirect Non Natural Force Majeure Event mentioned above, excluding circumstances where the source or cause of contamination or radiation is brought or has been brought into or near the Site by the Affected Party or those employed or engaged by the Affected Party; or
- industry-wide strikes and labour disturbances, having a nationwide impact in India.

#### **11.4 Force Majeure Exclusions**

11.4.1 Force Majeure shall not include (i) any event or circumstance which is within the reasonable control of the Parties and (ii) the following conditions, except to the extent that they are consequences of an event of Force Majeure:

- (a) Unavailability, late delivery, or changes in cost of the machinery, equipment, materials, spare parts etc. for the Project;
- (b) Delay in the performance of any Contractors or their agents;
- (c) Non-performance resulting from normal wear and tear typically experienced in transmission materials and equipment;
- (d) Strikes or labour disturbance at the facilities of the Affected Party;
- (e) Insufficiency of finances or funds or the Agreement becoming onerous to perform; and
- (f) Non-performance caused by, or connected with, the Affected Party's:
  - i. negligent or intentional acts, errors or omissions;
  - ii. failure to comply with an Indian Law; or
  - iii. breach of, or default under this Agreement or any Project Documents.
- (g) Any error or omission in the survey report provided by BPC during the bidding process.

## **11.5 Notification of Force Majeure Event**

11.5.1 The Affected Party shall give notice to the other Party of any event of Force Majeure as soon as reasonably practicable, but not later than seven (7) days after the date on which such Party knew or should reasonably have known of the commencement of the event of Force Majeure. If an event of Force Majeure results in a breakdown of communications rendering it unreasonable to give notice within the applicable time limit specified herein, then the Party claiming Force Majeure shall give such notice as soon as reasonably practicable after reinstatement of communications, but not later than one (1) day after such reinstatement.

Provided that, such notice shall be a pre-condition to the Affected Party's entitlement to claim relief under this Agreement. Such notice shall include full particulars of the event of Force Majeure, its effects on the Party claiming relief and the remedial measures proposed. The Affected Party shall give the other Party regular reports on the progress of those remedial measures and such other

information as the other Party may reasonably request about the Force Majeure.

11.5.2 The Affected Party shall give notice to the other Party of (i) the cessation of the relevant event of Force Majeure; and (ii) the cessation of the effects of such event of Force Majeure on the performance of its rights or obligations/ roles under this Agreement, as soon as practicable after becoming aware of each of these cessations.

#### **11.6 Duty to perform and duty to mitigate**

To the extent not prevented by a Force Majeure Event, the Affected Party shall continue to perform its obligations/ roles as provided in this Agreement. The Affected Party shall use its reasonable efforts to mitigate the effect of any event of Force Majeure as soon as practicable.

#### **11.7 Available Relief for a Force Majeure Event**

Subject to this Article 11,

- (a) no Party shall be in breach of its obligations/ roles pursuant to this Agreement to the extent that the performance of its obligations/ roles was prevented, hindered or delayed due to a Force Majeure Event;
- (b) each Party shall be entitled to claim relief for a Force Majeure Event affecting its performance in relation to its obligations/ roles under Articles 3.3.4, 4.4.2 and 6.3.1 of this Agreement.
- (c) For the avoidance of doubt, it is clarified that the computation of Availability of the Element(s) under outage due to Force Majeure Event, as per Article 11.3 affecting the TSP shall be as per **Appendix–II to Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019** as on Bid Deadline. For the event(s) for which the Element(s) is/are deemed to be available as per **Appendix –II to Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019**, then the Transmission Charges, as applicable to such Element(s), shall be payable as per Schedule 4, for the duration of such event(s).
- (d) For so long as the TSP is claiming relief due to any Force Majeure Event under this Agreement, the Nodal Agency may, if it so desires, from time to time on one (1) day notice, inspect the Project and the TSP shall provide the Nodal Agency's personnel with access to the Project to carry out such inspections.

- (e) For avoidance of doubt, the TSP acknowledges that for extension of Scheduled COD a period up to one hundred eighty (180) days due to Force Majeure event, no compensation on the grounds such as interest cost, incident expenditure, opportunity cost will be made to the TSP. However, if Scheduled COD is extended beyond a period of one hundred eighty (180) days due to Force Majeure event, the TSP will be allowed to recover the interest cost during construction corresponding to the period exceeding one hundred eighty (180) days by adjustment in the Transmission Charges in accordance with Schedule 9.

## ARTICLE: 12

### 12. CHANGE IN LAW

#### 12.1 Change in Law

12.1.1 Change in Law means the occurrence of any of the following after the Bid Deadline resulting into any additional recurring / non-recurring expenditure by the TSP or any savings of the TSP:

- the enactment, coming into effect, adoption, promulgation, amendment, modification or repeal (without re-enactment or consolidation) in India, of any Law, including rules and regulations framed pursuant to such Law, subject to the provisions under Article 12.1.2;
- a change in the interpretation or application of any Law by any Indian Governmental Instrumentality having the legal power to interpret or apply such Law, or any Competent Court of Law;
- the imposition of a requirement for obtaining any Consents, Clearances and Permits which was not required earlier;
- a change in the terms and conditions prescribed for obtaining any Consents, Clearances and Permits or the inclusion of any new terms or conditions for obtaining such Consents, Clearances and Permits;
- any change in the licensing regulations of the Commission, under which the Transmission License for the Project was granted if made applicable by such Commission to the TSP;
- change in wind zone; or
- any change in tax or introduction of any tax made applicable for providing Transmission Service by the TSP as per the terms of this Agreement.

12.1.2 Notwithstanding anything contained in this Agreement, Change in Law shall not cover any change:

- a) Taxes on corporate income; and
- b) Withholding tax on income or dividends distributed to the shareholders of the TSP.

**12.2 Relief for Change in Law**

12.2.1 During Construction Period, the impact of increase/decrease in the cost of the Project on the Transmission Charges shall be governed by the formula given in Schedule 9 of this Agreement

12.2.2 During the Operation Period:

During the operation period, if as a result of Change in Law, the TSP suffers or is benefited from a change in costs or revenue, the aggregate financial effect of which exceeds 0.30% (zero point three percent) of the Annual Transmission Charges in aggregate for a Contract Year, the TSP may notify so to the Nodal Agency and propose amendments to this Agreement so as to place the TSP in the same financial position as it would have enjoyed had there been no such Change in Law resulting in change in costs or revenue as aforesaid.

12.2.3 For any claims made under Articles 12.2.1 and 12.2.2 above, the TSP shall provide to the Nodal Agency documentary proof of such increase / decrease in cost of the Project / revenue for establishing the impact of such Change in Law.

In cases where Change in Law results in decrease of cost and it comes to the notice of Nodal Agency that TSP has not informed Nodal Agency about such decrease in cost, Nodal Agency may initiate appropriate claim.

**12.3 Notification of Change in Law:**

12.3.1 If the TSP is affected by a Change in Law in accordance with Article 12.1 and wishes to claim relief for such Change in Law under this Article 12, it shall give notice to Nodal Agency of such Change in Law as soon as reasonably practicable after becoming aware of the same.

12.3.2 The TSP shall also be obliged to serve a notice to the Nodal Agency even when it is beneficially affected by a Change in Law.

12.3.3 Any notice served pursuant to Articles 12.3.1 and 12.3.2 shall provide, amongst other things, precise details of the Change in Law and its estimated impact on the TSP.

**12.4 Payment on account of Change in Law**

12.4.1 The payment for Change in Law shall be through a separate Bill. However, in case of any change in Monthly Transmission Charges by reason of Change in Law, as

determined in accordance with this Agreement, the Bills to be raised by the Nodal Agency after such change in Transmission Charges shall appropriately reflect the changed Monthly Transmission Charges.

## ARTICLE: 13

### 13. EVENTS OF DEFAULT AND TERMINATION

#### 13.1 TSP's Event of Default

The occurrence and continuation of any of the following events shall constitute a TSP Event of Default, unless any such TSP Event of Default occurs as a result of any non-fulfilment of its obligations as prescribed under this Agreement by the Nodal Agency or a Force Majeure Event:

- a. After having taken up the construction of the Project, the abandonment by the TSP or the TSP's Contractors of the construction of the Project for a continuous period of two (2) months and such default is not rectified within thirty (30) days from the receipt of notice from the Nodal Agency in this regard;
- b. The failure to commission any Element of the Project by the date falling six (6) months after its Scheduled COD unless extended by Nodal Agency as per provisions of this Agreement;
- c. If the TSP:
  - i. assigns, mortgages or charges or purports to assign, mortgage or charge any of its assets or rights related to the Project in contravention of the provisions of this Agreement; or
  - ii. transfers or novates any of its obligations pursuant to this Agreement, in a manner contrary to the provisions of this Agreement;

Except where such transfer is in pursuance of a Law and

- it does not affect the ability of the transferee to perform, and such transferee has the financial and technical capability to perform, its obligations under this Agreement;
- is to a transferee who assumes such obligations under the Project and this Agreement remains effective with respect to the transferee;

- d. If:
- i. The TSP becomes voluntarily or involuntarily the subject of any bankruptcy or insolvency or winding up proceedings and such proceedings remain uncontested for a period of thirty (30) days; or
  - ii. any winding up or bankruptcy or insolvency order is passed against the TSP; or
  - iii. the TSP goes into liquidation or dissolution or a receiver or any similar officer is appointed over all or substantially all of its assets or official liquidator is appointed to manage its affairs, pursuant to Law,
- Provided that a dissolution or liquidation of the TSP will not be a TSP's Event of Default, where such dissolution or liquidation of the TSP is for the purpose of a merger, consolidation or reorganization with the prior approval of the Commission as per the provisions of Central Electricity Regulatory Commission (Procedure, terms and Conditions for grant of Transmission License and other related matters) Regulations, 2006 or as amended from time to time; or
- e. Failure on the part of the TSP to comply with the provisions of Article 19.1 of this Agreement; or
  - f. the TSP repudiates this Agreement and does not rectify such breach even within a period of thirty (30) days from a notice from the Nodal Agency in this regard; or
  - g. after Commercial Operation Date of the Project, the TSP fails to achieve monthly Target Availability of 98% for a period of six (6) consecutive months or within a non-consecutive period of six (6) months within any continuous aggregate period of eighteen(18) months except where the Availability is affected by Force Majeure Events as per Article 11; or
  - h. any of the representations and warranties made by the TSP in Article 17 of this Agreement being found to be untrue or inaccurate. Further, in addition to the above, any of the undertakings submitted by the Selected Bidder at the time of submission of the Bid being

found to be breached or inaccurate, including but not limited to undertakings from its Parent Company / Affiliates related to the minimum equity obligation; or

- i. the TSP fails to complete / fulfil all the activities / conditions within the specified period as per Article 3; or
- j. except for the reasons solely attributable to Nodal Agency, the TSP is in material breach of any of its obligations under this Agreement and such material breach is not rectified by the TSP within thirty (30) days of receipt of notice in this regard from the Nodal Agency; or
- k. deleted

### **13.2 Termination Procedure for TSP Event of Default**

- a. Upon the occurrence and continuance of any TSP's Event of Default under Article 13.1 the Nodal Agency may serve notice on the TSP, with a copy to the CEA and the Lenders' Representative, of their intention to terminate this Agreement (a "Nodal Agency's Preliminary Termination Notice"), which shall specify in reasonable detail, the circumstances giving rise to such Nodal Agency's Preliminary Termination Notice.
- b. Following the issue of a Nodal Agency's Preliminary Termination Notice, the Consultation Period shall apply and would be for the Parties to discuss as to what steps shall be taken with a view to mitigate the consequences of the relevant Event of Default having regard to all the circumstances.
- c. During the Consultation Period, the Parties shall, save as otherwise provided in this Agreement, continue to perform their respective obligations/ roles under this Agreement, and the TSP shall not remove any material, equipment or any part of the Project, without prior consent of the Nodal Agency.

Following the expiry of the Consultation Period, unless the Parties shall have otherwise agreed to the contrary or the circumstances giving rise to Nodal Agency's Preliminary Termination Notice shall have ceased to exist or shall have been remedied, this Agreement may be terminated by the Nodal Agency by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative

in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement.

Further, the Nodal Agency may also initiate proceedings to blacklist the TSP & its Affiliates from participation in any RFP issued by BPCs for a period of 5 years.

### **13.3 Procedure for Nodal Agency's non-fulfilment of Role**

- a. Upon the Nodal Agency not being able to fulfil its role under Article 4.2, the TSP may serve notice on the Nodal Agency, with a copy to CEA and the Lenders' Representative (a "TSP's Preliminary Notice"), which notice shall specify in reasonable detail the circumstances giving rise to such non-fulfilment of role by the Nodal Agency.
- b. Following the issue of a TSP's Preliminary Notice, the Consultation Period shall apply.
- c. The Consultation Period would be for the Parties to discuss as to what steps shall be taken with a view to mitigate the consequences of the relevant non-fulfilment of role by the Nodal Agency including giving time extension to TSP, having regard to all the circumstances.
- d. During the Consultation Period, both Parties shall, save as otherwise provided in this Agreement, continue to perform their respective obligations/ roles under this Agreement.

### **13.4 Termination due to Force Majeure**

13.4.1 In case the Parties could not reach an agreement pursuant to Articles 3.3.4 and 4.4.2 of this Agreement and the Force Majeure Event or its effects continue to be present, the Nodal Agency shall have the right to cause termination of the Agreement. In case of such termination, the Contract Performance Guarantee shall be returned to the TSP as per the provisions of Article 6.5.1.

13.4.2 In case of termination of this Agreement, the TSP shall provide to the Nodal Agency the full names and addresses of its Contractors as well as complete designs, design drawings, manufacturing drawings, material specifications and technical information, as required by the Nodal Agency within thirty (30) days of Termination Notice.

**13.5 Termination or amendment due to non-requirement of any Element or Project during construction**

13.5.1 In case any Element or Project, which is under construction, is no longer required due to any reason whatsoever, the Nodal Agency may issue a notice to this effect to the TSP.

13.5.2 Nodal agency may also issue notice to the TSP seeking their response to the proposed termination/ amendment (as the case may be) of the Agreement. The Nodal Agency shall issue copy of such notice to Lenders. In the notice, Nodal Agency shall also include an assessment of the physical progress made by TSP in the Element/ Project (as the case may be) that is no longer required.

13.5.3 The TSP shall neither carry out further investment nor carry out any work on the Element/ Project (as the case may be) that is no longer required after delivery of the notice.

13.5.4 After taking into account the comments of the TSP, the Nodal Agency may terminate the Agreement or amend it if both Parties agree to the amendment.

**13.6 Revocation of the Transmission License**

13.6.1 The Commission may, as per the provisions of the Electricity Act, 2003, revoke the Transmission License of the ISTS Licensee. Further, in such a case, the Agreement shall be deemed to have been terminated.

**13.7 Termination Payment**

13.7.1 If Agreement is terminated on account of Force Majeure Events, non-requirement of any Element or Project during Construction, Nodal Agency's non-fulfilment of Role & TSP's Event of Default, the TSP shall be entitled for Termination Payment equivalent to valuation of Project Assets. Upon payment, the Nodal Agency shall take over the Project Assets.

## ARTICLE: 14

### 14. LIABILITY AND INDEMNIFICATION

#### 14.1 Indemnity

14.1.1 The TSP shall indemnify, defend and hold the Nodal Agency harmless against:

- (a) any and all third party claims, actions, suits or proceedings against the Nodal Agency for any loss of or damage to property of such third party, or death or injury to such third party, arising out of a breach by the TSP of any of its obligations under this Agreement, except to the extent that any such claim, action, suit or proceeding has arisen due to a negligent act or omission, breach of this Agreement or non-fulfilment of statutory duty on the part of Nodal Agency; and
- (b) any and all losses, damages, costs and expenses including legal costs, fines, penalties and interest actually suffered or incurred by the Nodal Agency from third party claims arising by reason of:
  - i. a breach by the TSP of any of its obligations under this Agreement, (provided that this Article 14 shall not apply to such breaches by the TSP, for which specific remedies have been provided for under this Agreement) except to the extent that any such losses, damages, costs and expenses including legal costs, fines, penalties and interest (together to constitute "Indemnifiable Losses") has arisen due to a negligent act or omission, breach of this Agreement or non-fulfilment of statutory duty on the part of the Nodal Agency, or
  - ii. any of the representations and warranties of the TSP under this Agreement being found to be inaccurate or untrue.

14.1.2 The Nodal Agency shall, in accordance with the Regulations framed by CERC in this regard, indemnify, defend and hold the TSP harmless against:

- (a) any and all third party claims, actions, suits or proceedings against the TSP, for any loss of or damage to property of such third party, or death or injury to such third party, arising out of any material breach by the Nodal Agency of any of their roles under this Agreement, except to the extent that any such claim, action, suit or proceeding has arisen due to a negligent act or

omission, breach of this Agreement or breach of statutory duty on the part of the TSP, its Contractors, servants or agents; and

- (b) any and all losses, damages, costs and expenses including legal costs, fines, penalties and interest ('Indemnifiable Losses') actually suffered or incurred by the TSP from third party claims arising by reason of:
  - i. any material breach by the Nodal Agency of any of its roles under this Agreement (provided that, this Article 14 shall not apply to such breaches by the Nodal Agency, for which specific remedies have been provided for under this Agreement), except to the extent that any such Indemnifiable Losses have arisen due to a negligent act or omission, breach of this Agreement or breach of statutory duty on the part of the TSP, its Contractors, servants or agents or
  - ii. any of the representations and warranties of the Nodal Agency under this Agreement being found to be inaccurate or untrue.

## **14.2 Patent Indemnity:**

### 14.2.1

- (a) The TSP shall, subject to the Nodal Agency's compliance with Article 14.2.1 (b), indemnify and hold harmless the Nodal Agency and its employees and officers from and against any and all suits, actions or administrative proceedings, claims, demands, losses, damages, costs, and expenses of whatsoever nature, including attorney's fees and expenses, which the Nodal Agency may suffer as a result of any infringement or alleged infringement of any patent, utility model, registered design, trademark, copyright or other intellectual property right registered or otherwise existing at the date of the Agreement by reason of the setting up of the Project by the TSP.

Such indemnity shall not cover any use of the Project or any part thereof other than for the purpose indicated by or to be reasonably inferred from the Agreement, any infringement resulting from the misuse of the Project or any part thereof, or any products produced in association or combination with any other equipment, plant or materials not supplied by the TSP, pursuant to the Agreement.

- (b) If any proceedings are brought or any claim is made against the Nodal

Agency arising out of the matters referred to in Article 14.2.1(a), the Nodal Agency shall promptly give the TSP a notice thereof, and the TSP shall at its own expense take necessary steps and attend such proceedings or claim and any negotiations for the settlement of any such proceedings or claim. The TSP shall promptly notify the Nodal Agency of all actions taken in such proceedings or claims.

- (c) If the TSP fails to notify the Nodal Agency within twenty-eight (28) days after receipt of such notice from the Nodal Agency under Article 14.2.1(b) above, that it intends to attend any such proceedings or claim, then the Nodal Agency shall be free to attend the same on their own behalf at the cost of the TSP. Unless the TSP has so failed to notify the Nodal Agency within the twenty eight (28) days period, the Nodal Agency shall make no admission that may be prejudicial to the defence of any such proceedings or claims.
- (d) The Nodal Agency shall, at the TSP's request, afford all available assistance to the TSP in attending to such proceedings or claim, and shall be reimbursed by the TSP for all reasonable expenses incurred in so doing.

#### 14.2.2

- (a) The Nodal Agency, in accordance with the Regulations framed by CERC in this regard, subject to the TSP's compliance with Article 14.2.2(b) shall indemnify and hold harmless the TSP and its employees, officers from and against any and all suits, actions or administrative proceedings, claims, demands, losses, damages, costs and expenses of whatsoever nature, including attorney's fees and expenses, which the TSP may suffer as a result of any infringement or alleged infringement of any patent, utility model, registered design, trademark, copyright or other intellectual property right registered or otherwise existing at the date of the Agreement by reason of the setting up of the Project by the TSP.
- (b) If any proceedings are brought or any claim is made against the TSP arising out of the matters referred to in Article 14.2.2 (a) the TSP shall promptly give the Nodal Agency a notice thereof, and the Nodal Agency shall at its own expense take necessary steps and attend such proceedings or claim and any negotiations for the settlement of any such proceedings or claim. The Nodal Agency shall promptly notify the TSP of all actions taken in such proceedings or claims.

- (c) If the Nodal Agency fails to notify the TSP within twenty-eight (28) days after receipt of such notice from the TSP under Article 14.2.2(b) above, that it intends to attend any such proceedings or claim, then the TSP shall be free to attend the same on its own behalf at the cost of the Nodal Agency. Unless the Nodal Agency has so failed to notify the TSP within the twenty (28) days period, the TSP shall make no admission that may be prejudicial to the defence of any such proceedings or claim.
- (d) The TSP shall, at the Nodal Agency request, afford all available assistance to the Nodal Agency in attending to such proceedings or claim, and shall be reimbursed by the Nodal Agency for all reasonable expenses incurred in so doing.

### **14.3 Monetary Limitation of liability**

14.3.1 A Party ("Indemnifying Party") shall be liable to indemnify the other Party ("Indemnified Party") under this Article 14 for any indemnity claims made in a Contract Year only up to an amount of **Rs. 2.80 Crore (Rupees Two Crore Eighty Lakh Only)**.

### **14.4 Procedure for claiming indemnity**

14.4.1 Where the Indemnified Party is entitled to indemnification from the Indemnifying Party pursuant to Articles 14.1 or 14.2 the Indemnified Party shall promptly notify the Indemnifying Party of such claim, proceeding, action or suit referred to in Articles 14.1 or 14.2 in respect of which it is entitled to be indemnified. Such notice shall be given as soon as reasonably practicable after the Indemnified Party becomes aware of such claim, proceeding, action or suit. The Indemnifying Party shall be liable to settle the indemnification claim within thirty (30) days of receipt of the above notice.

Provided however that, if:

- i. the Parties choose to contest, defend or litigate such claim, action, suit or proceedings in accordance with Article 14.4.3 below; and
- ii. the claim amount is not required to be paid/deposited to such third party pending the resolution of the Dispute,

the Indemnifying Party shall become liable to pay the claim amount to the Indemnified Party or to the third party, as the case may be, promptly following the

resolution of the Dispute, if such Dispute is not settled in favour of the Indemnified Party.

14.4.2 The Indemnified Party may contest, defend and litigate a claim, action, suit or proceeding for which it is entitled to be indemnified under Articles 14.1 or 14.2 and the Indemnifying Party shall reimburse to the Indemnified Party all reasonable costs and expenses incurred by the Indemnified Party. However, such Indemnified Party shall not settle or compromise such claim, action, suit or proceedings without first getting the consent of the Indemnifying Party, which consent shall not be unreasonably withheld or delayed.

14.4.3 An Indemnifying Party may, at its own expense, assume control of the defence of any proceedings brought against the Indemnified Party if it acknowledges its obligation to indemnify such Indemnified Party, gives such Indemnified Party prompt notice of its intention to assume control of the defence, and employs an independent legal counsel at its own cost that is reasonably satisfactory to the Indemnified Party.

#### **14.5 Limitation on Liability**

14.5.1 Except as expressly provided in this Agreement, neither the TSP nor the Nodal Agency nor their respective officers, directors, agents, employees or Affiliates (including, officers, directors, agents or employees of such Affiliates), shall be liable or responsible to the other Party or its Affiliates including its officers, directors, agents, employees, successors, insurers or permitted assigns for incidental, indirect or consequential, punitive or exemplary damages, connected with or resulting from performance or non-performance of this Agreement, or anything done in connection herewith, including claims in the nature of lost revenues, income or profits (other than payments expressly required and properly due under this Agreement), any increased expense of, reduction in or loss of transmission capacity or equipment used therefore, irrespective of whether such claims are based upon breach of warranty, tort (including negligence, whether of the Nodal Agency, the TSP or others), strict liability, contract, breach of statutory duty, operation of law or otherwise.

14.5.2 The Nodal Agency shall have no recourse against any officer, director or shareholder of the TSP or any Affiliate of the TSP or any of its officers, directors or shareholders for such claims excluded under this Article. The TSP shall also have no recourse against any officer, director or shareholder of the Nodal Agency, or any Affiliate of the Nodal Agency or any of its officers, directors or shareholders for

such claims excluded under this Article.

#### **14.6 Duty to Mitigate**

The party entitled to the benefit of an indemnity under this Article 14 shall take all reasonable measures to mitigate any loss or damage which has occurred. If the Party fails to take such measures, the other Party's liabilities shall be correspondingly reduced.

## ARTICLE: 15

### 15. ASSIGNMENTS AND CHARGES

#### 15.1 Assignments:

15.1.1 This Agreement shall be binding upon, and inure to the benefit of the Parties and their respective successors and permitted assigns. This Agreement shall not be assigned by any Party, except as provided in Article 15.3.

#### 15.2 Permitted Charges:

15.2.1 Neither Party shall create or permit to subsist any encumbrance over all or any of its rights and benefits under this Agreement.

15.2.2 However, the TSP may create any encumbrance over all or part of the receivables, or the Project Assets of the Project in favour of the Lenders or the Lenders' Representative on their behalf, as security for amounts payable under the Financing Agreements and any other amounts agreed by the Parties.

Provided that:

- i. the Lenders or the Lenders' Representative on their behalf shall have entered into the Financing Agreements and agreed in writing to the provisions of this Agreement; and
- ii. any encumbrance granted by the TSP in accordance with this Article 15.2.2 shall contain provisions pursuant to which the Lenders or the Lender's Representative on their behalf agrees unconditionally with the TSP to release from such encumbrances upon payment by the TSP to the Lenders of all amounts due under the Financing Agreements.

15.2.3 Article 15.2.1 does not apply to:

- a. liens arising by operation of law (or by an agreement evidencing the same) in the ordinary course of the TSP developing and operating the Project;
- b. pledges of goods, the related documents of title and / or other related documents, arising or created in the ordinary course of the TSP developing and operating the Project; or

- c. security arising out of retention of title provisions in relation to goods acquired in the ordinary course of the TSP developing and operating the Project.

### **15.3 Substitution Rights of the Lenders**

- 15.3.1 The TSP would need to operate and maintain the Project under the provisions of this Agreement and cannot assign the Transmission License or transfer the Project or part thereof to any person by sale, lease, exchange or otherwise, without the prior approval of the Nodal Agency.
- 15.3.2 However, in the case of default by the TSP in debt repayments or in the case of default by the TSP as per Article 13 of this Agreement during the debt repayments, the Commission may, on an application from the Lenders, assign the Transmission License to the nominee of the Lenders subject to the fulfilment of the qualification requirements and provisions of the Central Electricity Regulatory Commission (Procedure, terms and Conditions for grant of Transmission License and other related matters) Regulations, 2006 and as amended from time to time.

## **ARTICLE: 16**

### **16. GOVERNING LAW AND DISPUTE RESOLUTION**

#### **16.1 Governing Law:**

This Agreement shall be governed by and construed in accordance with the Laws of India. Any legal proceedings in respect of any matters, claims or disputes under this Agreement shall be under the jurisdiction of appropriate courts in Delhi.

#### **16.2 Amicable Settlement:**

16.2.1 Either Party is entitled to raise any claim, dispute or difference of whatever nature arising under, out of or in connection with this Agreement, including its existence or validity or termination or whether during the execution of the Project or after its completion and whether prior to or after the abandonment of the Project or termination or breach of the Agreement by giving a written notice to the other Party, which shall contain:

- (i) a description of the Dispute;
- (ii) the grounds for such Dispute; and
- (iii) all written material in support of its claim.

16.2.2 The other Party shall, within thirty (30) days of issue of notice issued under Article 16.2.1, furnish:

- (i) counter-claim and defences, if any, regarding the Dispute; and
- (ii) all written material in support of its defences and counter-claim.

16.2.3 Within thirty (30) days of issue of notice by the Party pursuant to Article 16.2.1, if the other Party does not furnish any counter claim or defense under Article 16.2.2, or thirty (30) days from the date of furnishing counter claims or defence by the other Party, both the Parties to the Dispute shall meet to settle such Dispute amicably. If the Parties fail to resolve the Dispute amicably within thirty (30) days from the later of the dates mentioned in this Article 16.2.3, the Dispute shall be referred for dispute resolution in accordance with Article 16.3.

#### **16.3 Dispute Resolution:**

All Disputes shall be adjudicated by the Commission.

**16.4 Parties to Perform Obligations:**

Notwithstanding the existence of any Dispute and difference referred to the Commission as provided in Article 16.3 and save as the Commission may otherwise direct by a final or interim order, the Parties hereto shall continue to perform their respective obligations/ roles (which are not in dispute) under this Agreement.

**ARTICLE: 17****17. REPRESENTATION AND WARRANTIES****17.1 Representation and warranties of the Nodal Agency**

17.1.1 The Nodal Agency hereby represents and warrants to and agrees with the TSP as follows and acknowledges and confirms that the TSP is relying on such representations and warranties in connection with the transactions described in this Agreement:

- a. It has all requisite powers and authority to execute and consummate this Agreement;
- b. This Agreement is enforceable against the Nodal Agency in accordance with its terms;
- c. The consummation of the transactions contemplated by this Agreement on the part of Nodal Agency will not violate any provision of nor constitute a default under, nor give rise to a power to cancel any charter, mortgage, deed of trust or lien, lease, agreement, license, permit, evidence of indebtedness, restriction, or other contract to which the Nodal Agency is a Party or to which the Nodal Agency is bound, which violation, default or power has not been waived;

**17.2 Representation and Warranties of the TSP:**

17.2.1 The TSP hereby represents and warrants to and agrees with the Nodal Agency as follows and acknowledges and confirms that the Nodal Agency is relying on such representations and warranties in connection with the transactions described in this Agreement:

- a. It has all requisite powers and has been duly authorized to execute and consummate this Agreement;
- b. This Agreement is enforceable against it, in accordance with its terms;
- c. The consummation of the transactions contemplated by this Agreement on the part of the TSP will not violate any provision of nor constitute a default under, nor give rise to a power to cancel any charter, mortgage, deed of trust or lien, lease, agreement, license, permit, evidence of indebtedness,

restriction, or other contract to which the TSP is a Party or to which the TSP is bound which violation, default or power has not been waived;

- d. The TSP is not insolvent and no insolvency proceedings have been instituted, nor threatened or pending by or against the TSP;
- e. There are no actions, suits, claims, proceedings or investigations pending or, to the best of the TSP's knowledge, threatened in writing against the TSP at law, in equity, or otherwise, and whether civil or criminal in nature, before or by, any court, commission, arbitrator or governmental agency or authority, and there are no outstanding judgments, decrees or orders of any such courts, commission, arbitrator or governmental agencies or authorities, which materially adversely affect its ability to execute the Project or to comply with its obligations under this Agreement.

17.2.2 The TSP makes all the representations and warranties above to be valid as on the Effective Date of this Agreement.

**ARTICLE: 18****18. INDEPENDENT ENGINEER****18.1 Appointment of Independent Engineer**

The Nodal Agency shall appoint an agency/ company as Independent Engineer as per framework provided in the Guidelines for Encouraging Competition in Development of Transmission Projects for selection of Independent Engineer.

**18.2 Roles and functions of Independent Engineer**

The role and functions of the Independent Engineer shall include the following:

- a. Progress Monitoring as required under this Agreement;
- b. Ensuring Quality as required under this Agreement;
- c. determining, as required under the Agreement, the costs of any works or services and/or their reasonableness during construction phase;
- d. determining, as required under the Agreement, the period or any extension thereof, for performing any duty or obligation during construction phase;
- e. determining, as required under the Agreement, the valuation of the Project Assets.
- f. Assisting the Parties in resolution of Disputes and
- g. Undertaking all other duties and functions in accordance with the Agreement.

**18.3 Remuneration of Independent Engineer**

The fee and charges of the Independent Engineer shall be paid by the Nodal Agency as per terms & conditions of appointment.

**18.4 Termination of appointment**

18.4.1 The Nodal Agency may, in its discretion, terminate the appointment of the Independent Engineer at any time, but only after appointment of another Independent Engineer.

18.4.2 If the TSP has reason to believe that the Independent Engineer is not discharging its duties and functions in a fair, efficient and diligent manner, it may make a

written representation to the Nodal Agency and seek termination of the appointment of the Independent Engineer. Upon receipt of such representation, the Nodal Agency shall hold a tripartite meeting with the TSP and Independent Engineer for an amicable resolution, and the decision of Nodal agency is final. In the event that the appointment of the Independent Engineer is terminated hereunder, the Nodal Agency shall appoint forthwith another Independent Engineer.

#### **18.5 Authorised signatories**

The Nodal Agency shall require the Independent Engineer to designate and notify to the Nodal Agency up to 2 (two) persons employed in its firm to sign for and on behalf of the Independent Engineer, and any communication or document required to be signed by the Independent Engineer shall be valid and effective only if signed by any of the designated persons; provided that the Independent Engineer may, by notice in writing, substitute any of the designated persons by any of its employees.

**ARTICLE: 19****19. MISCELLANEOUS PROVISIONS****19.1 Equity Lock-in Commitment:**

19.1.1 The aggregate equity share holding of the Selected Bidder in the issued and paid up equity share capital of Bikaner III Neemrana II Transmission Limited shall not be less than Fifty one percent (51%) up to a period of one (1) year after COD of the Project.

Provided that, in case the Lead Member or Bidding Company is holding equity through Affiliate/s, Ultimate Parent Company or Parent Company, such restriction as specified above shall apply to such entities.

Provided further, that in case the Selected Bidder is a Bidding Consortium, the Lead Member shall continue to hold equity of at least twenty six percent (26%) upto a period of one (1) year after COD of the Project and any Member of such Bidding Consortium shall be allowed to divest its equity as long as the other remaining Members (which shall always include the Lead Member) hold the minimum equity specified above.

19.1.2 If equity is held by the Affiliates, Parent Company or Ultimate Parent Company of the Selected Bidder, then, subject to the second proviso to Article 19.1.1, such Affiliate, Parent Company or Ultimate Parent Company shall be eligible to transfer its shareholding in Bikaner III Neemrana II Transmission Limited to another Affiliate or to the Parent Company / Ultimate Parent Company of the Selected Bidder. If any such shareholding entity, qualifying as an Affiliate / Parent Company / Ultimate Parent Company, is likely to cease to meet the criteria to qualify as an Affiliate / Parent Company / Ultimate Parent Company, the shares held by such entity shall be transferred to another Affiliate / Parent Company / Ultimate Parent Company of the Selected Bidder.

19.1.3 Subject to Article 19.1.1, all transfer(s) of shareholding of Bikaner III Neemrana II Transmission Limited by any of the entities referred to in Article 19.1.1 and 19.1.2 above, shall be after prior written intimation to the Nodal Agency.

19.1.4 For computation of effective Equity holding, the Equity holding of the Selected Bidder or its Ultimate Parent Company in such Affiliate(s) or Parent Company and the equity holding of such Affiliate(s) or Ultimate Parent Company in Bikaner III Neemrana II Transmission Limited shall be computed in accordance

with the example given below:

If the Parent Company or the Ultimate Parent Company of the Selected Bidder A directly holds thirty percent (30%) of the equity in Bikaner III Neemrana II Transmission Limited, then holding of Selected Bidder A in Bikaner III Neemrana II Transmission Limited shall be thirty percent (30%);

If Selected Bidder A holds thirty percent (30%) equity of the Affiliate and the Affiliate holds fifty percent (50%) equity in Bikaner III Neemrana II Transmission Limited, then, for the purposes of ascertaining the minimum equity/equity lock-in requirements specified above, the effective holding of Bidder A in Bikaner III Neemrana II Transmission Limited shall be fifteen percent (15%), (i.e., 30% x 50%)

19.1.5 The provisions as contained in this Article 19.1 shall override the terms of the consortium agreement submitted as part of the Bid.

19.1.6 The TSP shall be responsible to report to Nodal Agency, within thirty (30) days from the occurrence of any event that would result in any change in its equity holding structure from that which existed as on the date of signing of the Share Purchase Agreement. In such cases, the Nodal Agency would reserve the right to ascertain the equity holding structure and to call for all such required documents / information / clarifications as may be required.

## **19.2 Commitment of maintaining Qualification Requirement**

19.2.1 The Selected Bidder will be required to continue to maintain compliance with the Qualification Requirements, as stipulated in RFP Document, till the COD of the Project. Where the Technically Evaluated Entity and/or the Financially Evaluated Entity is not the Bidding Company or a Member in a Bidding Consortium, as the case may be, the Bidding Company or Member shall continue to be an Affiliate of the Technically Evaluated Entity and/or Financially Evaluated Entity till the COD of the Project.

19.2.2 Failure to comply with the aforesaid provisions shall be dealt in the same manner as TSP's Event of Default as under Article 13 of this Agreement.

## **19.3 Language:**

19.3.1 All agreements, correspondence and communications between the Parties relating to this Agreement and all other documentation to be prepared and supplied under the Agreement shall be written in English, and the Agreement shall be construed

and interpreted in accordance with English language.

19.3.2 If any of the agreements, correspondence, communications or documents are prepared in any language other than English, the English translation of such agreements, correspondence, communications or documents shall prevail in matters of interpretation.

#### **19.4 Affirmation**

The TSP and the Nodal Agency, each affirm that:

1. neither it nor its respective directors, employees, or agents has paid or undertaken to pay or shall in the future pay any unlawful commission, bribe, pay-off or kick-back; and
2. it has not in any other manner paid any sums, whether in Indian currency or foreign currency and whether in India or abroad to the other Party to procure this Agreement, and the TSP and the Nodal Agency hereby undertake not to engage in any similar acts during the Term of Agreement.

#### **19.5 Severability**

The invalidity or enforceability, for any reason, of any part of this Agreement shall not prejudice or affect the validity or enforceability of the remainder of this Agreement, unless the part held invalid or unenforceable is fundamental to this Agreement.

#### **19.6 Counterparts**

This Agreement may be executed in one or more counterparts, each of which shall be deemed an original and all of which collectively shall be deemed one and the same Agreement.

#### **19.7 Breach of Obligations/ Roles**

The Parties acknowledge that a breach of any of the obligations/ roles contained herein would result in injuries. The Parties further acknowledge that the amount of the liquidated damages or the method of calculating the liquidated damages specified in this Agreement is a genuine and reasonable pre-estimate of the damages that may be suffered by the non-defaulting Party in each case specified under this Agreement

**19.8 Restriction of Shareholders / Owners Liability**

19.8.1 Parties expressly agree and acknowledge that none of the shareholders of the Parties hereto shall be liable to the other Parties for any of the contractual obligations of the concerned Party under this Agreement.

19.8.2 Further, the financial liabilities of the shareholder(s) of each Party to this Agreement shall be restricted to the extent provided in the Indian Companies Act, 1956 / Companies Act, 2013 (as the case may be).

**19.9 Taxes and Duties:**

19.9.1 The TSP shall bear and promptly pay all statutory taxes, duties, levies and cess, assessed/levied on the TSP, its Contractors or their employees that are required to be paid by the TSP as per the Law in relation to the execution of the Project and for providing Transmission Service as per the terms of this Agreement.

19.9.2 The Nodal Agency shall be indemnified and held harmless by the TSP against any claims that may be made against the Nodal Agency in relation to the matters set out in Article 19.9.1.

19.9.3 The Nodal Agency shall not be liable for any payment of, taxes, duties, levies, cess whatsoever for discharging any obligation of the TSP by the Nodal Agency on behalf of TSP or its personnel, provided the TSP has consented in writing to the Nodal Agency for such work, for which consent shall not be unreasonably withheld.

**19.10 No Consequential or Indirect Losses**

The liability of the TSP shall be limited to that explicitly provided in this Agreement.

Provided that, notwithstanding anything contained in this Agreement, under no event shall the Nodal Agency or the TSP claim from one another any indirect or consequential losses or damages.

**19.11 Discretion:**

Except where this Agreement expressly requires a Party to act fairly or reasonably, a Party may exercise any discretion given to it under this Agreement in any way it deems fit.

**19.12 Confidentiality**

19.12.1 The Parties undertake to hold in confidence this Agreement and RFP Project

Documents and not to disclose the terms and conditions of the transaction contemplated hereby to third parties, except:

- (a) to their professional advisors;
  - (b) to their officers, contractors, employees, agents or representatives, financiers, who need to have access to such information for the proper performance of their activities; or
  - (c) disclosures required under Law,
- without the prior written consent of the other Parties.

Provided that, the TSP agrees and acknowledges that the Nodal Agency, may, at any time, disclose the terms and conditions of the Agreement and the RFP Project Documents to any person, to the extent stipulated under the Law and the Competitive Bidding Guidelines.

#### **19.13 Order of priority in application:**

Save as provided in Article 2.5, in case of inconsistencies between the terms and conditions stipulated in Transmission License issued by the Commission to the TSP, agreement(s) executed between the Parties, applicable Law including rules and regulations framed thereunder, the order of priority as between them shall be the order in which they are placed below:

- terms and conditions of Transmission License;
- applicable Law, rules and regulations framed thereunder;
- this Agreement;
- Agreement(s), if any, under Sharing Regulations.

#### **19.14 Independent Entity:**

19.14.1 The TSP shall be an independent entity performing its obligations pursuant to the Agreement.

19.14.2 Subject to the provisions of the Agreement, the TSP shall be solely responsible for the manner in which its obligations under this Agreement are to be performed. All employees and representatives of the TSP or Contractors engaged by the TSP in connection with the performance of the Agreement shall

be under the complete control of the TSP and shall not be deemed to be employees, representatives, Contractors of the Nodal Agency and nothing contained in the Agreement or in any agreement or contract awarded by the TSP shall be construed to create any contractual relationship between any such employees, representatives or Contractors and the Nodal Agency.

**19.15 Amendments:**

19.15.1 This Agreement may only be amended or supplemented by a written agreement between the Parties.

**19.16 Waiver:**

19.16.1 No waiver by either Party of any default or breach by the other Party in the performance of any of the provisions of this Agreement shall be effective unless in writing duly executed by an authorised representative of such Party.

19.16.2 Neither the failure by either Party to insist on any occasion upon the performance of the terms, conditions and provisions of this Agreement nor time or other indulgence granted by one Party to the other Parties shall act as a waiver of such breach or acceptance of any variation or the relinquishment of any such right or any other right under this Agreement, which shall remain in full force and effect.

**19.17 Relationship of the Parties:**

This Agreement shall not be interpreted or construed to create an association, joint venture, or partnership or agency or any such other relationship between the Parties or to impose any partnership obligation or liability upon either Party and neither Party shall have any right, power or authority to enter into any agreement or undertaking for, or act on behalf of, or to act as or be an agent or representative of, or to otherwise bind, the other Party.

**19.18 Entirety:**

19.18.1 This Agreement along with its sections, schedules and appendices is intended by the Parties as the final expression of their agreement and is intended also as a complete and exclusive statement of the terms of their agreement.

19.18.2 Except as provided in this Agreement, all prior written or oral understandings, offers or other communications of every kind pertaining to this Agreement or the provision of Transmission Service under this Agreement to the Nodal Agency by the TSP shall stand superseded and abrogated.

**19.19 Notices:**

19.19.1 All notices or other communications which are required to be given under this Agreement shall be in writing and in the English language

19.19.2 If to the TSP, all notices or communications must be delivered personally or by registered post or facsimile or any other mode duly acknowledged to the addressee below:

Address :

Attention :

Email :

Fax. No. :

Telephone No. :

19.19.3 If to the Nodal Agency, all notices or communications must be delivered personally or by registered post or facsimile or any other mode duly acknowledged to the addresses below:

**(i) Central Transmission Utility of India Limited (Nodal Agency)**

Address :

Attention :

Email :

Fax. No. :

Telephone No. :

19.19.4 All notices or communications given by facsimile shall be confirmed by sending a copy of the same via post office in an envelope properly addressed to the appropriate Party for delivery by registered mail. All notices shall be deemed validly delivered upon receipt evidenced by an acknowledgement of the recipient, unless the Party delivering the notice

can prove in case of delivery through the registered post that the recipient refused to acknowledge the receipt of the notice despite efforts of the postal authorities.

- 19.19.5 Any Party may by notice of at least fifteen (15) days to the other Party change the address and/or addresses to which such notices and communications to it are to be delivered or mailed.

## **19.20 Fraudulent and Corrupt Practices**

19.20.1 The TSP and its respective officers, employees, agents and advisers shall observe the highest standard of ethics during the subsistence of this Agreement. Notwithstanding anything to the contrary contained in the Agreement, the Nodal Agency may terminate the Agreement without being liable in any manner whatsoever to the TSP, if it determines that the TSP has, directly or indirectly or through an agent, engaged in corrupt practice, fraudulent practice, coercive practice, undesirable practice or restrictive practice in the Bid process. In such an event, the Nodal Agency shall forfeit the Contract Performance Guarantee of the TSP, without prejudice to any other right or remedy that may be available to the Nodal Agency hereunder or subsistence otherwise.

19.20.2 Without prejudice to the rights of the Nodal Agency under Clause 19.20.1 hereinabove and the rights and remedies which the Nodal Agency may have under this Agreement, if a TSP is found by the Nodal Agency to have directly or indirectly or through an agent, engaged or indulged in any corrupt practice, fraudulent practice, coercive practice, undesirable practice or restrictive practice during the Bid process, or after the issue of Letter of Intent (hereinafter referred to as Lol) or after the execution of the agreement(s) required under Sharing Regulations, the Nodal Agency may terminate the Agreement without being liable in any manner whatsoever to the TSP. Further, the TSP & its Affiliates shall not be eligible to participate in any tender or RFP issued by any BPC for an indefinite period from the date such TSP is found by the Nodal Agency to have directly or indirectly or through an agent, engaged or indulged in any corrupt practice, fraudulent practice, coercive practice, undesirable practice or restrictive practices, as the case may be.

**19.20.3** For the purposes of this Clause 19.20, the following terms shall have the meaning hereinafter respectively assigned to them:

(a) **“corrupt practice”** means (i) the offering, giving, receiving, or soliciting, directly or indirectly, of anything of value to influence the actions of any person connected with the Bid process (for avoidance of doubt, offering of employment to or employing or engaging in any manner whatsoever, directly or indirectly, any official of the BPC who is or has been associated or dealt in any manner, directly or indirectly with the Bid process or the Lol or has dealt with matters concerning the RFP Project Documents or arising there from, before or after the execution thereof, at any time prior to the expiry of one year from the date such official resigns or retires from or otherwise ceases to be in the service of the BPC, shall be deemed to constitute influencing the actions of a person connected with the Bid Process); or (ii) engaging in any manner whatsoever, whether during the Bid Process or after the issue of the Lol or after the execution of the RFP Project Documents, as the case may be, any person in respect of any matter relating to the Project or the Lol or the RFP Project Documents, who at any time has been or is a legal, financial or technical adviser of the BPC in relation to any matter concerning the Project;

(b) **“fraudulent practice”** means a misrepresentation or omission of facts or suppression of facts or disclosure of incomplete facts, in order to influence the Bid process;

(c) **“coercive practice”** means impairing or harming, or threatening to impair or harm, directly or indirectly, any person or property to influence any person’s participation or action in the Bid process;

(d) **“undesirable practice”** means (i) establishing contact with any person connected with or employed or engaged by the BPC with the objective of canvassing, lobbying or in any manner influencing or attempting to influence the Bid process; or (ii) having a Conflict of Interest; and

(e) **“restrictive practice”** means forming a cartel or arriving at any understanding or arrangement among Bidders with the objective of restricting or manipulating a full and fair competition in the Bid process;

#### **19.21 Compliance with Law:**

Despite anything contained in this Agreement but without prejudice to Article 12, if any provision of this Agreement shall be in deviation or inconsistent with or repugnant to the provisions contained in the Electricity Act, 2003, or any rules and regulations made there under, such provision shall be deemed to be amended to the extent required to bring it into compliance with the aforesaid relevant provisions as amended from time to time.

IN WITNESS WHEREOF, THE PARTIES HAVE CAUSED THIS AGREEMENT TO BE EXECUTED BY THEIR DULY AUTHORISED REPRESENTATIVES AS OF THE DATE AND PLACE SET FORTH ABOVE.

1. For and on behalf of TSP

.....

[Signature, Name, Designation and Address]

2. For and on behalf of **Central Transmission Utility of India Limited (Nodal Agency)**

.....

[Signature, Name, Designation and Address]

**WITNESSES:**

1. For and on behalf of

: **BPC**

.....

[Signature]

.....

[Insert, Name, Designation and Address of the Witness]

2. For and on behalf of

: **Nodal Agency**

.....

[Signature]

.....

[Insert Name, Designation and Address of the Witness]

# SCHEDULES

## Schedule: 1

### Project Description and Scope of Project

#### a. Description of the Transmission Scheme

Renewable Energy Zones (REZs) were identified by MNRE/SECI with a total capacity of 181.5 GW for likely benefits by the year 2030 in eight states. This includes 75 GW REZ potential in Rajasthan comprising of 15 GW Wind and 60 GW Solar. In this regard, a Comprehensive transmission scheme for evacuation of 75GW RE potential from Rajasthan is already evolved which includes transmission scheme for total evacuation requirement of 7.7GW from Bikaner Complex (Bikaner-II: 3.7 GW, Bikaner-III: 4 GW).

As part of comprehensive system, 765/400/220kV Bikaner -III & 765/400kV Neemrana-II Substations are to be established along with interconnections of Bikaner-III PS with Bikaner (PG)/ Bikaner-II PS through 400kV lines. For further dispersal of power from Bikaner-III PS, 765kV high capacity corridor i.e. Bikaner-III-Neemrana-II -Bareilly (PG) as well as 400kV interconnections with Gurgaon (PG), Sohna Road and Kotputli is also being implemented.

The subject transmission scheme i.e. Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part C involves implementation of Bikaner-III - Neemrana-II 765 kV D/c line (2nd).

Above transmission system was agreed in the 8th CMETS-NR meeting held on 30.06.22, 56th NRPC meeting held on 29.07.22 and 9th National Committee on Transmission (NCT) held on 28.09.22. Subsequently, Ministry of Power, Government of India, vide its Gazette Notification No. CG-DL-E-14012023-241990 dated 13.01.2023 declared establishment of Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part C through tariff based competitive bidding process route as part of "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex)".

## b. Detailed Scope of Work

S. No.	Name of Transmission Element	Scheduled COD in months from Effective Date
1.	Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end <ul style="list-style-type: none"> <li>• 765 kV, 330 MVAR Switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• 765 kV, 330 MVAR Switchable line reactors at Neemrana-II – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Neemrana-II S/s – 2 nos.</li> </ul>	24 Months
2.	2 no. of 765 kV line bays each at Bikaner-III PS & Neemrana-II S/S <ul style="list-style-type: none"> <li>• 765kV line bays - 4 nos. (2 nos. each at Bikaner-III PS &amp; Neemrana-II S/S)</li> </ul>	

**Note:**

- (i) *Developer of Bikaner-III PS & Neemrana-II S/s shall provide space for 2 nos. of 765 kV line bays alongwith space for Switchable line reactor each at Bikaner-III PS & Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2nd).*

## SPECIFIC TECHNICAL REQUIREMENTS FOR TRANSMISSION SYSTEM

### SPECIFIC TECHNICAL REQUIREMENTS FOR TRANSMISSION LINE

- A.1.0 The design, routing and construction of transmission lines shall be in accordance with Chapter V, Part-A of CEA (Technical Standards for Construction of Electrical Plants and Electric Lines) Regulations, as amended from time to time.
- A.2.0 Selection of tower type shall be made as per CEA Regulations, however in case lattice type towers are used, the following shall also be applicable:
- A.2.1 Steel section of grade E 250 and/or grade E 350 as per IS 2062, only are permitted for use in towers, extensions, gantry structures and stub setting templates. For towers in snowbound areas, steel sections shall conform to Grade-C of IS-2062.
- A.2.2 Towers shall be designed as per IS-802:2015, however the drag coefficient of the tower shall be as follows: -
- A.3.0 Transmission Service Provider (TSP) shall adopt any additional loading/design criteria for ensuring reliability of the line, if so desired and /or deemed necessary.

<b>Solidity Ratio</b>	<b>Drag Coefficient</b>
Upto 0.05	3.6
0.1	3.4
0.2	2.9
0.3	2.5
0.4	2.2
0.5 and above	2.0

- A.4.0 Transmission line shall be designed considering wind zones as specified in wind map given in National Building Code 2016, Vol.1. The developer shall also make his own assessment of local wind conditions and frequent occurrences of high intensity winds (HIW) due to thunderstorms, dust-storms, downburst etc. along the line route and wherever required, higher wind zone than that given in wind map shall be considered for tower design for ensuring reliability of line. Further, for transmission line sections passing within a distance of 50 km from the boundary of two wind zones, higher of the two wind zones shall be considered for design of towers located in such sections.
- A.5.0 Selection of reliability level for design of tower shall be as per CEA Regulation (Technical Standards for Construction of Electrical Plants and Electric Lines) Regulations, as amended from time to time.

- A.6.0 A) For power line crossing of 400 kV or above voltage level (if crossed over the existing line) large angle & dead end towers (i.e. D/DD/QD) shall be used on either side of power line crossing.
- B) For power line crossing of 132 kV and 220 kV voltage level, angle towers (B/C/D/DB/DC/DD/ QB/QC/QD) shall be used on either side of power line crossing depending upon the merit of the prevailing site condition and line deviation requirement.
- C) For power line crossing of 66 kV and below voltage level, suspension/tension towers shall be provided on either side of power line crossing depending upon the merit of the prevailing site condition and line deviation requirement.
- D) For crossing of railways, national highways and state highways, the rules/Regulations of appropriate authorities shall be followed.

A.7.0 The relevant conductor configuration shall be as follows: -

Type of conductor: ACSR / AAAC / AL59

Basic parameters:

<b>Transmission line</b>	<b>ACSR Conductor specified</b>	<b>Equivalent AAAC conductor based on 53% conductivity of Al Alloy</b>	<b>Equivalent minimum size of AL59 conductor based on 59% conductivity of AL Alloy*</b>	<b>Sub-conductor Spacing</b>
765 kV D/C (Hexa Zebra) transmission lines	Zebra: Stranding 54/3.18 mm-Al + 7/3.18 mm-Steel, 28.62 mm diameter 428 sq. mm, Aluminium area,  Maximum DC Resistance at 20°C (Ω/km): 0.06868 Minimum UTS: 130.32 kN	Stranding details: 61/3.19mm, 28.71 mm diameter; 487.5 sq.mm Aluminium alloy area Maximum DC Resistance at 20°C (Ω/km) : 0.06815 Minimum UTS: 135.6 kN	Stranding details: 61/3.08mm, 27.72 mm diameter; 454 sq.mm Aluminium alloy area Maximum DC Resistance at 20°C (Ω/km) : 0.0653 Minimum UTS: 108 kN	457 mm

**Note:**

1. *\*To Select any size above the minimum, the sizes mentioned in the Indian standard IS-398(part-6) shall be followed.*
2. *The transmission lines shall have to be designed for a maximum operating conductor temperature of 85 deg C.*

A.8.0 The required phase to phase spacing and horizontal spacing for 765 kV line shall be governed by the tower design as well as minimum live metal clearances for 765 kV voltage level under different insulator swing angles. However, the phase to phase spacing for 765 kV line shall not be less than 15 m.

A.9.0 All electrical clearances including minimum live metal clearance, ground clearance and minimum mid span separation between earth wire and conductor shall be as per Central Electricity Authority (Measures Relating to Safety & Electric Supply) Regulations as amended from time to time and IS:5613. Since these clearances for 765kV are not included in CEA Regulation/ Indian Standard, following values shall be considered:

a) Minimum live metal clearances for 765 kV line:

(i) Under stationary conditions

From tower body: For 765 kV D/C: 6.1 m  
For 765 kV S/C: 5.6 m

(ii) Under swing conditions

Wind pressure Condition	Minimum electrical clearance
a) Swing angle (25°)	4.4 m
b) Swing angle (55°)	1.3 m

b) Minimum ground clearance: 18 m

c) Minimum mid span separation between earthwire and conductor: 9.0 m

A.10.0 Shielding angle shall not exceed 10 degree for 765 kV D/C transmission line.

A.11.0 The Fault current for design of line shall be 50 kA for 1 second for 765 kV.

A.12.0 In case of 765 kV voltage class lines, at least one out of two earth wires shall be OPGW and second earth wire, if not OPGW, shall be either of galvanized standard steel (GSS) or AACSR or any other suitable conductor type depending upon span length and other technical consideration.

- A.13.0 Each tower shall be earthed such that tower footing impedance does not exceed 10 ohms. Pipe type or Counterpoise type earthing shall be provided in accordance with relevant IS. Additional earthing shall be provided on every 7 to 8 km distance at tension tower for direct earthing of both shield wires. If site condition demands, multiple earthing or use of earthing enhancement compound shall be used.
- A.14.0 Pile type foundation shall be used for towers located in river or creek bed or on bank of river having scourable strata or in areas where river flow or change in river course is anticipated, based on detailed soil investigation and previous years' maximum flood discharge of the river, maximum velocity of water, highest flood level, scour depth & anticipated change in course of river based on river morphology data of at least past 20 years to ensure availability and reliability of the transmission line.
- A.15.0 Transmission line route shall be finalized, in consultation with appropriate authorities so as to avoid the habitat zones of endangered species and other protected species. Bird diverters, wherever required, shall be provided on the line.
- A.16.0 A.17.0 The raised chimney foundation is to be provided in areas prone to flooding/water stagnation like paddy field /agricultural field & undulated areas to avoid direct contact of water with steel part of tower. The top of the chimney of foundation should be at least above HFL (High Flood Level) or the historical water stagnation/ logging level (based on locally available data) or above High Tide Level or 500 mm above Natural Ground level (whichever is higher).

### SPECIFIC TECHNICAL REQUIREMENTS FOR SUBSTATION

The proposed augmentation of **Bikaner-III (AIS) substation** and **Neemrana-II (AIS) substation** shall be generally conforming to the requirements of CEA (Technical Standards for Construction of Electrical Plants and Electric Lines) Regulations as amended from time to time. All other CEA Regulations/guidelines as amended upto date and MoP guidelines shall also be followed.

#### **B.1.0 Salient features of Substation Equipment and Facilities**

The design and specification of substation equipment are to be governed by the following factors:

##### **B.1.1 Insulation Coordination**

The system design parameters for substations/switchyards shall be as given below:

S. No	Description of parameters	Extn. of 765 kV Bikaner-III s/s	Extn. of 765 kV Neemrana-II s/s
		765 kV System	765 kV System
1.	System operating voltage	765kV	765kV
2.	Maximum voltage of the system (rms)	800kV	800kV
3.	Rated frequency	50Hz	50Hz
4.	No. of phase	3	3
5.	Rated Insulation levels		
i)	Impulse withstand voltage for (1.2/50 micro sec.) for Equipment other than Transformer and Reactors for Insulator String	2100kVp 2100kVp	2100kVp 2100kVp
ii)	Switching impulse withstand voltage (250/2500 micro sec.) dry and wet	1550kVp	1550kVp
iii)	One minute power frequency dry withstand voltage (rms)	830kV	830kV
6.	Corona extinction voltage	508 kV	508 kV
7.	Max. radio interference voltage for frequency between 0.5 MHz and 2 MHz	2500 micro-volts at 508 kV rms	2500 micro-volts at 508 kV rms
8.	Minimum creepage distance for insulator string/ long rod insulators/ outdoor bushings	24800 mm (31mm/kV)	24800 mm (31mm/kV)
9.	Minimum creepage distance for switchyard equipment	20000 mm (25 mm/kV)	20000 mm (25 mm/kV)
10.	Max. fault current	50 kA	50kA

S. No	Description of parameters	Extn. of 765 kV Bikaner-III s/s	Extn. of 765 kV Neemrana-II s/s
		<b>765 kV System</b>	<b>765 kV System</b>
11.	Duration of fault	1 sec	1 Sec

### B.1.2 Switching Scheme

The switching schemes, as mentioned below, shall be adopted at various voltage levels of substation/switchyard:

Substation	765 kV side
765 kV <b>Bikaner-III</b> S/s Extn	One & half breaker
765 kV <b>Neemrana-II</b> S/s Extn.	One & half breaker

Notes: -

- (i) At 765kV voltage level, each circuit of a double circuit transmission line shall be terminated in different diameters.
- (ii) Connection arrangement of Switchable Line reactors shall be such that it can be used as Line reactor as well as Bus reactor with suitable NGR bypass arrangement.

### B.2.0 Substation Equipment and facilities:

The switchgear shall be designed and specified to withstand operating conditions and duty requirements. All equipment shall be designed considering the following capacity.

S. No	Description of bay	765kV Bikaner-III S/s Extn	765kV Neemrana-II S/s Extn.
		<b>765kV</b>	<b>765kV</b>
1.	Bus Bar	4000A	4000A
2.	Line bay	3150A	3150A
3.	Line Reactor Bay	3150A	3150A

#### B.2.1 Shunt Reactor

110 MVAR,  $765/\sqrt{3}$  kV, 1-Phase Reactor (including arrangement for 3-phase bank formation of 330 MVAR) shall conform to CEA's "Standard Specifications and Technical Parameters for Transformers and Reactors (66 kV and above)" available on CEA website.

**Connection arrangement for utilization of existing Spare 1-phase Shunt Reactor unit:**

TSP shall make the arrangement in such a way that the existing spare unit can be utilized for line reactor banks under present scope without its physical movement.

**Neutral Grounding Reactor and Surge Arrester for 765 kV Line Reactors (as applicable):**

The neutral of the line reactors (wherever provided) shall be grounded through adequately rated Neutral Grounding Reactors (NGR) to facilitate single phase auto-reclosure, provided that the NGR shall be provided with bypass arrangement so that the line reactor can be used as Bus reactor as and when required. The neutral of bus reactor shall be solidly grounded. The ohmic value of NGR for each circuit at both ends of 765kV D/c (2nd) Bikaner-III– Neemrana-II S/s shall be 450 ohms.

NGR shall be oil filled or dry type air core for outdoor application. NGR shall conform to CEA's "Standard specifications and technical parameters of transformers and reactors (66kV and above)". Technical parameters of NGR shall be as specified in Annexure-A of abovementioned document.

The 145 kV surge arrester of suitable rating shall be provided & physically located between the neutral of shunt reactor (brought out at 145kV class bushing) and neutral grounding reactor. The surge arresters shall be of heavy duty station class gapless Metal oxide (ZnO) type conforming in general to IEC-60099-4. Arresters shall be hermetically sealed units, of self-supporting construction, suitable for mounting on structures.

**B.2.3 765 kV Substation equipment (AIS)****B.2.3.1 Circuit Breakers (AIS)**

The circuit breakers and accessories shall conform with IEC: 62271-100, IEC: 62271-1 and shall be of SF6 Type. The circuit breakers shall be of class C2-M2 (as per IEC) with regard to restrike probability during capacitive current breaking and mechanical endurance. The rated break time shall not exceed 40 ms for 765 kV circuit breakers. 765 kV Circuit breakers shall be provided with single phase and three phase auto reclosing. The Circuit breakers controlling 765 kV lines shall be provided either with pre-insertion closing resistor of about 450 ohms maximum with 9 ms minimum insertion time or with Controlled Switching Device. The short line fault capacity shall be same as the rated capacity and this is proposed to be achieved without use of opening resistors. Control switching device shall be provided in Circuit Breaker of

switchable line reactor bay and in Main & Tie bay circuit breakers of line with non-switchable line reactors, Bus reactors and 765/400 kV Transformers.

#### **B.2.3.2 Isolators (AIS)**

The isolators shall comply with IEC 62271-102 in general. 765 kV Isolator design shall be double break or vertical break or knee-type. All Isolators and earth switches shall be motor operated. Earth switches shall be provided at various locations to facilitate maintenance. Isolator rated for 765kV shall be of extended mechanical endurance class-M2 and suitable for bus transfer current switching duty as per IEC-62271-102. Main blades and earth blades shall be interlocked and interlock shall be fail safe type. 765 kV earth switch for line isolator shall be suitable for induced current switching duty as defined for Class-B.

#### **B.2.3.3 Current Transformers (AIS)**

Current Transformers shall comply with IEC 61869 in general. All ratios shall be obtained by secondary taps only. Generally, Current Transformers (CT) for 765 kV shall have six cores (four for protection and two for metering). The burden and knee point voltage shall be in accordance with the requirements of the system including possible feeds for telemetry. Accuracy class for protection core shall be PX and for metering core it shall be 0.2S. The rated burden of cores shall be closer to the maximum burden requirement of metering & protection system (not more than 20 VA for metering core) for better sensitivity and accuracy. The instrument security factor shall be less than 10 for CTs of 765 kV voltage class.

#### **B.2.3.4 Capacitive Voltage Transformers (AIS)**

Capacitive Voltage transformers shall comply with IEC 61869 in general. These shall have three secondaries out of which two shall be used for protection and one for metering. Accuracy class for protection cores shall be 3P and for metering core it shall be 0.2. The Capacitive voltage transformers on lines shall be suitable for Carrier Coupling. The Capacitance of CVT for 765 kV shall be 8800 pF. The rated burden of cores shall be closer to the maximum burden requirement of metering & protection system (not more than 50 VA for metering core) for better sensitivity and accuracy.

#### **B.2.3.5 Surge Arresters (AIS)**

624 kV Station High (SH) duty gapless type Surge arresters with thermal energy (Wth) of minimum 13 kJ/kV conforming to IEC 60099-4 in general shall be provided for 765 kV system. Other characteristics of Surge arrester shall be chosen in accordance with

system requirements. Surge arresters shall be provided near line entrances, transformers & Reactor so as to achieve proper insulation coordination. Surge Arresters shall be provided with porcelain/ polymer housing fitted with pressure relief devices. A leakage current monitor with surge counter shall be provided with each surge arrester.

#### **B.2.4 Protection Relaying & Control System**

The protective relaying system proposed to be provided for transmission lines, auto-transformers, reactors and bus bars to minimize the damage to the equipment in the events of faults and abnormal conditions, is dealt in this section. All main protective relays shall be numerical type with IEC 61850 communication interface and should have interoperability during integration of numerical relays to communicate over IEC61850 protocol with RTU/SAS/IEDs of different OEMs. All numerical relays shall have built in disturbance recording feature.

The protection circuits and relays of transformer and reactor shall be electrically and physically segregated into two groups each being independent and capable of providing uninterrupted protection even in the event of one of the protection groups failing, to obtain redundancy, and to take protection systems out for maintenance while the equipment remains in service.

##### **a) Transmission Lines Protection**

765 kV lines shall have Main-I numerical three zone distance protection scheme with carrier aided inter-tripping feature. 765 kV lines shall also have Main-II numerical distance protection scheme like Main-I but from different make that of Main-I. The Main-I and Main-II protection relays of same make may be provided only if they are of different hardware & manufacturing platform or different principle of operation.

Further, all 765 kV lines shall be provided with single and three phase auto-reclosing facility to allow reclosing of circuit breakers in case of transient faults. These lines shall also be provided with distance to fault locators to identify the location of fault on transmission lines.

All 765 kV lines shall also be provided with two stages over voltage protection. Over voltage protection & distance to fault locator may be provided as in-built feature of Main-I & Main-II protection relays. Auto reclose as built in function of Bay Control Unit (BCU) is also acceptable.

The Main-I and Main-II protection relays shall be fed from separate DC sources and shall be mounted in separate panels.

For 765 kV transmission lines, directional IDMT earth fault relay should be provided as standalone unit or in-built feature of Main-I and Main -II feature.

**b) 765 kV Reactor Protection**

Reactor shall be provided with the following protections:

- i) Numerical Differential protection.
- ii) Numerical Restricted earth fault protection
- iii) Numerical Back-up impedance protection

Besides these, reactors shall also be provided with Buchholz relay, MOG with low oil level alarm, protection against oil and winding temperatures & pressure relief device, etc.

**c) Bus bar Protection**

The high speed low impedance type bus bar differential protection, which is essential to minimize the damage and maintain system stability at the time of bus bar faults, shall be provided for 765 kV buses. Duplicated bus bar protection is envisaged for 765 kV bus-bar protection. Bus bar protection scheme shall be such that it operates selectively for each bus and incorporate necessary features required for ensuring security. The scheme shall have complete bus bar protection for present as well as future bays envisaged i.e. input / output modules for future bays shall also be provided.

In case, the bus section is provided, then each side of bus section shall have separate set of bus bar protection schemes.

For existing substations, the existing bus bar protection shall be augmented as per requirement.

**d) Local Breaker Back up Protection**

This shall be provided for each 765 kV circuit breakers and will be connected to de-energize the affected stuck breaker from both sides.

*Notes:*

1. *LBB & REF relays shall be provided separately from transformer differential relay.*

2. *LBB relay may also be provided as built-in protection function of distributed bus bar protection scheme; however, in such case separate LBB relay shall be provided for tie bays (in case of One and Half breaker scheme).*
3. *Over fluxing & overload protection can be provided as built-in feature of differential relay.*
4. *In 765 kV switchyard, if spare bay of half diameter is identified as future, Tie CB relay panel shall be with Auto-reclosure feature.*

### **B.2.5 Substation Automation System**

- a) For all the new substations, state of art Substation Automation System (SAS) conforming to IEC-61850 shall be provided. The distributed architecture shall be used for Substation Automation system, where the controls shall be provided through Bay control units. The Bay control unit is to be provided bay wise for voltage level 220 kV and above. All bay control units as well as protection units are normally connected through an Optical fibre high speed network. The control and monitoring of circuit breaker, dis-connector, re-setting of relays etc. can be done from Human Machine Interface (HMI) from the control room.

The functions of control, annunciation, disturbance recording, event logging and measurement of electrical parameters shall be integrated in Substation Automation System.

At new substations, the Substation Automation System (SAS) shall be suitable for operation and monitoring of the complete substation including proposed future bays/elements.

In existing substations with Substation automation system (SAS), augmentation of existing SAS shall be done for bays under present scope.

In existing Substations where Substation automation is not provided, control functions shall be done through control panels.

Necessary gateway & modems (as required) shall be provided to send data to RLDC/SLDC as per their requirement. Any augmentation work at RLDC/SLDC is excluded from TSP's scope. However, all the configuration work at substation end required to send data to RLDC/SLDC shall be in the scope of TSP.

#### **b) Time synchronisation equipment**

Time synchronization equipment complete in all respect including antenna, cable, processing equipment required to receive time signal through GPS or from National Physical Laboratory (NPL) through INSAT shall be provided at new substations. This equipment shall be used to synchronize SAS & IEDs etc.

### **B.2.6 Phasor Measurement Units (PMUs)**

TSP shall supply, install & commission required no. of Phasor Measurement Units (PMUs) for all 400 kV and above voltage line bays under the scope of work and PMUs shall support latest IEEE C-37.118 protocols. The supplied PMUs may be mounted in the C&R/SAS panels. These PMUs shall be provided with GPS clock and LAN switch and shall connect with LAN switch of control room with Fibre Optic cable which shall further be interfaced with the FOTE. These PMUs shall be integrated with the existing PDC (Phasor Data Concentrator) located at respective RLDC. Configuration work in existing PDC at RLDC for new PMU integration is not in scope of TSP (shall be done by respective RLDC), however all the necessary co-ordination and support in this regard shall be ensured by TSP.

In case of bay extensions work, TSP shall also provide separate WAMS (PMU, switches, interface cabling and other associated accessories) required for extended bays at existing s/s.

### **B.3.0 Substation Support facilities**

Certain facilities required for operation & maintenance of substations as described below shall be provided at new substation. In existing substation, these facilities have already been provided and would be extended/ augmented as per requirement.

#### **B.3.1 AC & DC power supplies**

For catering the requirements of three phase & single phase AC supply and DC supply for various substation equipment, existing facilities shall be augmented as required.

#### **B.3.2 Fire Fighting System**

Fire-fighting system for substation including transformer & reactor shall conform to CEA (Measures Relating to Safety & Electric Supply) Regulations.

Further, adequate water hydrants and portable fire extinguishers shall be provided in the substations. The main header of firefighting system shall be suitable for extension to bays covered under the future scope; necessary piping interface in this regard shall be provided.

At existing substations, the fire-fighting systems as available shall be extended to meet the additional requirements.

### **B.3.3 Oil evacuating, filtering, testing & filling apparatus**

To monitor the quality of oil for satisfactory performance of transformers, shunt reactors and for periodical maintenance necessary oil evacuating, filtering, testing and filling apparatus would be provided at new substations. Oil storage tanks of adequate capacities for storage of transformer oil would be provided.

### **B.3.4 Illumination**

Normal & emergency AC & DC illumination shall be provided adequately in the switchyard panel room & other buildings of the substation. The switchyard shall also be provided with adequate illumination.

Lighting of the entire switchyard panel room building and other building (if any) and switchyard shall be done by LED based low power consumption luminaries.

### **B.3.5 Control Room**

For new substation, substation control room shall be provided to house substation work stations for station level control (SAS) alongwith its peripheral and recording equipment, AC & DC distribution boards, DC batteries & associated battery chargers, Fire Protection panels, Telecommunication panels & other panels as per requirements. Air conditioning shall be provided in the building as functional requirements. Main cable trenches from the control room shall have adequate space provision for laying of cables from control room for all the future bays also.

At existing substations, the adequacy of size of control room shall be ascertained and the same shall be augmented as per requirement.

### **B.3.7 Control Concept**

All the EHV circuit breakers in substation/switching stations shall be controlled and synchronized from the switchyard control room/remote control center. Each breaker would have two sets of trip circuits which would be connected to separate DC supplies for greater reliability. All the isolators shall have control from remote/local whereas the earth switches shall have local control only.

### **B.3.8 Visual monitoring system (VMS) for watch and ward of substation premises:**

Visual monitoring system for effective watch and ward of substation premises shall cover all the transformers and reactors, all other major AIS Equipment (such as CB, isolators, CT, CVT, SA etc. as applicable), GIS bays, panel room, all the gates of switchyard and all entry and exit points of control room building and accordingly the

location of cameras shall be decided. The camera shall be high definition color CCD camera with night vision feature. The VMS data partly/completely shall be recorded (minimum for 15 days) at least @25fps (or better) and stored on network video recorder. The system shall use video signals from various cameras installed at different locations, process them for viewing on workstations/monitors in the control room and simultaneously record all the cameras.

Mouse/keyboard controllers shall be used for pan, tilt, zoom and other functions of the desired camera. The Visual Monitoring System shall have provision of WAN connectivity for remote monitoring.

All camera recordings shall have Camera ID & location/area of recording as well as date/time stamp. The equipment should generally conform to Electromagnetic compatibility requirement for outdoor equipment in EHV substation.

At existing substations, the visual monitoring system if available shall be augmented as per existing or better specification as required.

#### **B.4.0 General Facilities**

- a) Line Gantry/Towers are envisaged for bays under present scope only. However, for adjacent future line bay, tower shall be designed for extension (considering Quad conductors for 765 kV) wherever applicable.
- b) Bay extension works at existing substation shall be executed by TSP in accordance with the requirement/provisions mentioned above. However, interface points shall be considered keeping in view the existing design/arrangement at the substation.
- c) TSP has to arrange for construction power and water on its own.
- d) All outdoor steel structures including anchor/foundation bolts shall be fully galvanized. The weight of the zinc coating shall be at least 610 gm/sq.m and 900 gm/sq.m for coastal/ creek regions (if applicable).
- e) In 765 kV switchyard, if spare bay of half diameter is identified as future, all the equipment for Tie bay and Future bay shall be designed considering the current rating of line bay i.e. 3150A.

All electrical equipment shall be installed above Highest Flood Level (HFL) and where such equipment is not possible to be installed above HFL, it shall be ensured that there is no seepage or leakage or logging of water.

**B.5.0 EXTENSION OF EXISTING SUBSTATION**

The following drawings/details of existing substation is attached with the RFP documents for further engineering by the bidder.

Sl. No.	Drawing Title	Drawing No./Details	Rev. No.
<b>A.</b>	<b>765kV Bikaner-III s/s</b>		
1.0	Single Line Diagram	Developer yet to be finalized by BPC. The finalization of drawings is in the scope of developer. The same may be availed from the developer on finalization.	
2.0	General Arrangement		
3.0	Earthmat Layout		
4.0	Visual Monitoring System		
5.0	Bus Bar Protection (765kV System)		
6.0	Substation Automation System (SAS)		
<b>B.</b>	<b>765kV Neemrana-II s/s</b>		
1.0	Single Line Diagram	Developer yet to be finalized by BPC. The finalization of drawings is in the scope of developer. The same may be availed from the developer on finalization.	
2.0	General Arrangement		
3.0	Earthmat Layout		
4.0	Visual Monitoring System		
5.0	Bus Bar Protection (765kV System)		
6.0	Substation Automation System (SAS)		

Bidder is also advised to visit the substation sites and acquaint themselves with the topography, infrastructure such as requirement of roads, cable trench, drainage etc. and also the design philosophy.

**SPECIFIC TECHNICAL REQUIREMENTS FOR COMMUNICATION**

The communication requirement shall be in accordance to CEA (Technical Standards for Communication System in Power System Operations) Regulations, 2020, CERC (Communication System for inter-State transmission of electricity) Regulations, 2017, and CEA (Cyber Security in Power Sector) Guidelines, 2021, all above documents as amended from time to time.

The protections for transmission line and the line compensating equipment shall have hundred percent back up communication channels i.e. two channels for tele-protection in addition to one channel for speech plus data for each direction.

In order to meet the requirement for grid management and operation of substations, Transmission Service Provider (TSP) shall provide the following:

**C.1.0 Bikaner-III – Neemrana -II 765 kV D/c line (2<sup>nd</sup>):**

On Bikaner-III – Neemrana-II 765 kV D/c line (2<sup>nd</sup>), TSP shall supply, install & commission one (1) no. OPGW cable containing 24 Fibres (24F) on one E/W peak and conventional earth wire on other E/W peak.

The TSP shall install this OPGW from gantry of Bikaner-III up to the gantry of Neemrana-II S/s with all associated hardware including Vibration Dampers, mid-way & gantry Joint Boxes (called **OPGW Hardware** hereafter) and finally terminate in Joint Boxes at end Substations. The transmission line length is 350 kms (approx.) where repeater/s are required to meet link budget requirement of Bikaner-III – Neemrana-II.

TSP shall finalize the location of repeater station depending upon the actual site conditions. Further TSP shall comply to the requirements mentioned as per **Appendix-D.1**.

**C.2.0 2 no. of 765 kV line bays at Bikaner-III for Bikaner-III – Neemrana-II 765 kV D/c line (2<sup>nd</sup>):**

- (i) TSP shall supply, install & commission 1 no. FODP (72 F or higher ) alongwith panel and required Approach Cable (24F) with all associated hardware fittings from gantry tower to Bay Kiosk and from the Bay Kiosk to Control room.
- (ii) TSP shall supply, install & commission One STM-16 (FOTE) equipment alongwith panel/s supporting minimum three (3) directions with MSP (Multiplex Section Protection – 1+1) with necessary interfaces to meet the voice and data communication requirement between Bikaner-III, Neemrana-II S/s. The suitable DC Power Supply and backup to be provided for communication equipment.

- (iii) FOTE/FODP panel shall be installed in the new Bay Kiosk (Switchyard Panel Room (SPR)). The FOTE under present scope shall be integrated by TSP with the existing/proposed FOTE at control room of **Bikaner-III** S/s which shall be communicating with respective control center. TSP to provide necessary FODP sub rack / Splice trays/ Patch cords etc. and optical interfaces/equipment in the existing FOTE/FODP panels in control room for integration with the existing FOTE for onwards data transmission.

In case spare optical direction is not available in the existing FOTE at the control room, the TSP shall coordinate with station owner to reconfigure the directions in existing FOTE at control room. Alternatively, the TSP may integrate the FOTE under the present scope with FOTE in the nearby Kiosk connected to the control room (if available with spare direction). For this purpose, TSP shall provide necessary FODP sub rack / Splice trays/ Patch cords etc. and suitable optical interfaces/equipment in the existing FOTE/FODP panels in another Kiosk (SPR).

- (iv) FOTE & FODP can be accommodated in same panel to optimize space.
- (v) The new communication equipment under the present scope shall be compatible for integration with existing regional level centralized NMS. The local configuration of the new communication equipment shall be the responsibility of TSP. The configuration work in the existing centralized NMS for integration of new Communication equipment shall be done by Regional ULDC Team, however all the necessary support in this regard shall be ensured by TSP.

The maintenance of all the communication equipment including FOTE, FODP, approach cable, DCPS alongwith Battery Bank shall be the responsibility of TSP.

### **C.3.0 2 no. of 765 kV line bays at Neemrana-II for Bikaner-III – Neemrana-II 765 kV D/c line (2nd)**

- (i) TSP shall supply, install & commission 1 no. FODP (72 F or higher) alongwith panel and required Approach Cable (24F) with all associated hardware fittings from gantry tower to Bay Kiosk and from the Bay Kiosk to Control room.
- (ii) TSP shall supply, install & commission One STM-16 (FOTE) equipment alongwith panel/s supporting minimum three (3) directions with MSP (Multiplex Section Protection – 1+1) with necessary interfaces to meet the voice and data communication requirement between Bikaner-III, Neemrana-II S/s. The suitable DC Power Supply and backup to be provided for communication equipment.

- (iii) FOTE/FODP panel shall be installed in the new Bay Kiosk (Switchyard Panel Room (SPR)). The FOTE under present scope shall be integrated by TSP with the existing/proposed FOTE at control room of **Neemrana-II** S/s which shall be communicating with respective control center. TSP to provide necessary FODP sub rack / Splice trays/ Patch cords etc. and optical interfaces/equipment in the existing FOTE/FODP panels in control room for integration with the existing FOTE for onwards data transmission.

In case spare optical direction is not available in the existing FOTE at the control room, the TSP shall coordinate with station owner to reconfigure the directions in existing FOTE at control room. Alternatively, the TSP may integrate the FOTE under the present scope with existing FOTE in the nearby Kiosk connected to the control room FOTE (if available with spare direction). For this purpose, TSP shall provide necessary FODP sub rack / Splice trays/ Patch cords etc. and suitable optical interfaces/ equipment in the existing FOTE/FODP panels in another Kiosk (SPR).

- (iv) FOTE & FODP can be accommodated in same panel to optimize space.
- (v) The new communication equipment under the present scope shall be compatible for integration with existing regional level centralized NMS. The local configuration of the new communication equipment shall be the responsibility of TSP. The configuration work in the existing centralized NMS for integration of new Communication equipment shall be done by Regional ULDC Team, however all the necessary support in this regard shall be ensured by TSP.

The maintenance of all the communication equipment including FOTE, FODP, approach cable, DCPS alongwith Battery Bank shall be the responsibility of TSP.

## Appendix-D.1

## Repeater Requirements

- If the repeater location is finalized in the Control Room of a nearby substation, TSP shall provide 1 no. OPGW (48F) on a single Earthwire peak with OPGW Hardware & mid-way Joint Boxes etc. of the line crossing the main line and 1 no. Approach Cable (48F) with all associated hardware fittings, to establish connectivity between crossing point of main transmission line up to the repeater equipment in substation control room.

TSP shall co-ordinate for Space & DC power supply sharing for repeater equipment.

TSP shall provide FODP, FOTE (with STM-16 capacity) with suitable interfaces require for link budget of respective link.

OR

- If the repeater location is finalized in the nearby substation premises, the TSP shall identify the Space for repeater shelter in consultation with station owner. Further TSP shall provide 1 no. OPGW (48F) on a single Earthwire peak with OPGW Hardware & mid-way Joint Boxes etc. of the line crossing the main line and 1 no. Approach Cable (48F) / UGFO (48F) with all associated hardware fittings, to establish connectivity between crossing point of main transmission line up to the substation where the repeater shelter is to be housed.

TSP shall provide repeater shelter along with FODP, FOTE (with STM-16 capacity) with suitable interfaces require for link budget of respective link, reliable power supply provisioning for AC and DC supply, battery bank, Air Conditioner and other associated systems.

OR

- If the repeater location is finalized on land near the transmission tower. TSP shall make the provisions for Land at nearby tower for repeater shelter. Further TSP shall provide 1 no. Approach Cable (48F) / UGFO (48F) with all associated hardware fittings to establish connectivity up to the location of repeater shelter.

TSP shall provide repeater shelter along with FODP, FOTE (with STM-16 capacity) with suitable interfaces require for link budget of respective link, reliable power supply provisioning for AC and DC supply, battery bank, Air Conditioner and other associated systems

Maintenance of OPGW Cable and **OPGW Hardware**, repeater equipment & items associated with repeater shelter shall be responsibility of TSP.

Note: Existing Station owner/s to provide necessary support to integrate different equipment & applications of new extended bays with the existing substation e.g. Communication (through FOTE), Voice etc. for smooth operation and monitoring of new added grid elements.

Proposed Communication for Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1), Part-C

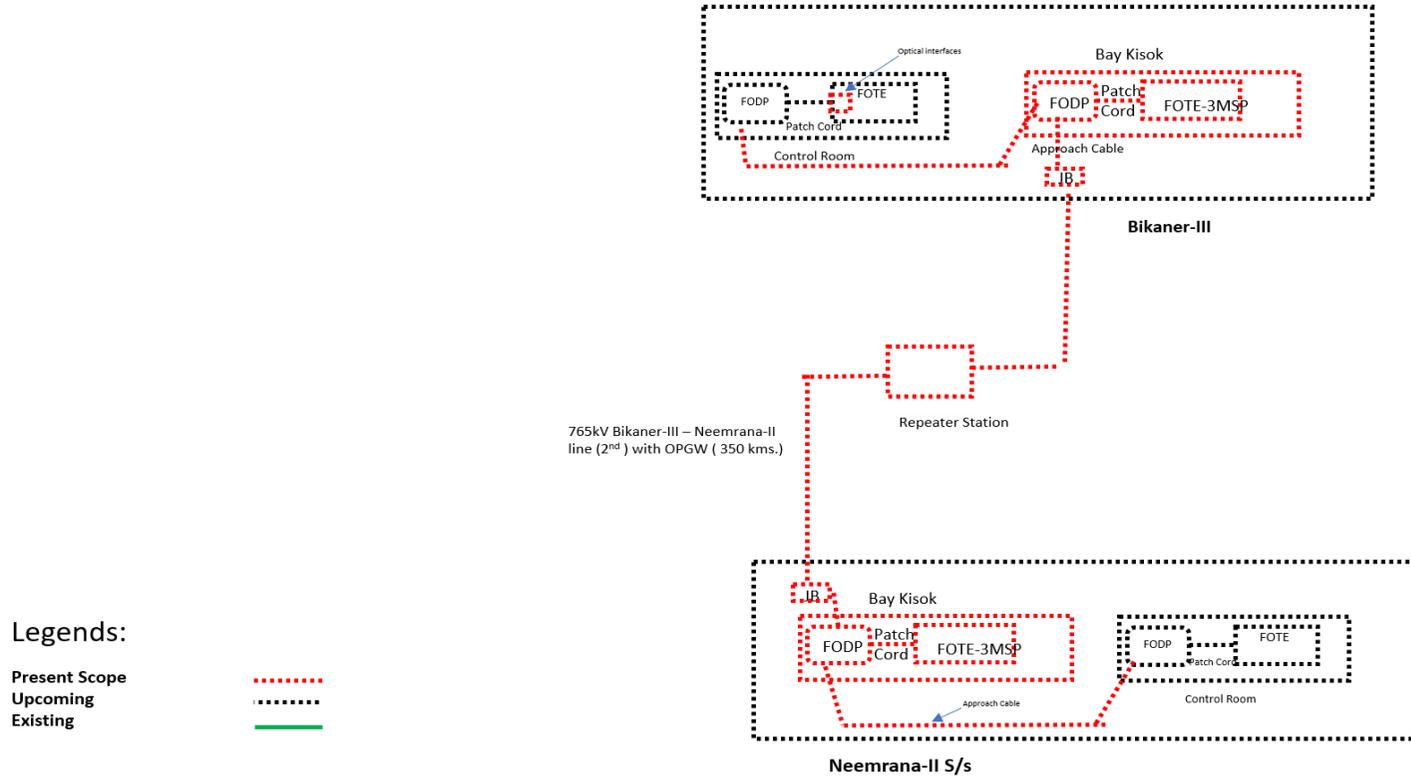


Figure D.1

**C.4.0 PLCC& PABX:**

Power line carrier communication (PLCC) equipment complete for speech, tele-protection commands and data channels shall be provided on each transmission line. The PLCC equipment shall in brief include the following: -

- Coupling device, line traps, carrier terminals, protection couplers, HF cables, PABX (if applicable) and maintenance and testing instruments.
- At new substation, a telephone exchange (PABX) of 24 lines shall be provided at as means of effective communication among various buildings of the substation, remote end substations and with control centres (RLDC/SLDC) etc.
- Coupling devices shall be suitable for phase to phase coupling for 765kV Transmission lines. The pass band of coupling devices shall have sufficient margin for adding communication channel in future if required. Necessary protection devices for safety of personnel and low voltage part against power frequency voltages and transient over voltage shall also be provided.
- The line traps shall be broad band tuned suitable for blocking the complete range of carrier frequencies. Line Trap shall have necessary protective devices such as lightning arresters for the protection of tuning device. Decoupling network consisting of line traps and coupling capacitors may also be required at certain substation in case of extreme frequency congestion.
- The carrier terminals shall be of single side-band (SSB) amplitude modulation (AM) type and shall have 4 kHz band width. PLCC Carrier terminals and Protection couplers shall be considered for both ends of the line.
- PLCC equipment for all the transmission lines covered under the scheme (consisting of one set of analog PLCC channel along with circuit protection coupler and one set of Digital protection coupler for both ends) shall be provided by TSP. CVT & Wave trap for all the line bays under present scope shall be provided by TSP.
- All other associated equipment like cabling, coupling device and HF cable shall also be provided by the TSP.

**Schedule: 2****Scheduled COD**

[Note: As referred to in the definition of “Element”, “Scheduled COD”, and in Articles 3.1.3 (c), 4.1 (b) and 4.3 (a) of this Agreement]

S. No.	Name of the Transmission Element	Scheduled COD	Percentage of Quoted Transmission Charges recoverable on Scheduled COD of the Element of the Project	Element(s) which are pre-required for declaring the commercial operation (COD) of the respective Element
1.	Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end	24 months from SPV transfer	100%	All elements of scheme are required to be commissioned simultaneously as their utilization is dependent on each other.
2.	2 no. of 765 kV line bays each at Bikaner-III PS & Neemrana-II S/s			

**Note:**

- (i) Developer of Bikaner-III PS & Neemrana-II S/s shall provide space for 2 nos. of 765 kV line bays alongwith space for Switchable line reactor each at Bikaner-III PS & Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2nd).

The payment of Transmission Charges for any Element irrespective of its successful commissioning on or before its Scheduled COD shall only be considered after successful commissioning of the Element(s) which are pre-required for declaring the commercial operation of such Element as mentioned in the above table.

Scheduled COD for the Project: 24 Months from Effective Date.

### Schedule: 3

#### Safety Rules and Procedures

[Note: As referred to in Articles 5.6 of this Agreement]

**1: Site Regulations and Safety:**

The TSP shall establish Site regulations within sixty (60) days from fulfilment of conditions subsequent, as per Prudent Utility Practices setting out the rules to be observed till expiry of the Agreement at the Site and shall comply therewith.

Such Site regulations shall include, but shall not be limited to, rules in respect of security, safety of the Project, gate control, sanitation, medical care, and fire prevention, public health, environment protection, security of public life, etc.

Copies of such Site regulations shall be provided to the Nodal Agency and the CEA for the purpose of monitoring of the Project.

**2: Emergency Work:**

In cases of any emergency, the TSP shall carry out all necessary remedial work as may be necessary.

If the work done or caused to be done by any entity, other than the TSP, the TSP shall, reimburse the actual costs incurred, to the other Party carrying out such remedial works.

**3: Site Clearance:**

In the course of execution of the Agreement, the TSP shall keep the Site reasonably free from all unnecessary obstruction, storage, remove any surplus materials, clear away any wreckage, rubbish and temporary works from the Site, and remove any equipment no longer required for execution of the Agreement. After completion of all Elements of the Project, the TSP shall clear away and remove all wreckage, rubbish and debris of any kind from the Site, and shall leave the Site clean and safe.

**4: Watching and Lighting:**

The TSP shall provide and maintain at its own expense all lighting, fencing, and watching when and where necessary for the proper construction, operation, maintenance / repair of any of the Elements of the Project, or for the safety of the owners and occupiers of adjacent property and for the safety of the public, during such maintenance / repair.

## Schedule: 4

### Computation of Transmission Charges

#### 1.1 General

The Monthly Transmission Charges to be paid to the TSP for providing Transmission Service for any Contract Year during the term of the Agreement shall be computed in accordance with this Schedule and paid as per Sharing Regulations.

Illustration regarding payment of Transmission Charges under various scenarios (considering definitions of Contract Year, Expiry Date & Monthly Transmission Charges above) is as below: -

#### **Illustration-1: In case the Project Elements achieve COD as per Schedule**

Quoted Transmission Charges: **Rs. 140 Million**

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	28	1-Feb-2018	1-Feb-2018	25%
Element 2	38	1-Dec-2018	1-Dec-2018	75%

Tariff Payable as follows:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Feb-18 to 31-Mar-18	$140 \times 25\% \times ((28+31)/365)$	5.65		--	0.00
1-Apr-18 to 30-Nov-18	$140 \times 25\% \times (244/365)$	23.39		--	0.00
1-Dec-18 to 31-Mar-19	$140 \times 100\% \times (121/365)$				46.41
2	$140 \times 100\% \times 1$				140
3	$140 \times 100\% \times 1$				140
4	$140 \times 100\% \times 1$				140
5	$140 \times 100\% \times 1$				140
.....					
.....					
36 (1-Apr to 30-Nov)	$140 \times 100\% \times (244/365)$				93.59

**Illustration-2: In case of extension of Scheduled COD as per Article 4.4.1 & 4.4.2 of this Agreement**

Quoted Transmission Charges: **Rs. 140 Million**

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	20	1-Feb-2018	1-Jul-2018	25%
Element 2	28	1-Oct-2018	1-Dec-2018	75%

Tariff Payable as follows:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Feb-18 to 31-Mar-18	--	0.00		--	0.00
1-Apr-18 to 30-Jun-18	--	0.00		--	0.00
1-Jul-18 to 30-Nov-18	140 X 25% X (153/365)	14.67		--	0.00
1-Dec-18 to 31-Mar-19	140 X 100% X (121/365)				46.41
2	140 X 100% X 1				140
3	140 X 100% X 1				140
4	140 X 100% X 1				140
5	140 X 100% X 1				140
.....					
.....					
36 (1-Apr to 30-Nov)	140 X 100% X (244/365)				93.59

**Illustration-3: In case of delay in achieving COD of Project & all individual Elements (COD of the Project achieved in Contract Year 1)**

Quoted Transmission Charges: **Rs. 140 Million**

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	20	1-Feb-2018	1-Dec-2018	25%
Element 2	28	1-Oct-2018	1-Dec-2018	75%

Tariff Payable as follows:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Feb-18 to 31-Mar-18	--	0.00		--	0.00
1-Apr-18 to 30-Sept-18	--	0.00		--	0.00
1-Oct-18 to 30-Nov-18	--	0.00	1-Oct-18 to 30-Nov-18	--	0.00
1-Dec-18 to 31-Mar-19	140 X 100% X (121/365)				46.41
2	140 X 100% X 1				140
3	140 X 100% X 1				140
4	140 X 100% X 1				140
5	140 X 100% X 1				140
.....					
.....					
36 (1-Apr to 30-Nov)	140 X 100% X (244/365)				93.59

**Illustration-4: In case of delay in achieving COD of Project & all individual Elements (COD of the Project achieved in Contract Year other than Contract Year 1)**

Quoted Transmission Charges: **Rs. 140 Million**

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	38	1-Oct-2019	1-May-2020	25%
Element 2	38	1-Oct-2019	1-May-2020	75%

Tariff Payment to be paid as:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Oct-19 to 31-Mar-20	--	0.00	1-Oct-19 to 31-Mar-20	--	0.00
1-Apr-20 to 30-Apr-20	-	0.00	1-Apr-20 to 30-Apr-20	-	0.00
1-May-20 to 31-Mar-21	140 X 100% X (335/365)				128.49
2	140 X 100% X 1				140
3	140 X 100% X 1				140
4	140 X 100% X 1				140
5	140 X 100% X 1				140
.....					
.....					
36 (1-Apr to 30-Apr)	140 X 100% X (30/ 365)				11.51

**Illustration5: In case of delay in achieving COD of Element but Project COD achieved on time**

Quoted Transmission Charges: **Rs. 140 Million**

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	20	1-Feb-2018	1-Jul-2018	25%
Element 2	30	1-Dec-2018	1-Dec-2018	75%

Tariff Payable as follows:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Feb-18 to 31-Mar-18	--	0.00		--	0.00
1-Apr-18 to 30-Jun-18	--	0.00		--	0.00
1-Jul-18 to 30-Nov-18	140 X 25% X (153/365)	14.67		--	0.00
1-Dec-18 to 31-Mar-19	140 X 100% X (121/365)				46.41
2	140 X 100% X 1				140
3	140 X 100% X 1				140
4	140 X 100% X 1				140
5	140 X 100% X 1				140
.....					
.....					
36 (1-Apr to 30-Nov)	140 X 100% X (244/365)				93.59

**Illustration-6: In case of early commissioning of Project**Quoted Transmission Charges: **Rs. 140 Million**

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	38	1-Oct-2019	1-Jul-2019	25%
Element 2	38	1-Oct-2019	1-Jul-2019	75%

Tariff Payment to be paid as:

Transmission Charges for Element 1		Transmission Charges for Element 2	
1-July-19 to 31-Mar-20		$140 \times 100\% \times (274/365)$	105.09
2		$140 \times 100\% \times 1$	140
3		$140 \times 100\% \times 1$	140
4		$140 \times 100\% \times 1$	140
5		$140 \times 100\% \times 1$	140
.....			
.....			
36 (1-Apr to 30-Jun)		$140 \times 100\% \times (91/365)$	34.91

**Illustration-7: In case of early commissioning of an element**Quoted Transmission Charges: **Rs. 140 Million**

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	38	1-Oct-2019	1-Apr-2019	25%
Element 2	38	1-Jul-2019	1-Jul-2019	75%

Tariff Payment to be paid as:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Apr-2019 to 30-Jun-19	140 X 25% X (91/365)	8.72	1-Apr-2019 to 30-Jun-19	--	0.00
1-July-19 to 31-Mar-20	140 X 100% X (274/ 365)				105.09
2	140 X 100% X 1				140
3	140 X 100% X 1				140
4	140 X 100% X 1				140
5	140 X 100% X 1				140
.....					
.....					
36 (1-Apr-30-Jun)	140 X 100% X (91/365)				34.91

The Transmission Charges shall be payable on monthly basis as computed above.

### 1.2 Computation of Monthly Transmission Charges

The Monthly Transmission Charges for any month m in a Contract Year n shall be calculated as below:

For AC System:

- a. If Actual Transmission System Availability for the month m of contract year n is greater than or equal to 98% and less than or equal to 98.5%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * 1$$

- a. If Actual Transmission System Availability for the month m of contract year n exceeds 98.5% and less than or equal to 99.75%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA / 98.5\%)$$

- c. If Actual Transmission System Availability for the month m of contract year n is greater than 99.75%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (99.75\% / 98.5\%)$$

- d. If Actual Transmission System Availability for the month m of contract year n is less than 98% and greater than or equal to 95.00%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA / 98\%)$$

- e. If Actual Transmission System Availability for the month m of contract year falls below 95%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA/ 98\%) - 0.02 * (T_{mn} * (AA/ 95\%))$$

For DC System:

- a. If Actual Transmission System Availability for the month m of contract year n is greater than or equal to 95% and less than or equal to 96%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * 1$$

- b. If Actual Transmission System Availability for the month m of contract year n exceeds 96% and less than or equal to 99.75%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA/ 96\%)$$

- c. If Actual Transmission System Availability for the month m of contract year n is greater than 99.75%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (99.75\% / 96\%)$$

- d. If Actual Transmission System Availability for the month m of contract year n is less than 95% and greater than or equal to 92.00%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA/ 95\%)$$

- e. If Actual Transmission System Availability for the month m of contract year falls below 92%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA/ 95\%) - 0.02 * (T_{mn} * (AA/ 92\%))$$

where:

- AA is the actual Availability, as certified by RPC, as per procedure provided in Schedule 6.
- m is the month in Contract Year 'n'
- $T_{mn}$  = Transmission Charges for the month 'm' in Contract Year 'n' =  $(\text{Transmission Charge} / \text{no. of days in the Year } n) * \text{no. of days in month } m$

Provided, no Transmission Charges shall be paid during the period for which the RLDC has not allowed the operation of the Element/Project due to the failure of the TSP to operate it as per the provisions of the Grid Code.

**1.3 RLDC Fee & Charges**

The payment of RLDC fee & charges, in accordance with relevant regulations of CERC, shall be the responsibility of the TSP.

**Schedule: 5****Quoted Transmission Charges**

[Quoted Transmission Charges from Annexure - 21 of the RFP of the Selected Bidder to be inserted here]

[To be incorporated from the Bid of the Selected Bidder submitted during the e-reverse auction after its selection]

**Quoted Transmission Charges: Rs. .... Million**

**Proportionate Transmission Charges payable for each Element of the Project:**

S. No.	Name of the Transmission Element	Percentage of Quoted Transmission Charges recoverable on Scheduled COD of the Element of the Project
1.	Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end	100%
2.	2 no. of 765 kV line bays each at Bikaner-III PS & Neemrana-II S/s	

## Schedule: 6

### Appendix –II of the Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019 as amended from time to time

#### Procedure for Calculation of Transmission System Availability Factor for a Month

1. Transmission system availability factor for nth calendar month (“TAFPn”) shall be calculated by the respective transmission licensee, got verified by the concerned Regional Load Dispatch Centre (RLDC) and certified by the Member-Secretary, Regional Power Committee of the region concerned, separately for each AC and HVDC transmission system and grouped according to sharing of transmission charges. In case of AC system, transmission System Availability shall be calculated separately for each Regional Transmission System and inter-regional transmission system. In case of HVDC system, transmission System Availability shall be calculated on consolidate basis for all inter-state HVDC system.
2. Transmission system availability factor for nth calendar month (“TAFPn”) shall be calculated by consider following:
  - i) **AC transmission lines:** Each circuit of AC transmission line shall be considered as one element;
  - ii) **Inter-Connecting Transformers (ICTs):** Each ICT bank (three single phase transformer together) shall form one element;
  - iii) **Static VAR Compensator (SVC):** SVC along with SVC transformer shall form one element;
  - iv) **Bus Reactors or Switchable line reactors:** Each Bus Reactors or Switchable line reactors shall be considered as one element;
  - v) **HVDC Bi-pole links:** Each pole of HVDC link along with associated equipment at both ends shall be considered as one element;
  - vi) **HVDC back-to-back station:** Each block of HVDC back-to-back station shall be considered as one element. If associated AC line (necessary for transfer of inter- regional power through HVDC back-to-back station) is not available, the HVDC back-to-back station block shall also be considered as unavailable;
  - vii) **Static Synchronous Compensation (“STATCOM”):** Each STATCOM shall be considered as separate element.
3. The Availability of AC and HVDC portion of Transmission system shall be calculated by considering each category of transmission elements as under:

**TAFMn (in %) for AC system:**

$$= \frac{o \times AV_o + (p \times AV_p) + (q \times AV_q) + (r \times AV_r) + (u \times AV_u)}{(o + p + q + r + u)} \times 100$$

Where,

o	=	Total number of AC lines.
AV <sub>o</sub>	=	Availability of o number of AC lines.
p	=	Total number of bus reactors/switchable line reactors
AV <sub>p</sub>	=	Availability of p number of bus reactors/switchable line reactors
q	=	Total number of ICTs.
AV <sub>q</sub>	=	Availability of q number of ICTs.
r	=	Total number of SVCs.
AV <sub>r</sub>	=	Availability of r number of SVCs
u	=	Total number of STATCOM.
AV <sub>u</sub>	=	Availability of u number of STATCOMs

**TAFMn (in %) for HVDC System:**

$$= \frac{\sum_{x=1}^s C_{xpb}(\text{act}) \times AV_{xpb} + \sum_{y=1}^t C_{ybtb}(\text{act}) \times AV_{ybtb}}{\sum_{x=1}^s C_{xpb} + \sum_{y=1}^t C_{ybtb}} \times 100$$

Where

C <sub>xpb</sub> (act)	=	Total actual operated capacity of x <sup>th</sup> HVDC pole
C <sub>xpb</sub>	=	Total rated capacity of x <sup>th</sup> HVDC pole
AV <sub>xpb</sub>	=	Availability of x <sup>th</sup> HVDC pole
C <sub>ybtb</sub> (act)	=	Total actual operated capacity of y <sup>th</sup> HVDC back-to-back station block
C <sub>ybtb</sub>	=	Total rated capacity of y <sup>th</sup> HVDC back-to-back station block
AV <sub>ybtb</sub>	=	Availability of y <sup>th</sup> HVDC back-to-back station block
s	=	Total no of HVDC poles
t	=	Total no of HVDC Back to Back blocks

4. The availability for each category of transmission elements shall be calculated based on the weightage factor, total hours under consideration and non-available hours for each element of that category. The formulae for calculation of Availability of

each category of the transmission elements are as per **Appendix-III**. The weightage factor for each category of transmission elements shall be considered as under:

- (a) For each circuit of AC line – Number of sub-conductors in the line multiplied by ckt-km;
  - (b) For each HVDC pole- The rated MW capacity x ckt-km;
  - (c) For each ICT bank – The rated MVA capacity;
  - (d) For SVC- The rated MVAR capacity (inductive and capacitive);
  - (e) For Bus Reactor/switchable line reactors – The rated MVAR capacity;
  - (f) For HVDC back-to-back station connecting two Regional grids- Rated MW capacity of each block; and
  - (g) For STATCOM – Total rated MVAR Capacity.
5. The transmission elements under outage due to following reasons shall be deemed to be available:
- i. Shut down availed for maintenance of another transmission scheme or construction of new element or renovation/ upgradation/ additional capitalization in existing system approved by the Commission. If the other transmission scheme belongs to the transmission licensee, the Member Secretary, RPC may restrict the deemed availability period to that considered reasonable by him for the work involved. In case of dispute regarding deemed availability, the matter may be referred to Chairperson, CEA within 30days.
  - ii. Switching off of a transmission line to restrict over voltage and manual tripping of switched reactors as per the directions of concerned RLDC.
6. For the following contingencies, outage period of transmission elements, as certified by the Member Secretary, RPC, shall be excluded from the total time of the element under period of consideration for the following contingencies:
- i) Outage of elements due to acts of God and force majeure events beyond the control of the transmission licensee. However, whether the same outage is due to force majeure (not design failure) will be verified by the Member Secretary, RPC. A reasonable restoration time for the element shall be considered by Member Secretary, RPC and any additional time taken by the transmission licensee for restoration of the element beyond the reasonable time shall be treated as outage time attributable to the transmission licensee. Member Secretary, RPC may consult the transmission licensee or any expert for estimation of reasonable restoration time. Circuits restored through ERS (Emergency Restoration System) shall be considered as available;
  - ii) Outage caused by grid incident/disturbance not attributable to the

transmission licensee, e.g. faults in substation or bays owned by other agency causing outage of the transmission licensee's elements, and tripping of lines, ICTs, HVDC, etc. due to grid disturbance. However, if the element is not restored on receipt of direction from RLDC while normalizing the system following grid incident/disturbance within reasonable time, the element will be considered not available for the period of outage after issuance of RLDC's direction for restoration;

Provided that in case of any disagreement with the transmission licensee regarding reason for outage, same may be referred to Chairperson, CEA within 30 days. The above need to be resolved within two months:

Provided further that where there is a difficulty or delay beyond sixty days, from the incidence in finalizing the recommendation, the Member Secretary of concerned RPC shall allow the outage hours on provisional basis till the final view.

7. Time frame for certification of transmission system availability: (1) Following schedule shall be followed for certification of availability by Member Secretary of concerned RPC:
  - Submission of outage data by Transmission Licensees to RLDC/constituents – By 5th of the following month;
  - Review of the outage data by RLDC / constituents and forward the same to respective RPC– by 20th of the month;
  - Issue of availability certificate by respective RPC – by 3rd of the next month.

## Appendix-III

## FORMULAE FOR CALCULATION OF AVAILABILITY OF EACH CATEGORY OF TRANSMISSION ELEMENTS

For AC transmission system

$$AV_o(\text{Availability of } o \text{ no. of AC lines}) = \frac{\sum_{i=1}^o W_i(T_i - TN_{Ai})/T_i}{\sum_{i=1}^o W_i}$$

$$AV_q(\text{Availability of } q \text{ no. of ICTs}) = \frac{\sum_{k=1}^q W_k(T_k - TN_{Ak})/T_k}{\sum_{k=1}^q W_k}$$

$$AV_r(\text{Availability of } r \text{ no. of SVCs}) = \frac{\sum_{l=1}^r W_l(T_l - TN_{Al})/T_l}{\sum_{l=1}^r W_l}$$

$$AV_p(\text{Availability of } p \text{ no. of Switched Bus reactors}) = \frac{\sum_{m=1}^p W_m(T_m - TN_{Am})/T_m}{\sum_{m=1}^p W_m}$$

$$AV_u(\text{Availability of } u \text{ no. of STATCOMs}) = \frac{\sum_{n=1}^u W_n(T_n - TN_{An})/T_n}{\sum_{n=1}^u W_n}$$

$$AV_{x_{bp}}(\text{Availability of an individual HVDC pole}) = \frac{(T_x - TN_{x_{bp}})}{T_x}$$

$$AV_{y_{btb}}(\text{Availability of an individual HVDC Back-to-back Blocks}) = \frac{(T_y - TN_{Ay})}{T_y}$$

For HVDC transmission system

For the new HVDC commissioned but not completed twelve months;

For first 12 months:  $[(AV_{x_{bp}} \text{ or } AV_{y_{btb}}) \times 95\% / 85\%]$ , subject to ceiling of 95%.

Where,

- $o$  = Total number of AC lines;
- $AV_o$  = Availability of  $o$  number of AC lines;
- $p$  = Total number of bus reactors/switchable line reactors;
- $AV_p$  = Availability of  $p$  number of bus reactors/switchable line reactors;
- $q$  = Total number of ICTs;
- $AV_q$  = Availability of  $q$  number of ICTs;
- $r$  = Total number of SVCs;
- $AV_r$  = Availability of  $r$  number of SVCs;
- $U$  = Total number of STATCOM;

$AV_u$	=	Availability of $u$ number of STATCOMs;
$W_i$	=	Weightage factor for $i$ th transmission line;
$W_k$	=	Weightage factor for $k$ th ICT;
$W_l$	=	Weightage factors for inductive & capacitive operation of $l$ th SVC;
$W_m$	=	Weightage factor for $m$ th bus reactor;
$W_n$	=	Weightage factor for $n$ th STATCOM.
$T_i, , T_k, T_l, , -$ $T_m, T_n, T_x, T_y$		The total hours of $i$ th AC line, $k$ th ICT, $l$ th SVC, $m$ th Switched Bus Reactor & $n$ th STATCOM, $x$ th HVDC pole, $y$ th HVDC back-to-back blocks during the period under consideration (excluding time period for outages not attributable to transmission licensee for reasons given in Para 5 of the procedure)
$T_{NAi}, T_{NAk} -$ $T_{NAL}, T_{NAM},$ $T_{NAl}, T_{NAx}, T_{NAy}$		The non-availability hours (excluding the time period for outages not attributable to transmission licensee taken as deemed availability as per Para 5 of the procedure) for $i$ th AC line, $k$ th ICT, $l$ th SVC, $m$ th Switched Bus Reactor, $n$ th STATCOM, $x$ th HVDC pole and $y$ th HVDC back-to-back block.

**Schedule: 7**

**Entire Bid (both financial bid and technical bid) of the Selected Bidder to be attached here**

## Schedule: 8

### Contract Performance Guarantee

**(To be on non-judicial stamp paper of appropriate value as per Stamp Act relevant to place of execution. Foreign entities submitting Bids are required to follow the applicable law in their country.)**

In consideration of the ..... [Insert name of the SPV or Selected Bidder on behalf of the TSP, or Lead Member in case of the Consortium, with address] agreeing to undertake the obligations under the Transmission Service Agreement dated .....and the other RFP Project Documents and the Nodal Agency and the PFC Consulting Limited, agreeing to execute the *RFP Project Documents* with the Selected Bidder, regarding setting up the Project, the ..... [Insert name and address of the bank issuing the guarantee and address of the head office] (hereinafter referred to as “Guarantor Bank”) hereby agrees unequivocally, irrevocably and unconditionally to pay to ..... (being the Nodal Agency) \_at .....[Insert the Place from the address of the Nodal Agency indicated in the TSA] forthwith on demand in writing from the Nodal Agency\_or any Officer authorized by it in this behalf, any amount up to and not exceeding Rupees ..... Crores (Rs. ....) only [Insert the amount of the bank guarantee] on behalf of M/s. .... [Insert name of the Selected Bidder or SPV].

This guarantee shall be valid and binding on the Guarantor Bank up to and including .....and shall not be terminable by notice or any change in the constitution of the Bank or the term of the Transmission Service Agreement or by any other reasons whatsoever and our liability hereunder shall not be impaired or discharged by any extension of time or variations or alternations made, given, or agreed with or without our knowledge or consent, by or between parties to the respective agreement.

Our liability under this Guarantee is restricted to Rs. .... Crores (Rs. ....) only. Our Guarantee shall remain in force until ..... [Insert the date of validity of the Guarantee as per Article 3.1.2 of this Agreement]. The Nodal Agency, shall be entitled to invoke this Guarantee up to three hundred sixty five (365) days of the last date of the validity of this Guarantee.

The Guarantor Bank hereby expressly agrees that it shall not require any proof in addition to the written demand from ..... (in its roles as the Nodal Agency), made in any format, raised at the above mentioned address of the Guarantor Bank, in order to make the said payment to Nodal Agency.

The Guarantor Bank shall make payment hereunder on first demand without restriction or conditions and notwithstanding any objection by ..... [Insert name of the Selected Bidder], ..... [Insert name of the TSP] and / or any other person. The Guarantor Bank shall not require Nodal Agency to justify the invocation of this BANK GUARANTEE, nor shall the Guarantor Bank have any recourse against Nodal Agency in respect of any payment made hereunder.

**THIS BANK GUARANTEE** shall be interpreted in accordance with the laws of India.

The Guarantor Bank represents that this BANK GUARANTEE has been established in such form and with such content that it is fully enforceable in accordance with its terms as against the Guarantor Bank in the manner provided herein.

**THIS BANK GUARANTEE** shall not be affected in any manner by reason of merger, amalgamation, restructuring, liquidation, winding up, dissolution or any other change in the constitution of the Guarantor Bank.

**THIS BANK GUARANTEE** shall be a primary obligation of the Guarantor Bank and accordingly Nodal Agency shall not be obliged before enforcing this BANK GUARANTEE to take any action in any court or arbitral proceedings against **SPV** or the Selected Bidder, as the case may be, to make any claim against or any demand on **SPV** or the Selected Bidder, as the case may be, or to give any notice to **SPV** or the Selected Bidder, as the case may be, or to enforce any security held by the Nodal Agency or to exercise, levy or enforce any distress, diligence or other process against **SPV** or the Selected Bidder, as the case may be.

The Guarantor Bank acknowledges that this BANK GUARANTEE is not personal to Nodal Agency and may be assigned, in whole or in part, (whether absolutely or by way of security) by Nodal Agency to any entity to whom the Nodal Agency is entitled to assign its rights and obligations under the Transmission Service Agreement.

The Guarantor Bank hereby agrees and acknowledges that Nodal Agency shall have a right to invoke this Bank Guarantee either in part or in full, as it may deem fit.

Notwithstanding anything contained hereinabove, our liability under this Guarantee is restricted to Rs. .... Crores (Rs. ....) only and it

shall remain in force until .....[Date to be inserted on the basis of Article 3.1.2of the Transmission Service Agreement], with an additional claim period of three hundred sixty five (365) days thereafter. This BANK GUARANTEE shall be extended from time to time for such period, as may be desired by ..... [Insert name of the Selected Bidder or Lead Member in case of the Consortium or SPV]. We are liable to pay the guaranteed amount or any part thereof under this Bank Guarantee only if Nodal Agency serves upon us a written claim or demand.

**In witness where of:**

Signature .....

Name: .....

Power of attorney No.: .....

**For:**

..... [Insert Name of the Bank]

**Banker's Seal and Full Address, including mailing address of the Head Office**

## Schedule: 9

### Methodology for determining the Relief Under Force Majeure Event & Change in Law during Construction Period

The relief in the form of revision in tariff due to Force Majeure Event leading to extension of Scheduled COD for a period beyond one hundred eighty (180) days and/ or Change in Law during the construction period shall be as under:

$$\Delta T = [(P \times d)] \div [1 - (1 + d)^{-n}]$$

Where,

$\Delta T$  = Change in Transmission Charges for each year

P = Sum of cumulative increase or decrease in the cost of the Project due to Change in Law and interest cost during construction corresponding to the period exceeding one hundred eighty (180) due to Force Majeure Event leading to extension of Scheduled COD for a period beyond one hundred eighty (180) days

n = number of years over which the Transmission Charges has to be paid

d = Discount rate as notified by the CERC, applicable on the Bid Deadline

The increase in Transmission Charges as stated above shall be applicable only if the value of increase in Transmission Charges as calculated above exceeds 0.30% (zero point three percent) of the quoted Transmission Charges of the TSP.

**PFC Consulting Limited  
(A wholly owned subsidiary of PFC Limited)**

**November 03, 2023**

**Sub: Qualification Status of RFP (Technical) Bids and opening of Initial Offer for establishment of Independent Transmission Project (ITP) “Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): PART-C”.**

With reference to issuance of RFP documents by PFC Consulting Limited (the Bid Process Coordinator), on **March 02, 2023** for selection of Bidder as Transmission Service Provider (TSP) to establish “**Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): PART-C**” and opening of RFP Bids on **October 10, 2023**, the following Bidders have been declared as Qualified Bidders for opening of Initial Offer:

1. Power Grid Corporation of India Limited
2. Sterlite Grid 35 Limited
3. Adani Energy Solutions Limited (Formerly known as Adani Transmission Limited)
4. The Tata Power Company Limited

\*\*\*\*\*



पीएफसी कंसल्टिंग लिमिटेड  
(पावर फाइनेंस कॉर्पोरेशन लिमिटेड की पूर्णतः स्वामित्वाधीन सहायक कम्पनी)  
**PFC CONSULTING LIMITED**  
(A wholly owned subsidiary of Power Finance Corporation Limited)

Ref. No.: 04/22-23/ITP-60/RFP

November 08, 2023

To,  
Mr. Piyush Kumar  
Authorized Signatory  
The Tata Power Company Limited  
Bombay House, 24, Homi Mody Street,  
Mumbai-400001, India

E-mail: [piyushkumar@tatapower.com](mailto:piyushkumar@tatapower.com)

**Subject: Independent Transmission Project "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C" – Regarding submission of original hard copies.**

Dear Sir,

This has reference to the opening of RFP (Financial) Bids-Initial Offer on November 06, 2023 at 16:00 hrs (IST) and subsequent e-Reverse bidding held on November 07, 2023 from 10:00 hrs (IST) onwards. On conclusion of e-Reverse Auction on November 07, 2023 at 20:37 hrs (IST), 'The Tata Power Company Limited' has emerged as bidder with lowest Quoted Transmission Charges during e-bidding stage.

As per the Clause No. 2.5.2 of the RFP document "In addition to the online submission of above formats through the electronic platform, the Bidder with lowest Final Offer will be required to submit original hard copies of Annexure 3, Annexure 4 (if applicable), Annexure 6 (if applicable) and Annexure 14 before issuance of Lol. In case, there is a discrepancy between the online submission and physical documents, the bid would be out rightly rejected and the bidder shall be construed to have engaged in the fraudulent practice as defined in Clause 2.19.3 with consequences as mentioned in Clause 2.19.2."

In view of the above, 'The Tata Power Company Limited' is requested to submit the original hard copies of Annexure 3, Annexure 4 (if applicable), Annexure 6 (if applicable) and Annexure 14 latest by 10.11.2023 at 16:30 hrs (IST) in the office of PFC Consulting Limited.

Thanking you,

Yours faithfully,

(Sanjay Nayak)

General Manager

पंजीकृत कार्यालय : प्रथम तल "ऊर्जानिधि", 1, बाराखम्बा लेन, कनॉट प्लेस, नई दिल्ली-110001

Regd. Office : First Floor, "Urjanidhi", 1, Barakhamba Lane, Connaught Place, New Delhi-110001

कंपनी मुख्यालय: नौवाँ तल (ए विंग) स्टेट्समैन हाउस, कनॉट प्लेस, नई दिल्ली-110001 दूरभाष : 011-23443900 फैक्स : 011-23443990  
Corporate Office : 9th Floor, (A Wing) Statesman House, Connaught Place, New Delhi-110001 Phone : 011-23443900 Fax : 011-23443990

वेबसाइट/Website : [www.pfcclindia.com](http://www.pfcclindia.com) • CIN : U74140DL2008GOI175858

**ANNEXURE P/18****Ref. No: T&D/BD/DOM/FY24/Transmission/PFCCL/036****Date: Nov 08, 2023****To,**

PFC Consulting Limited,  
9th Floor, A-Wing, Statesman House  
Connaught Place, New Delhi - 110001, India

**Kind attention: General Manager****Subject: Transmission Service Provider to establish Inter-State Transmission System for "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C" through tariff based competitive bidding process****Ref: 04/22-23/ITP-60/RFP**

Dear Sir,

This is in reference to the above mentioned letter regarding the submission of the original hard copies of Annexure 3 and Annexure 14 by the bidder, for the subject cited project. May please note that the other mentioned Annexures 4 and 6 are not applicable.

In this regard, we are submitting the required documents as per the desired timeline.

Thanking you,

Piyush Kumar  
Head-Business Development (Transmission)  
E-mail: [piyushkumar@tatapower.com](mailto:piyushkumar@tatapower.com);  
Mob: +91-9971152926

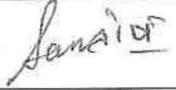
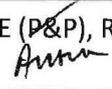
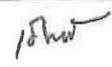
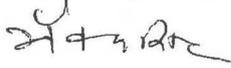
Dated: November 24, 2023

**CERTIFICATE BY THE BID EVALUATION COMMITTEE**

**Subject: Selection of Successful Bidder as Transmission Service Provider to establish "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): PART-C".**

It is hereby certified that:

1. The entire bid process has been carried out in accordance with the "Tariff based Competitive Bidding Guidelines for Transmission Service" and "Guidelines for encouraging competition in development of the Transmission Projects" issued by Ministry of Power, Govt. of India under Section 63 of the Electricity Act, 2003 and as amended from time to time.
2. **The Tata Power Company Limited** emerged as the Successful Bidder after the conclusion of e-reverse bidding process with the lowest Quoted Transmission Charges of **Rs. 1626.59 million per annum.**
3. The quoted tariff is lower than the Levelised Tariff calculated based on CERC norms considering the Capital Cost for the Project '**Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): PART-C**' as assessed by Cost Committee. The quoted tariff discovered through e-reverse bidding process is acceptable.

Name of Committee Member	Signature
Sh. Rajesh Kumar Singh, General Manager, SBI, CCGRO-II, New Delhi - <b>Chairman</b>	
Sh. Santosh Kumar, SE, NRPC- <b>Member</b>	
Sh. V.A. Kale, SE (P&P), RVPNL - <b>Member</b> 	
Sh. Bhanwar Singh Meena, Director (PSE&TD), Central Electricity Authority- <b>Member</b>	
Smt. Manjari Chaturvedi, Director (PSPA-I), Central Electricity Authority, New Delhi - <b>Member</b>	
Sh. Neeraj Singh, Chairman, Bikaner III Neemrana II Transmission Limited, New Delhi - <b>Convener Member</b>	



पीएफसी कंसल्टिंग लिमिटेड  
(पावर फाइनेंस कॉर्पोरेशन लिमिटेड की पूर्णतः स्वामित्वाधीन सहायक कम्पनी)  
**PFC CONSULTING LIMITED**  
(A wholly owned subsidiary of Power Finance Corporation Limited)

Ref. No. 04/22-23/ITP-60/RFP

In Duplicate  
November 29, 2023

To,  
The Tata Power Company Limited  
Bombay House, 24, Homi Mody Street,  
Mumbai 400 001, India  
E-mail: piyushkumar@tatapower.com

Kind Attn.: Mr. Piyush Kumar, Authorized Signatory

Sub: Independent Transmission Project (ITP) "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C" – Letter of Intent

Sir,

We refer to:

1. The Request for Proposal document dated March 02, 2023 issued to 'The Tata Power Company Limited' as regards participation in the international competitive bidding process for Transmission Scheme for "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C", and as amended till the Bid Deadline including all correspondence/ clarifications / amendments exchanged between 'The Tata Power Company Limited' and PFC Consulting Limited in regard thereto (hereinafter collectively referred to as the "Final RFP");
2. The offer of 'The Tata Power Company Limited' by way of a Technical Bid pursuant to (1) above submitted on October 10, 2023 in response to the Final RFP.
3. The offer of 'The Tata Power Company Limited' by way of Financial Bid-Initial Offer submitted on October 10, 2023 in response to the Final RFP.
4. The offer of 'The Tata Power Company Limited' by way of a Financial Bid-Final Offer Submitted during e-Reverse Auction process concluded on November 07, 2023 in response to the Final RFP.
5. The Technical Bid as in (2) above and the Financial Bid as in (3 & 4) above, hereinafter collectively referred to as the "Bid".

This is to inform you that the process of evaluating bids received pursuant to the Final RFP, including the Bid, has been concluded. We are pleased to inform you that your proposal and offer received by way of the "Bid" has been accepted and 'The Tata Power Company Limited' is hereby declared as the Successful Bidder as per Clause 3.6.1 of the Final RFP for the above project and consequently, this Letter of Intent (hereinafter referred to as the "LoI") is being issued.

पंजीकृत कार्यालय : प्रथम तल "ऊर्जानिधि", 1, बाराखम्बा लेन, कर्नाट प्लेस, नई दिल्ली-110001

Regd. Office : First Floor, "Urjanidhi", 1, Barakhamba Lane, Connaught Place, New Delhi-110001

कंपनी मुख्यालय: नौवाँ तल (ए विंग) स्टेट्समैन हाउस, कर्नाट प्लेस, नई दिल्ली-110001 दूरभाष : 011-23443900 फैक्स : 011-23443990

Corporate Office : 9th Floor, (A Wing) Statesman House, Connaught Place, New Delhi-110001 Phone : 011-23443900 Fax : 011-23443990

वैबसाईट/Website : www.pfcclindia.com • CIN : U74140DL2008GO1175858

This Lol is based on the Final RFP and you are requested to please comply with the following:

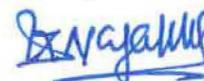
- a) Acknowledging its issuance and unconditionally accepting its contents and recording "Accepted unconditionally" under the signature of your authorized signatory on each page of the duplicate copy of this letter attached herewith, and returning the same to PFC Consulting Limited within seven (07) days of the date of issuance of Lol. This Lol is issued to you in duplicate.
- b) Completion of various activities as stipulated in the Final RFP including in particular Clause 2.15.2, Clause 2.15.3 and Clause 2.15.4 of the Final RFP, within the timelines as prescribed therein.

It may be noted that PFC Consulting Limited has the rights available to them under the Final RFP, including rights under Clause 2.15.5 and Clause 3.6.3 thereof, upon your failure to comply with the aforementioned conditions.

As you are aware, the issuance and contents of this Lol are based on the Bid submitted by you as per the Final RFP including the Transmission charges and other details regarding the Scheduled COD as contained therein. The Quoted Transmission Charges as submitted by you and the Scheduled COD of each transmission Element and the Project as agreed by you in your Bid, as per Annexure -21 and Format-1 of Annexure -8 respectively of the Final RFP is annexed herewith as **Schedule -A** and incorporated herein by way of reference.

Yours sincerely,

For PFC Consulting Limited



(Sanjay Nayak)

General Manager

**Enclosures:** Schedule A – Quoted Transmission Charges and the Scheduled COD of each Transmission Element and the Project submitted in your Bid, as per Annexure 21 and Format-1 of Annexure 8 respectively of the Final RFP

**Copy to:**

1. **Chairman and Managing Director, Power Finance Corporation Limited, "Urjanidhi", 1, Barakhamba Lane, Connaught Lane, New Delhi – 110 001**
2. **Director (Transmission), Ministry of Power, Shram Shakti Bhawan, Rafi Marg, New Delhi-110001**
3. **Chief Engineer (PSPA-I) and Member Secretary (NCT), Central Electricity Authority, 3<sup>rd</sup> Floor, Sewa Bhawan, R.K. Puram, New Delhi – 110066**
4. **Chief Operating Officer (COO), Central Transmission Utility of India Limited (CTUIL), "Saudamini", Plot No. 2, Sector - 29, Gurgaon, Haryana - 122001**
5. **Secretary, Central Electricity Regulatory Commission, 3<sup>rd</sup> & 4<sup>th</sup> Floor, Chanderlok Building, 36, Janpath, New Delhi – 110 001**

1. Quoted Transmission Charges as per Annexure-21-Format For Financial Bid

Quoted Transmission Charges: Rs. 1626.59 million per annum



SCHEDULE – A

(Page 2 of 2)

**2. Scheduled COD of each transmission Element and the Project as per Format 1 of Annexure-8 of RFP**

<b>S. No.</b>	<b>Name of the Transmission Element</b>	<b>Scheduled COD in months from Effective Date</b>	<b>Percentage of Quoted Transmission Charges recoverable on Scheduled COD of the Element of the Project</b>	<b>Element(s) which are pre-required for declaring the commercial operation (COD) of the respective Element</b>
1.	Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end <ul style="list-style-type: none"> <li>• 765 kV, 330 MVAR Switchable line reactors at Bikaner III PS – 2 nos.</li> <li>• 765 kV, 330 MVAR Switchable line reactors at Neemrana-II – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Neemrana-II S/s – 2 nos.</li> </ul>	24 Months	100%	All elements of scheme are required to be commissioned simultaneously as their utilization is dependent on each other.
2.	2 no. of 765 kV line bays each at Bikaner-III PS & Neemrana II S/S <ul style="list-style-type: none"> <li>• 765kV line bays - 4 nos. (2 nos. each at Bikaner-III PS &amp; Neemrana-II S/S)</li> </ul>			



पीएफसी कंसल्टिंग लिमिटेड  
(पावर फाइनेंस कॉर्पोरेशन लिमिटेड की पूर्णतः स्वामित्वाधीन सहायक कम्पनी)  
**PFC CONSULTING LIMITED**  
(A wholly owned subsidiary of Power Finance Corporation Limited)

Ref. No. 04/22-23/ITP-60/RFP

In Duplicate  
November 29, 2023

To,  
The Tata Power Company Limited  
Bombay House, 24, Homi Mody Street,  
Mumbai 400 001, India  
E-mail: piyushkumar@tatapower.com

Kind Attn.: Mr. Piyush Kumar, Authorized Signatory

Sub: Independent Transmission Project (ITP) "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C" – Letter of Intent

Sir,

We refer to:

1. The Request for Proposal document dated March 02, 2023 issued to 'The Tata Power Company Limited' as regards participation in the international competitive bidding process for Transmission Scheme for "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C", and as amended till the Bid Deadline including all correspondence/ clarifications / amendments exchanged between 'The Tata Power Company Limited' and PFC Consulting Limited in regard thereto (hereinafter collectively referred to as the "Final RFP");
2. The offer of 'The Tata Power Company Limited' by way of a Technical Bid pursuant to (1) above submitted on October 10, 2023 in response to the Final RFP.
3. The offer of 'The Tata Power Company Limited' by way of Financial Bid-Initial Offer submitted on October 10, 2023 in response to the Final RFP.
4. The offer of 'The Tata Power Company Limited' by way of a Financial Bid-Final Offer Submitted during e-Reverse Auction process concluded on November 07, 2023 in response to the Final RFP.
5. The Technical Bid as in (2) above and the Financial Bid as in (3 & 4) above, hereinafter collectively referred to as the "Bid".

This is to inform you that the process of evaluating bids received pursuant to the Final RFP, including the Bid, has been concluded. We are pleased to inform you that your proposal and offer received by way of the "Bid" has been accepted and 'The Tata Power Company Limited' is hereby declared as the Successful Bidder as per Clause 3.6.1 of the Final RFP for the above project and consequently, this Letter of Intent (hereinafter referred to as the "LoI") is being issued.

पंजीकृत कार्यालय : प्रथम तल "ऊर्जानिधि", 1, बाराखम्बा लेन, कनॉट प्लेस, नई दिल्ली-110001

Regd. Office : First Floor, "Urjanidhi", 1, Barakhamba Lane, Connaught Place, New Delhi-110001

कंपनी मुख्यालय: नौवीं तल (ए विंग) स्टेट्समैन हाउस, कनॉट प्लेस, नई दिल्ली-110001 दूरभाष : 011-23443900 फैक्स : 011-23443990  
Corporate Office : 9th Floor, (A Wing) Statesman House, Connaught Place, New Delhi-110001 Phone : 011-23443900 Fax : 011-23443990

वेबसाइट/Website : www.pfcclindia.com • CIN : U74140DL2008GOI175858

This Lol is based on the Final RFP and you are requested to please comply with the following:

- a) Acknowledging its issuance and unconditionally accepting its contents and recording "Accepted unconditionally" under the signature of your authorized signatory on each page of the duplicate copy of this letter attached herewith, and returning the same to PFC Consulting Limited within seven (07) days of the date of issuance of Lol. This Lol is issued to you in duplicate.
- b) Completion of various activities as stipulated in the Final RFP including in particular Clause 2.15.2, Clause 2.15.3 and Clause 2.15.4 of the Final RFP, within the timelines as prescribed therein.

It may be noted that PFC Consulting Limited has the rights available to them under the Final RFP, including rights under Clause 2.15.5 and Clause 3.6.3 thereof, upon your failure to comply with the aforementioned conditions.

As you are aware, the issuance and contents of this Lol are based on the Bid submitted by you as per the Final RFP including the Transmission charges and other details regarding the Scheduled COD as contained therein. The Quoted Transmission Charges as submitted by you and the Scheduled COD of each transmission Element and the Project as agreed by you in your Bid, as per Annexure -21 and Format-1 of Annexure -8 respectively of the Final RFP is annexed herewith as **Schedule -A** and incorporated herein by way of reference.

Accepted  
unconditionally



Yours sincerely,

For PFC Consulting Limited

(Sanjay Nayak)

General Manager

**Enclosures:** Schedule A – Quoted Transmission Charges and the Scheduled COD of each Transmission Element and the Project submitted in your Bid, as per Annexure 21 and Format-1 of Annexure 8 respectively of the Final RFP

**Copy to:**

1. **Chairman and Managing Director, Power Finance Corporation Limited, "Urjanidhi", 1, Barakhamba Lane, Connaught Lane, New Delhi – 110 001**
2. **Director (Transmission), Ministry of Power, Shram Shakti Bhawan, Rafi Marg, New Delhi-110001**
3. **Chief Engineer (PSPA-I) and Member Secretary (NCT), Central Electricity Authority, 3<sup>rd</sup> Floor, Sewa Bhawan, R.K. Puram, New Delhi – 110066**
4. **Chief Operating Officer (COO), Central Transmission Utility of India Limited (CTUIL), "Saudamini", Plot No. 2, Sector - 29, Gurgaon, Haryana - 122001**
5. **Secretary, Central Electricity Regulatory Commission, 3<sup>rd</sup> & 4<sup>th</sup> Floor, Chanderlok Building, 36, Janpath, New Delhi – 110 001**

1. Quoted Transmission Charges as per Annexure-21-Format For Financial Bid

Quoted Transmission Charges: Rs. 1626.59 million per annum



Accepted unconditionally



SCHEDULE – A

(Page 2 of 2)

**2. Scheduled COD of each transmission Element and the Project as per Format 1 of Annexure-8 of RFP**

S. No.	Name of the Transmission Element	Scheduled COD in months from Effective Date	Percentage of Quoted Transmission Charges recoverable on Scheduled COD of the Element of the Project	Element(s) which are pre-required for declaring the commercial operation (COD) of the respective Element
1.	<p>Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end</p> <ul style="list-style-type: none"> <li>• 765 kV, 330 MVAR Switchable line reactors at Bikaner III PS – 2 nos.</li> <li>• 765 kV, 330 MVAR Switchable line reactors at Neemrana-II – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Neemrana-II S/s – 2 nos.</li> </ul>	24 Months	100%	All elements of scheme are required to be commissioned simultaneously as their utilization is dependent on each other.
2.	<p>2 no. of 765 kV line bays each at Bikaner-III PS &amp; Neemrana II S/S</p> <ul style="list-style-type: none"> <li>• 765kV line bays - 4 nos. (2 nos. each at Bikaner-III PS &amp; Neemrana-II S/S)</li> </ul>			

Accepted unconditionally.







**पीएफसी कंसल्टिंग लिमिटेड**  
(पावर फाइनेंस कॉर्पोरेशन लिमिटेड की पूर्णतःस्वामित्वाधीन सहायक कम्पनी)  
**PFC CONSULTING LIMITED**  
(A wholly owned subsidiary of Power Finance Corporation Limited)  
CIN U74140DL2008GOI175858

Ref. No. 04/22-23/ITP-60/RFP

December 27, 2023

To,

The Tata Power Company Limited  
Bombay House, 24, Homi Mody Street,  
Mumbai-400001, India

Email: [piyushkumar@tatapower.com](mailto:piyushkumar@tatapower.com)

Kind Attn.: Mr. Piyush Kumar, Authorized Signatory

**Sub: Independent Transmission Project "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C" – Regarding extension of Lol.**

Dear Sir,

This is with reference to Letter of Intent (Lol) issued on November 29, 2023 for establishment of subject transmission scheme. The Clause No. 2.15.2 of the RFP document stipulates that within ten (10) days of the issue of the Lol the selected bidder shall complete all the activities including the acquisition of SPV.

As the SPV is being transferred on December 27, 2023, the last date for completion of various activities under Clause No. 2.15.2 of the RFP document is extended from December 09, 2023 (10 days from Lol) to December 27, 2023.

Thanking you,

Yours faithfully,

(Sanjay Nayak)  
General Manager

पंजीकृत कार्यालय : प्रथम तल "ऊर्जानिधि" , 1, बाराखम्बा लेन, कर्नाट प्लेस, नई दिल्ली-110001

Regd. Office : First Floor, "Urjanidhi" , 1, Barakhamba Lane, Connaught Place, New Delhi-110001

कंपनी मुख्यालय: नौवां तल (ए विंग) स्टेट्समैन हाउस, कर्नाट प्लेस, नई दिल्ली-110001 दूरभाष : 011-23443900 फ़ैक्स : 011-23443990

Corporate Office : 9th Floor (A Wing) Statesman House, Connaught Place, New Delhi-110001 Phone : 011-23443900 Fax : 011-23443990

ई-मेल/E-mail : [pfcconsulting@pfcindia.com](mailto:pfcconsulting@pfcindia.com) वैबसाईट/Website : [www.pfcclindia.com](http://www.pfcclindia.com)



Date: 22-12-2023  
Ref: 0393NDLG00170924

To,  
ED (BCD, REGULATORY AND LEGAL) CENTRAL TRANSMISSION UTILITY OF INDIA LTD.  
SAUDAMINI, 1ST FLOOR, PLOT NO.2  
SECTOR 29,

GURUGRAM  
HARYANA  
INDIA  
122001

Sub: Issuance of Bank Guarantee

Dear Sir/Madam,

Please find enclosed Bank Guarantee issued by ICICI Bank Limited ("ICICI Bank") favoring yourself on behalf of: THE TATA POWER COMPANY LTD, FCOE,42 KISHANLAL MARWAH,ROAD,, OFF SAKI VIHAR ROAD,ANDHERI EAST, , MUMBAI, MAHARASHTRA, INDIA, 400072 ("Bank Guarantee") with the tenor and claim period as requested by you. For ease of reference the details have been reproduced as below:

Bank Guarantee No. & Date of Issue	Expiry Date	Claim Expiry Date	Currency	Amount of Bank Guarantee
0393NDLG00170924 22-12-2023	27-03-2026	27-03-2027	INR	42,00,00,000.00

We confirm that the officials who have signed the above Bank Guarantee are authorized to sign such documents on behalf of ICICI Bank. You may verify genuineness of the Bank Guarantee by writing to us at [bgconfirmation@icicibank.com](mailto:bgconfirmation@icicibank.com) for receiving the confirmation over email.

Alternatively, you may also write to the following address to verify the genuineness of the BG :

ICICI Bank Limited, Trade Finance Operations Group,  
ICICI Bank Towers, Survey No.115/27, Tower 3, South Wing, 6th Floor,  
Plot No. 12, Nanakramguda, Serilingampally, Hyderabad - 500032, Telangana

In the event of invocation, we request you to please ensure compliance with the terms and conditions of the Bank Guarantee in order to ensure timely payment. You are requested to ensure special care inter alia with respect to the following in the invocation claim letter -

- Bank Guarantee Number
- Expiry/Claim Expiry date
- Claim Amount
- Designated Bank branch for submission of invocation claim
- Any declaration / certification that may be required as part of the guarantee text.
- Any other requisite document including the original Bank Guarantee.

Please note that ICICI Bank shall not be liable under the Bank Guarantee post expiry of the claim period as requested by you.

Thanking you,

Yours faithfully,

*Deepali*

For ICICI Bank Limited  
Authorized Signatory

**DEEPALI GUPTA**  
Deputy Manager-II : 453822

**ICICI Bank Limited**  
9A, Phelps Building,  
2nd Floor, Connaught Place,  
New Delhi - 110 001,  
Delhi, India.

Website [www.icicibank.com](http://www.icicibank.com)  
CIN :L65190GJ1994PLC021012

Regd. Office : ICICI Bank Tower, Near Chakli Circle,  
Old Padra Road, Vadodara 390 007,  
India.  
Corp. Office : ICICI Bank Towers, Bandra-Kurla  
Complex, Mumbai 400051, India.



Sr.No. 1296411  
 BG Number: 0393NDLG00170924  
 Issuance Date: December 22, 2023

**BANK GUARANTEE**  
**ICICI Bank Limited**  
 (Incorporated in India)



1 CONTRACT PERFORMANCE GUARANTEE

2 To,  
 3 ED (BCD, Regulatory and Legal)  
 4 The Central Transmission Utility of India Limited,  
 5 "Saudamini", 1st Floor,  
 6 Plot No. 2, Sector-29,  
 7 Gurugram-122001, Haryana

8 In consideration of M/s The Tata Power Company Limited Bombay House, 24, Homi Mody  
 9 Street, Mumbai - 400001 (the Selected Bidder) agreeing to undertake the obligations under  
 10 the Transmission Service Agreement to be executed on 27th December 2023 and the other  
 11 RFP Project Documents and the Central Transmission Utility of India Ltd. and PFC Consulting  
 12 Limited, agreeing to execute the RFP Project Documents with the Selected Bidder, regarding  
 13 setting up the Project, We ICICI Bank Ltd having Registered Office at ICICI Bank Tower, Near  
 14 Chakli Circle, Old Padra Road, Vadodara- 390 007 and having a branch at ICICI Bank Ltd,  
 15 ICICI Centre, 163, H.T. Parekh Marg, Backbay Reclamation, Churchgate, Mumbai -400020  
 16 (hereinafter referred to as "Guarantor Bank") hereby agrees unequivocally, irrevocably and  
 17 unconditionally to pay to the Central Transmission Utility of India Ltd. at The Central  
 18 Transmission Utility of India Limited, "Saudamini", 1st Floor, Plot No. 2, Sector-29,  
 19 Gurugram-122001, Haryana forthwith on demand in writing from the Central Transmission  
 20 Utility of India Ltd. or any Officer authorized by it in this behalf, any amount up to and not  
 21 exceeding Rs.42,00,00,000/- (Rupees Forty Two Crore Only) on behalf of M/s The Tata Power  
 22 Company Limited

23 This guarantee shall be valid and binding on the Guarantor Bank up to and including  
 24 27.03.2026 and shall not be terminable by notice or any change in the constitution of the Bank  
 25 or the term of the Transmission Service Agreement or by any other reasons whatsoever and  
 26 our liability hereunder shall not be impaired or discharged by any extension of time or  
 27 variations or alternations made, given, or agreed with or without our knowledge or consent,  
 28 by or between parties to the respective agreement.

29 Our liability under this Guarantee is restricted to Rs.42,00,00,000/- (Rupees Forty Two Crore  
 30 Only). Our Guarantee shall remain in force until 27.03.2026. The Central Transmission Utility  
 31 of India Ltd. shall be entitled to invoke this Guarantee up to three hundred sixty five (365)  
 32 days of the last date of the validity of this Guarantee, i.e., 27.03.2027

Page 1 of 3

For ICICI Bank Limited  
  
 Authorised Signatory  
 Transaction Banking, 9A, C.P., N.D.-1

**SUYASH ANAND**  
 M-I A-3734

**VAIBHAV SOLANKI**  
 Deputy Manager-I : 878134

**The beneficiary may, in its own interest, verify the genuineness of the bank guarantee by seeking confirmation of its issuance from a branch of ICICI Bank other than the issuing branch.**

Regd. Office: ICICI Bank Ltd., ICICI Bank Tower, Near Chakli Circle, Old Padra Road, Vadodara, Pin code- 390 007, Gujarat  
 Phone : +91-265-6722286, CIN L65190GJ1994PLC021012

Sr.No. 1296412  
 BG Number: 0393NDLG00170924  
 Issuance Date: December 22, 2023

**BANK GUARANTEE**  
**ICICI Bank Limited**  
 (Incorporated in India)



33 The Guarantor Bank hereby expressly agrees that it shall not require any proof in addition to  
 34 the written demand from the Central Transmission Utility of India Ltd., made in any format,  
 35 raised at the ICICI Bank Ltd, 9A, Phelps Building, Inner Circle, Connaught Place, New Delhi  
 36 110001(Place of invocation), in order to make the said payment to the Central Transmission  
 37 Utility of India Ltd..

38 The Guarantor Bank shall make payment hereunder on first demand without restriction or  
 39 conditions and notwithstanding any objection by Bikaner III Neemrana II Transmission  
 40 Limited, M/s The Tata Power Company Limited, and/or any other person. The Guarantor Bank  
 41 shall not require the Central Transmission Utility of India Ltd. to justify the invocation of this  
 42 BANK GUARANTEE, nor shall the Guarantor Bank have any recourse against the Central  
 43 Transmission Utility of India Ltd. in respect of any payment made hereunder.  
 44 This BANK GUARANTEE shall be interpreted in accordance with the laws of India.

45 The Guarantor Bank represents that this BANK GUARANTEE has been established in such  
 46 form and with such content that it is fully enforceable in accordance with its terms as against  
 47 the Guarantor Bank in the manner provided herein.

48 This BANK GUARANTEE shall not be affected in any manner by reason of merger,  
 49 amalgamation, restructuring, liquidation, winding up, dissolution or any other change in the  
 50 constitution of the Guarantor Bank.

51 This BANK GUARANTEE shall be a primary obligation of the Guarantor Bank and accordingly  
 52 the Central Transmission Utility of India Ltd. shall not be obliged before enforcing this BANK  
 53 GUARANTEE to take any action in any court or arbitral proceedings against Bikaner III  
 54 Neemrana II Transmission Limited or the The Tata Power Co. Ltd., to make any claim against  
 55 or any demand on Bikaner III Neemrana II Transmission Limited or the The Tata Power Co.  
 56 Ltd., or to give any notice to Bikaner III Neemrana II Transmission Limited or the The Tata  
 57 Power Co. Ltd., as the case may be, or to enforce any security held by the Central  
 58 Transmission Utility of India Ltd. or to exercise, levy or enforce any distress, diligence or other  
 59 process against Bikaner III Neemrana II Transmission Limited or the The Tata Power Co. Ltd.,  
 60 as the case may be.

61 The Guarantor Bank acknowledges that this BANK GUARANTEE is not personal to the Central  
 62 Transmission Utility of India Ltd. and may be assigned, in whole or in part, (whether  
 63 absolutely or by way of security) by Central Transmission Utility of India Ltd. to any entity to  
 64 whom the Central Transmission Utility of India Ltd. is entitled to assign its rights and  
 65 obligations under the Transmission Service Agreement.

Page 2 of 3

For ICICI Bank Limited  
  
 Authorised Signatory  
 Transaction Banking, 9A, C.P., N.D.-1

**SUYASH ANAND**  
 M-I A-3734

**VAIBHAV SOLANKI**  
 Deputy Manager-I : 878134

**The beneficiary may, in its own interest, verify the genuineness of the bank guarantee by seeking confirmation of its issuance from a branch of ICICI Bank other than the issuing branch.**

Regd. Office: ICICI Bank Ltd., ICICI Bank Tower, Near Chakli Circle, Old Padra Road, Vadodara, Pin code- 390 007, Gujarat  
 Phone : +91-265-6722286, CIN L65190GJ1994PLC021012

Sr.No. 1296413  
 BG Number: 0393NDLG00170924  
 Issuance Date: December 22, 2023

**BANK GUARANTEE**  
**ICICI Bank Limited**  
 (Incorporated in India)



66 The Guarantor Bank hereby agrees and acknowledges that the Central Transmission Utility of  
 67 India Ltd. shall have a right to invoke this Bank Guarantee either in part or in full, as it may  
 68 deem fit.

69 Notwithstanding anything contained hereinabove, our liability under this Guarantee is  
 70 restricted to Rs.42,00,00,000/- (Rupees Forty Two Crore Only) and it shall remain in force until  
 71 27.03.2026, with an additional claim period of three hundred sixty five (365) days thereafter,  
 72 i.e.,27.03.2027. This BANK GUARANTEE shall be extended from time to time for such period,  
 73 as may be desired by M/s The Tata Power Company Limited. We are liable to pay the  
 74 guaranteed amount or any part thereof under this Bank Guarantee only if the Central  
 75 Transmission Utility of India Ltd. serves upon us a written claim or demand at ICICI Bank Ltd,  
 76 9A, Phelps Building, Inner Circle, Connaught Place, New Delhi 110001

77 FOR ICICI BANK LTD.

78 Authorized Signatories

79	Signature _____	Signature _____
80	Name <u>For ICICI Bank Limited</u>	Name <u>For ICICI Bank Limited</u>
81	Signature Code _____	Signature Code _____
82	Bank Seal <u>Authorized Signatory</u>	Bank Seal <u>Authorized Signatory</u>

Transaction Banking, 9A, C.P., N.D.-1

**SUYASH ANAND**  
 M-I A-3734

**VAIBHAV SOLANKI**  
 Deputy Manager-I : 878134

**BENEFICIARY COPY**

**The beneficiary may, in its own interest, verify the genuineness of the bank guarantee by seeking confirmation of its issuance from a branch of ICICI Bank other than the issuing branch.**

Regd. Office: ICICI Bank Ltd., ICICI Bank Tower, Near Chakli Circle, Old Padra Road, Vadodara, Pin code- 390 007, Gujarat  
 Phone : +91-265-6722286, CIN L65190GJ1994PLC021012

**Atre Hemant**

**From:** Finance Dept, PFCCL <finance.pfcl@pfcindia.com>  
**Sent:** 26 December 2023 17:40  
**To:** Atre Hemant; Project In-charge, ITP  
**Cc:** Deepak Kumar; Kumar Piyush; Srivastava Neeraj; Sawant Pradeep; Megha Bansal  
**Subject:** RE: Independent Transmission Project (ITP) "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C" – Regarding Transfer of SPV

[EXTERNAL sender, Exercise caution..!]

Dear Sir,

The amount as per trail mail has been received by PFCCL.

Regards,  
PFCCL (F&A)

---

**From:** Atre Hemant [mailto:haatre@tatapower.com]  
**Sent:** 26 December 2023 17:00  
**To:** Project In-charge, ITP; Finance Dept, PFCCL  
**Cc:** Deepak Kumar; Kumar Piyush; Srivastava Neeraj; Sawant Pradeep  
**Subject:** RE: Independent Transmission Project (ITP) "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C" – Regarding Transfer of SPV

This email is originated from outside your organization. Exercise caution when opening attachments or clicking links, esp

Acquisition price as per trailing mail is transferred. UTR number is shared herewith. Please confirm receipt.

PFB UTR Number

0040069344-26 12 2023-HD763HD763	(170,157,791.00)	26/12/2023	N360232800148090
----------------------------------	------------------	------------	------------------

Regards,  
Hemant Arun Atre  
Group Head-Electrical  
The Tata Power Company Limited, Dharavi Receiving Station, Near Shalimar Industrial Estate,  
Matunga, Mumbai 400 019, Maharashtra, India  
Tel: 022-67173424 Mobile: 9223311432




---

**From:** Project In-charge, ITP <pfcl.itp@pfcindia.com>  
**Sent:** Friday, December 22, 2023 7:35 PM  
**To:** Atre Hemant <haatre@tatapower.com>

**TRANSMISSION SERVICE AGREEMENT**

**FOR**

**DEVELOPMENT AND OPERATION OF INTER-STATE  
TRANSMISSION SYSTEM**

**FOR TRANSMISSION OF ELECTRICITY THROUGH TARIFF  
BASED COMPETITIVE BIDDING FOR**

**TRANSMISSION SYSTEM FOR EVACUATION OF POWER  
FROM RAJASTHAN REZ PH-IV (PART-1) (BIKANER  
COMPLEX): PART-C**

**BETWEEN THE**

**CENTRAL TRANSMISSION UTILITY OF INDIA LIMITED  
(NODAL AGENCY)**

**AND**

**BIKANER III NEEMRANA II TRANSMISSION LIMITED**

December 27<sup>th</sup> 2023



## Transmission Service Agreement

## CONTENTS

1	Definitions and Interpretations .....	5
2	Effectiveness and Term of Agreement .....	18
3	Conditions Subsequent .....	20
4	Development of the Project .....	24
5	Construction of the Project.....	28
6	Connection and commissioning of the Project.....	33
7	Operation and Maintenance of the Project.....	38
8	Availability of the project.....	39
9	Insurances .....	40
10	Billing And Payment of Transmission Charges.....	42
11	Force Majeure .....	43
12	Change in Law .....	48
13	Events of Default and Termination.....	51
14	Liability and Indemnification .....	56
15	Assignments and Charges .....	62
16	Governing Law and Dispute Resolution.....	64
17	Representation and Warranties .....	66
18	Independent Engineer .....	68
19	Miscellaneous Provisions.....	70



Central Transmission Utility of India Limited

2 Bikaner III Neemrana II Transmission Limited

Bond



Indian Non Judicial Stamp  
Haryana Government



Date :13/12/2023

Certificate No. G0M2023L4786

Stamp Duty Paid : ₹ 101  
(Rs. Only)

GRN No. 110487533

Penalty : ₹ 0  
(Rs. Zero Only)**Deponent**

Name: Central Transmission utility of India Ltd

H.No/Floor : 2

Sector/Ward : 29

Landmark : Na

City/Village : Gurugram

District : Gurugram

State : Haryana

Phone : 98\*\*\*\*\*10



Purpose : ARTICLE 5 GENERAL AGREEMENT to be submitted at Concerned office

**THIS TRANSMISISON SERVICE AGREEMENT** (hereinafter referred to as "TSA" or "Agreement" or "the Agreement" or "this Agreement") is made on the ..... [Insert day] of..... [Insert month] of Two Thousand and..... [Insert Year]

**BETWEEN:**

The **Central Transmission Utility of India Limited**, "Saudamini", 1st Floor, Plot No. 2, Sector-29, Gurugram-122001, Haryana acting as a Nodal Agency (referred to as the "Nodal Agency"), which expression shall unless repugnant to the context or meaning thereof include its successors, and permitted assigns) as Party of the one part;

**AND**

**Bikaner III Neemrana II Transmission Limited**, incorporated under the Companies Act, 2013, having its registered office at First Floor, Urjanidhi, 1 Barakhamba Lane Cannought Place, New Delhi, Delhi Central Delhi DL 110001 (herein after referred to as "Transmission Service Provider" or "TSP" or "ISTS Licensee", which expression shall unless repugnant to the context or meaning thereof include its successors, and permitted assigns) as Party of the other part;

("Nodal Agency" and "TSP" are individually referred to as "Party" and collectively as the "Parties")



Central Transmission Utility of India Limited

3

Bikaner III Neemrana II Transmission Limited

| December, 2023

## Transmission Service Agreement

**AND WHEREAS:**

- A) In accordance with the Bidding Guidelines, the Bid Process Coordinator (hereinafter referred to as BPC) had initiated a competitive e-reverse bidding process through issue of RFP for selecting a Successful Bidder to build, own, operate and transfer the Project comprising of the Elements mentioned in Schedule 1 (hereinafter referred to as the Project)
- B) Pursuant to the said e-reverse bidding process, the BPC has identified the Successful Bidder, who will be responsible to set up the Project on build, own, operate and transfer basis to provide Transmission Service in accordance with the terms of this Agreement and the Transmission License.
- C) The Selected Bidder have submitted the Contract Performance Guarantee and acquired one hundred percent (100%) of the equity shareholding of Bikaner III Neemrana II Transmission Limited, along with all its related assets and liabilities in terms of the provisions of the Share Purchase Agreement.
- D) The TSP has agreed to make an application for a Transmission License to the Commission for setting up the Project on build, own, operate and transfer basis.
- E) The TSP has further agreed to make an application to the Commission for the adoption of the Transmission Charges under Section 63 of the Electricity Act, 2003, along with a certification from the Bid Evaluation Committee in accordance with the Bidding Guidelines issued by Ministry of Power, Government of India.
- F) The TSP has agreed to execute the agreement(s) required, if any, under Sharing Regulations within fifteen (15) days from the date of grant of Transmission License from the Commission.
- G) The TSP agrees to the terms and conditions laid down under Sharing Regulations, for making available the ISTS and charge the Transmission Charges in accordance with the terms and conditions of Sharing Regulations.
- H) The billing, collection and disbursement of the Transmission Charges by the CTU to the ISTS Licensee shall be governed as per Sharing Regulations.
- I) The terms and conditions stipulated in the Transmission License issued by the Commission to the TSP shall be applicable to this Agreement and the TSP agrees to comply with these terms and conditions. In case of inconsistency between the Transmission License terms & conditions and the conditions of this Agreement, the conditions stipulated in the Transmission License granted by the Commission shall prevail.



Central Transmission Utility of India Limited

4

Bikaner III Neemrana II Transmission Limited

Transmission Service Agreement

NOW, THEREFORE, IN CONSIDERATION OF THE PREMISES AND MUTUAL AGREEMENTS, COVENANTS AND CONDITIONS SET FORTH HEREIN, IT IS HEREBY AGREED BY AND BETWEEN THE PARTIES HERETO AS FOLLOWS:



Central Transmission Utility of India Limited

5

Bikaner III Neemrana II Transmission Limited

**ARTICLE: 1****1. DEFINITIONS AND INTERPRETATIONS****1.1 Definitions:**

- 1.1.1 The words / expressions used in this Agreement, unless as defined below or repugnant to the context, shall have the same meaning as assigned to them by the Electricity Act, 2003 and the rules or regulations framed there under including those issued / framed by the Commission (as defined hereunder), as amended or re-enacted from time to time or the General Clauses Act, failing which it shall bear its ordinary English meaning.

The words/expressions when used in this Agreement shall have the respective meanings as specified below:

**"Acquisition Price"** shall have the same meaning as defined in the Share Purchase Agreement;

**"Act" or "Electricity Act" or "Electricity Act 2003"** shall mean the Electricity Act, 2003 and any amendments made to the same or any succeeding enactment thereof;

**"Affiliate"** shall mean a company that either directly or indirectly

- i. controls or
- ii. is controlled by or
- iii. is under common control with

a Bidding Company (in the case of a single company) or a Member (in the case of a Consortium) and **"control"** means ownership by one entity of at least twenty six percent (26%) of the voting rights of the other entity;

**"Availability"** in relation to the Project or in relation to any Element of the Project, for a given period shall mean the time in hours during that period the Project is capable to transmit electricity at its Rated Voltage and shall be expressed in percentage of total hours in the given period and shall be calculated as per the procedure contained in **Appendix –II to Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019**, attached herewith in Schedule 6;



**"Bid"** shall mean technical bid and financial bid submitted by the Bidder, in response to the RFP, in accordance with the terms and conditions of the RFP;

**"Bid Deadline"** shall mean the last date and time for submission of the Bid in response to RFP, as specified in the RFP;

**"Bidding Company"** shall refer to such single company that has made a Response to RFP for the Project;

**"Bidding Consortium / Consortium"** shall refer to a group of companies that has collectively made a Response to RFP for the Project;

**"Bid Documents" or "Bidding Documents"** shall mean the RFP, along with all attachments thereto or clarifications thereof;

**"Bidding Guidelines"** shall mean the "Tariff Based Competitive Bidding Guidelines for Transmission Service" and "Guidelines for Encouraging Competition in Development of Transmission Projects" issued by Government of India, Ministry of Power under Section – 63 of the Electricity Act as amended from time to time;

**"Bid Process Coordinator" or "BPC"** shall mean a person or its authorized representative as notified by the Government of India, responsible for carrying out the process for selection of Bidder who will acquire Transmission Service Provider;

**"Bill"** shall mean any bill raised by the CTU on the DICs to recover the Transmission Charges pursuant to the Sharing Regulations;

**"Business Day"** shall mean a day other than Sunday or a statutory holiday, on which the banks remain open for business in the State in which the Nodal Agency's registered office is located and the concerned TSP are located;

**"CEA"** shall mean the Central Electricity Authority constituted under Section -70 of the Electricity Act;

**"Change in law"** shall have the meaning ascribed thereto in Article 12;

**"Commercial Operation Date" or "COD"** shall mean the date as per Article 6.2;

**"Commission" or "CERC"** shall mean the Central Electricity Regulatory Commission referred to in sub-section (1) of Section 76 of the Electricity Act, 2003 or its successors and assigns;



## Transmission Service Agreement

**“Competent Court of Law”** shall mean the Supreme Court or any High Court, or any tribunal or any similar judicial or quasi-judicial body in India that has jurisdiction to adjudicate upon issues relating to the Project;

**“Connection Agreement”** shall mean the agreement between the CTU or STU or any other concerned parties and the TSP, setting out the terms relating to the connection of the Project to the Inter-connection Facilities and use of the Inter State Transmission System as per the provisions of the IEGC, as the case may be;

**“Consultation Period”** shall mean the period of sixty (60) days or such longer period as the Parties may agree, commencing from the date of issue of a TSP’s Preliminary Notice or a Nodal Agency’s Preliminary Termination Notice, as provided in Article 13 of this Agreement, for consultation between the Parties to mitigate the consequence of the relevant event having regard to all the circumstances;

**“Consents, Clearances and Permits”** shall mean all authorizations, licenses, approvals, registrations, permits, waivers, privileges, acknowledgements, agreements, or concessions required to be obtained from or provided by any concerned authority for the development, execution and operation of Project including without any limitation for the construction, ownership, operation and maintenance of the Transmission Lines and/or sub-stations;

**“Construction Period”** shall mean the period from (and including) the Effective Date of the Transmission Service Agreement up to (but not including) the COD of the Element of the Project in relation to an Element and up to (but not including) the COD of the Project in relation to the Project;

**“Contractors”** shall mean the engineering, procurement, construction, operation & maintenance contractors, surveyors, advisors, consultants, designers, suppliers to the TSP and each of their respective sub-contractors (and each of their respective successors and permitted assigns) in their respective capacities as such;

**“Contract Performance Guarantee”** shall mean the irrevocable unconditional bank guarantee, submitted and to be submitted by the TSP or by the Selected Bidder on behalf of the TSP to the Nodal Agency from a bank mentioned in Annexure 17 of the RFP, in the form attached here to as Schedule 8, in accordance with Article 3 of this Agreement and which shall include the additional bank guarantee furnished by the TSP under this Agreement;



**“Contract Year”**, for the purpose of payment of Transmission Charges, shall mean the period beginning on the COD, and ending on the immediately succeeding March 31 and thereafter each period of 12 months beginning on April 1 and ending on March 31 provided that the last Contract Year shall end on the last day of the term of the TSA;

**“CTU” or “Central Transmission Utility”** shall have same meaning as defined in the Electricity Act, 2003;

**“Day”** shall mean a day starting at 0000 hours and ending at 2400 hours;

**“D/C”** shall mean Double Circuit;

**“Designated ISTS Customers” or “DICs”** shall have the meaning as ascribed in the Sharing Regulations;

**“Dispute”** shall mean any dispute or difference of any kind between the Parties, in connection with or arising out of this Agreement including any issue on the interpretation and scope of the terms of this Agreement as provided in Article 16;

**“Effective Date”** for the purposes of this Agreement, shall have the same meaning as per Article 2.1 of this Agreement;

**“Electrical Inspector”** shall mean a person appointed as such by the Government under sub-section (1) of Section 162 of the Electricity Act 2003 and also includes Chief Electrical Inspector;

**“Electricity Rules 2005”** shall mean the rules framed pursuant to the Electricity Act 2003 and as amended from time to time;

**“Element”** shall mean each Transmission Line or each circuit of the Transmission Lines (where there are more than one circuit) or each bay of Sub-station or switching station or HVDC terminal or inverter station of the Project, including ICTs, Reactors, SVC, FSC, etc. forming part of the ISTS, which will be owned, operated and maintained by the concerned ISTS Licensee, and which has a separate Scheduled COD as per Schedule 2 of this Agreement and has a separate percentage for recovery of Transmission Charges on achieving COD as per Schedule 5 of this Agreement;

**“Event of Default”** shall mean the events as defined in Article 13 of this Agreement;



## Transmission Service Agreement

**“Expiry Date”** shall be the date which is thirty five (35) years from the COD of the Project;

**“Financial Closure”** shall mean the first Business Day on which funds are made available to the TSP pursuant to the Financing Agreements;

**“Financially Evaluated Entity”** shall mean the company which has been evaluated for the satisfaction of the financial requirement set forth in the RFP;

**“Financing Agreements”** shall mean the agreements pursuant to which the TSP is to finance the Project including the loan agreements, security documents, notes, indentures, security agreements, letters of credit and other documents, as may be amended, modified, or replaced from time to time, but without in anyway increasing the liabilities of the Designated ISTS Customers / Nodal Agency;

**“Financial Year”** shall mean a period of twelve months at midnight Indian Standard Time (IST) between 1st April & 31st March;

**“Force Majeure”** and **“Force Majeure Event”** shall have the meaning assigned thereto in Article 11;

**“GOI”** shall mean Government of India;

**“Grid Code” / “IEGC”** shall mean the Grid Code specified by the Central Commission under Clause (h) of sub-section (1) of Section 79 of the Electricity Act;

**“Independent Engineer”** shall mean an agency/ company, appointed by Nodal Agency in accordance with the Guidelines for Encouraging Competition in Development of Transmission Projects.

**“Indian Governmental Instrumentality”** shall mean Government of India, Government of any State in India or any ministry, department, board, authority, agency, corporation, commission under the direct or indirect control of Government of India or any State Government or both, any political sub-division of any of them including any court or Commission or tribunal or judicial or quasi-judicial body in India but excluding the CTU, TSP and the Designated ISTS Customers;

**“Insurances”** shall mean the insurance cover to be obtained and maintained by the TSP in accordance with Article 9 of this Agreement;

**“Interconnection Facilities”** shall mean the facilities as may be set up for transmission of electricity through the use of the Project, on either one or both side of generating station’s / CTU’s / STU’s / ISTS Licensee’s / Designated ISTS Customer’s substations (as the case may be) which shall include, without limitation, all other transmission lines, gantries, sub-stations and associated equipments not forming part of the Project;

**“ISTS Licensee”** shall be the TSP under this Agreement, consequent to having been awarded a Transmission License by the CERC and shall be referred to as the TSP or the ISTS Licensee, as the context may require in this Agreement;

**“Law” or “Laws”** in relation to this Agreement, shall mean all laws including electricity laws in force in India and any statute, ordinance, rule, regulation, notification, order or code, or any interpretation of any of them by an Indian Governmental Instrumentality having force of law and shall include all rules, regulations, decisions and orders of the Commission;

**“Lead Member of the Bidding Consortium” or “Lead Member”** shall mean a company who commits at least 26% equity stake in the Project, meets the technical requirement as specified in the RFP and so designated by other Member(s) in Bidding Consortium;

**“Lenders”** means the banks, financial institutions, multilateral funding agencies, non banking financial companies registered with the Reserve Bank of India (RBI), insurance companies registered with the Insurance Regulatory & Development Authority (IRDA), pension funds regulated by the Pension Fund Regulatory & Development Authority (PFRDA), mutual funds registered with Securities & Exchange Board of India (SEBI), etc., including their successors and assigns, who have agreed on or before COD of the Project to provide the TSP with the debt financing described in the capital structure schedule, and any successor banks or financial institutions to whom their interests under the Financing Agreements may be transferred or assigned;

Provided that, such assignment or transfer shall not relieve the TSP of its obligations to the Nodal Agency under this Agreement in any manner and shall also does not lead to an increase in the liability of the Nodal Agency;

**“Lenders Representative”** shall mean the person notified by the Lender(s) in writing as being the representative of the Lender(s) or the Security Trustee and



## Transmission Service Agreement

such person may from time to time be replaced by the Lender(s) pursuant to the Financing Agreements by written notice to the TSP;

“**Letter of Intent**” or “**LOI**” shall have the same meaning as in the RFP;

“**Member in a Bidding Consortium / Member**” shall mean each company in the Bidding Consortium;

“**Month**” shall mean a period of thirty (30) days from (and excluding) the date of the event;

“**Monthly Transmission Charges**” for any Element of the Project, after COD of the Element till COD of the Project, and for the Project after COD of the Project, shall mean the amount of Transmission Charges as specified in Schedule 5 of this Agreement multiplied by no. of days in the relevant month and divided by no. of days in the year;

“**National Load Despatch Centre**” shall mean the centre established as per sub-section (1) of Section 26 of the Electricity Act 2003;

“**Nodal Agency**” shall mean CTU, which shall execute and implement the Transmission Service Agreement (TSA);

Provided that while taking major decisions, CTU shall consult CEA on technical matters and any other matter it feels necessary.

“**Notification**” shall mean any notification, issued in the Gazette of India;

“**Operating Period**” for any Element of the Project shall mean the period from (and including) the COD of such Element of the Project, up to (and including) the Expiry Date and for the Project, shall mean the period from (and including) the COD of the Project, up to (and including) the Expiry Date;

“**Parent Company**” shall mean an entity that holds at least twenty six percent (26%) of the paid - up equity capital directly or indirectly in the Bidding Company or in the Member in a Bidding Consortium, as the case may be;

“**Preliminary Termination Notice**” shall mean a Nodal Agency’s Preliminary Termination Notice as defined in Article 13 of this Agreement;



**“Project”** shall mean **“Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C”**, as detailed in Schedule 1 of this Agreement;

**“Project Assets”** shall mean all physical and other assets relating to and forming part of the Project including:

- (a) rights over the Site for substations, ROW for transmission lines;
- (b) tangible & intangible assets such as civil works and equipment including foundations, embankments, pavements, electrical systems, communication systems, relief centres, administrative offices, Sub-stations, software, tower and sub-stations designs etc;
- (c) project facilities situated on the Site;
- (d) all rights of the TSP under the project agreements;
- (e) financial assets, such as receivables, security deposits etc;
- (f) insurance proceeds; and
- (g) Applicable Permits and authorisations relating to or in respect of the Transmission System;”

**“Project Execution Plan”** shall mean the plan referred to in Article 3.1.3(c) hereof;

**“Prudent Utility Practices”** shall mean the practices, methods and standards that are generally accepted internationally from time to time by electric transmission utilities for the purpose of ensuring the safe, efficient and economic design, construction, commissioning, operation, repair and maintenance of the Project and which practices, methods and standards shall be adjusted as necessary, to take account of:

- (i) operation, repair and maintenance guidelines given by the manufacturers to be incorporated in the Project,
- (ii) the requirements of Law, and
- (iii) the physical conditions at the Site;
- (iv) the safety of operating personnel and human beings;



## Transmission Service Agreement

**"Rated Voltage"** shall mean voltage at which the Transmission System is designed to operate or such lower voltage at which the line is charged, for the time being, in consultation with the Central Transmission Utility;

**"Rebate"** shall have the meaning as ascribed to in Article 10.3 of this Agreement;

**"RFP"** shall mean Request For Proposal dated **March 02, 2023** along with all schedules, annexures and RFP Project Documents attached thereto, issued by the BPC for tariff based competitive bidding process for selection of Bidder as TSP to execute the Project, including any modifications, amendments or alterations thereto;

**"RFP Project Documents"** shall mean the following documents to be entered into in respect of the Project, by the Parties to the respective agreements:

- a. Transmission Service Agreement,
- b. Share Purchase Agreement,
- c. Agreement(s) required under Sharing Regulations and
- d. Any other agreement as may be required;

**"RLDC"** shall mean the relevant Regional Load Dispatch Centre as defined in the Electricity Act, 2003, in the region(s) in which the Project is located;

**"RPC"** shall mean the relevant Regional Power Committee established by the Government of India for the specific Region(s) in accordance with the Electricity Act, 2003 for facilitating integrated operation of the Power System in that Region;

**"Scheduled COD"** in relation to an Element(s) shall mean the date(s) as mentioned in Schedule 2 as against such Element(s) and in relation to the Project, shall mean the date as mentioned in Schedule 2 as against such Project, subject to the provisions of Article 4.4 of this Agreement, or such date as may be mutually agreed among the Parties;

**"Scheduled Outage"** shall mean the final outage plan as approved by the RPC as per the provisions of the Grid Code;

**"Selected Bid"** shall mean the technical Bid and the Final Offer of the Selected Bidder submitted during e-reverse bidding, which shall be downloaded and attached in Schedule 7 on or prior to the Effective Date;



**“Share Purchase Agreement”** shall mean the agreement amongst **PFC Consulting Limited (PFCCL)**, Bikaner III Neemrana II Transmission Limited and the Successful Bidder for the purchase of one hundred (100%) per cent of the shareholding of the Bikaner III Neemrana II Transmission Limited for the Acquisition Price, by the Successful Bidder on the terms and conditions as contained therein;

**“Sharing Regulations”** shall mean the Central Electricity Regulatory Commission (Sharing of Inter-State Transmission Charges and Losses) Regulations, 2020 and as amended from time to time;

**“Site”** in relation to a substation, switching station or HVDC terminal or inverter station, shall mean the land and other places upon which such station / terminal is to be established;

**“SLDC”** shall mean the State Load Despatch Centre established as per sub-section (1) of Section 31 of the Electricity Act 2003;

**“STU”** or **“State Transmission Utility”** shall be the Board or the Government company, specified as such by the State Government under sub-section (1) of Section 39 of the Electricity Act 2003;

**“Successful Bidder”** or **“Selected Bidder”** shall mean the Bidder selected pursuant to the RFP and who has to acquire one hundred percent (100%) equity shares of Bikaner III Neemrana II Transmission Limited, along with all its related assets and liabilities, which will be responsible as the TSP to establish the Project on build, own, operate and transfer basis as per the terms of the TSA and other RFP Project Documents;

**“TSP’s Preliminary Notice”** shall mean a notice issued by the TSP in pursuant to the provisions of Article 13.3 of this Agreement;

**“Target Availability”** shall have the meaning as ascribed hereto in Article 8.2 of this Agreement;

**“Technically Evaluated Entity”** shall mean the company which has been evaluated for the satisfaction of the technical requirement set forth in RFP;

**“Termination Notice”** shall mean a Nodal Agency’s Termination Notice given by the Nodal Agency to the TSP pursuant to the provisions of Articles 3.3.2, 3.3.4, 4.4.2, 5.8, 13.2 and 13.3 of this Agreement for the termination of this Agreement;



## Transmission Service Agreement

**"Term of Agreement"** for the purposes of this Agreement shall have the meaning ascribed thereto in Article 2.2 of this Agreement;

**"Transmission Charges"** shall mean the Final Offer of the Selected Bidder during the e-reverse bidding and adopted by the Commission, payable to the TSP as per Sharing Regulations;

**"Transmission License"** shall mean the license granted by the Commission in terms of the relevant regulations for grant of such license issued under the Electricity Act;

**"Transmission Service"** shall mean making the Project available as per the terms and conditions of this Agreement and Sharing Regulations;

**"Unscheduled Outage"** shall mean an interruption resulting in reduction of the Availability of the Element(s) / Project (as the case may be) that is not a result of a Scheduled Outage or a Force Majeure Event.

**"Ultimate Parent Company"** shall mean an entity which owns at least twenty six percent (26%) equity in the Bidding Company or Member of a Consortium, (as the case may be) and in the Technically Evaluated Entity and / or Financially Evaluated Entity (as the case may be) and such Bidding Company or Member of a Consortium, (as the case may be) and the Technically Evaluated Entity and / or Financially Evaluated Entity (as the case may be) shall be under the direct control or indirectly under the common control of such entity;

## 1.2 Interpretation:

***Save where the contrary is indicated, any reference in this Agreement to:***

**"Agreement"** shall be construed as including a reference to its Schedules, Appendices and Annexures;

**"Rupee", "Rupees" and "Rs."** shall denote lawful currency of India;

**"crore"** shall mean a reference to ten million (10,000,000) and a **"lakh"** shall mean a reference to one tenth of a million (1,00,000);

**"encumbrance"** shall be construed as a reference to a mortgage, charge, pledge, lien or other encumbrance securing any obligation of any person or any other type of preferential arrangement (including, without limitation, title transfer and retention arrangements) having a similar effect;



"**holding company**" of a company or corporation shall be construed as a reference to any company or corporation of which the other company or corporation is a subsidiary;

"**indebtedness**" shall be construed so as to include any obligation (whether incurred as principal or surety) for the payment or repayment of money, whether present or future, actual or contingent;

"**person**" shall have the meaning as defined in Section 2 (49) of the Act;

"**subsidiary**" of a company or corporation (the holding company) shall be construed as a reference to any company or corporation:

- (i) which is controlled, directly or indirectly, by the holding company, or
- (ii) more than half of the issued share capital of which is beneficially owned, directly or indirectly, by the holding company, or
- (iii) which is a subsidiary of another subsidiary of the holding company,

for these purposes, a company or corporation shall be treated as being controlled by another if that other company or corporation is able to direct its affairs and/or to control the composition of its board of directors or equivalent body;

"**winding-up**", "**dissolution**", "**insolvency**", or "**reorganization**" in the context of a company or corporation shall have the same meaning as defined in the Companies Act, 1956/ Companies Act, 2013 (as the case may be).

1.2.1 Words importing the singular shall include the plural and vice versa.

1.2.2 This Agreement itself or any other agreement or document shall be construed as a reference to this or to such other agreement or document as it may have been, or may from time to time be, amended, varied, novated, replaced or supplemented.

1.2.3 A Law shall be construed as a reference to such Law including its amendments or re-enactments from time to time.

1.2.4 A time of day shall, save as otherwise provided in any agreement or document be construed as a reference to Indian Standard Time.



## Transmission Service Agreement

- 1.2.5 Different parts of this Agreement are to be taken as mutually explanatory and supplementary to each other and if there is any inconsistency between or among the parts of this Agreement, they shall be interpreted in a harmonious manner so as to give effect to each part.
- 1.2.6 The tables of contents and any headings or sub-headings in this Agreement have been inserted for ease of reference only and shall not affect the interpretation of this Agreement.
- 1.2.7 All interest payable under this Agreement shall accrue from day to day and be calculated on the basis of a year of three hundred and sixty five (365) days.
- 1.2.8 The words "hereof" or "herein", if and when used in this Agreement shall mean a reference to this Agreement.
- 1.2.9 The contents of Schedule 7 shall be referred to for ascertaining accuracy and correctness of the representations made by the Selected Bidder in Article 17.2.1 hereof.



**ARTICLE: 2****2. EFFECTIVENESS AND TERM OF AGREEMENT****2.1 Effective Date:**

This Agreement shall be effective from later of the dates of the following events:

- a. The Selected Bidder, on behalf of the TSP, has provided the Contract Performance Guarantee, as per terms of Article 3.1 of this Agreement; and
- b. The Selected Bidder has acquired for the Acquisition Price, one hundred percent (100%) of the equity shareholding of **PFC Consulting Limited** in Bikaner III Neemrana II Transmission Limited along with all its related assets and liabilities as per the provisions of the Share Purchase Agreement. and
- c. The Agreement is executed and delivered by the Parties;

**2.2 Term and Termination:**

2.2.1 Subject to Article 2.2.3 and Article 2.4, this Agreement shall continue to be effective in relation to the Project until the Expiry Date, when it shall automatically terminate.

2.2.2 Post the Expiry Date of this Agreement, the TSP shall ensure transfer of Project Assets to CTU or its successors or an agency as decided by the Central Government at zero cost and free from any encumbrance and liability. The transfer shall be completed within 90 days of expiry of this Agreement failing which CTU shall be entitled to take over the Project Assets Suo moto.

2.2.3 This Agreement shall terminate before the Expiry Date in accordance with Article 13 or Article 3.3.2 or Article 3.3.4.

**2.3 Conditions prior to the expiry of the Transmission License**

2.3.1 In order to continue the Project beyond the expiry of the Transmission License, the TSP shall be obligated to make an application to the Commission at least two (2) years before the date of expiry of the Transmission License, seeking the Commission's approval for the extension of the term of the Transmission License up to the Expiry Date.

## Transmission Service Agreement

2.3.2 The TSP shall timely comply with all the requirements that may be laid down by the Commission for extension of the term of the Transmission License beyond the initial term of twenty-five (25) years & upto the Expiry Date and the TSP shall keep the Nodal Agency fully informed about the progress on its application for extension of the term of the Transmission License.

#### 2.4 Survival:

The expiry or termination of this Agreement shall not affect any accrued rights, obligations/ roles and liabilities of the Parties under this Agreement, including the right to receive liquidated damages as per the terms of this Agreement, nor shall it effect the survival of any continuing obligations/ roles for which this Agreement provides, either expressly or by necessary implication, which are to survive after the Expiry Date or termination including those under Articles 3.3.3, 3.3.5, Article 9.3 (Application of Insurance Proceeds), Article 11 (Force Majeure), Article 13 (Events of Default and Termination), Article 14 (Liability & Indemnification), Article 16 (Governing Law & Dispute Resolution), Article 19 (Miscellaneous).

#### 2.5 Applicability of the provisions of this Agreement

2.5.1 For the purpose of Availability, Target Availability and the computation of Availability, Incentive, Penalty, the provisions provided in this Agreement shall apply and any future modifications in the relevant Rules and Regulations shall not be applicable for this Project.

2.5.2 For the purposes of this Agreement for ISTS systems developed under the tariff based competitive bidding framework, the provisions relating to the definitions (Availability and COD), Article 3 (Contract Performance Guarantee and Conditions Subsequent), Article 5 (Construction of the Project), Article 6 (Connection and Commissioning of the Project), Article 8 (Target Availability and calculation of Availability), Article 11 (Force Majeure), Article 12 (Change in Law), Article 13 (Event of Default), Article 14 (Indemnification), Article 15 (Assignment and Charges), Articles 16.1, 16.2 and 16.4 (Governing Laws and Dispute Resolution) and Article 17 (representation and warranties of the ISTS Licensee) of this agreement shall supersede the corresponding provisions under Sharing Regulations.



**ARTICLE: 3****3. CONDITIONS SUBSEQUENT****3.1 Satisfaction of conditions subsequent by the TSP**

3.1.1 Within ten (10) days from the date of issue of Letter of Intent, the Selected Bidder, shall:

- a. Provide the Contract Performance Guarantee, and
- b. Acquire, for the Acquisition Price, one hundred percent (100%) equity shareholding of Bikaner III Neemrana II Transmission Limited from **PFC Consulting Limited**, who shall sell to the Selected Bidder, the equity shareholding of Bikaner III Neemrana II Transmission Limited, along with all its related assets and liabilities.
- c. Execute this Agreement;

The TSP shall, within five (5) working days from the date of acquisition of SPV by the Selected Bidder, undertake to apply to the Commission for the grant of Transmission License and for the adoption of tariff as required under section-63 of the Electricity Act.

The Selected Bidder, on behalf of the TSP, will provide to the **Central Transmission Utility of India Limited** (being the Nodal Agency) the Contract Performance Guarantee for an amount of **Rs 42 Crore (Rupees Forty Two Crore Only)**.

3.1.2 The Contract Performance Guarantee shall be initially valid for a period up to three (3) months after the Scheduled COD of the Project and shall be extended from time to time to be valid for a period up to three (3) months after the COD of the Project. In case the validity of the Contract Performance Guarantee is expiring before the validity specified in this Article, the TSP shall, at least thirty (30) days before the expiry of the Contract Performance Guarantee, replace the Contract Performance Guarantee with another Contract Performance Guarantee or extend the validity of the existing Contract Performance Guarantee until the validity period specified in this Article.

3.1.3 The TSP agrees and undertakes to duly perform and complete the following activities within six (6) months from the Effective Date (except for c) below), unless such



### Transmission Service Agreement

completion is affected due to any Force Majeure Event, or if any of the activities is specifically waived in writing by the Nodal Agency:

- a. To obtain the Transmission License for the Project from the Commission;
- b. To obtain the order for adoption of Transmission Charges by the Commission, as required under Section 63 of the Electricity Act 2003;
- c. To submit to the Nodal Agency, CEA & Independent Engineer, the Project Execution Plan, immediately after award of contract(s) and maximum within one hundred and twenty (120) days from the Effective Date. Also, an approved copy each of Manufacturing Quality Plan (MQP) and Field Quality Plan (FQP) would be submitted to Independent Engineer & Nodal Agency in the same time period. The TSP's Project Execution Plan should be in conformity with the Scheduled COD as specified in Schedule 2 of this Agreement, and shall bring out clearly the organization structure, time plan and methodology for executing the Project, award of major contracts, designing, engineering, procurement, shipping, construction, testing and commissioning to commercial operation;
- d. To submit to the Nodal Agency, CEA & Independent Engineer a detailed bar (GANTT) chart of the Project outlining each activity (taking longer than one Month), linkages as well as durations;
- e. To submit to the Nodal Agency, CEA & Independent Engineer detailed specifications of conductor meeting the functional specifications specified in RFP;
- f. To achieve Financial Closure;
- g. To provide an irrevocable letter to the Lenders duly accepting and acknowledging the rights provided to the Lenders under the provisions of Article 15.3 of this Agreement and all other RFP Project Documents;
- h. To award the Engineering, Procurement and Construction contract ("EPC contract") for the design and construction of the Project and shall have given to such Contractor an irrevocable notice to proceed; and
- i. To sign the Agreement(s) required, if any, under Sharing Regulations.

### 3.2

#### Recognition of Lenders' Rights by the Nodal Agency



## Transmission Service Agreement

3.2.1 The Nodal Agency hereby accepts and acknowledges the rights provided to the Lenders as per Article 15.3 of this Agreement and all other RFP Project Documents.

### 3.3 Consequences of non-fulfilment of conditions subsequent

3.3.1 If any of the conditions specified in Article 3.1.3 is not duly fulfilled by the TSP even within three (3) Months after the time specified therein, then on and from the expiry of such period and until the TSP has satisfied all the conditions specified in Article 3.1.3, the TSP shall, on a monthly basis, be liable to furnish to **Central Transmission Utility of India Limited (being the Nodal Agency)** additional Contract Performance Guarantee of **Rs. 4.20 Crore (Rupees Four Crore Twenty Lakh Only)** within two (2) Business Days of expiry of every such Month. Such additional Contract Performance Guarantee shall be provided to **Central Transmission Utility of India Limited (being the Nodal Agency)** in the manner provided in Article 3.1.1 and shall become part of the Contract Performance Guarantee and all the provisions of this Agreement shall be construed accordingly. **Central Transmission Utility of India Limited (being the Nodal Agency)** shall be entitled to hold and / or invoke the Contract Performance Guarantee, including such additional Contract Performance Guarantee, in accordance with the provisions of this Agreement.

3.3.2 Subject to Article 3.3.4, if:

- (i) the fulfilment of any of the conditions specified in Article 3.1.3 is delayed beyond nine (9) Months from the Effective Date and the TSP fails to furnish additional Contract Performance Guarantee to the Nodal Agency in accordance with Article 3.3.1 hereof; or
- (ii) the TSP furnishes additional Performance Guarantee to the Nodal Agency in accordance with Article 3.3.1 hereof but fails to fulfil the conditions specified in Article 3.1.3 within a period of twelve (12) months from the Effective Date,

the Nodal Agency shall have the right to terminate this Agreement, by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement.

3.3.3 If the Nodal Agency elects to terminate this Agreement as per the provisions of Article 3.3.2, the TSP shall be liable to pay to the Nodal Agency an amount of **Rs 42 Crore (Rupees Forty Two Crore Only)** as liquidated damages. The Nodal Agency shall be entitled to recover this amount of damages by invoking the Contract

## Transmission Service Agreement

Performance Guarantee to the extent of liquidated damages, which shall be required by the Nodal Agency, and the balance shall be returned to TSP, if any.

It is clarified for removal of doubt that this Article shall survive the termination of this Agreement.

- 3.3.4 In case of inability of the TSP to fulfil the conditions specified in Article 3.1.3 due to any Force Majeure Event, the time period for fulfilment of the condition subsequent as mentioned in Article 3.1.3, may be extended for a period of such Force Majeure Event. Alternatively, if deemed necessary, this Agreement may be terminated by the Nodal Agency by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement and the Contract Performance Guarantee shall be returned as per the provisions of Article 6.5.1.

Provided, that due to the provisions of this Article 3.3.4, any increase in the time period for completion of conditions subsequent mentioned under Article 3.1.3, shall lead to an equal increase in the time period for the Scheduled COD. If the Scheduled COD is extended beyond a period of one hundred eighty (180) days due to the provisions of this Article 3.3.4, the TSP will be allowed to recover the interest cost during construction corresponding to the period exceeding one hundred eighty (180) days by adjustment in the Transmission Charges in accordance with Schedule 9.

- 3.3.5 Upon termination of this Agreement as per Articles 3.3.2 and 3.3.4, the Nodal Agency may take steps to bid out the Project again.
- 3.3.6 The Nodal agency, on the failure of the TSP to fulfil its obligations, if it considers that there are sufficient grounds for so doing, apart from invoking the Contract Performance Guarantee under para 3.3.3 may also initiate proceedings for blacklisting the TSP as per provisions of Article 13.2 of TSA.

### 3.4 Progress Reports

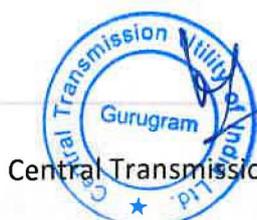
The TSP shall notify the Nodal Agency and CEA in writing at least once a Month on the progress made in satisfying the conditions subsequent in Articles 3.1.3.



**ARTICLE: 4****4. DEVELOPMENT OF THE PROJECT****4.1 TSP's obligations in development of the Project:**

Subject to the terms and conditions of this Agreement, the TSP at its own cost and expense shall observe, comply with, perform, undertake and be responsible:

- a. for procuring and maintaining in full force and effect all Consents, Clearances and Permits, required in accordance with Law for development of the Project;
- b. for financing, constructing, owning and commissioning each of the Element of the Project for the scope of work set out in Schedule 1 of this Agreement in accordance with:
  - i. the Electricity Act and the Rules made thereof;
  - ii. the Grid Code;
  - iii. the CEA Regulations applicable, and as amended from time to time, for Transmission Lines and sub-stations:
    - the Central Electricity Authority (Technical Standards for Connectivity to the Grid) Regulations, 2007;
    - Central Electricity Authority (Technical Standards for construction of Electrical Plants and Electric Lines) Regulation, 2010;
    - Central Electricity Authority (Grid Standard) Regulations, 2010;
    - Central Electricity Authority (Safety requirements for construction, operation and maintenance of Electrical Plants and Electrical Lines) Regulation, 2011;
    - Central Electricity Authority (Measures relating to Safety and Electricity Supply) Regulation, 2010;
    - Central Electricity Authority (Technical Standards for Communication System in Power System Operation) Regulations, 2020.
  - iv. Safety/ security Guidelines laid down by the Government;



## Transmission Service Agreement

- v. Prudent Utility Practices, relevant Indian Standards and the Law;

not later than the Scheduled COD as per Schedule 2 of this Agreement;

- c. for entering into a Connection Agreement with the concerned parties in accordance with the Grid Code.
- d. for owning the Project throughout the term of this Agreement free and clear of any encumbrances except those expressly permitted under Article 15 of this Agreement;
- e. to co-ordinate and liaise with concerned agencies and provide on a timely basis relevant information with regard to the specifications of the Project that may be required for interconnecting the Project with the Interconnection Facilities;
- f. for providing all assistance to the Arbitrators as they may require for the performance of their duties and responsibilities;
- g. to provide to the Nodal Agency and CEA, on a monthly basis, progress reports with regard to the Project and its execution (in accordance with prescribed form) to enable the CEA to monitor and co-ordinate the development of the Project matching with the Interconnection Facilities;
- h. to comply with Ministry of Power order no. 25-11/6/2018 – PG dated 02.07.2020 as well as other Guidelines issued by Govt. of India pertaining to this;
- i. to procure the products associated with the Transmission System as per provisions of Public Procurement (Preference to Make in India) orders issued by Ministry of Power vide orders No. 11/5/2018 - Coord. dated 28.07.2020 for transmission sector, as amended from time to time read with Department for Promotion of Industry and Internal Trade (DPIIT) orders in this regard (Procuring Entity as defined in above orders shall deemed to have included Selected Bidder and/ or TSP).

Also, to comply with Department of Expenditure, Ministry of Finance vide Order (Public Procurement No 1) bearing File No. 6/18/2019-PPD dated 23.07.2020, Order (Public Procurement No 2) bearing File



**Transmission Service Agreement**

No. 6/18/2019-PPD dated 23.07.2020 and Order (Public Procurement No. 3) bearing File No. 6/18/2019-PPD, dated 24.07.2020, as amended from time to time, regarding public procurement from a bidder of a country, which shares land border with India;

- j. to submit to Nodal Agency information in the prescribed format [To be devised by Nodal Agency] for ensuring compliance to Article 4.1 i) above.
- k. to comply with all its obligations undertaken in this Agreement.

**4.2 Roles of the Nodal Agency in implementation of the Project:**

4.2.1 Subject to the terms and conditions of this Agreement, the Nodal Agency shall be the holder and administrator of this Agreement and shall inter alia:

- a. appoint an Independent Engineer within 90 days of the Effective Date
- b. provide letters of recommendation to the concerned Indian Governmental Instrumentality, as may be requested by the TSP from time to time, for obtaining the Consents, Clearances and Permits required for the Project;
- c. coordinate among TSP and upstream/downstream entities in respect of Interconnection Facilities; and
- d. monitor the implementation of the Agreement and take appropriate action for breach thereof including revocation of guarantees, cancellation of Agreement, blacklisting etc
- e. provide all assistance to the Arbitrators as required for the performance of their duties and responsibilities; and
- f. perform any other responsibility (ies) as specified in this Agreement.

**4.3 Time for Commencement and Completion:**

- a. The TSP shall take all necessary steps to commence work on the Project from the Effective Date of the Agreement and shall achieve Scheduled COD of the Project in accordance with the time schedule specified in Schedule 2 of this Agreement;
- b. The COD of each Element of the Project shall occur no later than the Scheduled COD or within such extended time to which the TSP shall be entitled under Article 4.4 hereto.



Central Transmission Utility of India Limited

27

Bikaner III Neemrana II Transmission Limited

## Transmission Service Agreement

**4.4 Extension of time:**

- 4.4.1 In the event that the TSP is unable to perform its obligations for the reasons solely attributable to the Nodal Agency, the Scheduled COD shall be extended, by a 'day to day' basis, subject to the provisions of Article 13.
- 4.4.2 In the event that an Element or the Project cannot be commissioned by its Scheduled COD on account of any Force Majeure Event as per Article 11, the Scheduled COD shall be extended, by a 'day to day' basis for a period of such Force Majeure Event. Alternatively, if deemed necessary, the Nodal Agency may terminate the Agreement as per the provisions of Article 13.4 by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement.
- 4.4.3 If the Parties have not agreed, within thirty (30) days after the affected Party's performance has ceased to be affected by the relevant circumstance, on how long the Scheduled COD should be deferred by, any Party may raise the Dispute to be resolved in accordance with Article 16.

**4.5 Metering Arrangements:**

- 4.5.1 The TSP shall comply with all the provisions of the IEGC and the Central Electricity Authority (Installation and Operation of Meters) Regulations, 2006 as amended from time to time, with regard to the metering arrangements for the Project. The TSP shall fully cooperate with the CTU / STU / RLDC and extend all necessary assistance in taking meter readings.

**4.6 Interconnection Facilities:**

- 4.6.1 Subject to the terms and conditions of this Agreement, the TSP shall be responsible for connecting the Project with the interconnection point(s) specified in Schedule 1 of this Agreement. The Interconnection Facilities shall be developed as per the scope of work and responsibilities assigned in Schedule 1 of this Agreement. The Nodal Agency shall be responsible for coordinating to make available the Interconnection Facilities.
- 4.6.2 In order to remove any doubts, it is made clear that the obligation of the TSP within the scope of the project is to construct the Project as per Schedule-1 of this Agreement and in particular to connect it to the Interconnection Facilities as specified in this Agreement.



**ARTICLE: 5****5. CONSTRUCTION OF THE PROJECT****5.1 TSP's Construction Responsibilities:**

- 5.1.1 The TSP, at its own cost and expense, shall be responsible for designing, constructing, erecting, testing and commissioning each Element of the Project by the Scheduled COD in accordance with the Regulations and other applicable Laws specified in Article 4.1 of this Agreement.
- 5.1.2 The TSP acknowledges and agrees that it shall not be relieved from any of its obligations under this Agreement or be entitled to any extension of time or any compensation whatsoever by reason of the unsuitability of the Site or Transmission Line route(s).
- 5.1.3 The TSP shall be responsible for obtaining all Consents, Clearances and Permits related but not limited to road / rail / river / canal / power line / crossings, Power and Telecom Coordination Committee (PTCC), defence, civil aviation, right of way / way-leaves and environmental & forest clearances from relevant authorities required for developing, financing, constructing, maintaining/ renewing all such Consents, Clearances and Permits in order to carry out its obligations under this Agreement in general and shall furnish to the Nodal Agency such copy/ies of each Consents, Clearances and Permits, on demand. Nodal Agency shall provide letters of recommendation to the concerned Indian Governmental Instrumentality, as may be requested by the TSP from time to time, for obtaining the Consents, Clearances and Permits required for the Project.
- 5.1.4 The TSP shall be responsible for:
- a) deleted
  - b) deleted
  - c) survey and geo-technical investigation of line route in order to determine the final route of the Transmission Lines;
  - d) seeking access to the Site and other places where the Project is being executed, at its own risk and costs, including payment of any crop, tree compensation or any other compensation as may be required.



## Transmission Service Agreement

5.1.5 In case the Project involves any resettlement and rehabilitation, the resettlement and rehabilitation package will be implemented by the State Government authorities, for which the costs is to be borne by the TSP and no changes would be allowed in the Transmission Charges on account of any variation in the resettlement and rehabilitation cost. The TSP shall provide assistance on best endeavour basis, in implementation of the resettlement and rehabilitation package, if execution of such package is in the interest of expeditious implementation of the Project and is beneficial to the Project affected persons.

**5.2 Appointing Contractors:**

5.2.1 The TSP shall conform to the requirements as provided in this Agreement while appointing Contractor(s) for procurement of goods & services.

5.2.2 The appointment of such Contractor(s) shall neither relieve the TSP of any of its obligations under this Agreement nor make the Nodal Agency liable for the performance of such Contractor(s).

**5.3 Monthly Progress Reporting:**

The TSP shall provide to the CEA, Nodal Agency & Independent Engineer, on a monthly basis, progress reports along with likely completion date of each Element with regard to the Project and its execution (in accordance with prescribed form). The Nodal Agency/ CEA shall monitor the development of the Project for its timely completion for improving and augmenting the electricity system as a part of its statutory responsibility.

**5.4 Quality of Workmanship:**

The TSP shall ensure that the Project is designed, built and completed in a good workmanship using sound engineering and construction practices, and using only materials and equipment that are new and manufactured as per the MQP and following approved FQP for erection, testing & commissioning and complying with Indian /International Standards such that, the useful life of the Project will be at least thirty five (35) years from the COD of the Project.

The TSP shall ensure that all major substation equipment / component (e.g. transformers, reactors, Circuit Breakers, Instrument Transformers (IT), Surge Arresters (SA), Protection relays, clamps & connectors etc.), equipment in terminal stations of HVDC installations including Thyristor/ IGBT valves, Converter Transformers, smoothing reactors, Transformer bushings and wall bushings, GIS bus



## Transmission Service Agreement

ducts, towers and gantry structures and transmission towers or poles and line materials (conductors, earthwire, OPGW, insulator, accessories for conductors, OPGW & earthwires, hardware fittings for insulators, aviation lights etc), facilities and system shall be designed, constructed and tested (Type test, Routine tests, Factory Acceptance Test (FAT)) in accordance with relevant CEA Regulations and Indian Standards. In case Indian Standards for any particular equipment/ system/ process is not available, IEC/ IEEE or equivalent International Standards and Codes shall be followed.

### 5.5 Progress Monitoring & Quality Assurance:

- 5.5.1 The Project Execution Plan submitted by the TSP in accordance with Article 3.1.3 c) shall comprise of detailed schedule of all the equipments/items /materials required for the Project, right from procurement of raw material till the dispatch from works and receipt at the site. Further, it should also include various stages of the construction schedule up to the commissioning of the Project.
- 5.5.2 Nodal Agency, CEA & Independent Engineer shall have access at all reasonable times to the Site and to the Manufacturer's works and to all such places where the Project is being executed.
- 5.5.3 Independent Engineer shall ensure conformity of the conductor specifications with the functional specifications specified in RFP.
- 5.5.4 The Independent Engineer shall monitor the following during construction of the Project:
- a) Quality of equipments, material, foundation, structures and workmanship etc. as laid down in Article 5.4 and 6.1.4 of the TSA. Specifically, quality of Sub-station equipments, transmission line material and workmanship etc. would be checked in accordance with the Article 5.4.
  - b) Progress in the activities specified in Condition Subsequent
  - c) Verification of readiness of the elements including the statutory clearances & completion of civil works, fixing of all components and finalisation of punch points (if any) prior to charging of the elements
  - d) Progress of construction of substation and Transmission Lines

## Transmission Service Agreement

5.5.5 The progress shall be reviewed by the Independent Engineer against the Project Execution Plan. The Independent Engineer shall prepare its report on monthly basis and submit the same to Nodal Agency highlighting the progress achieved till the end of respective month vis-à-vis milestone activities, areas of concern, if any, which may result in delay in the timely completion of the Project. Based on the progress, Nodal Agency and/ or CEA shall issue written instructions to the TSP to take corrective measures, as may be prudent for the timely completion of the Project. In case of any deficiency, the Nodal Agency would be at liberty to take action in accordance with the procedure of this Agreement.

5.5.6 For any delay in commissioning any critical Element(s), as identified in Schedule 1 & Schedule 2 of this Agreement, beyond a period of 45 days shall lead to a sequestration of 10% of the Contract Performance Guarantee.

#### 5.6 Site regulations and Construction Documents

The TSP shall abide by the Safety Rules and Procedures as mentioned in Schedule 3 of this Agreement

The TSP shall retain at the Site and make available for inspection at all reasonable times, copies of the Consents, Clearances and Permits, construction drawings and other documents related to construction.

#### 5.7 Supervision of work:

The TSP shall provide all necessary superintendence for execution of the Project and its supervisory personnel shall be available to provide full-time superintendence for execution of the Project. The TSP shall provide skilled personnel who are experienced in their respective fields.

#### 5.8 Remedial Measures:

The TSP shall take all necessary actions for remedying the shortfall in achievement of timely progress in execution of the Project, if any, as intimated by the Independent Engineer and/ or CEA and/ or the Nodal Agency. However, such intimation by the Independent Engineer and/ or CEA and/ or the Nodal Agency and the subsequent effect of such remedial measures carried out by the TSP shall not relieve the TSP of its obligations in the Agreement. Independent Engineer and/ or CEA and/ or the Nodal Agency may carry out random inspections during the Project



## Transmission Service Agreement

execution, as and when deemed necessary by it. If the shortfalls as intimated to the TSP are not remedied to the satisfaction of the CEA and/ or the Nodal Agency, this Agreement may be terminated by the Nodal Agency by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement.



**ARTICLE: 6****6. CONNECTION AND COMMISSIONING OF THE PROJECT****6.1 Connection with the Inter-Connection Facilities:**

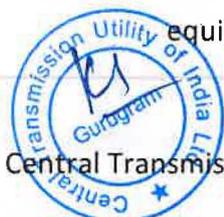
6.1.1 The TSP shall give the RLDC(s), CTU, / STU, as the case may be, and any other agencies as required, at least sixty (60) days advance written notice of the date on which it intends to connect an Element of the Project, which date shall not be earlier than its Scheduled COD or Schedule COD extended as per Article 4.4.1 & 4.4.2 of this Agreement, unless mutually agreed to by Parties. Further, any preponing of COD of any element prior to Scheduled COD must be approved by the Nodal Agency.

6.1.2 The RLDC / SLDC (as the case may be) or the CTU / STU (as the case may be), for reasonable cause, including non-availability of Interconnection Facilities as per Article 4.2, can defer the connection for up to fifteen (15) days from the date notified by the TSP pursuant to Article 6.1.1, if it notifies to the TSP in writing, before the date of connection, of the reason for the deferral and when the connection is to be rescheduled. However, no such deferment on one or more occasions would be for more than an aggregate period of thirty (30) days. Further, the Scheduled COD would be extended as required, for all such deferments on "day to day" basis.

6.1.3 Subject to Articles 6.1.1 and 6.1.2, any Element of Project may be connected with the Interconnection Facilities when:

- a. it has been completed in accordance with this Agreement and the Connection Agreement;
- b. it meets the Grid Code, Central Electricity Authority (Technical Standards for Connectivity to the Grid) Regulations, 2007 as amended from time to time and all other Indian legal requirements, and
- c. The TSP has obtained the approval in writing of the Electrical Inspector certifying that the Element is ready from the point of view of safety of supply and can be connected with the Interconnection Facilities.
- d. It has satisfactorily met all the testing requirements as per Articles 6.1.4.

6.1.4 Site Acceptance Test (SAT)/ pre-commissioning tests of all major substation equipment, component, system, facilities shall be successfully carried out before



commissioning. The Type tests, FAT and SAT reports should be available at the substation / terminal station of HVDC installations for ready reference of operation and maintenance staff and has to be made available to the Independent Engineer appointed for quality monitoring or their authorised representatives, as and when they wish to examine the same.

## 6.2 Commercial Operation:

6.2.1 An Element of the Project shall be declared to have achieved COD twenty four (24) hours following the connection of the Element with the Interconnection Facilities pursuant to Article 6.1 or seven (7) days after the date on which it is declared by the TSP to be ready for charging but is not able to be charged for reasons not attributable to the TSP subject to Article 6.1.2.

Provided that an Element shall be declared to have achieved COD only after all the Element(s), if any, which are pre-required to have achieved COD as defined in Schedule 2 of this Agreement, have been declared to have achieved their respective COD.

6.2.2 Once any Element of the Project has been declared to have achieved deemed COD as per Article 6.2.1 above, such Element of the Project shall be deemed to have Availability equal to the Target Availability till the actual charging of the Element and to this extent, TSP shall be eligible for the Monthly Transmission Charges applicable for such Element.

## 6.3 Compensation for Direct Non Natural Force Majeure Event or Indirect Non Natural Force Majeure Event or Natural Force Majeure Event (affecting the Nodal Agency)

6.3.1 If the TSP is otherwise ready to connect the Element(s) of the Project and has given due notice, as per provisions of Article 6.1.1, to the concerned agencies of the date of intention to connect the Element(s) of the Project, where such date is not before the Scheduled COD, but is not able to connect the Element(s) of the Project by the said date specified in the notice, due to Direct Non Natural Force Majeure Event or Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency, provided such Direct Non Natural Force Majeure Event or Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency has continued for a period of more than three (3) continuous or non-continuous Months, the TSP shall, until the effects of the Direct Non Natural Force



## Transmission Service Agreement

Majeure Event or of Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency no longer prevent the TSP from connecting the Element(s) of the Project, be deemed to have achieved COD relevant to that date and to this extent, be deemed to have been providing Transmission Service with effect from the date notified, and shall be treated as follows:

- a. In case of delay due to Direct Non Natural Force Majeure Event, TSP is entitled for Transmission Charges calculated on Target Availability for the period of such events in excess of three (3) continuous or non continuous Months in the manner provided in (c) below.
- b. In case of delay due to Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency, TSP is entitled for payment for debt service which is due under the Financing Agreements, subject to a maximum of Transmission Charges calculated on Target Availability, for the period of such events in excess of three (3) continuous or non continuous Months in the manner provided in (c) below.
- c. In case of delay due to Direct Non Natural Force Majeure Event or Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency, the TSP is entitled for payments mentioned in (a) and (b) above, after commencement of Transmission Service, in the form of an increase in Transmission Charges. These amounts shall be paid from the date, being the later of a) the date of cessation of such Indirect Non Natural Force Majeure Event or Natural Force Majeure Event affecting the Nodal Agency and b) the completion of sixty (60) days from the receipt of the Financing Agreements by the Nodal Agency from the TSP.

Provided such increase in Transmission Charges shall be so as to put the TSP in the same economic position as the TSP would have been in case the TSP had been paid amounts mentioned in (a) and (b) above in a situation where the Force Majeure Event had not occurred.

For the avoidance of doubt, it is clarified that the charges payable under this Article 6.3.1 shall be recovered as per Sharing Regulations.

#### 6.4 Liquidated Damages for Delay in achieving COD of Project:



## Transmission Service Agreement

6.4.1 If the TSP fails to achieve COD of any Element of the Project or the Project, by the Element's / Project's Scheduled COD or such Scheduled COD as extended under Articles 4.4.1 and 4.4.3, then the TSP shall pay to the Nodal Agency, a sum equivalent to 3.33% of Monthly Transmission Charges applicable for the Element of the Project [in case where no Elements have been defined, to be on the Project as a whole] / Project, for each day of delay up to sixty (60) days of delay and beyond that time limit, at the rate of five percent (5%) of the Monthly Transmission Charges applicable to such Element / Project, as liquidated damages for such delay and not as penalty, without prejudice to any rights of the Nodal Agency under the Agreement.

6.4.2 The TSP's maximum liability under this Article 6.4 shall be limited to the amount of liquidated damages calculated in accordance with Article 6.4.1 for and up to six (6) months of delay for the Element or the Project.

Provided that, in case of failure of the TSP to achieve COD of the Element of the Project even after the expiry of six (6) months from its Scheduled COD, the provisions of Article 13 shall apply.

6.4.3 The TSP shall make payment to the Nodal Agency of the liquidated damages calculated pursuant to Article 6.4.1 within ten (10) days of the earlier of:

- a. the date on which the applicable Element achieves COD; or
- b. the date of termination of this Agreement.

The payment of such damages shall not relieve the TSP from its obligations to complete the Project or from any other obligation and liabilities under the Agreement.

6.4.4 If the TSP fails to pay the amount of liquidated damages to the Nodal Agency within the said period of ten (10) days, the Nodal Agency shall be entitled to recover the said amount of the liquidated damages by invoking the Contract Performance Guarantee. If the then existing Contract Performance Guarantee is for an amount which is less than the amount of the liquidated damages payable by the TSP to the Nodal Agency under this Article 6.3 and the TSP fails to make payment of the balance amount of the liquidated damages not covered by the Contract Performance Guarantee, then such balance amount shall be deducted from the Transmission Charges payable to the TSP. The right of the Nodal Agency to encash



Central Transmission Utility of India Limited

37

Bikaner III Neemrana II Transmission Limited

## Transmission Service Agreement

the Contract Performance Guarantee is without prejudice to the other rights of the Nodal Agency under this Agreement.

6.4.5 For avoidance of doubt, it is clarified that amount payable by TSP under this Article is over and above the penalty payable by TSP under Article 5.5.6 of this Agreement.

### 6.5 Return of Contract Performance Guarantee

6.5.1 The Contract Performance Guarantee as submitted by TSP in accordance with Article 3.1.1 shall be released by the Nodal Agency within three (3) months from the COD of the Project. In the event of delay in achieving Scheduled COD of any of the Elements by the TSP (otherwise than due to reasons as mentioned in Article 3.1.3 or Article 11) and consequent part invocation of the Contract Performance Guarantee by the Nodal Agency, Nodal Agency shall release the Contract Performance Guarantee, if any remaining unadjusted, after the satisfactory completion by the TSP of all the requirements regarding achieving the Scheduled COD of the remaining Elements of the Project. It is clarified that the Nodal Agency shall also return / release the Contract Performance Guarantee in the event of (i) applicability of Article 3.3.2 to the extent the Contract Performance Guarantee is valid for an amount in excess of **Rs 42 Crore (Rupees Forty Two Crore Only)**, or (ii) termination of this Agreement by the Nodal Agency as mentioned under Article 3.3.4 of this Agreement.

6.5.2 The release of the Contract Performance Guarantee shall be without prejudice to other rights of the Nodal Agency under this Agreement.



**ARTICLE: 7****7. OPERATION AND MAINTENANCE OF THE PROJECT****7.1 Operation and Maintenance of the Project:**

The TSP shall be responsible for ensuring that the Project is operated and maintained in accordance with the regulations made by the Commission and CEA from time to time and provisions of the Act.



**ARTICLE: 8****8. AVAILABILITY OF THE PROJECT****8.1 Calculation of Availability of the Project:**

Calculation of Availability for the Elements and for the Project, as the case may be, shall be as per **Appendix –II to Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019**, as applicable on the Bid Deadline and as appended in Schedule 6 of this Agreement.

**8.2 Target Availability:**

The Target Availability of each Element and the Project shall be **98%**.

Payment of monthly Transmission charges based on actual availability will be calculated as per para 1.2 of Schedule 4 of this Agreement.

If the availability of any Element or the Project is below the Target Availability, for six consecutive months in a Contract Year, the DIC(s) or the Nodal Agency may issue a show cause notice to the TSP, asking them to show cause as to why the Transmission Service Agreement be not terminated, and if no satisfactory cause is shown it may terminate the Agreement. If the Nodal Agency is of the opinion that the transmission system is of critical importance, it may carry out or cause to carry out the operation and maintenance of transmission system at the risk and cost of TSP.



**ARTICLE: 9****9. INSURANCES****9.1 Insurance:**

- 9.1.1 The TSP shall effect and maintain or cause to be effected and maintained during the Construction Period and the Operating Period, adequate Insurances against such risks, with such deductibles including but not limited to any third party liability and endorsements and co-beneficiary/insured, as may be necessary under
- a. any of the Financing Agreements,
  - b. the Laws, and
  - c. in accordance with Prudent Utility Practices.

The Insurances shall be taken effective from a date prior to the date of the Financial Closure till the Expiry Date.

**9.2 Evidence of Insurance cover:**

- 9.2.1 The TSP shall furnish to the Nodal Agency copies of certificates and policies of the Insurances, as and when the Nodal Agency may seek from the TSP as per the terms of Article 9.1

**9.3 Application of Insurance Proceeds:**

- 9.3.1 Save as expressly provided in this Agreement, the policies of Insurances and the Financing Agreements, the proceeds of any insurance claim made due to loss or damage to the Project or any part of the Project shall be first applied to reinstatement, replacement or renewal of such loss or damage.
- 9.3.2 If a Natural Force Majeure Event renders the Project no longer economically and technically viable and the insurers under the Insurances make payment on a "total loss" or equivalent basis, the portion of the proceeds of such Insurance available to the TSP (after making admissible payments to the Lenders as per the Financing Agreements) shall be allocated only to the TSP. Nodal Agency and / or concerned Designated ISTS Customers shall have no claim on such proceeds of the Insurance:
- 9.3.3 Subject to the requirements of the Lenders under the Financing Agreements, any

## Transmission Service Agreement

dispute or difference between the Parties as to whether the Project is no longer economically and technically viable due to a Force Majeure Event or whether that event was adequately covered in accordance with this Agreement by the Insurances shall be determined in accordance with Article 16.

**9.4 Effect on liability of the Nodal Agency / Designated ISTS Customers**

9.4.1 The Nodal Agency and / or the Designated ISTS Customers shall have no financial obligations or liability whatsoever towards the TSP in respect of this Article 9.



**ARTICLE: 10****10. BILLING AND PAYMENT OF TRANSMISSION CHARGES**

10.1 Subject to provisions of this Article 10, the Monthly Transmission Charges shall be paid to the TSP, in Indian Rupees, on monthly basis as per the provisions of the Sharing Regulations, from the date on which an Element(s) has achieved COD until the Expiry Date of this Agreement, unless terminated earlier and in line with the provisions of Schedule 4 of this Agreement.

**10.2 Calculation of Monthly Transmission Charges:**

The Monthly Transmission Charges for each Contract Year including Incentive & Penalty payment shall be calculated in accordance with the provisions of Schedule 4 of this Agreement.

**10.3 Rebate & Late Payment Surcharge:**

The rebate and late payment surcharge shall be governed as per Sharing Regulations.

**10.4 Disputed Bills, Default in payment by the Designated ISTS Customers & Annual Reconciliation:**

Any Disputed Bill, Default in payment by the Designated ISTS Customers & Annual Reconciliation shall be governed as per Sharing Regulations.

**ARTICLE: 11****11. FORCE MAJEURE****11.1 Definitions**

11.1.1 The following terms shall have the meanings given hereunder.

**11.2 Affected Party**

11.2.1 An Affected Party means any Party whose performance has been affected by an event of Force Majeure.

11.2.2 Any event of Force Majeure shall be deemed to be an event of Force Majeure affecting the TSP only if the Force Majeure event affects and results in, late delivery of machinery and equipment for the Project or construction, completion, commissioning of the Project by Scheduled COD and/or operation thereafter;

**11.3 Force Majeure**

A 'Force Majeure' means any event or circumstance or combination of events and circumstances including those stated below that wholly or partly prevents or unavoidably delays an Affected Party in the performance of its obligations/ roles under this Agreement, but only if and to the extent that such events or circumstances are not within the reasonable control, directly or indirectly, of the Affected Party and could not have been avoided if the Affected Party had taken reasonable care or complied with Prudent Utility Practices:

**a) Natural Force Majeure Events:**

- i. act of God, including, but not limited to drought, fire and explosion (to the extent originating from a source external to the Site), earthquake, volcanic eruption, landslide, flood, cyclone, typhoon, tornado, or exceptionally adverse weather conditions, which are in excess of the statistical measures for the last hundred (100) years; and
- ii. epidemic/ pandemic notified by Indian Governmental Instrumentality.

**b) Non-Natural Force Majeure Events:**

- i. Direct Non-Natural Force Majeure Events



## Transmission Service Agreement

- Nationalization or compulsory acquisition by any Indian Governmental Instrumentality of any material assets or rights of the Affected Party; or
- the unlawful, unreasonable or discriminatory revocation of, or refusal to renew, any Consents, Clearances and Permits required by the Affected Party to perform their obligations/ roles under the RFP Project Documents or any unlawful, unreasonable or discriminatory refusal to grant any other Consents, Clearances and Permits required for the development/ operation of the Project, provided that a Competent Court of Law declares the revocation or refusal to be unlawful, unreasonable and discriminatory and strikes the same down; or
- any other unlawful, unreasonable or discriminatory action on the part of an Indian Governmental Instrumentality which is directed against the Project, provided that a Competent Court of Law declares the action to be unlawful, unreasonable and discriminatory and strikes the same down.

ii. Indirect Non - Natural Force Majeure Events

- act of war (whether declared or undeclared), invasion, armed conflict or act of foreign enemy, blockade, embargo, revolution, riot, insurrection, terrorist or military action; or
- radio active contamination or ionising radiation originating from a source in India or resulting from any other Indirect Non Natural Force Majeure Event mentioned above, excluding circumstances where the source or cause of contamination or radiation is brought or has been brought into or near the Site by the Affected Party or those employed or engaged by the Affected Party; or
- industry-wide strikes and labour disturbances, having a nationwide impact in India.

#### 11.4 Force Majeure Exclusions

11.4.1 Force Majeure shall not include (i) any event or circumstance which is within the reasonable control of the Parties and (ii) the following conditions, except to the



*Handwritten signature*

## Transmission Service Agreement

extent that they are consequences of an event of Force Majeure:

- (a) Unavailability, late delivery, or changes in cost of the machinery, equipment, materials, spare parts etc. for the Project;
- (b) Delay in the performance of any Contractors or their agents;
- (c) Non-performance resulting from normal wear and tear typically experienced in transmission materials and equipment;
- (d) Strikes or labour disturbance at the facilities of the Affected Party;
- (e) Insufficiency of finances or funds or the Agreement becoming onerous to perform; and
- (f) Non-performance caused by, or connected with, the Affected Party's:
  - i. negligent or intentional acts, errors or omissions;
  - ii. failure to comply with an Indian Law; or
  - iii. breach of, or default under this Agreement or any Project Documents.
- (g) Any error or omission in the survey report provided by BPC during the bidding process.

### 11.5 Notification of Force Majeure Event

11.5.1 The Affected Party shall give notice to the other Party of any event of Force Majeure as soon as reasonably practicable, but not later than seven (7) days after the date on which such Party knew or should reasonably have known of the commencement of the event of Force Majeure. If an event of Force Majeure results in a breakdown of communications rendering it unreasonable to give notice within the applicable time limit specified herein, then the Party claiming Force Majeure shall give such notice as soon as reasonably practicable after reinstatement of communications, but not later than one (1) day after such reinstatement.

Provided that, such notice shall be a pre-condition to the Affected Party's entitlement to claim relief under this Agreement. Such notice shall include full particulars of the event of Force Majeure, its effects on the Party claiming relief and the remedial measures proposed. The Affected Party shall give the other Party

## Transmission Service Agreement

regular reports on the progress of those remedial measures and such other information as the other Party may reasonably request about the Force Majeure.

11.5.2 The Affected Party shall give notice to the other Party of (i) the cessation of the relevant event of Force Majeure; and (ii) the cessation of the effects of such event of Force Majeure on the performance of its rights or obligations/ roles under this Agreement, as soon as practicable after becoming aware of each of these cessations.

#### 11.6 Duty to perform and duty to mitigate

To the extent not prevented by a Force Majeure Event, the Affected Party shall continue to perform its obligations/ roles as provided in this Agreement. The Affected Party shall use its reasonable efforts to mitigate the effect of any event of Force Majeure as soon as practicable.

#### 11.7 Available Relief for a Force Majeure Event

Subject to this Article 11,

- (a) no Party shall be in breach of its obligations/ roles pursuant to this Agreement to the extent that the performance of its obligations/ roles was prevented, hindered or delayed due to a Force Majeure Event;
- (b) each Party shall be entitled to claim relief for a Force Majeure Event affecting its performance in relation to its obligations/ roles under Articles 3.3.4, 4.4.2 and 6.3.1 of this Agreement.
- (c) For the avoidance of doubt, it is clarified that the computation of Availability of the Element(s) under outage due to Force Majeure Event, as per Article 11.3 affecting the TSP shall be as per **Appendix-II to Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019** as on Bid Deadline. For the event(s) for which the Element(s) is/are deemed to be available as per **Appendix -II to Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019**, then the Transmission Charges, as applicable to such Element(s), shall be payable as per Schedule 4, for the duration of such event(s).
- (d) For so long as the TSP is claiming relief due to any Force Majeure Event under this Agreement, the Nodal Agency may, if it so desires, from time to time on one (1) day notice, inspect the Project and the TSP shall provide the Nodal



## Transmission Service Agreement

Agency's personnel with access to the Project to carry out such inspections.

- (e) For avoidance of doubt, the TSP acknowledges that for extension of Scheduled COD a period up to one hundred eighty (180) days due to Force Majeure event, no compensation on the grounds such as interest cost, incident expenditure, opportunity cost will be made to the TSP. However, if Scheduled COD is extended beyond a period of one hundred eighty (180) days due to Force Majeure event, the TSP will be allowed to recover the interest cost during construction corresponding to the period exceeding one hundred eighty (180) days by adjustment in the Transmission Charges in accordance with Schedule 9.



**ARTICLE: 12****12. CHANGE IN LAW****12.1 Change in Law**

12.1.1 Change in Law means the occurrence of any of the following after the Bid Deadline resulting into any additional recurring / non-recurring expenditure by the TSP or any savings of the TSP:

- the enactment, coming into effect, adoption, promulgation, amendment, modification or repeal (without re-enactment or consolidation) in India, of any Law, including rules and regulations framed pursuant to such Law, subject to the provisions under Article 12.1.2;
- a change in the interpretation or application of any Law by any Indian Governmental Instrumentality having the legal power to interpret or apply such Law, or any Competent Court of Law;
- the imposition of a requirement for obtaining any Consents, Clearances and Permits which was not required earlier;
- a change in the terms and conditions prescribed for obtaining any Consents, Clearances and Permits or the inclusion of any new terms or conditions for obtaining such Consents, Clearances and Permits;
- any change in the licensing regulations of the Commission, under which the Transmission License for the Project was granted if made applicable by such Commission to the TSP;
- change in wind zone; or
- any change in tax or introduction of any tax made applicable for providing Transmission Service by the TSP as per the terms of this Agreement.

12.1.2 Notwithstanding anything contained in this Agreement, Change in Law shall not cover any change:

- a) Taxes on corporate income; and
- b) Withholding tax on income or dividends distributed to the shareholders of the TSP.



## Transmission Service Agreement

**12.2 Relief for Change in Law**

12.2.1 During Construction Period, the impact of increase/decrease in the cost of the Project on the Transmission Charges shall be governed by the formula given in Schedule 9 of this Agreement

12.2.2 During the Operation Period:

During the operation period, if as a result of Change in Law, the TSP suffers or is benefited from a change in costs or revenue, the aggregate financial effect of which exceeds 0.30% (zero point three percent) of the Annual Transmission Charges in aggregate for a Contract Year, the TSP may notify so to the Nodal Agency and propose amendments to this Agreement so as to place the TSP in the same financial position as it would have enjoyed had there been no such Change in Law resulting in change in costs or revenue as aforesaid.

12.2.3 For any claims made under Articles 12.2.1 and 12.2.2 above, the TSP shall provide to the Nodal Agency documentary proof of such increase / decrease in cost of the Project / revenue for establishing the impact of such Change in Law.

In cases where Change in Law results in decrease of cost and it comes to the notice of Nodal Agency that TSP has not informed Nodal Agency about such decrease in cost, Nodal Agency may initiate appropriate claim.

**12.3 Notification of Change in Law:**

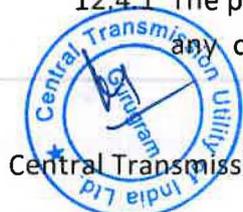
12.3.1 If the TSP is affected by a Change in Law in accordance with Article 12.1 and wishes to claim relief for such Change in Law under this Article 12, it shall give notice to Nodal Agency of such Change in Law as soon as reasonably practicable after becoming aware of the same.

12.3.2 The TSP shall also be obliged to serve a notice to the Nodal Agency even when it is beneficially affected by a Change in Law.

12.3.3 Any notice served pursuant to Articles 12.3.1 and 12.3.2 shall provide, amongst other things, precise details of the Change in Law and its estimated impact on the TSP.

**12.4 Payment on account of Change in Law**

12.4.1 The payment for Change in Law shall be through a separate Bill. However, in case of any change in Monthly Transmission Charges by reason of Change in Law, as



Transmission Service Agreement

determined in accordance with this Agreement, the Bills to be raised by the Nodal Agency after such change in Transmission Charges shall appropriately reflect the changed Monthly Transmission Charges.



Central Transmission Utility of India Limited

51 Bikaner III Neemrana II Transmission Limited



**ARTICLE: 13****13. EVENTS OF DEFAULT AND TERMINATION****13.1 TSP's Event of Default**

The occurrence and continuation of any of the following events shall constitute a TSP Event of Default, unless any such TSP Event of Default occurs as a result of any non-fulfilment of its obligations as prescribed under this Agreement by the Nodal Agency or a Force Majeure Event:

- a. After having taken up the construction of the Project, the abandonment by the TSP or the TSP's Contractors of the construction of the Project for a continuous period of two (2) months and such default is not rectified within thirty (30) days from the receipt of notice from the Nodal Agency in this regard;
- b. The failure to commission any Element of the Project by the date falling six (6) months after its Scheduled COD unless extended by Nodal Agency as per provisions of this Agreement;
- c. If the TSP:
  - i. assigns, mortgages or charges or purports to assign, mortgage or charge any of its assets or rights related to the Project in contravention of the provisions of this Agreement; or
  - ii. transfers or novates any of its obligations pursuant to this Agreement, in a manner contrary to the provisions of this Agreement;

Except where such transfer is in pursuance of a Law and

- it does not affect the ability of the transferee to perform, and such transferee has the financial and technical capability to perform, its obligations under this Agreement;
- is to a transferee who assumes such obligations under the Project and this Agreement remains effective with respect to the transferee;

d. If:



## Transmission Service Agreement

- i. The TSP becomes voluntarily or involuntarily the subject of any bankruptcy or insolvency or winding up proceedings and such proceedings remain uncontested for a period of thirty (30) days; or
- ii. any winding up or bankruptcy or insolvency order is passed against the TSP; or
- iii. the TSP goes into liquidation or dissolution or a receiver or any similar officer is appointed over all or substantially all of its assets or official liquidator is appointed to manage its affairs, pursuant to Law,

Provided that a dissolution or liquidation of the TSP will not be a TSP's Event of Default, where such dissolution or liquidation of the TSP is for the purpose of a merger, consolidation or reorganization with the prior approval of the Commission as per the provisions of Central Electricity Regulatory Commission (Procedure, terms and Conditions for grant of Transmission License and other related matters) Regulations, 2006 or as amended from time to time; or

- e. Failure on the part of the TSP to comply with the provisions of Article 19.1 of this Agreement; or
- f. the TSP repudiates this Agreement and does not rectify such breach even within a period of thirty (30) days from a notice from the Nodal Agency in this regard; or
- g. after Commercial Operation Date of the Project, the TSP fails to achieve monthly Target Availability of 98% for a period of six (6) consecutive months or within a non-consecutive period of six (6) months within any continuous aggregate period of eighteen(18) months except where the Availability is affected by Force Majeure Events as per Article 11; or
- h. any of the representations and warranties made by the TSP in Article 17 of this Agreement being found to be untrue or inaccurate. Further, in addition to the above, any of the undertakings submitted by the Selected Bidder at the time of submission of the Bid being found to be breached or inaccurate, including but not limited to undertakings



## Transmission Service Agreement

from its Parent Company / Affiliates related to the minimum equity obligation; or

- i. the TSP fails to complete / fulfil all the activities / conditions within the specified period as per Article 3; or
- j. except for the reasons solely attributable to Nodal Agency, the TSP is in material breach of any of its obligations under this Agreement and such material breach is not rectified by the TSP within thirty (30) days of receipt of notice in this regard from the Nodal Agency; or
- k. deleted

### 13.2 Termination Procedure for TSP Event of Default

- a. Upon the occurrence and continuance of any TSP's Event of Default under Article 13.1 the Nodal Agency may serve notice on the TSP, with a copy to the CEA and the Lenders' Representative, of their intention to terminate this Agreement (a "Nodal Agency's Preliminary Termination Notice"), which shall specify in reasonable detail, the circumstances giving rise to such Nodal Agency's Preliminary Termination Notice.
- b. Following the issue of a Nodal Agency's Preliminary Termination Notice, the Consultation Period shall apply and would be for the Parties to discuss as to what steps shall be taken with a view to mitigate the consequences of the relevant Event of Default having regard to all the circumstances.
- c. During the Consultation Period, the Parties shall, save as otherwise provided in this Agreement, continue to perform their respective obligations/ roles under this Agreement, and the TSP shall not remove any material, equipment or any part of the Project, without prior consent of the Nodal Agency.

Following the expiry of the Consultation Period, unless the Parties shall have otherwise agreed to the contrary or the circumstances giving rise to Nodal Agency's Preliminary Termination Notice shall have ceased to exist or shall have been remedied, this Agreement may be terminated by the Nodal Agency by giving a Termination Notice to the TSP, in writing, of at least seven (7) days, with a copy to CEA and the Lenders' Representative in order to enable the Lenders to exercise right of substitution in accordance with Article 15.3 of this Agreement.



## Transmission Service Agreement

Further, the Nodal Agency may also initiate proceedings to blacklist the TSP & its Affiliates from participation in any RFP issued by BPCs for a period of 5 years.

### 13.3 Procedure for Nodal Agency's non-fulfilment of Role

- a. Upon the Nodal Agency not being able to fulfil its role under Article 4.2, the TSP may serve notice on the Nodal Agency, with a copy to CEA and the Lenders' Representative (a "TSP's Preliminary Notice"), which notice shall specify in reasonable detail the circumstances giving rise to such non-fulfilment of role by the Nodal Agency.
- b. Following the issue of a TSP's Preliminary Notice, the Consultation Period shall apply.
- c. The Consultation Period would be for the Parties to discuss as to what steps shall be taken with a view to mitigate the consequences of the relevant non-fulfilment of role by the Nodal Agency including giving time extension to TSP, having regard to all the circumstances.
- d. During the Consultation Period, both Parties shall, save as otherwise provided in this Agreement, continue to perform their respective obligations/ roles under this Agreement.

### 13.4 Termination due to Force Majeure

13.4.1 In case the Parties could not reach an agreement pursuant to Articles 3.3.4 and 4.4.2 of this Agreement and the Force Majeure Event or its effects continue to be present, the Nodal Agency shall have the right to cause termination of the Agreement. In case of such termination, the Contract Performance Guarantee shall be returned to the TSP as per the provisions of Article 6.5.1.

13.4.2 In case of termination of this Agreement, the TSP shall provide to the Nodal Agency the full names and addresses of its Contractors as well as complete designs, design drawings, manufacturing drawings, material specifications and technical information, as required by the Nodal Agency within thirty (30) days of Termination Notice.



Central Transmission Utility of India Limited

55 Bikaner III Neemrana II Transmission Limited

## Transmission Service Agreement

**13.5 Termination or amendment due to non-requirement of any Element or Project during construction**

13.5.1 In case any Element or Project, which is under construction, is no longer required due to any reason whatsoever, the Nodal Agency may issue a notice to this effect to the TSP.

13.5.2 Nodal agency may also issue notice to the TSP seeking their response to the proposed termination/ amendment (as the case may be) of the Agreement. The Nodal Agency shall issue copy of such notice to Lenders. In the notice, Nodal Agency shall also include an assessment of the physical progress made by TSP in the Element/ Project (as the case may be) that is no longer required.

13.5.3 The TSP shall neither carry out further investment nor carry out any work on the Element/ Project (as the case may be) that is no longer required after delivery of the notice.

13.5.4 After taking into account the comments of the TSP, the Nodal Agency may terminate the Agreement or amend it if both Parties agree to the amendment.

**13.6 Revocation of the Transmission License**

13.6.1 The Commission may, as per the provisions of the Electricity Act, 2003, revoke the Transmission License of the ISTS Licensee. Further, in such a case, the Agreement shall be deemed to have been terminated.

**13.7 Termination Payment**

13.7.1 If Agreement is terminated on account of Force Majeure Events, non-requirement of any Element or Project during Construction, Nodal Agency's non-fulfilment of Role & TSP's Event of Default, the TSP shall be entitled for Termination Payment equivalent to valuation of Project Assets. Upon payment, the Nodal Agency shall take over the Project Assets.



**ARTICLE: 14****14. LIABILITY AND INDEMNIFICATION****14.1 Indemnity**

14.1.1 The TSP shall indemnify, defend and hold the Nodal Agency harmless against:

- (a) any and all third party claims, actions, suits or proceedings against the Nodal Agency for any loss of or damage to property of such third party, or death or injury to such third party, arising out of a breach by the TSP of any of its obligations under this Agreement, except to the extent that any such claim, action, suit or proceeding has arisen due to a negligent act or omission, breach of this Agreement or non-fulfilment of statutory duty on the part of Nodal Agency; and
- (b) any and all losses, damages, costs and expenses including legal costs, fines, penalties and interest actually suffered or incurred by the Nodal Agency from third party claims arising by reason of:
  - i. a breach by the TSP of any of its obligations under this Agreement, (provided that this Article 14 shall not apply to such breaches by the TSP, for which specific remedies have been provided for under this Agreement) except to the extent that any such losses, damages, costs and expenses including legal costs, fines, penalties and interest (together to constitute "Indemnifiable Losses") has arisen due to a negligent act or omission, breach of this Agreement or non-fulfilment of statutory duty on the part of the Nodal Agency, or
  - ii. any of the representations and warranties of the TSP under this Agreement being found to be inaccurate or untrue.

14.1.2 The Nodal Agency shall, in accordance with the Regulations framed by CERC in this regard, indemnify, defend and hold the TSP harmless against:

- (a) any and all third party claims, actions, suits or proceedings against the TSP, for any loss of or damage to property of such third party, or death or injury to such third party, arising out of any material breach by the Nodal Agency of any of their roles under this Agreement, except to the extent that any such claim, action, suit or proceeding has arisen due to a negligent act or omission,



## Transmission Service Agreement

breach of this Agreement or breach of statutory duty on the part of the TSP, its Contractors, servants or agents; and

- (b) any and all losses, damages, costs and expenses including legal costs, fines, penalties and interest ('Indemnifiable Losses') actually suffered or incurred by the TSP from third party claims arising by reason of:
- i. any material breach by the Nodal Agency of any of its roles under this Agreement (provided that, this Article 14 shall not apply to such breaches by the Nodal Agency, for which specific remedies have been provided for under this Agreement), except to the extent that any such Indemnifiable Losses have arisen due to a negligent act or omission, breach of this Agreement or breach of statutory duty on the part of the TSP, its Contractors, servants or agents or
  - ii. any of the representations and warranties of the Nodal Agency under this Agreement being found to be inaccurate or untrue.

#### 14.2 Patent Indemnity:

##### 14.2.1

- (a) The TSP shall, subject to the Nodal Agency's compliance with Article 14.2.1 (b), indemnify and hold harmless the Nodal Agency and its employees and officers from and against any and all suits, actions or administrative proceedings, claims, demands, losses, damages, costs, and expenses of whatsoever nature, including attorney's fees and expenses, which the Nodal Agency may suffer as a result of any infringement or alleged infringement of any patent, utility model, registered design, trademark, copyright or other intellectual property right registered or otherwise existing at the date of the Agreement by reason of the setting up of the Project by the TSP.

Such indemnity shall not cover any use of the Project or any part thereof other than for the purpose indicated by or to be reasonably inferred from the Agreement, any infringement resulting from the misuse of the Project or any part thereof, or any products produced in association or combination with any other equipment, plant or materials not supplied by the TSP, pursuant to the Agreement.

If any proceedings are brought or any claim is made against the Nodal Agency



## Transmission Service Agreement

arising out of the matters referred to in Article 14.2.1(a), the Nodal Agency shall promptly give the TSP a notice thereof, and the TSP shall at its own expense take necessary steps and attend such proceedings or claim and any negotiations for the settlement of any such proceedings or claim. The TSP shall promptly notify the Nodal Agency of all actions taken in such proceedings or claims.

- (c) If the TSP fails to notify the Nodal Agency within twenty-eight (28) days after receipt of such notice from the Nodal Agency under Article 14.2.1(b) above, that it intends to attend any such proceedings or claim, then the Nodal Agency shall be free to attend the same on their own behalf at the cost of the TSP. Unless the TSP has so failed to notify the Nodal Agency within the twenty eight (28) days period, the Nodal Agency shall make no admission that may be prejudicial to the defence of any such proceedings or claims.
- (d) The Nodal Agency shall, at the TSP's request, afford all available assistance to the TSP in attending to such proceedings or claim, and shall be reimbursed by the TSP for all reasonable expenses incurred in so doing.

## 14.2.2

- (a) The Nodal Agency, in accordance with the Regulations framed by CERC in this regard, subject to the TSP's compliance with Article 14.2.2(b) shall indemnify and hold harmless the TSP and its employees, officers from and against any and all suits, actions or administrative proceedings, claims, demands, losses, damages, costs and expenses of whatsoever nature, including attorney's fees and expenses, which the TSP may suffer as a result of any infringement or alleged infringement of any patent, utility model, registered design, trademark, copyright or other intellectual property right registered or otherwise existing at the date of the Agreement by reason of the setting up of the Project by the TSP.
- (b) If any proceedings are brought or any claim is made against the TSP arising out of the matters referred to in Article 14.2.2 (a) the TSP shall promptly give the Nodal Agency a notice thereof, and the Nodal Agency shall at its own expense take necessary steps and attend such proceedings or claim and any negotiations for the settlement of any such proceedings or claim. The Nodal Agency shall promptly notify the TSP of all actions taken in such proceedings or claims.



## Transmission Service Agreement

- (c) If the Nodal Agency fails to notify the TSP within twenty-eight (28) days after receipt of such notice from the TSP under Article 14.2.2(b) above, that it intends to attend any such proceedings or claim, then the TSP shall be free to attend the same on its own behalf at the cost of the Nodal Agency. Unless the Nodal Agency has so failed to notify the TSP within the twenty (28) days period, the TSP shall make no admission that may be prejudicial to the defence of any such proceedings or claim.
- (d) The TSP shall, at the Nodal Agency request, afford all available assistance to the Nodal Agency in attending to such proceedings or claim, and shall be reimbursed by the Nodal Agency for all reasonable expenses incurred in so doing.

**14.3 Monetary Limitation of liability**

14.3.1 A Party ("Indemnifying Party") shall be liable to indemnify the other Party ("Indemnified Party") under this Article 14 for any indemnity claims made in a Contract Year only up to an amount of **Rs. 2.80 Crore (Rupees Two Crore Eighty Lakh Only)**.

**14.4 Procedure for claiming indemnity**

14.4.1 Where the Indemnified Party is entitled to indemnification from the Indemnifying Party pursuant to Articles 14.1 or 14.2 the Indemnified Party shall promptly notify the Indemnifying Party of such claim, proceeding, action or suit referred to in Articles 14.1 or 14.2 in respect of which it is entitled to be indemnified. Such notice shall be given as soon as reasonably practicable after the Indemnified Party becomes aware of such claim, proceeding, action or suit. The Indemnifying Party shall be liable to settle the indemnification claim within thirty (30) days of receipt of the above notice.

Provided however that, if:

- i. the Parties choose to contest, defend or litigate such claim, action, suit or proceedings in accordance with Article 14.4.3 below; and
- ii. the claim amount is not required to be paid/deposited to such third party pending the resolution of the Dispute,

the Indemnifying Party shall become liable to pay the claim amount to the Indemnified Party or to the third party, as the case may be, promptly following the



## Transmission Service Agreement

resolution of the Dispute, if such Dispute is not settled in favour of the Indemnified Party.

14.4.2 The Indemnified Party may contest, defend and litigate a claim, action, suit or proceeding for which it is entitled to be indemnified under Articles 14.1 or 14.2 and the Indemnifying Party shall reimburse to the Indemnified Party all reasonable costs and expenses incurred by the Indemnified Party. However, such Indemnified Party shall not settle or compromise such claim, action, suit or proceedings without first getting the consent of the Indemnifying Party, which consent shall not be unreasonably withheld or delayed.

14.4.3 An Indemnifying Party may, at its own expense, assume control of the defence of any proceedings brought against the Indemnified Party if it acknowledges its obligation to indemnify such Indemnified Party, gives such Indemnified Party prompt notice of its intention to assume control of the defence, and employs an independent legal counsel at its own cost that is reasonably satisfactory to the Indemnified Party.

#### 14.5 Limitation on Liability

14.5.1 Except as expressly provided in this Agreement, neither the TSP nor the Nodal Agency nor their respective officers, directors, agents, employees or Affiliates (including, officers, directors, agents or employees of such Affiliates), shall be liable or responsible to the other Party or its Affiliates including its officers, directors, agents, employees, successors, insurers or permitted assigns for incidental, indirect or consequential, punitive or exemplary damages, connected with or resulting from performance or non-performance of this Agreement, or anything done in connection herewith, including claims in the nature of lost revenues, income or profits (other than payments expressly required and properly due under this Agreement), any increased expense of, reduction in or loss of transmission capacity or equipment used therefore, irrespective of whether such claims are based upon breach of warranty, tort (including negligence, whether of the Nodal Agency, the TSP or others), strict liability, contract, breach of statutory duty, operation of law or otherwise.

14.5.2 The Nodal Agency shall have no recourse against any officer, director or shareholder of the TSP or any Affiliate of the TSP or any of its officers, directors or shareholders for such claims excluded under this Article. The TSP shall also have no recourse against any officer, director or shareholder of the Nodal Agency, or any Affiliate of



## Transmission Service Agreement

the Nodal Agency or any of its officers, directors or shareholders for such claims excluded under this Article.

**14.6 Duty to Mitigate**

The party entitled to the benefit of an indemnity under this Article 14 shall take all reasonable measures to mitigate any loss or damage which has occurred. If the Party fails to take such measures, the other Party's liabilities shall be correspondingly reduced.



**ARTICLE: 15****15. ASSIGNMENTS AND CHARGES****15.1 Assignments:**

15.1.1 This Agreement shall be binding upon, and inure to the benefit of the Parties and their respective successors and permitted assigns. This Agreement shall not be assigned by any Party, except as provided in Article 15.3.

**15.2 Permitted Charges:**

15.2.1 Neither Party shall create or permit to subsist any encumbrance over all or any of its rights and benefits under this Agreement.

15.2.2 However, the TSP may create any encumbrance over all or part of the receivables, or the Project Assets of the Project in favour of the Lenders or the Lenders' Representative on their behalf, as security for amounts payable under the Financing Agreements and any other amounts agreed by the Parties.

Provided that:

- i. the Lenders or the Lenders' Representative on their behalf shall have entered into the Financing Agreements and agreed in writing to the provisions of this Agreement; and
- ii. any encumbrance granted by the TSP in accordance with this Article 15.2.2 shall contain provisions pursuant to which the Lenders or the Lender's Representative on their behalf agrees unconditionally with the TSP to release from such encumbrances upon payment by the TSP to the Lenders of all amounts due under the Financing Agreements.

15.2.3 Article 15.2.1 does not apply to:

- a. liens arising by operation of law (or by an agreement evidencing the same) in the ordinary course of the TSP developing and operating the Project;
- b. pledges of goods, the related documents of title and / or other related documents, arising or created in the ordinary course of the TSP developing and operating the Project; or



Central Transmission Utility of India Limited

63

Bikaner III Neemrana II Transmission Limited

## Transmission Service Agreement

- c. security arising out of retention of title provisions in relation to goods acquired in the ordinary course of the TSP developing and operating the Project.

**15.3 Substitution Rights of the Lenders**

15.3.1 The TSP would need to operate and maintain the Project under the provisions of this Agreement and cannot assign the Transmission License or transfer the Project or part thereof to any person by sale, lease, exchange or otherwise, without the prior approval of the Nodal Agency.

15.3.2 However, in the case of default by the TSP in debt repayments or in the case of default by the TSP as per Article 13 of this Agreement during the debt repayments, the Commission may, on an application from the Lenders, assign the Transmission License to the nominee of the Lenders subject to the fulfilment of the qualification requirements and provisions of the Central Electricity Regulatory Commission (Procedure, terms and Conditions for grant of Transmission License and other related matters) Regulations, 2006 and as amended from time to time.



**ARTICLE: 16****16. GOVERNING LAW AND DISPUTE RESOLUTION****16.1 Governing Law:**

This Agreement shall be governed by and construed in accordance with the Laws of India. Any legal proceedings in respect of any matters, claims or disputes under this Agreement shall be under the jurisdiction of appropriate courts in Delhi.

**16.2 Amicable Settlement:**

16.2.1 Either Party is entitled to raise any claim, dispute or difference of whatever nature arising under, out of or in connection with this Agreement, including its existence or validity or termination or whether during the execution of the Project or after its completion and whether prior to or after the abandonment of the Project or termination or breach of the Agreement by giving a written notice to the other Party, which shall contain:

- (i) a description of the Dispute;
- (ii) the grounds for such Dispute; and
- (iii) all written material in support of its claim.

16.2.2 The other Party shall, within thirty (30) days of issue of notice issued under Article 16.2.1, furnish:

- (i) counter-claim and defences, if any, regarding the Dispute; and
- (ii) all written material in support of its defences and counter-claim.

16.2.3 Within thirty (30) days of issue of notice by the Party pursuant to Article 16.2.1, if the other Party does not furnish any counter claim or defense under Article 16.2.2, or thirty (30) days from the date of furnishing counter claims or defence by the other Party, both the Parties to the Dispute shall meet to settle such Dispute amicably. If the Parties fail to resolve the Dispute amicably within thirty (30) days from the later of the dates mentioned in this Article 16.2.3, the Dispute shall be referred for dispute resolution in accordance with Article 16.3.

**16.3 Dispute Resolution:**

Central Transmission Utility of India Limited

65

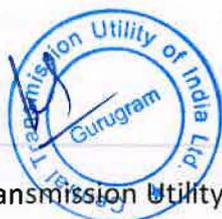
Bikaner III Neemrana II Transmission Limited

## Transmission Service Agreement

All Disputes shall be adjudicated by the Commission.

**16.4 Parties to Perform Obligations:**

Notwithstanding the existence of any Dispute and difference referred to the Commission as provided in Article 16.3 and save as the Commission may otherwise direct by a final or interim order, the Parties hereto shall continue to perform their respective obligations/ roles (which are not in dispute) under this Agreement.



Central Transmission Utility of India Limited

66

Bikaner III Neemrana II Transmission Limited

**ARTICLE: 17****17. REPRESENTATION AND WARRANTIES****17.1 Representation and warranties of the Nodal Agency**

17.1.1 The Nodal Agency hereby represents and warrants to and agrees with the TSP as follows and acknowledges and confirms that the TSP is relying on such representations and warranties in connection with the transactions described in this Agreement:

- a. It has all requisite powers and authority to execute and consummate this Agreement;
- b. This Agreement is enforceable against the Nodal Agency in accordance with its terms;
- c. The consummation of the transactions contemplated by this Agreement on the part of Nodal Agency will not violate any provision of nor constitute a default under, nor give rise to a power to cancel any charter, mortgage, deed of trust or lien, lease, agreement, license, permit, evidence of indebtedness, restriction, or other contract to which the Nodal Agency is a Party or to which the Nodal Agency is bound, which violation, default or power has not been waived;

**17.2 Representation and Warranties of the TSP:**

17.2.1 The TSP hereby represents and warrants to and agrees with the Nodal Agency as follows and acknowledges and confirms that the Nodal Agency is relying on such representations and warranties in connection with the transactions described in this Agreement:

- a. It has all requisite powers and has been duly authorized to execute and consummate this Agreement;
- b. This Agreement is enforceable against it, in accordance with its terms;
- c. The consummation of the transactions contemplated by this Agreement on the part of the TSP will not violate any provision of nor constitute a default under, nor give rise to a power to cancel any charter, mortgage, deed of trust or lien, lease, agreement, license, permit, evidence of indebtedness,



**Transmission Service Agreement**

restriction, or other contract to which the TSP is a Party or to which the TSP is bound which violation, default or power has not been waived;

- d. The TSP is not insolvent and no insolvency proceedings have been instituted, nor threatened or pending by or against the TSP;
- e. There are no actions, suits, claims, proceedings or investigations pending or, to the best of the TSP's knowledge, threatened in writing against the TSP at law, in equity, or otherwise, and whether civil or criminal in nature, before or by, any court, commission, arbitrator or governmental agency or authority, and there are no outstanding judgments, decrees or orders of any such courts, commission, arbitrator or governmental agencies or authorities, which materially adversely affect its ability to execute the Project or to comply with its obligations under this Agreement.

17.2.2 The TSP makes all the representations and warranties above to be valid as on the Effective Date of this Agreement.



**ARTICLE: 18****18. INDEPENDENT ENGINEER****18.1 Appointment of Independent Engineer**

The Nodal Agency shall appoint an agency/ company as Independent Engineer as per framework provided in the Guidelines for Encouraging Competition in Development of Transmission Projects for selection of Independent Engineer.

**18.2 Roles and functions of Independent Engineer**

The role and functions of the Independent Engineer shall include the following:

- a. Progress Monitoring as required under this Agreement;
- b. Ensuring Quality as required under this Agreement;
- c. determining, as required under the Agreement, the costs of any works or services and/or their reasonableness during construction phase;
- d. determining, as required under the Agreement, the period or any extension thereof, for performing any duty or obligation during construction phase;
- e. determining, as required under the Agreement, the valuation of the Project Assets.
- f. Assisting the Parties in resolution of Disputes and
- g. Undertaking all other duties and functions in accordance with the Agreement.

**18.3 Remuneration of Independent Engineer**

The fee and charges of the Independent Engineer shall be paid by the Nodal Agency as per terms & conditions of appointment.

**18.4 Termination of appointment**

18.4.1 The Nodal Agency may, in its discretion, terminate the appointment of the Independent Engineer at any time, but only after appointment of another Independent Engineer.



## Transmission Service Agreement

18.4.2 If the TSP has reason to believe that the Independent Engineer is not discharging its duties and functions in a fair, efficient and diligent manner, it may make a written representation to the Nodal Agency and seek termination of the appointment of the Independent Engineer. Upon receipt of such representation, the Nodal Agency shall hold a tripartite meeting with the TSP and Independent Engineer for an amicable resolution, and the decision of Nodal agency is final. In the event that the appointment of the Independent Engineer is terminated hereunder, the Nodal Agency shall appoint forthwith another Independent Engineer.

**18.5 Authorised signatories**

The Nodal Agency shall require the Independent Engineer to designate and notify to the Nodal Agency up to 2 (two) persons employed in its firm to sign for and on behalf of the Independent Engineer, and any communication or document required to be signed by the Independent Engineer shall be valid and effective only if signed by any of the designated persons; provided that the Independent Engineer may, by notice in writing, substitute any of the designated persons by any of its employees.



**ARTICLE: 19****19. MISCELLANEOUS PROVISIONS****19.1 Equity Lock-in Commitment:**

19.1.1 The aggregate equity share holding of the Selected Bidder in the issued and paid up equity share capital of Bikaner III Neemrana II Transmission Limited shall not be less than Fifty one percent (51%) up to a period of one (1) year after COD of the Project.

Provided that, in case the Lead Member or Bidding Company is holding equity through Affiliate/s, Ultimate Parent Company or Parent Company, such restriction as specified above shall apply to such entities.

Provided further, that in case the Selected Bidder is a Bidding Consortium, the Lead Member shall continue to hold equity of at least twenty six percent (26%) upto a period of one (1) year after COD of the Project and any Member of such Bidding Consortium shall be allowed to divest its equity as long as the other remaining Members (which shall always include the Lead Member) hold the minimum equity specified above.

19.1.2 If equity is held by the Affiliates, Parent Company or Ultimate Parent Company of the Selected Bidder, then, subject to the second proviso to Article 19.1.1, such Affiliate, Parent Company or Ultimate Parent Company shall be eligible to transfer its shareholding in Bikaner III Neemrana II Transmission Limited to another Affiliate or to the Parent Company / Ultimate Parent Company of the Selected Bidder. If any such shareholding entity, qualifying as an Affiliate / Parent Company / Ultimate Parent Company, is likely to cease to meet the criteria to qualify as an Affiliate / Parent Company / Ultimate Parent Company, the shares held by such entity shall be transferred to another Affiliate / Parent Company / Ultimate Parent Company of the Selected Bidder.

19.1.3 Subject to Article 19.1.1, all transfer(s) of shareholding of Bikaner III Neemrana II Transmission Limited by any of the entities referred to in Article 19.1.1 and 19.1.2 above, shall be after prior written intimation to the Nodal Agency.

19.1.4 For computation of effective Equity holding, the Equity holding of the Selected Bidder or its Ultimate Parent Company in such Affiliate(s) or Parent Company and the equity holding of such Affiliate(s) or Ultimate Parent Company in Bikaner



### Transmission Service Agreement

III Neemrana II Transmission Limited shall be computed in accordance with the example given below:

If the Parent Company or the Ultimate Parent Company of the Selected Bidder A directly holds thirty percent (30%) of the equity in Bikaner III Neemrana II Transmission Limited, then holding of Selected Bidder A in Bikaner III Neemrana II Transmission Limited shall be thirty percent (30%);

If Selected Bidder A holds thirty percent (30%) equity of the Affiliate and the Affiliate holds fifty percent (50%) equity in Bikaner III Neemrana II Transmission Limited, then, for the purposes of ascertaining the minimum equity/equity lock-in requirements specified above, the effective holding of Bidder A in Bikaner III Neemrana II Transmission Limited shall be fifteen percent (15%), (i.e., 30% x 50%)

19.1.5 The provisions as contained in this Article 19.1 shall override the terms of the consortium agreement submitted as part of the Bid.

19.1.6 The TSP shall be responsible to report to Nodal Agency, within thirty (30) days from the occurrence of any event that would result in any change in its equity holding structure from that which existed as on the date of signing of the Share Purchase Agreement. In such cases, the Nodal Agency would reserve the right to ascertain the equity holding structure and to call for all such required documents / information / clarifications as may be required.

### 19.2 Commitment of maintaining Qualification Requirement

19.2.1 The Selected Bidder will be required to continue to maintain compliance with the Qualification Requirements, as stipulated in RFP Document, till the COD of the Project. Where the Technically Evaluated Entity and/or the Financially Evaluated Entity is not the Bidding Company or a Member in a Bidding Consortium, as the case may be, the Bidding Company or Member shall continue to be an Affiliate of the Technically Evaluated Entity and/or Financially Evaluated Entity till the COD of the Project.

19.2.2 Failure to comply with the aforesaid provisions shall be dealt in the same manner as TSP's Event of Default as under Article 13 of this Agreement.

### 19.3 Language:

19.3.1 All agreements, correspondence and communications between the Parties relating



### Transmission Service Agreement

to this Agreement and all other documentation to be prepared and supplied under the Agreement shall be written in English, and the Agreement shall be construed and interpreted in accordance with English language.

19.3.2 If any of the agreements, correspondence, communications or documents are prepared in any language other than English, the English translation of such agreements, correspondence, communications or documents shall prevail in matters of interpretation.

#### 19.4 Affirmation

The TSP and the Nodal Agency, each affirm that:

1. neither it nor its respective directors, employees, or agents has paid or undertaken to pay or shall in the future pay any unlawful commission, bribe, pay-off or kick-back; and
2. it has not in any other manner paid any sums, whether in Indian currency or foreign currency and whether in India or abroad to the other Party to procure this Agreement, and the TSP and the Nodal Agency hereby undertake not to engage in any similar acts during the Term of Agreement.

#### 19.5 Severability

The invalidity or enforceability, for any reason, of any part of this Agreement shall not prejudice or affect the validity or enforceability of the remainder of this Agreement, unless the part held invalid or unenforceable is fundamental to this Agreement.

#### 19.6 Counterparts

This Agreement may be executed in one or more counterparts, each of which shall be deemed an original and all of which collectively shall be deemed one and the same Agreement.

#### 19.7 Breach of Obligations/ Roles

The Parties acknowledge that a breach of any of the obligations/ roles contained herein would result in injuries. The Parties further acknowledge that the amount of the liquidated damages or the method of calculating the liquidated damages specified in this Agreement is a genuine and reasonable pre-estimate of the damages that may be suffered by the non-defaulting Party in each case specified



Central Transmission Utility of India Limited

73

Bikaner III Neemrana II Transmission Limited

## Transmission Service Agreement

under this Agreement

### 19.8 Restriction of Shareholders / Owners Liability

19.8.1 Parties expressly agree and acknowledge that none of the shareholders of the Parties hereto shall be liable to the other Parties for any of the contractual obligations of the concerned Party under this Agreement.

19.8.2 Further, the financial liabilities of the shareholder(s) of each Party to this Agreement shall be restricted to the extent provided in the Indian Companies Act, 1956 / Companies Act, 2013 (as the case may be).

### 19.9 Taxes and Duties:

19.9.1 The TSP shall bear and promptly pay all statutory taxes, duties, levies and cess, assessed/levied on the TSP, its Contractors or their employees that are required to be paid by the TSP as per the Law in relation to the execution of the Project and for providing Transmission Service as per the terms of this Agreement.

19.9.2 The Nodal Agency shall be indemnified and held harmless by the TSP against any claims that may be made against the Nodal Agency in relation to the matters set out in Article 19.9.1.

19.9.3 The Nodal Agency shall not be liable for any payment of, taxes, duties, levies, cess whatsoever for discharging any obligation of the TSP by the Nodal Agency on behalf of TSP or its personnel, provided the TSP has consented in writing to the Nodal Agency for such work, for which consent shall not be unreasonably withheld.

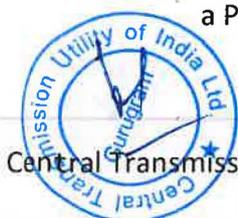
### 19.10 No Consequential or Indirect Losses

The liability of the TSP shall be limited to that explicitly provided in this Agreement.

Provided that, notwithstanding anything contained in this Agreement, under no event shall the Nodal Agency or the TSP claim from one another any indirect or consequential losses or damages.

### 19.11 Discretion:

Except where this Agreement expressly requires a Party to act fairly or reasonably, a Party may exercise any discretion given to it under this Agreement in any way it



## Transmission Service Agreement

deems fit.

**19.12 Confidentiality**

19.12.1 The Parties undertake to hold in confidence this Agreement and RFP Project Documents and not to disclose the terms and conditions of the transaction contemplated hereby to third parties, except:

- (a) to their professional advisors;
  - (b) to their officers, contractors, employees, agents or representatives, financiers, who need to have access to such information for the proper performance of their activities; or
  - (c) disclosures required under Law,
- without the prior written consent of the other Parties.

Provided that, the TSP agrees and acknowledges that the Nodal Agency, may, at any time, disclose the terms and conditions of the Agreement and the RFP Project Documents to any person, to the extent stipulated under the Law and the Competitive Bidding Guidelines.

**19.13 Order of priority in application:**

Save as provided in Article 2.5, in case of inconsistencies between the terms and conditions stipulated in Transmission License issued by the Commission to the TSP, agreement(s) executed between the Parties, applicable Law including rules and regulations framed thereunder, the order of priority as between them shall be the order in which they are placed below:

- terms and conditions of Transmission License;
- applicable Law, rules and regulations framed thereunder;
- this Agreement;
- Agreement(s), if any, under Sharing Regulations.

**19.14 Independent Entity:**

19.14.1 The TSP shall be an independent entity performing its obligations pursuant to the Agreement.



Central Transmission Utility of India Limited

75

Bikaner III Neemrana II Transmission Limited

## Transmission Service Agreement

19.14.2 Subject to the provisions of the Agreement, the TSP shall be solely responsible for the manner in which its obligations under this Agreement are to be performed. All employees and representatives of the TSP or Contractors engaged by the TSP in connection with the performance of the Agreement shall be under the complete control of the TSP and shall not be deemed to be employees, representatives, Contractors of the Nodal Agency and nothing contained in the Agreement or in any agreement or contract awarded by the TSP shall be construed to create any contractual relationship between any such employees, representatives or Contractors and the Nodal Agency.

**19.15 Amendments:**

19.15.1 This Agreement may only be amended or supplemented by a written agreement between the Parties.

**19.16 Waiver:**

19.16.1 No waiver by either Party of any default or breach by the other Party in the performance of any of the provisions of this Agreement shall be effective unless in writing duly executed by an authorised representative of such Party.

19.16.2 Neither the failure by either Party to insist on any occasion upon the performance of the terms, conditions and provisions of this Agreement nor time or other indulgence granted by one Party to the other Parties shall act as a waiver of such breach or acceptance of any variation or the relinquishment of any such right or any other right under this Agreement, which shall remain in full force and effect.

**19.17 Relationship of the Parties:**

This Agreement shall not be interpreted or construed to create an association, joint venture, or partnership or agency or any such other relationship between the Parties or to impose any partnership obligation or liability upon either Party and neither Party shall have any right, power or authority to enter into any agreement or undertaking for, or act on behalf of; or to act as or be an agent or representative of, or to otherwise bind, the other Party.

**Entirety:**

Central Transmission Utility of India Limited

76

Bikaner III Neemrana II Transmission Limited



## Transmission Service Agreement

19.18.1 This Agreement along with its sections, schedules and appendices is intended by the Parties as the final expression of their agreement and is intended also as a complete and exclusive statement of the terms of their agreement.

19.18.2 Except as provided in this Agreement, all prior written or oral understandings, offers or other communications of every kind pertaining to this Agreement or the provision of Transmission Service under this Agreement to the Nodal Agency by the TSP shall stand superseded and abrogated.

**19.19 Notices:**

19.19.1 All notices or other communications which are required to be given under this Agreement shall be in writing and in the English language

19.19.2 If to the TSP, all notices or communications must be delivered personally or by registered post or facsimile or any other mode duly acknowledged to the addressee below:

Address :

Attention :

Email :

Fax. No. :

Telephone No. :

19.19.3 If to the Nodal Agency, all notices or communications must be delivered personally or by registered post or facsimile or any other mode duly acknowledged to the addresses below:

**(i) Central Transmission Utility of India Limited (Nodal Agency)**

Address : Plot No.2, Sector – 29, Gurugram, Haryana-  
: 122001, India

Attention : Mr. Vikram Singh Bhal, ED

Email : vsbhal@powergrid.in

Fax. No. :-

Telephone No. : 9910378068

19.19.4 All notices or communications given by facsimile shall be confirmed by



**Transmission Service Agreement**

sending a copy of the same via post office in an envelope properly addressed to the appropriate Party for delivery by registered mail. All notices shall be deemed validly delivered upon receipt evidenced by an acknowledgement of the recipient, unless the Party delivering the notice can prove in case of delivery through the registered post that the recipient refused to acknowledge the receipt of the notice despite efforts of the postal authorities.

- 19.19.5 Any Party may by notice of at least fifteen (15) days to the other Party change the address and/or addresses to which such notices and communications to it are to be delivered or mailed.

**19.20 Fraudulent and Corrupt Practices**

19.20.1 The TSP and its respective officers, employees, agents and advisers shall observe the highest standard of ethics during the subsistence of this Agreement. Notwithstanding anything to the contrary contained in the Agreement, the Nodal Agency may terminate the Agreement without being liable in any manner whatsoever to the TSP, if it determines that the TSP has, directly or indirectly or through an agent, engaged in corrupt practice, fraudulent practice, coercive practice, undesirable practice or restrictive practice in the Bid process. In such an event, the Nodal Agency shall forfeit the Contract Performance Guarantee of the TSP, without prejudice to any other right or remedy that may be available to the Nodal Agency hereunder or subsistence otherwise.

19.20.2 Without prejudice to the rights of the Nodal Agency under Clause 19.20.1 hereinabove and the rights and remedies which the Nodal Agency may have under this Agreement, if a TSP is found by the Nodal Agency to have directly or indirectly or through an agent, engaged or indulged in any corrupt practice, fraudulent practice, coercive practice, undesirable practice or restrictive practice during the Bid process, or after the issue of Letter of Intent (hereinafter referred to as LoI) or after the execution of the agreement(s) required under Sharing Regulations, the Nodal Agency may terminate the Agreement without being liable in any manner whatsoever to the TSP. Further, the TSP & its Affiliates shall not be eligible to participate in any tender or RFP issued by any BPC for an indefinite period from the date such TSP is found by the Nodal Agency to have directly or indirectly or through an agent, engaged or indulged in any corrupt practice, fraudulent practice, coercive practice, undesirable practice or restrictive practices, as



## Transmission Service Agreement

the case may be.

**19.20.3** For the purposes of this Clause 19.20, the following terms shall have the meaning hereinafter respectively assigned to them:

(a) **“corrupt practice”** means (i) the offering, giving, receiving, or soliciting, directly or indirectly, of anything of value to influence the actions of any person connected with the Bid process (for avoidance of doubt, offering of employment to or employing or engaging in any manner whatsoever, directly or indirectly, any official of the BPC who is or has been associated or dealt in any manner, directly or indirectly with the Bid process or the Lol or has dealt with matters concerning the RFP Project Documents or arising there from, before or after the execution thereof, at any time prior to the expiry of one year from the date such official resigns or retires from or otherwise ceases to be in the service of the BPC, shall be deemed to constitute influencing the actions of a person connected with the Bid Process); or (ii) engaging in any manner whatsoever, whether during the Bid Process or after the issue of the Lol or after the execution of the RFP Project Documents, as the case may be, any person in respect of any matter relating to the Project or the Lol or the RFP Project Documents, who at any time has been or is a legal, financial or technical adviser of the BPC in relation to any matter concerning the Project;

(b) **“fraudulent practice”** means a misrepresentation or omission of facts or suppression of facts or disclosure of incomplete facts, in order to influence the Bid process;

(c) **“coercive practice”** means impairing or harming, or threatening to impair or harm, directly or indirectly, any person or property to influence any person's participation or action in the Bid process;

(d) **“undesirable practice”** means (i) establishing contact with any person connected with or employed or engaged by the BPC with the objective of canvassing, lobbying or in any manner influencing or attempting to influence the Bid process; or (ii) having a Conflict of Interest; and

(e) **“restrictive practice”** means forming a cartel or arriving at any understanding or arrangement among Bidders with the objective of restricting or manipulating a full and fair competition in the Bid process;

**19.21 Compliance with Law:**

Despite anything contained in this Agreement but without prejudice to Article



## Transmission Service Agreement

12, if any provision of this Agreement shall be in deviation or inconsistent with or repugnant to the provisions contained in the Electricity Act, 2003, or any rules and regulations made there under, such provision shall be deemed to be amended to the extent required to bring it into compliance with the aforesaid relevant provisions as amended from time to time.

**IN WITNESS WHEREOF, THE PARTIES HAVE CAUSED THIS AGREEMENT TO BE EXECUTED BY THEIR DULY AUTHORISED REPRESENTATIVES AS OF THE DATE AND PLACE SET FORTH ABOVE.**

1. For and on behalf of TSP

  
.....

[Signature, Name, Designation and Address]

2. For and on behalf of **Central Transmission Utility of India Limited (Nodal Agency)**

  
.....

[Signature, Name, Designation and Address]

**WITNESSES:**

1. For and on behalf of

: BPC

.....  
[Signature]

.....  
[Insert, Name, Designation and Address of the Witness]

2. For and on behalf of

: **Nodal Agency**

  
.....  
[Signature]

*Deepak Krishnan, manager, CTUIL*  
.....  
[Insert Name, Designation and Address of the Witness]



# SCHEDULES



**Schedule: 1****Project Description and Scope of Project****a. Description of the Transmission Scheme**

Renewable Energy Zones (REZs) were identified by MNRE/SECI with a total capacity of 181.5 GW for likely benefits by the year 2030 in eight states. This includes 75 GW REZ potential in Rajasthan comprising of 15 GW Wind and 60 GW Solar. In this regard, a Comprehensive transmission scheme for evacuation of 75GW RE potential from Rajasthan is already evolved which includes transmission scheme for total evacuation requirement of 7.7GW from Bikaner Complex (Bikaner-II: 3.7 GW, Bikaner-III: 4 GW).

As part of comprehensive system, 765/400/220kV Bikaner -III & 765/400kV Neemrana-II Substations are to be established along with interconnections of Bikaner-III PS with Bikaner (PG)/ Bikaner-II PS through 400kV lines. For further dispersal of power from Bikaner-III PS, 765kV high capacity corridor i.e. Bikaner-III-Neemrana-II - Bareilly (PG) as well as 400kV interconnections with Gurgaon (PG), Sohna Road and Kotputli is also being implemented.

The subject transmission scheme i.e. Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part C involves implementation of Bikaner-III - Neemrana-II 765 kV D/c line (2nd).

Above transmission system was agreed in the 8th CMETS-NR meeting held on 30.06.22, 56th NRPC meeting held on 29.07.22 and 9th National Committee on Transmission (NCT) held on 28.09.22. Subsequently, Ministry of Power, Government of India, vide its Gazette Notification No. CG-DL-E-14012023-241990 dated 13.01.2023 declared establishment of Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part C through tariff based competitive bidding process route as part of "Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex)".



## Transmission Service Agreement

## b. Detailed Scope of Work

S. No.	Name of Transmission Element	Scheduled COD in months from Effective Date
1.	<p>Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end</p> <ul style="list-style-type: none"> <li>• 765 kV, 330 MVAR Switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• 765 kV, 330 MVAR Switchable line reactors at Neemrana-II – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Bikaner-III PS – 2 nos.</li> <li>• Switching equipment for 765kV 330 MVAR switchable line reactors at Neemrana-II S/s – 2 nos.</li> </ul>	24 Months
2.	<p>2 no. of 765 kV line bays each at Bikaner-III PS &amp; Neemrana-II S/S</p> <ul style="list-style-type: none"> <li>• 765kV line bays - 4 nos. (2 nos. each at Bikaner-III PS &amp; Neemrana-II S/S)</li> </ul>	

**Note:**

- (i) Developer of Bikaner-III PS & Neemrana-II S/s shall provide space for 2 nos. of 765 kV line bays alongwith space for Switchable line reactor each at Bikaner-III PS & Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2nd).



## Transmission Service Agreement

**SPECIFIC TECHNICAL REQUIREMENTS FOR TRANSMISSION SYSTEM****SPECIFIC TECHNICAL REQUIREMENTS FOR TRANSMISSION LINE**

- A.1.0 The design, routing and construction of transmission lines shall be in accordance with Chapter V, Part-A of CEA (Technical Standards for Construction of Electrical Plants and Electric Lines) Regulations, as amended from time to time.
- A.2.0 Selection of tower type shall be made as per CEA Regulations, however in case lattice type towers are used, the following shall also be applicable:
- A.2.1 Steel section of grade E 250 and/or grade E 350 as per IS 2062, only are permitted for use in towers, extensions, gantry structures and stub setting templates. For towers in snowbound areas, steel sections shall conform to Grade-C of IS-2062.
- A.2.2 Towers shall be designed as per IS-802:2015, however the drag coefficient of the tower shall be as follows: -
- A.3.0 Transmission Service Provider (TSP) shall adopt any additional loading/design criteria for ensuring reliability of the line, if so desired and /or deemed necessary.

Solidity Ratio	Drag Coefficient
Upto 0.05	3.6
0.1	3.4
0.2	2.9
0.3	2.5
0.4	2.2
0.5 and above	2.0

- A.4.0 Transmission line shall be designed considering wind zones as specified in wind map given in National Building Code 2016, Vol.1. The developer shall also make his own assessment of local wind conditions and frequent occurrences of high intensity winds (HIW) due to thunderstorms, dust-storms, downburst etc. along the line route and wherever required, higher wind zone than that given in wind map shall be considered for tower design for ensuring reliability of line. Further, for transmission line sections passing within a distance of 50 km from the boundary of two wind zones, higher of the two wind zones shall be considered for design of towers located in such sections.
- A.5.0 Selection of reliability level for design of tower shall be as per CEA Regulation (Technical Standards for Construction of Electrical Plants and Electric Lines) Regulations, as amended from time to time.



## Transmission Service Agreement

- A.6.0 A) For power line crossing of 400 kV or above voltage level (if crossed over the existing line) large angle & dead end towers (i.e. D/DD/QD) shall be used on either side of power line crossing.
- B) For power line crossing of 132 kV and 220 kV voltage level, angle towers (B/C/D/DB/DC/DD/ QB/QC/QD) shall be used on either side of power line crossing depending upon the merit of the prevailing site condition and line deviation requirement.
- C) For power line crossing of 66 kV and below voltage level, suspension/tension towers shall be provided on either side of power line crossing depending upon the merit of the prevailing site condition and line deviation requirement.
- D) For crossing of railways, national highways and state highways, the rules/Regulations of appropriate authorities shall be followed.

A.7.0 The relevant conductor configuration shall be as follows: -

Type of conductor: ACSR / AAAC / AL59

Basic parameters:

Transmission line	ACSR Conductor specified	Equivalent AAAC conductor based on 53% conductivity of Al Alloy	Equivalent minimum size of AL59 conductor based on 59% conductivity of AL Alloy*	Sub-conductor Spacing
765 kV D/C (Hexa Zebra) transmission lines	Zebra: Stranding 54/3.18 mm-Al + 7/3.18 mm-Steel, 28.62 mm diameter 428 sq. mm, Aluminium area, Maximum DC Resistance at 20°C ( $\Omega$ /km): 0.06868 Minimum UTS: 130.32 kN	Stranding details: 61/3.19mm, 28.71 mm diameter; 487.5 sq.mm Aluminium alloy area Maximum DC Resistance at 20°C ( $\Omega$ /km) : 0.06815 Minimum UTS:	Stranding details: 61/3.08mm, 27.72 mm diameter; 454 sq.mm Aluminium alloy area Maximum DC Resistance at 20°C ( $\Omega$ /km) : 0.0653 Minimum UTS:	457 mm



## Transmission Service Agreement

Transmission line	ACSR Conductor specified	Equivalent AAAC conductor based on 53% conductivity of Al Alloy	Equivalent minimum size of AL59 conductor based on 59% conductivity of AL Alloy*	Sub-conductor Spacing
		135.6 kN	108 kN	

**Note:**

- \*To Select any size above the minimum, the sizes mentioned in the Indian standard IS-398(part-6) shall be followed.*
- The transmission lines shall have to be designed for a maximum operating conductor temperature of 85 deg C.*

A.8.0 The required phase to phase spacing and horizontal spacing for 765 kV line shall be governed by the tower design as well as minimum live metal clearances for 765 kV voltage level under different insulator swing angles. However, the phase to phase spacing for 765 kV line shall not be less than 15 m.

A.9.0 All electrical clearances including minimum live metal clearance, ground clearance and minimum mid span separation between earth wire and conductor shall be as per Central Electricity Authority (Measures Relating to Safety & Electric Supply) Regulations as amended from time to time and IS:5613. Since these clearances for 765kV are not included in CEA Regulation/ Indian Standard, following values shall be considered:

a) Minimum live metal clearances for 765 kV line:

(i) Under stationary conditions

From tower body: For 765 kV D/C: 6.1 m

For 765 kV S/C: 5.6 m

(ii) Under swing conditions

Wind pressure Condition	Minimum electrical clearance
a) Swing angle (25°)	4.4 m
b) Swing angle (55°)	1.3 m



## Transmission Service Agreement

- b) Minimum ground clearance: 18 m
- c) Minimum mid span separation between earthwire and conductor: 9.0 m
- A.10.0 Shielding angle shall not exceed 10 degree for 765 kV D/C transmission line.
- A.11.0 The Fault current for design of line shall be 50 kA for 1 second for 765 kV.
- A.12.0 In case of 765 kV voltage class lines, at least one out of two earth wires shall be OPGW and second earth wire, if not OPGW, shall be either of galvanized standard steel (GSS) or AACSR or any other suitable conductor type depending upon span length and other technical consideration.
- A.13.0 Each tower shall be earthed such that tower footing impedance does not exceed 10 ohms. Pipe type or Counterpoise type earthing shall be provided in accordance with relevant IS. Additional earthing shall be provided on every 7 to 8 km distance at tension tower for direct earthing of both shield wires. If site condition demands, multiple earthing or use of earthing enhancement compound shall be used.
- A.14.0 Pile type foundation shall be used for towers located in river or creek bed or on bank of river having scourable strata or in areas where river flow or change in river course is anticipated, based on detailed soil investigation and previous years' maximum flood discharge of the river, maximum velocity of water, highest flood level, scour depth & anticipated change in course of river based on river morphology data of at least past 20 years to ensure availability and reliability of the transmission line.
- A.15.0 Transmission line route shall be finalized, in consultation with appropriate authorities so as to avoid the habitant zones of endangered species and other protected species. Bird diverters, wherever required, shall be provided on the line.
- A.16.0 A.17.0 The raised chimney foundation is to be provided in areas prone to flooding/water stagnation like paddy field /agricultural field & undulated areas to avoid direct contact of water with steel part of tower. The top of the chimney of foundation should be at least above HFL (High Flood Level) or the historical water stagnation/ logging level (based on locally available data) or above High Tide Level or 500 mm above Natural Ground level (whichever is higher).



## Transmission Service Agreement

**SPECIFIC TECHNICAL REQUIREMENTS FOR SUBSTATION**

The proposed augmentation of **Bikaner-III (AIS) substation** and **Neemrana-II (AIS) substation** shall be generally conforming to the requirements of CEA (Technical Standards for Construction of Electrical Plants and Electric Lines) Regulations as amended from time to time. All other CEA Regulations/guidelines as amended upto date and MoP guidelines shall also be followed.

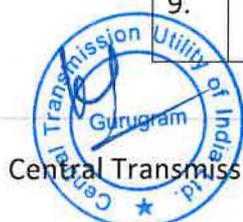
**B.1.0 Salient features of Substation Equipment and Facilities**

The design and specification of substation equipment are to be governed by the following factors:

**B.1.1 Insulation Coordination**

The system design parameters for substations/switchyards shall be as given below:

S. No	Description of parameters	Extn. of 765 kV Bikaner-III s/s	Extn. of 765 kV Neemrana-II s/s
		765 kV System	765 kV System
1.	System operating voltage	765kV	765kV
2.	Maximum voltage of the system (rms)	800kV	800kV
3.	Rated frequency	50Hz	50Hz
4.	No. of phase	3	3
5.	Rated Insulation levels		
i)	Impulse withstand voltage for (1.2/50 micro sec.) for Equipment other than Transformer and Reactors for Insulator String	2100kVp 2100kVp	2100kVp 2100kVp
ii)	Switching impulse withstand voltage (250/2500 micro sec.) dry and wet	1550kVp	1550kVp
iii)	One minute power frequency dry withstand voltage (rms)	830kV	830kV
6.	Corona extinction voltage	508 kV	508 kV
7.	Max. radio interference voltage for frequency between 0.5 MHz and 2 MHz	2500 micro-volts at 508 kV rms	2500 micro-volts at 508 kV rms
8.	Minimum creepage distance for insulator string/ long rod insulators/ outdoor bushings	24800 mm (31mm/kV)	24800 mm (31mm/kV)
9.	Minimum creepage distance for switchyard equipment	20000 mm (25 mm/kV)	20000 mm (25 mm/kV)



## Transmission Service Agreement

S. No	Description of parameters	Extn. of 765 kV Bikaner-III s/s	Extn. of 765 kV Neemrana-II s/s
		765 kV System	765 kV System
10.	Max. fault current	50 kA	50kA
11.	Duration of fault	1 sec	1 Sec

**B.1.2 Switching Scheme**

The switching schemes, as mentioned below, shall be adopted at various voltage levels of substation/switchyard:

Substation	765 kV side
765 kV Bikaner-III S/s Extn	One & half breaker
765 kV Neemrana-II S/s Extn.	One & half breaker

Notes: -

- (i) At 765kV voltage level, each circuit of a double circuit transmission line shall be terminated in different diameters.
- (ii) Connection arrangement of Switchable Line reactors shall be such that it can be used as Line reactor as well as Bus reactor with suitable NGR bypass arrangement.

**B.2.0 Substation Equipment and facilities:**

The switchgear shall be designed and specified to withstand operating conditions and duty requirements. All equipment shall be designed considering the following capacity.

S. No	Description of bay	765kV Bikaner-III S/s Extn	765kV Neemrana-II S/s Extn.
		765kV	765kV
1.	Bus Bar	4000A	4000A
2.	Line bay	3150A	3150A
3.	Line Reactor Bay	3150A	3150A

**B.2.1 Shunt Reactor**

110 MVAR, 765/ $\sqrt{3}$  kV, 1-Phase Reactor (including arrangement for 3-phase bank formation of 330 MVAR) shall conform to CEA's "Standard Specifications and Technical Parameters for Transformers and Reactors (66 kV and above)" available on CEA website.



## Transmission Service Agreement

**Connection arrangement for utilization of existing Spare 1-phase Shunt Reactor unit:**  
TSP shall make the arrangement in such a way that the existing spare unit can be utilized for line reactor banks under present scope without its physical movement.

**Neutral Grounding Reactor and Surge Arrester for 765 kV Line Reactors (as applicable):**

The neutral of the line reactors (wherever provided) shall be grounded through adequately rated Neutral Grounding Reactors (NGR) to facilitate single phase auto-reclosure, provided that the NGR shall be provided with bypass arrangement so that the line reactor can be used as Bus reactor as and when required. The neutral of bus reactor shall be solidly grounded. The ohmic value of NGR for each circuit at both ends of 765kV D/c (2nd) Bikaner-III– Neemrana-II S/s shall be 450 ohms.

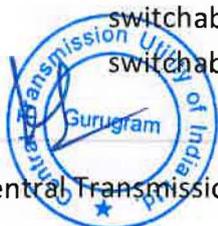
NGR shall be oil filled or dry type air core for outdoor application. NGR shall conform to CEA's "Standard specifications and technical parameters of transformers and reactors (66kV and above)". Technical parameters of NGR shall be as specified in Annexure-A of abovementioned document.

The 145 kV surge arrester of suitable rating shall be provided & physically located between the neutral of shunt reactor (brought out at 145kV class bushing) and neutral grounding reactor. The surge arresters shall be of heavy duty station class gapless Metal oxide (ZnO) type conforming in general to IEC-60099-4. Arresters shall be hermetically sealed units, of self-supporting construction, suitable for mounting on structures.

**B.2.3 765 kV Substation equipment (AIS)**

**B.2.3.1 Circuit Breakers (AIS)**

The circuit breakers and accessories shall conform with IEC: 62271-100, IEC: 62271-1 and shall be of SF6 Type. The circuit breakers shall be of class C2-M2 (as per IEC) with regard to restrike probability during capacitive current breaking and mechanical endurance. The rated break time shall not exceed 40 ms for 765 kV circuit breakers. 765 kV Circuit breakers shall be provided with single phase and three phase auto reclosing. The Circuit breakers controlling 765 kV lines shall be provided either with pre-insertion closing resistor of about 450 ohms maximum with 9 ms minimum insertion time or with Controlled Switching Device. The short line fault capacity shall be same as the rated capacity and this is proposed to be achieved without use of opening resistors. Control switching device shall be provided in Circuit Breaker of switchable line reactor bay and in Main & Tie bay circuit breakers of line with non-switchable line reactors, Bus reactors and 765/400 kV Transformers.



**B.2.3.2 Isolators (AIS)**

The isolators shall comply with IEC 62271-102 in general. 765 kV Isolator design shall be double break or vertical break or knee-type. All Isolators and earth switches shall be motor operated. Earth switches shall be provided at various locations to facilitate maintenance. Isolator rated for 765kV shall be of extended mechanical endurance class-M2 and suitable for bus transfer current switching duty as per IEC-62271-102. Main blades and earth blades shall be interlocked and interlock shall be fail safe type. 765 kV earth switch for line isolator shall be suitable for induced current switching duty as defined for Class-B.

**B.2.3.3 Current Transformers (AIS)**

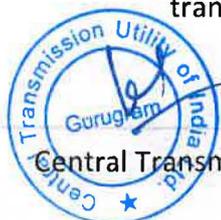
Current Transformers shall comply with IEC 61869 in general. All ratios shall be obtained by secondary taps only. Generally, Current Transformers (CT) for 765 kV shall have six cores (four for protection and two for metering). The burden and knee point voltage shall be in accordance with the requirements of the system including possible feeds for telemetry. Accuracy class for protection core shall be PX and for metering core it shall be 0.2S. The rated burden of cores shall be closer to the maximum burden requirement of metering & protection system (not more than 20 VA for metering core) for better sensitivity and accuracy. The instrument security factor shall be less than 10 for CTs of 765 kV voltage class.

**B.2.3.4 Capacitive Voltage Transformers (AIS)**

Capacitive Voltage transformers shall comply with IEC 61869 in general. These shall have three secondaries out of which two shall be used for protection and one for metering. Accuracy class for protection cores shall be 3P and for metering core it shall be 0.2. The Capacitive voltage transformers on lines shall be suitable for Carrier Coupling. The Capacitance of CVT for 765 kV shall be 8800 pF. The rated burden of cores shall be closer to the maximum burden requirement of metering & protection system (not more than 50 VA for metering core) for better sensitivity and accuracy.

**B.2.3.5 Surge Arresters (AIS)**

624 kV Station High (SH) duty gapless type Surge arresters with thermal energy (Wth) of minimum 13 kJ/kV conforming to IEC 60099-4 in general shall be provided for 765 kV system. Other characteristics of Surge arrester shall be chosen in accordance with system requirements. Surge arresters shall be provided near line entrances, transformers & Reactor so as to achieve proper insulation coordination. Surge



## Transmission Service Agreement

Arresters shall be provided with porcelain/ polymer housing fitted with pressure relief devices. A leakage current monitor with surge counter shall be provided with each surge arrester.

**B.2.4 Protection Relaying & Control System**

The protective relaying system proposed to be provided for transmission lines, auto-transformers, reactors and bus bars to minimize the damage to the equipment in the events of faults and abnormal conditions, is dealt in this section. All main protective relays shall be numerical type with IEC 61850 communication interface and should have interoperability during integration of numerical relays to communicate over IEC61850 protocol with RTU/SAS/IEDs of different OEMs. All numerical relays shall have built in disturbance recording feature.

The protection circuits and relays of transformer and reactor shall be electrically and physically segregated into two groups each being independent and capable of providing uninterrupted protection even in the event of one of the protection groups failing, to obtain redundancy, and to take protection systems out for maintenance while the equipment remains in service.

**a) Transmission Lines Protection**

765 kV lines shall have Main-I numerical three zone distance protection scheme with carrier aided inter-tripping feature. 765 kV lines shall also have Main-II numerical distance protection scheme like Main-I but from different make that of Main-I. The Main-I and Main-II protection relays of same make may be provided only if they are of different hardware & manufacturing platform or different principle of operation.

Further, all 765 kV lines shall be provided with single and three phase auto-reclosing facility to allow reclosing of circuit breakers in case of transient faults. These lines shall also be provided with distance to fault locators to identify the location of fault on transmission lines.

All 765 kV lines shall also be provided with two stages over voltage protection. Over voltage protection & distance to fault locator may be provided as in-built feature of Main-I & Main-II protection relays. Auto reclose as built in function of Bay Control Unit (BCU) is also acceptable.

The Main-I and Main-II protection relays shall be fed from separate DC sources and shall be mounted in separate panels.



## Transmission Service Agreement

For 765 kV transmission lines, directional IDMT earth fault relay should be provided as standalone unit or in-built feature of Main-I and Main -II feature.

**b) 765 kV Reactor Protection**

Reactor shall be provided with the following protections:

- i) Numerical Differential protection.
- ii) Numerical Restricted earth fault protection
- iii) Numerical Back-up impedance protection

Besides these, reactors shall also be provided with Buchholz relay, MOG with low oil level alarm, protection against oil and winding temperatures & pressure relief device, etc.

**c) Bus bar Protection**

The high speed low impedance type bus bar differential protection, which is essential to minimize the damage and maintain system stability at the time of bus bar faults, shall be provided for 765 kV buses. Duplicated bus bar protection is envisaged for 765 kV bus-bar protection. Bus bar protection scheme shall be such that it operates selectively for each bus and incorporate necessary features required for ensuring security. The scheme shall have complete bus bar protection for present as well as future bays envisaged i.e. input / output modules for future bays shall also be provided. In case, the bus section is provided, then each side of bus section shall have separate set of bus bar protection schemes.

For existing substations, the existing bus bar protection shall be augmented as per requirement.

**d) Local Breaker Back up Protection**

This shall be provided for each 765 kV circuit breakers and will be connected to de-energize the affected stuck breaker from both sides.

Notes:

1. LBB & REF relays shall be provided separately from transformer differential relay.
2. LBB relay may also be provided as built-in protection function of distributed bus bar protection scheme; however, in such case separate LBB relay shall be provided for tie bays (in case of One and Half breaker scheme).
3. Over fluxing & overload protection can be provided as built-in feature of differential relay.



## Transmission Service Agreement

4. *In 765 kV switchyard, if spare bay of half diameter is identified as future, Tie CB relay panel shall be with Auto-reclosure feature.*

**B.2.5 Substation Automation System**

- a) For all the new substations, state of art Substation Automation System (SAS) conforming to IEC-61850 shall be provided. The distributed architecture shall be used for Substation Automation system, where the controls shall be provided through Bay control units. The Bay control unit is to be provided bay wise for voltage level 220 kV and above. All bay control units as well as protection units are normally connected through an Optical fibre high speed network. The control and monitoring of circuit breaker, dis-connector, re-setting of relays etc. can be done from Human Machine Interface (HMI) from the control room.

The functions of control, annunciation, disturbance recording, event logging and measurement of electrical parameters shall be integrated in Substation Automation System.

At new substations, the Substation Automation System (SAS) shall be suitable for operation and monitoring of the complete substation including proposed future bays/elements.

In existing substations with Substation automation system (SAS), augmentation of existing SAS shall be done for bays under present scope.

In existing Substations where Substation automation is not provided, control functions shall be done through control panels.

Necessary gateway & modems (as required) shall be provided to send data to RLDC/SLDC as per their requirement. Any augmentation work at RLDC/SLDC is excluded from TSP's scope. However, all the configuration work at substation end required to send data to RLDC/SLDC shall be in the scope of TSP.

**b) Time synchronisation equipment**

Time synchronization equipment complete in all respect including antenna, cable, processing equipment required to receive time signal through GPS or from National Physical Laboratory (NPL) through INSAT shall be provided at new substations. This equipment shall be used to synchronize SAS & IEDs etc.

**B.2.6 Phasor Measurement Units (PMUs)**

TSP shall supply, install & commission required no. of Phasor Measurement Units (PMUs) for all 400 kV and above voltage line bays under the scope of work and PMUs shall support latest IEEE C-37.118 protocols. The supplied PMUs may be mounted in the



## Transmission Service Agreement

C&R/SAS panels. These PMUs shall be provided with GPS clock and LAN switch and shall connect with LAN switch of control room with Fibre Optic cable which shall further be interfaced with the FOTE. These PMUs shall be integrated with the existing PDC (Phasor Data Concentrator) located at respective RLDC. Configuration work in existing PDC at RLDC for new PMU integration is not in scope of TSP (shall be done by respective RLDC), however all the necessary co-ordination and support in this regard shall be ensured by TSP.

In case of bay extensions work, TSP shall also provide separate WAMS (PMU, switches, interface cabling and other associated accessories) required for extended bays at existing s/s.

### B.3.0 Substation Support facilities

Certain facilities required for operation & maintenance of substations as described below shall be provided at new substation. In existing substation, these facilities have already been provided and would be extended/ augmented as per requirement.

#### B.3.1 AC & DC power supplies

For catering the requirements of three phase & single phase AC supply and DC supply for various substation equipment, existing facilities shall be augmented as required.

#### B.3.2 Fire Fighting System

Fire-fighting system for substation including transformer & reactor shall conform to CEA (Measures Relating to Safety & Electric Supply) Regulations.

Further, adequate water hydrants and portable fire extinguishers shall be provided in the substations. The main header of firefighting system shall be suitable for extension to bays covered under the future scope; necessary piping interface in this regard shall be provided.

At existing substations, the fire-fighting systems as available shall be extended to meet the additional requirements.

#### B.3.3 Oil evacuating, filtering, testing & filling apparatus

To monitor the quality of oil for satisfactory performance of transformers, shunt reactors and for periodical maintenance necessary oil evacuating, filtering, testing and



## Transmission Service Agreement

filling apparatus would be provided at new substations. Oil storage tanks of adequate capacities for storage of transformer oil would be provided.

**B.3.4 Illumination**

Normal & emergency AC & DC illumination shall be provided adequately in the switchyard panel room & other buildings of the substation. The switchyard shall also be provided with adequate illumination.

Lighting of the entire switchyard panel room building and other building (if any) and switchyard shall be done by LED based low power consumption luminaries.

**B.3.5 Control Room**

For new substation, substation control room shall be provided to house substation work stations for station level control (SAS) alongwith its peripheral and recording equipment, AC & DC distribution boards, DC batteries & associated battery chargers, Fire Protection panels, Telecommunication panels & other panels as per requirements. Air conditioning shall be provided in the building as functional requirements. Main cable trenches from the control room shall have adequate space provision for laying of cables from control room for all the future bays also.

At existing substations, the adequacy of size of control room shall be ascertained and the same shall be augmented as per requirement.

**B.3.7 Control Concept**

All the EHV circuit breakers in substation/switching stations shall be controlled and synchronized from the switchyard control room/remote control center. Each breaker would have two sets of trip circuits which would be connected to separate DC supplies for greater reliability. All the isolators shall have control from remote/local whereas the earth switches shall have local control only.

**B.3.8 Visual monitoring system (VMS) for watch and ward of substation premises:**

Visual monitoring system for effective watch and ward of substation premises shall cover all the transformers and reactors, all other major AIS Equipment (such as CB, isolators, CT, CVT, SA etc. as applicable), GIS bays, panel room, all the gates of switchyard and all entry and exit points of control room building and accordingly the location of cameras shall be decided. The camera shall be high definition color CCD camera with night vision feature. The VMS data partly/completely shall be recorded (minimum for 15 days) at least @25fps (or better) and stored on network video



## Transmission Service Agreement

recorder. The system shall use video signals from various cameras installed at different locations, process them for viewing on workstations/monitors in the control room and simultaneously record all the cameras.

Mouse/keyboard controllers shall be used for pan, tilt, zoom and other functions of the desired camera. The Visual Monitoring System shall have provision of WAN connectivity for remote monitoring.

All camera recordings shall have Camera ID & location/area of recording as well as date/time stamp. The equipment should generally conform to Electromagnetic compatibility requirement for outdoor equipment in EHV substation.

At existing substations, the visual monitoring system if available shall be augmented as per existing or better specification as required.

**B.4.0 General Facilities**

- a) Line Gantry/Towers are envisaged for bays under present scope only. However, for adjacent future line bay, tower shall be designed for extension (considering Quad conductors for 765 kV) wherever applicable.
- b) Bay extension works at existing substation shall be executed by TSP in accordance with the requirement/provisions mentioned above. However, interface points shall be considered keeping in view the existing design/arrangement at the substation.
- c) TSP has to arrange for construction power and water on its own.
- d) All outdoor steel structures including anchor/foundation bolts shall be fully galvanized. The weight of the zinc coating shall be at least 610 gm/sq.m and 900 gm/sq.m for coastal/ creek regions (if applicable).
- e) In 765 kV switchyard, if spare bay of half diameter is identified as future, all the equipment for Tie bay and Future bay shall be designed considering the current rating of line bay i.e. 3150A.

All electrical equipment shall be installed above Highest Flood Level (HFL) and where such equipment is not possible to be installed above HFL, it shall be ensured that there is no seepage or leakage or logging of water.

**B.5.0 EXTENSION OF EXISTING SUBSTATION**

Central Transmission Utility of India Limited

97

Bikaner III Neemrana II Transmission Limited

| December, 2023

## Transmission Service Agreement

The following drawings/details of existing substation is attached with the RFP documents for further engineering by the bidder.

Sl. No.	Drawing Title	Drawing No./Details	Rev. No.
<b>A. 765kV Bikaner-III s/s</b>			
1.0	Single Line Diagram	Developer yet to be finalized by BPC. The finalization of drawings is in the scope of developer. The same may be availed from the developer on finalization.	
2.0	General Arrangement		
3.0	Earthmat Layout		
4.0	Visual Monitoring System		
5.0	Bus Bar Protection (765kV System)		
6.0	Substation Automation System (SAS)		
<b>B. 765kV Neemrana-II s/s</b>			
1.0	Single Line Diagram	Developer yet to be finalized by BPC. The finalization of drawings is in the scope of developer. The same may be availed from the developer on finalization.	
2.0	General Arrangement		
3.0	Earthmat Layout		
4.0	Visual Monitoring System		
5.0	Bus Bar Protection (765kV System)		
6.0	Substation Automation System (SAS)		

Bidder is also advised to visit the substation sites and acquaint themselves with the topography, infrastructure such as requirement of roads, cable trench, drainage etc. and also the design philosophy.



**SPECIFIC TECHNICAL REQUIREMENTS FOR COMMUNICATION**

The communication requirement shall be in accordance to CEA (Technical Standards for Communication System in Power System Operations) Regulations, 2020, CERC (Communication System for inter-State transmission of electricity) Regulations, 2017, and CEA (Cyber Security in Power Sector) Guidelines, 2021, all above documents as amended from time to time.

The protections for transmission line and the line compensating equipment shall have hundred percent back up communication channels i.e. two channels for tele-protection in addition to one channel for speech plus data for each direction.

In order to meet the requirement for grid management and operation of substations, Transmission Service Provider (TSP) shall provide the following:

**C.1.0 Bikaner-III – Neemrana -II 765 kV D/c line (2<sup>nd</sup>):**

On Bikaner-III – Neemrana-II 765 kV D/c line (2<sup>nd</sup>), TSP shall supply, install & commission one (1) no. OPGW cable containing 24 Fibres (24F) on one E/W peak and conventional earth wire on other E/W peak.

The TSP shall install this OPGW from gantry of Bikaner-III up to the gantry of Neemrana-II S/s with all associated hardware including Vibration Dampers, mid-way & gantry Joint Boxes (called **OPGW Hardware** hereafter) and finally terminate in Joint Boxes at end Substations. The transmission line length is 350 kms (approx.) where repeater/s are required to meet link budget requirement of Bikaner-III – Neemrana-II.

TSP shall finalize the location of repeater station depending upon the actual site conditions. Further TSP shall comply to the requirements mentioned as per **Appendix-D.1**.

**C.2.0 2 no. of 765 kV line bays at Bikaner-III for Bikaner-III – Neemrana-II 765 kV D/c line (2<sup>nd</sup>):**

- (i) TSP shall supply, install & commission 1 no. FODP (72 F or higher ) alongwith panel and required Approach Cable (24F) with all associated hardware fittings from gantry tower to Bay Kiosk and from the Bay Kiosk to Control room.
- (ii) TSP shall supply, install & commission One STM-16 (FOTE) equipment alongwith panel/s supporting minimum three (3) directions with MSP (Multiplex Section Protection – 1+1) with necessary interfaces to meet the voice and data communication requirement between Bikaner-III, Neemrana-II S/s. The suitable DC Power Supply and backup to be provided for communication equipment.



## Transmission Service Agreement

- (iii) FOTE/FODP panel shall be installed in the new Bay Kiosk (Switchyard Panel Room (SPR)). The FOTE under present scope shall be integrated by TSP with the existing/proposed FOTE at control room of **Bikaner-III** S/s which shall be communicating with respective control center. TSP to provide necessary FODP sub rack / Splice trays/ Patch cords etc. and optical interfaces/equipment in the existing FOTE/FODP panels in control room for integration with the existing FOTE for onwards data transmission.

In case spare optical direction is not available in the existing FOTE at the control room, the TSP shall coordinate with station owner to reconfigure the directions in existing FOTE at control room. Alternatively, the TSP may integrate the FOTE under the present scope with FOTE in the nearby Kiosk connected to the control room (if available with spare direction). For this purpose, TSP shall provide necessary FODP sub rack / Splice trays/ Patch cords etc. and suitable optical interfaces/ equipment in the existing FOTE/FODP panels in another Kiosk (SPR).

- (iv) FOTE & FODP can be accommodated in same panel to optimize space.
- (v) The new communication equipment under the present scope shall be compatible for integration with existing regional level centralized NMS. The local configuration of the new communication equipment shall be the responsibility of TSP. The configuration work in the existing centralized NMS for integration of new Communication equipment shall be done by Regional ULDC Team, however all the necessary support in this regard shall be ensured by TSP.

The maintenance of all the communication equipment including FOTE, FODP, approach cable, DCPS alongwith Battery Bank shall be the responsibility of TSP.

**C.3.0 2 no. of 765 kV line bays at Neemrana-II for Bikaner-III – Neemrana-II 765 kV D/c line (2nd)**

- (i) TSP shall supply, install & commission 1 no. FODP (72 F or higher) alongwith panel and required Approach Cable (24F) with all associated hardware fittings from gantry tower to Bay Kiosk and from the Bay Kiosk to Control room.
- (ii) TSP shall supply, install & commission One STM-16 (FOTE) equipment alongwith panel/s supporting minimum three (3) directions with MSP (Multiplex Section Protection – 1+1) with necessary interfaces to meet the voice and data communication requirement between Bikaner-III, Neemrana-II S/s. The suitable DC Power Supply and backup to be provided for communication equipment.



## Transmission Service Agreement

- (iii) FOTE/FODP panel shall be installed in the new Bay Kiosk (Switchyard Panel Room (SPR)). The FOTE under present scope shall be integrated by TSP with the existing/proposed FOTE at control room of **Neemrana-II S/s** which shall be communicating with respective control center. TSP to provide necessary FODP sub rack / Splice trays/ Patch cords etc. and optical interfaces/equipment in the existing FOTE/FODP panels in control room for integration with the existing FOTE for onwards data transmission.

In case spare optical direction is not available in the existing FOTE at the control room, the TSP shall coordinate with station owner to reconfigure the directions in existing FOTE at control room. Alternatively, the TSP may integrate the FOTE under the present scope with existing FOTE in the nearby Kiosk connected to the control room FOTE (if available with spare direction). For this purpose, TSP shall provide necessary FODP sub rack / Splice trays/ Patch cords etc. and suitable optical interfaces/ equipment in the existing FOTE/FODP panels in another Kiosk (SPR).

- (iv) FOTE & FODP can be accommodated in same panel to optimize space.
- (v) The new communication equipment under the present scope shall be compatible for integration with existing regional level centralized NMS. The local configuration of the new communication equipment shall be the responsibility of TSP. The configuration work in the existing centralized NMS for integration of new Communication equipment shall be done by Regional ULDC Team, however all the necessary support in this regard shall be ensured by TSP.

The maintenance of all the communication equipment including FOTE, FODP, approach cable, DCPS alongwith Battery Bank shall be the responsibility of TSP.



**Repeater Requirements**

- If the repeater location is finalized in the Control Room of a nearby substation, TSP shall provide 1 no. OPGW (48F) on a single Earthwire peak with OPGW Hardware & mid-way Joint Boxes etc. of the line crossing the main line and 1 no. Approach Cable (48F) with all associated hardware fittings, to establish connectivity between crossing point of main transmission line up to the repeater equipment in substation control room.

TSP shall co-ordinate for Space & DC power supply sharing for repeater equipment.

TSP shall provide FODP, FOTE (with STM-16 capacity) with suitable interfaces require for link budget of respective link.

OR

- If the repeater location is finalized in the nearby substation premises, the TSP shall identify the Space for repeater shelter in consultation with station owner. Further TSP shall provide 1 no. OPGW (48F) on a single Earthwire peak with OPGW Hardware & mid-way Joint Boxes etc. of the line crossing the main line and 1 no. Approach Cable (48F) / UGFO (48F) with all associated hardware fittings, to establish connectivity between crossing point of main transmission line up to the substation where the repeater shelter is to be housed.

TSP shall provide repeater shelter along with FODP, FOTE (with STM-16 capacity) with suitable interfaces require for link budget of respective link, reliable power supply provisioning for AC and DC supply, battery bank, Air Conditioner and other associated systems.

OR

- If the repeater location is finalized on land near the transmission tower. TSP shall make the provisions for Land at nearby tower for repeater shelter. Further TSP shall provide 1 no. Approach Cable (48F) / UGFO (48F) with all associated hardware fittings to establish connectivity up to the location of repeater shelter.

TSP shall provide repeater shelter along with FODP, FOTE (with STM-16 capacity) with suitable interfaces require for link budget of respective link, reliable power supply provisioning for AC and DC supply, battery bank, Air Conditioner and other associated systems

Maintenance of OPGW Cable and **OPGW Hardware**, repeater equipment & items associated with repeater shelter shall be responsibility of TSP.



Transmission Service Agreement

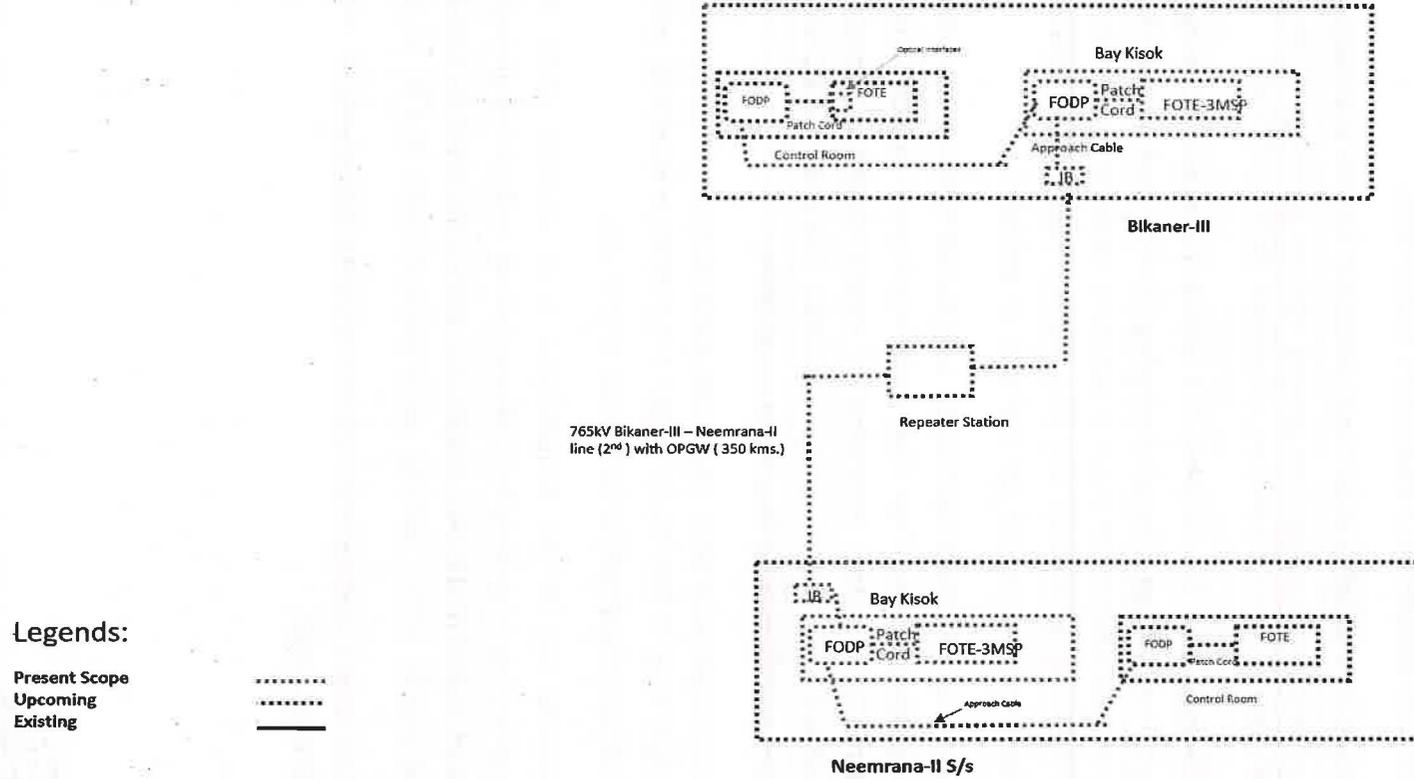
Note: Existing Station owner/s to provide necessary support to integrate different equipment & applications of new extended bays with the existing substation e.g. Communication (through FOTE), Voice etc. for smooth operation and monitoring of new added grid elements.



A handwritten signature in blue ink, appearing to be 'R. R.', located to the right of the stamp.

Transmission Service Agreement

Proposed Communication for Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1), Part-C



Legends:

Present Scope  
Upcoming  
Existing



Figure D.1

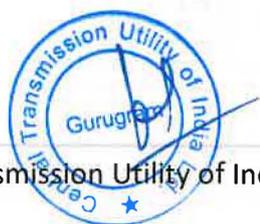


*Handwritten signature*

**C.4.0 PLCC& PABX:**

Power line carrier communication (PLCC) equipment complete for speech, tele-protection commands and data channels shall be provided on each transmission line. The PLCC equipment shall in brief include the following: -

- Coupling device, line traps, carrier terminals, protection couplers, HF cables, PABX (if applicable) and maintenance and testing instruments.
- At new substation, a telephone exchange (PABX) of 24 lines shall be provided at as means of effective communication among various buildings of the substation, remote end substations and with control centres (RLDC/SLDC) etc.
- Coupling devices shall be suitable for phase to phase coupling for 765kV Transmission lines. The pass band of coupling devices shall have sufficient margin for adding communication channel in future if required. Necessary protection devices for safety of personnel and low voltage part against power frequency voltages and transient over voltage shall also be provided.
- The line traps shall be broad band tuned suitable for blocking the complete range of carrier frequencies. Line Trap shall have necessary protective devices such as lightning arresters for the protection of tuning device. Decoupling network consisting of line traps and coupling capacitors may also be required at certain substation in case of extreme frequency congestion.
- The carrier terminals shall be of single side-band (SSB) amplitude modulation (AM) type and shall have 4 kHz band width. PLCC Carrier terminals and Protection couplers shall be considered for both ends of the line.
- PLCC equipment for all the transmission lines covered under the scheme (consisting of one set of analog PLCC channel along with circuit protection coupler and one set of Digital protection coupler for both ends) shall be provided by TSP. CVT & Wave trap for all the line bays under present scope shall be provided by TSP.
- All other associated equipment like cabling, coupling device and HF cable shall also be provided by the TSP.



## Transmission Service Agreement

## Schedule: 2

## Scheduled COD

[Note: As referred to in the definition of "Element", "Scheduled COD", and in Articles 3.1.3 (c), 4.1 (b) and 4.3 (a) of this Agreement]

S. No.	Name of the Transmission Element	Scheduled COD	Percentage of Quoted Transmission Charges recoverable on Scheduled COD of the Element of the Project	Element(s) which are pre-required for declaring the commercial operation (COD) of the respective Element
1.	Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end	24 months from SPV transfer	100%	All elements of scheme are required to be commissioned simultaneously as their utilization is dependent on each other.
2.	2 no. of 765 kV line bays each at Bikaner-III PS & Neemrana-II S/s.			

**Note:**

- (i) Developer of Bikaner-III PS & Neemrana-II S/s shall provide space for 2 nos. of 765 kV line bays alongwith space for Switchable line reactor each at Bikaner-III PS & Neemrana-II S/s for termination of Bikaner-III - Neemrana-II 765 kV D/c line (2nd).

The payment of Transmission Charges for any Element irrespective of its successful commissioning on or before its Scheduled COD shall only be considered after successful commissioning of the Element(s) which are pre-required for declaring the commercial operation of such Element as mentioned in the above table.

Scheduled COD for the Project: 24 Months from Effective Date.



**Schedule: 3****Safety Rules and Procedures**

[Note: As referred to in Articles 5.6 of this Agreement]

**1: Site Regulations and Safety:**

The TSP shall establish Site regulations within sixty (60) days from fulfilment of conditions subsequent, as per Prudent Utility Practices setting out the rules to be observed till expiry of the Agreement at the Site and shall comply therewith.

Such Site regulations shall include, but shall not be limited to, rules in respect of security, safety of the Project, gate control, sanitation, medical care, and fire prevention, public health, environment protection, security of public life, etc.

Copies of such Site regulations shall be provided to the Nodal Agency and the CEA for the purpose of monitoring of the Project.

**2: Emergency Work:**

In cases of any emergency, the TSP shall carry out all necessary remedial work as may be necessary.

If the work done or caused to be done by any entity, other than the TSP, the TSP shall, reimburse the actual costs incurred, to the other Party carrying out such remedial works.

**3: Site Clearance:**

In the course of execution of the Agreement, the TSP shall keep the Site reasonably free from all unnecessary obstruction, storage, remove any surplus materials, clear away any wreckage, rubbish and temporary works from the Site, and remove any equipment no longer required for execution of the Agreement. After completion of all Elements of the Project, the TSP shall clear away and remove all wreckage, rubbish and debris of any kind from the Site, and shall leave the Site clean and safe.

**4: Watching and Lighting:**

The TSP shall provide and maintain at its own expense all lighting, fencing, and watching when and where necessary for the proper construction, operation, maintenance / repair of any of the Elements of the Project, or for the safety of the owners and occupiers of adjacent property and for the safety of the public, during such maintenance / repair.



## Transmission Service Agreement

## Schedule: 4

## Computation of Transmission Charges

## 1.1 General

The Monthly Transmission Charges to be paid to the TSP for providing Transmission Service for any Contract Year during the term of the Agreement shall be computed in accordance with this Schedule and paid as per Sharing Regulations.

Illustration regarding payment of Transmission Charges under various scenarios (considering definitions of Contract Year, Expiry Date & Monthly Transmission Charges above) is as below: -

**Illustration-1: In case the Project Elements achieve COD as per Schedule**

Quoted Transmission Charges: **Rs. 140 Million**

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	28	1-Feb-2018	1-Feb-2018	25%
Element 2	38	1-Dec-2018	1-Dec-2018	75%

Tariff Payable as follows:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Feb-18 to 31-Mar-18	$140 \times 25\% \times ((28+31)/365)$	5.65		--	0.00
1-Apr-18 to 30-Nov-18	$140 \times 25\% \times (244/365)$	23.39		--	0.00
1-Dec-18 to 31-Mar-19	$140 \times 100\% \times (121/365)$				46.41
2	$140 \times 100\% \times 1$				140
3	$140 \times 100\% \times 1$				140
4	$140 \times 100\% \times 1$				140
5	$140 \times 100\% \times 1$				140
.....					
.....					
36 (1-Apr to 30-Nov)	$140 \times 100\% \times (244/365)$				93.59



## Transmission Service Agreement

**Illustration-2: In case of extension of Scheduled COD as per Article 4.4.1 & 4.4.2 of this Agreement**Quoted Transmission Charges: **Rs. 140 Million**

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	20	1-Feb-2018	1-Jul-2018	25%
Element 2	28	1-Oct-2018	1-Dec-2018	75%

Tariff Payable as follows:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Feb-18 to 31-Mar-18	--	0.00		--	0.00
1-Apr-18 to 30-Jun-18	--	0.00		--	0.00
1-Jul-18 to 30-Nov-18	140 X 25% X (153/365)	14.67		--	0.00
1-Dec-18 to 31-Mar-19	140 X 100% X (121/365)				46.41
2	140 X 100% X 1				140
3	140 X 100% X 1				140
4	140 X 100% X 1				140
5	140 X 100% X 1				140
.....					
.....					
36 (1-Apr to 30-Nov)	140 X 100% X (244/365)				93.59



## Transmission Service Agreement

**Illustration-3: In case of delay in achieving COD of Project & all individual Elements (COD of the Project achieved in Contract Year 1)**Quoted Transmission Charges: **Rs. 140 Million**

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	20	1-Feb-2018	1-Dec-2018	25%
Element 2	28	1-Oct-2018	1-Dec-2018	75%

Tariff Payable as follows:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Feb-18 to 31-Mar-18	--	0.00		--	0.00
1-Apr-18 to 30-Sept-18	--	0.00		--	0.00
1-Oct-18 to 30-Nov-18	--	0.00	1-Oct-18 to 30-Nov-18	--	0.00
1-Dec-18 to 31-Mar-19	140 X 100% X (121/365)				46.41
2	140 X 100% X 1				140
3	140 X 100% X 1				140
4	140 X 100% X 1				140
5	140 X 100% X 1				140
.....					
.....					
36 (1-Apr to 30-Nov)	140 X 100% X (244/365)				93.59



## Transmission Service Agreement

**Illustration-4: In case of delay in achieving COD of Project & all individual Elements (COD of the Project achieved in Contract Year other than Contract Year 1)**Quoted Transmission Charges: **Rs. 140 Million**

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	38	1-Oct-2019	1-May-2020	25%
Element 2	38	1-Oct-2019	1-May-2020	75%

Tariff Payment to be paid as:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Oct-19 to 31-Mar-20	--	0.00	1-Oct-19 to 31-Mar-20	--	0.00
1-Apr-20 to 30-Apr-20	-	0.00	1-Apr-20 to 30-Apr-20	-	0.00
1-May-20 to 31-Mar-21	140 X 100% X (335/365)			128.49	
2	140 X 100% X 1			140	
3	140 X 100% X 1			140	
4	140 X 100% X 1			140	
5	140 X 100% X 1			140	
.....					
.....					
36 (1-Apr to 30-Apr)	140 X 100% X (30/ 365)			11.51	



## Transmission Service Agreement

**Illustration5: In case of delay in achieving COD of Element but Project COD achieved on time**Quoted Transmission Charges: **Rs. 140 Million**

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	20	1-Feb-2018	1-Jul-2018	25%
Element 2	30	1-Dec-2018	1-Dec-2018	75%

Tariff Payable as follows:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Feb-18 to 31-Mar-18	--	0.00		--	0.00
1-Apr-18 to 30-Jun-18	--	0.00		--	0.00
1-Jul-18 to 30-Nov-18	140 X 25% X (153/365)	14.67		--	0.00
1-Dec-18 to 31-Mar-19	140 X 100% X (121/365)				46.41
2	140 X 100% X 1				140
3	140 X 100% X 1				140
4	140 X 100% X 1				140
5	140 X 100% X 1				140
.....					
.....					
36 (1-Apr to 30-Nov)	140 X 100% X (244/365)				93.59



## Transmission Service Agreement

**Illustration-6: In case of early commissioning of Project**

Quoted Transmission Charges: Rs. 140 Million

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	38	1-Oct-2019	1-Jul-2019	25%
Element 2	38	1-Oct-2019	1-Jul-2019	75%

Tariff Payment to be paid as:

Transmission Charges for Element 1		Transmission Charges for Element 2	
1-July-19 to 31-Mar-20	140 X 100% X (274/365)		105.09
2	140 X 100% X 1		140
3	140 X 100% X 1		140
4	140 X 100% X 1		140
5	140 X 100% X 1		140
.....			
.....			
36 (1-Apr to 30-Jun)	140 X 100% X (91/365)		34.91

**Illustration-7: In case of early commissioning of an element**

Quoted Transmission Charges: Rs. 140 Million

Completion Schedule:

Element No.	Completion Schedule in Months	Scheduled CoD of the Element	Actual CoD of the Element	% Charges recoverable on Scheduled CoD of the Element
Element 1	38	1-Oct-2019	1-Apr-2019	25%
Element 2	38	1-Jul-2019	1-Jul-2019	75%



## Transmission Service Agreement

Tariff Payment to be paid as:

Transmission Charges for Element 1			Transmission Charges for Element 2		
1-Apr-2019 to 30-Jun-19	140 X 25% X (91/365)	8.72	1-Apr-2019 to 30-Jun-19	--	0.00
1-July-19 to 31-Mar-20	140 X 100% X (274/ 365)				105.09
2	140 X 100% X 1				140
3	140 X 100% X 1				140
4	140 X 100% X 1				140
5	140 X 100% X 1				140
.....					
.....					
36 (1-Apr-30-Jun)	140 X 100% X (91/365)				34.91

The Transmission Charges shall be payable on monthly basis as computed above.

### 1.2 Computation of Monthly Transmission Charges

The Monthly Transmission Charges for any month m in a Contract Year n shall be calculated as below:

For AC System:

- a. If Actual Transmission System Availability for the month m of contract year n is greater than or equal to 98% and less than or equal to 98.5%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * 1$$

- a. If Actual Transmission System Availability for the month m of contract year n exceeds 98.5% and less than or equal to 99.75%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA / 98.5\%)$$

- c. If Actual Transmission System Availability for the month m of contract year n is greater than 99.75%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (99.75\% / 98.5\%)$$

- d. If Actual Transmission System Availability for the month m of contract year n is less than 98% and greater than or equal to 95.00%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA / 98\%)$$



## Transmission Service Agreement

- e. If Actual Transmission System Availability for the month m of contract year falls below 95%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA/ 98\%) - 0.02 * (T_{mn} * (AA/ 95\%))$$

For DC System:

- a. If Actual Transmission System Availability for the month m of contract year n is greater than or equal to 95% and less than or equal to 96%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * 1$$

- b. If Actual Transmission System Availability for the month m of contract year n exceeds 96% and less than or equal to 99.75%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA/ 96\%)$$

- c. If Actual Transmission System Availability for the month m of contract year n is greater than 99.75%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (99.75\% / 96\%)$$

- d. If Actual Transmission System Availability for the month m of contract year n is less than 95% and greater than or equal to 92.00%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA/ 95\%)$$

- e. If Actual Transmission System Availability for the month m of contract year falls below 92%;

$$\text{Monthly Transmission Charges MTC}(m) = T_{mn} * (AA/ 95\%) - 0.02 * (T_{mn} * (AA/ 92\%))$$

where:

- AA is the actual Availability, as certified by RPC, as per procedure provided in Schedule 6.
- m is the month in Contract Year 'n'
- $T_{mn}$  = Transmission Charges for the month 'm' in Contract Year 'n' =  
(=Transmission Charge/ no. of days in the Year n)\* no. of days in month m

Provided, no Transmission Charges shall be paid during the period for which the RLDC has not allowed the operation of the Element/Project due to the failure of the TSP to operate it as per the provisions of the Grid Code.



## Transmission Service Agreement

**1.3 RLDC Fee & Charges**

The payment of RLDC fee & charges, in accordance with relevant regulations of CERC, shall be the responsibility of the TSP.



A handwritten signature in blue ink, appearing to be "R. N.", located to the right of the stamp.

## Transmission Service Agreement

## Schedule: 5

## Quoted Transmission Charges

[Quoted Transmission Charges from Annexure - 21 of the RFP of the Selected Bidder to be inserted here]

[To be incorporated from the Bid of the Selected Bidder submitted during the e-reverse auction after its selection]

Quoted Transmission Charges: Rs. 1626.59 Million per annum

Proportionate Transmission Charges payable for each Element of the Project:

S. No.	Name of the Transmission Element	Percentage of Quoted Transmission Charges recoverable on Scheduled COD of the Element of the Project
1.	Bikaner-III - Neemrana-II 765 kV D/C line (2nd) along with 330 MVAR switchable line reactor for each circuit at each end	100%
2.	2 no. of 765 kV line bays each at Bikaner-III PS & Neemrana-II S/s	



## Transmission Service Agreement

## Schedule: 6

## Appendix –II of the Central Electricity Regulatory Commission (Terms and Conditions of Tariff) Regulations, 2019 as amended from time to time

## Procedure for Calculation of Transmission System Availability Factor for a Month

1. Transmission system availability factor for nth calendar month (“TAFPn”) shall be calculated by the respective transmission licensee, got verified by the concerned Regional Load Dispatch Centre (RLDC) and certified by the Member-Secretary, Regional Power Committee of the region concerned, separately for each AC and HVDC transmission system and grouped according to sharing of transmission charges. In case of AC system, transmission System Availability shall be calculated separately for each Regional Transmission System and inter-regional transmission system. In case of HVDC system, transmission System Availability shall be calculated on consolidate basis for all inter-state HVDC system.
2. Transmission system availability factor for nth calendar month (“TAFPn”) shall be calculated by consider following:
  - i) **AC transmission lines:** Each circuit of AC transmission line shall be considered as one element;
  - ii) **Inter-Connecting Transformers (ICTs):** Each ICT bank (three single phase transformer together) shall form one element;
  - iii) **Static VAR Compensator (SVC):** SVC along with SVC transformer shall form one element;
  - iv) **Bus Reactors or Switchable line reactors:** Each Bus Reactors or Switchable line reactors shall be considered as one element;
  - v) **HVDC Bi-pole links:** Each pole of HVDC link along with associated equipment at both ends shall be considered as one element;
  - vi) **HVDC back-to-back station:** Each block of HVDC back-to-back station shall be considered as one element. If associated AC line (necessary for transfer of inter- regional power through HVDC back-to-back station) is not available, the HVDC back-to-back station block shall also be considered as unavailable;
  - vii) **Static Synchronous Compensation (“STATCOM”):** Each STATCOM shall be considered as separate element.

3. The Availability of AC and HVDC portion of Transmission system shall be calculated by considering each category of transmission elements as under:



## Transmission Service Agreement

TAFMn (in %) for AC system:

$$= \frac{o \times AV_o + (p \times AV_p) + (q \times AV_q) + (r \times AV_r) + (u \times AV_u)}{(o + p + q + r + u)} \times 100$$

Where,

o	=	Total number of AC lines.
AV <sub>o</sub>	=	Availability of o number of AC lines.
p	=	Total number of bus reactors/switchable line reactors
AV <sub>p</sub>	=	Availability of p number of bus reactors/switchable line reactors
q	=	Total number of ICTs.
AV <sub>q</sub>	=	Availability of q number of ICTs.
r	=	Total number of SVCs.
AV <sub>r</sub>	=	Availability of r number of SVCs
u	=	Total number of STATCOM.
AV <sub>u</sub>	=	Availability of u number of STATCOMs

TAFMn (in %) for HVDC System:

$$= \frac{\sum_{x=1}^s C_{xpb}(\text{act}) \times AV_{xpb} + \sum_{y=1}^t C_{ybtb}(\text{act}) \times AV_{ybtb}}{\sum_{x=1}^s C_{xpb} + \sum_{y=1}^t C_{ybtb}} \times 100$$

Where

C <sub>xpb</sub> (act)	=	Total actual operated capacity of x <sup>th</sup> HVDC pole
C <sub>xpb</sub>	=	Total rated capacity of x <sup>th</sup> HVDC pole
AV <sub>xpb</sub>	=	Availability of x <sup>th</sup> HVDC pole
C <sub>ybtb</sub> (act)	=	Total actual operated capacity of y <sup>th</sup> HVDC back-to-back station block
C <sub>ybtb</sub>	=	Total rated capacity of y <sup>th</sup> HVDC back-to-back station block
AV <sub>ybtb</sub>	=	Availability of y <sup>th</sup> HVDC back-to-back station block
s	=	Total no of HVDC poles
t	=	Total no of HVDC Back to Back blocks

4. The availability for each category of transmission elements shall be calculated based on the weightage factor, total hours under consideration and non-available hours for



## Transmission Service Agreement

each element of that category. The formulae for calculation of Availability of each category of the transmission elements are as per **Appendix-III**. The weightage factor for each category of transmission elements shall be considered as under:

- (a) For each circuit of AC line – Number of sub-conductors in the line multiplied by ckt-km;
  - (b) For each HVDC pole- The rated MW capacity x ckt-km;
  - (c) For each ICT bank – The rated MVA capacity;
  - (d) For SVC- The rated MVAR capacity (inductive and capacitive);
  - (e) For Bus Reactor/switchable line reactors – The rated MVAR capacity;
  - (f) For HVDC back-to-back station connecting two Regional grids- Rated MW capacity of each block; and
  - (g) For STATCOM – Total rated MVAR Capacity.
5. The transmission elements under outage due to following reasons shall be deemed to be available:
- i. Shut down availed for maintenance of another transmission scheme or construction of new element or renovation/ upgradation/ additional capitalization in existing system approved by the Commission. If the other transmission scheme belongs to the transmission licensee, the Member Secretary, RPC may restrict the deemed availability period to that considered reasonable by him for the work involved. In case of dispute regarding deemed availability, the matter may be referred to Chairperson, CEA within 30days.
  - ii. Switching off of a transmission line to restrict over voltage and manual tripping of switched reactors as per the directions of concerned RLDC.
6. For the following contingencies, outage period of transmission elements, as certified by the Member Secretary, RPC, shall be excluded from the total time of the element under period of consideration for the following contingencies:
- i) Outage of elements due to acts of God and force majeure events beyond the control of the transmission licensee. However, whether the same outage is due to force majeure (not design failure) will be verified by the Member Secretary, RPC. A reasonable restoration time for the element shall be considered by Member Secretary, RPC and any additional time taken by the transmission licensee for restoration of the element beyond the reasonable time shall be treated as outage time attributable to the transmission licensee. Member Secretary, RPC may consult the transmission licensee or any expert for estimation of reasonable restoration time. Circuits restored through ERS (Emergency Restoration System) shall be considered as available;



## Transmission Service Agreement

- ii) Outage caused by grid incident/disturbance not attributable to the transmission licensee, e.g. faults in substation or bays owned by other agency causing outage of the transmission licensee's elements, and tripping of lines, ICTs, HVDC, etc. due to grid disturbance. However, if the element is not restored on receipt of direction from RLDC while normalizing the system following grid incident/disturbance within reasonable time, the element will be considered not available for the period of outage after issuance of RLDC's direction for restoration;

Provided that in case of any disagreement with the transmission licensee regarding reason for outage, same may be referred to Chairperson, CEA within 30 days. The above need to be resolved within two months:

Provided further that where there is a difficulty or delay beyond sixty days, from the incidence in finalizing the recommendation, the Member Secretary of concerned RPC shall allow the outage hours on provisional basis till the final view.

7. Time frame for certification of transmission system availability: (1) Following schedule shall be followed for certification of availability by Member Secretary of concerned RPC:

- Submission of outage data by Transmission Licensees to RLDC/constituents – By 5th of the following month;
- Review of the outage data by RLDC / constituents and forward the same to respective RPC– by 20th of the month;
- Issue of availability certificate by respective RPC – by 3rd of the next month.



## Transmission Service Agreement

## Appendix-III

## FORMULAE FOR CALCULATION OF AVAILABILITY OF EACH CATEGORY OF TRANSMISSION ELEMENTS

For AC transmission system

$$AV_o(\text{Availability of } o \text{ no. of AC lines}) = \frac{\sum_{i=1}^o W_i(T_i - TNA_i)/T_i}{\sum_{i=1}^o W_i}$$

$$AV_q(\text{Availability of } q \text{ no. of ICTs}) = \frac{\sum_{k=1}^q W_k(T_k - TNA_k)/T_k}{\sum_{k=1}^q W_k}$$

$$AV_r(\text{Availability of } r \text{ no. of SVCs}) = \frac{\sum_{i=1}^r W_i(T_i - TNA_i)/T_i}{\sum_{i=1}^r W_i}$$

$$AV_p(\text{Availability of } p \text{ no. of Switched Bus reactors}) = \frac{\sum_{m=1}^p W_m(T_m - TNA_m)/T_m}{\sum_{m=1}^p W_m}$$

$$AV_u(\text{Availability of } u \text{ no. of STATCOMs}) = \frac{\sum_{n=1}^u W_n(T_n - TNA_n)/T_n}{\sum_{n=1}^u W_n}$$

$$AV_{x_{bp}}(\text{Availability of an individual HVDC pole}) = \frac{(T_x - TNA_x)}{T_x}$$

$$AV_{y_{btb}}(\text{Availability of an individual HVDC Back-to-back Blocks}) = \frac{(T_y - TNA_y)}{T_y}$$

For HVDC transmission system

For the new HVDC commissioned but not completed twelve months;

For first 12 months:  $[(AV_{x_{bp}} \text{ or } AV_{y_{btb}}) \times 95\% / 85\%]$ , subject to ceiling of 95%.

Where,

- o = Total number of AC lines;
- AV<sub>o</sub> = Availability of o number of AC lines;
- p = Total number of bus reactors/switchable line reactors;
- AV<sub>p</sub> = Availability of p number of bus reactors/switchable line reactors;
- q = Total number of ICTs;
- AV<sub>q</sub> = Availability of q number of ICTs;
- r = Total number of SVCs;
- AV<sub>r</sub> = Availability of r number of SVCs;
- U = Total number of STATCOM;



## Transmission Service Agreement

$AV_u$	=	Availability of $u$ number of STATCOMs;
$W_i$	=	Weightage factor for $i$ th transmission line;
$W_k$	=	Weightage factor for $k$ th ICT;
$W_l$	=	Weightage factors for inductive & capacitive operation of $l$ th SVC;
$W_m$	=	Weightage factor for $m$ th bus reactor;
$W_n$	=	Weightage factor for $n$ th STATCOM.
$T_i, T_k, T_l, T_m, T_n, T_x, T_y$	=	The total hours of $i$ th AC line, $k$ th ICT, $l$ th SVC, $m$ th Switched Bus Reactor & $n$ th STATCOM, $x$ th HVDC pole, $y$ th HVDC back-to-back blocks during the period under consideration (excluding time period for outages not attributable to transmission licensee for reasons given in Para 5 of the procedure)
$T_{NAi}, T_{NAk}, T_{NAL}, T_{NAM}, T_{NAN}, T_{NAX}, T_{NAY}$	=	The non-availability hours (excluding the time period for outages not attributable to transmission licensee taken as deemed availability as per Para 5 of the procedure) for $i$ th AC line, $k$ th ICT, $l$ th SVC, $m$ th Switched Bus Reactor, $n$ th STATCOM, $x$ th HVDC pole and $y$ th HVDC back-to-back block.



Transmission Service Agreement

Schedule: 7

Entire Bid (both financial bid and technical bid) of the Selected Bidder to be attached here



## Transmission Service Agreement

## Schedule: 8

## Contract Performance Guarantee

(To be on non-judicial stamp paper of appropriate value as per Stamp Act relevant to place of execution. Foreign entities submitting Bids are required to follow the applicable law in their country.)

In consideration of the ..... [Insert name of the SPV or Selected Bidder on behalf of the TSP, or Lead Member in case of the Consortium, with address] agreeing to undertake the obligations under the Transmission Service Agreement dated .....and the other RFP Project Documents and the Nodal Agency and the PFC Consulting Limited, agreeing to execute the *RFP Project Documents* with the Selected Bidder, regarding setting up the Project, the ..... [Insert name and address of the bank issuing the guarantee and address of the head office] (hereinafter referred to as "Guarantor Bank") hereby agrees unequivocally, irrevocably and unconditionally to pay to ..... (being the Nodal Agency) \_at .....[Insert the Place from the address of the Nodal Agency indicated in the TSA] forthwith on demand in writing from the Nodal Agency\_or any Officer authorized by it in this behalf, any amount up to and not exceeding Rupees ..... Crores (Rs. ....) only [Insert the amount of the bank guarantee] on behalf of M/s. .... [Insert name of the Selected Bidder or SPV].

This guarantee shall be valid and binding on the Guarantor Bank up to and including .....and shall not be terminable by notice or any change in the constitution of the Bank or the term of the Transmission Service Agreement or by any other reasons whatsoever and our liability hereunder shall not be impaired or discharged by any extension of time or variations or alternations made, given, or agreed with or without our knowledge or consent, by or between parties to the respective agreement.

Our liability under this Guarantee is restricted to Rs. .... Crores (Rs. ....) only. Our Guarantee shall remain in force until ..... [Insert the date of validity of the Guarantee as per Article 3.1.2 of this Agreement]. The Nodal Agency, shall be entitled to invoke this Guarantee up to three hundred sixty five (365) days of the last date of the validity of this Guarantee.



## Transmission Service Agreement

The Guarantor Bank hereby expressly agrees that it shall not require any proof in addition to the written demand from ..... (in its roles as the Nodal Agency), made in any format, raised at the above mentioned address of the Guarantor Bank, in order to make the said payment to Nodal Agency.

The Guarantor Bank shall make payment hereunder on first demand without restriction or conditions and notwithstanding any objection by ..... [Insert name of the Selected Bidder], ..... [Insert name of the TSP] and / or any other person. The Guarantor Bank shall not require Nodal Agency to justify the invocation of this BANK GUARANTEE, nor shall the Guarantor Bank have any recourse against Nodal Agency in respect of any payment made hereunder.

**THIS BANK GUARANTEE** shall be interpreted in accordance with the laws of India.

The Guarantor Bank represents that this BANK GUARANTEE has been established in such form and with such content that it is fully enforceable in accordance with its terms as against the Guarantor Bank in the manner provided herein.

**THIS BANK GUARANTEE** shall not be affected in any manner by reason of merger, amalgamation, restructuring, liquidation, winding up, dissolution or any other change in the constitution of the Guarantor Bank.

**THIS BANK GUARANTEE** shall be a primary obligation of the Guarantor Bank and accordingly Nodal Agency shall not be obliged before enforcing this BANK GUARANTEE to take any action in any court or arbitral proceedings against **SPV** or the Selected Bidder, as the case may be, to make any claim against or any demand on **SPV** or the Selected Bidder, as the case may be, or to give any notice to **SPV** or the Selected Bidder, as the case may be, or to enforce any security held by the Nodal Agency or to exercise, levy or enforce any distress, diligence or other process against **SPV** or the Selected Bidder, as the case may be.

The Guarantor Bank acknowledges that this BANK GUARANTEE is not personal to Nodal Agency and may be assigned, in whole or in part, (whether absolutely or by way of security) by Nodal Agency to any entity to whom the Nodal Agency is entitled to assign its rights and obligations under the Transmission Service Agreement.

The Guarantor Bank hereby agrees and acknowledges that Nodal Agency shall have a right to invoke this Bank Guarantee either in part or in full, as it may deem fit.

Notwithstanding anything contained hereinabove, our liability under this Guarantee is restricted to Rs. .... Crores (Rs. ....) only and it shall remain in



## Transmission Service Agreement

force until .....[Date to be inserted on the basis of Article 3.1.2 of the Transmission Service Agreement], with an additional claim period of three hundred sixty five (365) days thereafter. This BANK GUARANTEE shall be extended from time to time for such period, as may be desired by ..... [Insert name of the Selected Bidder or Lead Member in case of the Consortium or SPV]. We are liable to pay the guaranteed amount or any part thereof under this Bank Guarantee only if Nodal Agency serves upon us a written claim or demand.

**In witness where of:**

Signature .....

Name: .....

Power of attorney No.: .....

**For:**

..... [Insert Name of the Bank]

**Banker's Seal and Full Address, including mailing address of the Head Office**



## Transmission Service Agreement

**Schedule: 9****Methodology for determining the Relief Under Force Majeure Event & Change in Law during Construction Period**

The relief in the form of revision in tariff due to Force Majeure Event leading to extension of Scheduled COD for a period beyond one hundred eighty (180) days and/ or Change in Law during the construction period shall be as under:

$$\Delta T = [(P \times d)] \div [1 - (1 + d)^{-n}]$$

Where,

$\Delta T$  = Change in Transmission Charges for each year

P = Sum of cumulative increase or decrease in the cost of the Project due to Change in Law and interest cost during construction corresponding to the period exceeding one hundred eighty (180) due to Force Majeure Event leading to extension of Scheduled COD for a period beyond one hundred eighty (180) days

n = number of years over which the Transmission Charges has to be paid

d = Discount rate as notified by the CERC, applicable on the Bid Deadline

The increase in Transmission Charges as stated above shall be applicable only if the value of increase in Transmission Charges as calculated above exceeds 0.30% (zero point three percent) of the quoted Transmission Charges of the TSP.



Dated 27<sup>th</sup> December, 2023

---

**SHARE PURCHASE AGREEMENT**

**AMONG**

**PFC CONSULTING LIMITED**

**AND**

**BIKANER III NEEMRANA II TRANSMISSION LIMITED**

**AND**

**THE TATA POWER COMPANY LIMITED**

---





सत्यमेव जयते

## INDIA NON JUDICIAL

## Government of National Capital Territory of Delhi

₹100

## e-Stamp

**Certificate No.** : IN-DL16607592397610V  
**Certificate Issued Date** : 21-Dec-2023 11:45 AM  
**Account Reference** : IMPACC (IV)/ dl960303/ DELHI/ DL-DLH  
**Unique Doc. Reference** : SUBIN-DL96030396976586006000V  
**Purchased by** : PFC CONSULTING LIMITED  
**Description of Document** : Article 5 General Agreement  
**Property Description** : Not Applicable  
**Consideration Price (Rs.)** : 0  
 (Zero)  
**First Party** : PFC CONSULTING LIMITED  
**Second Party** : Not Applicable  
**Stamp Duty Paid By** : PFC CONSULTING LIMITED  
**Stamp Duty Amount(Rs.)** : 100  
 (One Hundred only)



₹100

Please write or type below this line

IN-DL16607592397610V

## SHARE PURCHASE AGREEMENT

This **SHARE PURCHASE AGREEMENT** ('Agreement') made on this 27<sup>th</sup> Day of December 2023 at New Delhi by and between:

**PFC CONSULTING LIMITED** (a wholly owned subsidiary of Power Finance Corporation Ltd.), a company incorporated under the Companies Act, 1956, with CIN No. U74140DL2008GOI175858 having its registered office at First Floor, "Urjanidhi", 1 Barakhamba Lane, Connaught Place, New Delhi 110001, (hereinafter referred to as "**PFCCL**", which expression shall, unless it be repugnant to the context or meaning thereof, be deemed to mean and include its successors and permitted assigns,) of the **FIRST PART**;

Statutory AleRFCCCL

BIIINIITL

TTPCL

1. The authenticity of this Stamp certificate should be verified at 'www.shclsestamp.com' or using e-Stamp Mobile App of Stock Holding. Any discrepancy in the details on this Certificate and as available on the website / Mobile App renders it invalid.
2. The onus of checking the legitimacy is on the users of the certificate.
3. In case of any discrepancy please inform the Competent Authority.

AND

**BIKANER III NEEMRANA II TRANSMISSION LIMITED**, a company incorporated under the Companies Act, 2013, with CIN No. U42201DL2023GOI415740 having its registered office at First Floor, "Urjanidhi", 1 Barakhamba Lane, Connaught Place, New Delhi 110001, (hereinafter referred to as "**Company**" which expression shall, unless repugnant to the context or meaning thereof, be deemed to mean and include its successors and permitted assigns) of the **SECOND PART**; and

AND

**THE TATA POWER COMPANY LIMITED**, a company incorporated under the Companies Act, 1956, with CIN No. L28920MH1919PLC000567 having its registered office at **Bombay House, 24, Homi Mody Street, Mumbai-400001** (hereinafter referred to as "**Selected Bidder**" which expression shall, unless repugnant to the context or meaning thereof, be deemed to mean and include its successors and permitted assigns) of the **THIRD PART**.

**WHEREAS:**

- A. The Ministry of Power, Government of India, vide its Gazette no. **CG-DL-E-14012023-241990** dated **January 13, 2023** has notified PFC Consulting Ltd. to be the Bid Process Coordinator (BPC) for the purpose of selection of Bidder as Transmission Service Provider (TSP) to establish transmission system for "**Transmission system for evacuation of power from Rajasthan REZ Ph-IV (Part-1) (Bikaner Complex): Part-C**" through tariff based competitive bidding process (hereinafter referred to as the "Project").
- B. In accordance with the Bidding Guidelines, PFCCCL had initiated a Bid Process through issuance of RFP documents for selecting a Successful Bidder to build, own, operate and transfer the Project in accordance with and on the terms and conditions mentioned in the RFP Project Documents (as defined hereinafter).
- C. PFCCCL has incorporated the Company and PFCCCL along with the Nominees hold One hundred per cent (100 %) of total issued and paid up equity share capital of the Company.
- D. PFCCCL has initiated the development of the Project and has obtained survey report, certain clearances, consents and permits as specified in the RFP regarding the Project.
- E. Pursuant to the said Bid Process, "The Tata Power Company Limited" has been identified as the Selected Bidder vide Letter of Intent dated November 29, 2023 issued by the PFCCCL in favor of the Selected Bidder.
- F. As envisaged in the RFP, the Shares Seller (as defined hereinafter) has agreed to sell the Sale Shares (as defined hereinafter) to the Selected Bidder and the Selected Bidder has agreed to purchase the Sale Shares from the Shares Seller, subject to and on the terms and conditions set forth in this Agreement.

**NOW THEREFORE, IN CONSIDERATION OF THE MUTUAL COVENANTS AND AGREEMENTS SET FORTH IN THIS AGREEMENT AND FOR OTHER GOOD AND VALUABLE CONSIDERATION, THE PARTIES HEREBY AGREE AS FOLLOWS:**



## 1. DEFINITIONS

- 1.1 Capitalised terms in this Agreement, unless defined in this Agreement shall, in so far as the context admits, have the same meaning in this Agreement as has been ascribed to them in the Transmission Service Agreement.
- 1.2 Additionally, the following terms shall have the meaning hereinafter respectively assigned to them herein below:
- (i) **“Acquisition Price”** shall mean **INR 18,60,53,101/- (Rupees Eighteen Crore Sixty Lakh Fifty Three Thousand One Hundred One Only)**, which is the aggregate consideration payable by the Selected Bidder towards purchase of the **Sale Shares at par** along with assets and liabilities of the Company as on the Closing Date subject to adjustment as per the audited accounts of the Company as on the Closing Date;
  - (ii) **“Agreement”** or **“the Agreement”** or **“this Agreement”** shall mean this Share Purchase Agreement and shall include the recitals and/or annexures attached hereto, and the contracts, certificates, disclosures and other documents to be executed and delivered pursuant hereto, if any, and any amendments made to this Agreement by Parties in writing;
  - (iii) **“Bid Process”** shall mean the competitive bidding process initiated by the Company, by issuance of RFP Documents for selecting a Successful Bidder to build, own, operate and transfer the Project in accordance with and on the terms and conditions mentioned in the RFP Project Documents;
  - (iv) **“Board”** shall mean the board of directors of the Company
  - (v) **“Closing Date”** shall mean a mutually agreed date between the Parties falling within the period as mentioned in Clause 2.4 of RFP or on failure of such mutual agreement between the Parties shall be the date falling on the last date of such period;
  - (vi) **“CTU”** or **“Central Transmission Utility of India Limited”** shall have same meaning as defined in the Electricity Act, 2003;
  - (vii) **“Encumbrance”** shall mean any mortgage, pledge, lien, charge, security assignment, hypothecation, trust, encumbrance or any other agreement having the effect of creating security interest;
  - (viii) **“Letter of Intent”** shall have the meaning ascribed thereto under the RFP;
  - (ix) **“Nominees”** shall mean the Persons, who are named in Annexure A, holding the Sale Shares as nominees of PFCL.
  - (x) **“Party”** shall mean PFCL, Company and the Selected Bidder, referred to individually, and **“Parties”** shall mean PFCL, Company and the Selected Bidder collectively referred to, as relevant;



- (xi) **“Person”** shall include an individual, an association, a corporation, a partnership, a joint venture, a trust, an unincorporated organisation, a joint stock company or other entity or organisation, including a government or political subdivision, or an agency or instrumentality thereof, and/or any other legal entity;
- (xii) **“RfP Project Documents”** shall mean the following documents, referred to collectively:
- a) Transmission Services Agreement;
  - b) this Agreement; and
  - c) Any other agreement(s) as may be required.
- (xiii) **“Representations and Warranties”** shall mean the representations and warranties mentioned in **Clause 4** hereto;
- (xiv) **“Sale Shares”** shall mean **10,000 (Ten Thousand)** Shares, representing 100 percent of the total issued, subscribed and fully paid-up equity share capital of the Company held by the Shares Seller and Nominees as more particularly described in Annexure A attached hereto;
- (xv) **“Shares”** shall mean the fully paid-up equity shares of Company, of face value Rs. 10 each;
- (xvi) **“Shares Seller”** shall mean PFCCL;
- (xvii) **“Transmission Services Agreement”** or **“TSA”** means the agreement titled ‘Transmission Services Agreement’ dated December 27, 2023 entered into between Central Transmission Utility of India Limited and the TSP pursuant to which the TSP shall build, own, operate and transfer the Project and make available the assets of the Project to Central Transmission Utility of India Limited on a commercial basis, as may be amended from time to time;
- (xviii) **Transmission Service Provider”** or **“TSP”** shall mean **Bikaner III Neemrana II Transmission Limited** which has executed the Transmission Service Agreement and which shall be acquired by the Selected Bidder.

### 1.3 Interpretation Clause

Unless the context otherwise requires, the provisions of the TSA relating to the interpretation of the TSA shall apply to this Agreement as if they were set out in full in this Agreement and to this end are incorporated herein by reference.

## 2. TRANSFER OF SHARES

- 2.1 Subject to the terms and conditions of this Agreement, the Shares Seller agrees to sell and transfer to the Selected Bidder and the Selected Bidder hereby agrees to purchase from the Shares Seller, the Sale Shares of the Company free from Encumbrances with



rights and benefits attached thereto in consideration of the Acquisition Price and the covenants, undertakings and the agreements of the Selected Bidder contained in this Agreement.

- 2.2 The Shares Seller hereby undertakes to cause the Nominees to transfer part of the Sale Shares held by them as Nominees of the Shares Seller to the Selected Bidder and execute any documents required to deliver good title to the Sale Shares to the Selected Bidder.

### 3. CLOSING

- 3.1 Prior to the Closing Date, the Selected Bidder shall provide to the Shares Seller, valid share transfer forms ("Share Transfer Forms") duly stamped with requisite amount of stamp duty payable on the transfer of Sale Shares.
- 3.2 On the Closing Date, the Shares Seller shall hand over to the Selected Bidder or its authorised representative, the original share certificates representing the Sale Shares ("Sale Share Certificates") along with the Share Transfer Forms duly executed by the Shares Seller and the Nominees in favour of the Selected Bidder and its nominees, simultaneously against the Selected Bidder handing over to the Shares Seller demand drafts drawn in favour of the Shares Seller for the Acquisition Price payable to it.

Provided that prior to the handing over of the Sale Share Certificates to the Selected Bidder as mentioned above, the Selected Bidder shall provide satisfactory evidence to PFCCCL that on or before the Closing Date, the Selected Bidder has furnished the Performance Bank Guarantee to Central Transmission Utility of India Limited and is in a position to comply with all other requirements of Clause 2.4 of the RFP.

- 3.3 The Selected Bidder shall immediately upon receiving the Sale Share Certificates and the Share Transfer Forms, duly execute the Share Transfer Forms and duly lodge the Share Transfer Forms and the Sale Share Certificates with the Company. The Selected Bidder may also propose the names of its nominees to be appointed on the Board of the Company and the address within the jurisdiction of the Registrar of Delhi and Haryana, which would be the new registered office of the Company. The Company shall, upon receipt of the said documents from the Selected Bidder, do the following:
- (i) Immediately on the Closing Date convene a meeting of the Board, wherein the Board shall pass the following necessary resolutions:
- (a) approving the transfer of the Shares constituting the Sale Shares from the Shares Seller and its Nominees to the name of the 'The Tata Power Company Limited' and its nominees;
- (b) approving the "The Tata Power Company Limited" and its nominees as a member of the Company and entering the name of the "The Tata Power Company Limited" and its nominees in the register of members.



- (c) changing the address of the registered office of the Company to the new address, within the jurisdiction of the Registrar of Companies, Delhi and Haryana, as may be provided by the Selected Bidder.
- (d) appointing the nominees of the Selected Bidder on the Board and accepting the resignations of the other existing Directors on the Board and the Chair of the meeting which was taken by one of the existing Directors shall be vacated and appointment of a new Chairman who shall be one of the newly appointed Director, for the rest of the meeting.

Immediately pursuant to the acceptance of resignation of the existing Directors and appointment of new Chairman, the newly constituted Board of Directors shall continue with the meeting and pass the following resolution:

- (e) terminating all the authorizations granted regarding the business and/or operations of the Company or the operations of the bank accounts of the Company, with prospective effect; and
  - (f) acknowledging and accepting the terms and conditions as contained in the executed copies of the RFP Project Documents and to abide by the provisions contained therein.
- (ii) Enter the name of the **"The Tata Power Company Limited" and its nominees** as the legal and beneficial owner of the Sale Shares, free of all Encumbrances, in the register of members of the Company;
  - (iii) Make the necessary endorsements on the Sale Share Certificates, indicating the name of the **"The Tata Power Company Limited" and its nominees** as the legal and beneficial owner of the Sale Shares evidenced there under;
  - (iv) Return the original Sale Share Certificates, duly endorsed in the name of the **"The Tata Power Company Limited" and its nominees**, to the **"The Tata Power Company Limited" and its nominees**, as the case may be or its authorised representative;
  - (v) Handover all the statutory registers and records, if any, of the Company to the Selected Bidder.
  - (vi) Handover certified true copies of the Board resolution passed by the Company as per (i)(a) to (i)(e) of Clause 3.3 (i) to Central Transmission Utility of India Limited.

3.4 The Parties to this Agreement agree to take all measures that may be required to ensure that all the events contemplated in the **Clauses 3.1 to 3.3** above on the Closing Date are completed on the same day.

Notwithstanding the provisions of **Clause 3.3** hereto, all proceedings to be taken and all documents to be executed and delivered by the Parties at the Closing Date shall be deemed to have been taken and executed simultaneously and no proceedings shall be



PFCCCL



BHINIITL



TTPCL

deemed to have been taken nor documents executed or delivered until all have been taken, executed and delivered.

- 3.5 The Selected Bidder hereby acknowledges and agrees that after the date of acquisition of one hundred percent (100%) of the equity shareholding of the Company, by the Selected Bidder as per Clause 3.3, (a) the authority, rights and obligations of the PFCCL/Company in respect of the Bid Process shall forthwith cease and any actions to be taken thereafter regarding the Bid Process will be undertaken by Central Transmission Utility of India Limited themselves or through their any other authorized representative(s), (b) all rights and obligations of the PFCCL/Company shall be of the Selected Bidder and (d) any decisions taken by the PFCCL/Company prior to the date of its acquisition by the Selected Bidder shall continue to be binding on the Selected Bidder. The Parties hereby agree that this provision shall survive the termination of this Agreement.
- 3.6 This agreement shall be effective from the date of its signing by the Parties and shall remain in force until all the obligations of the respective Parties under Clause 3.3 hereto are fulfilled.

#### 4. REPRESENTATIONS AND WARRANTIES

4.1 The Selected Bidder hereby represents and warrants to the Shares Seller that:

4.1.1 The Selected Bidder has full legal right, power and authority to enter into, execute and deliver this Agreement and to perform the obligations, undertakings and transactions set forth herein, and this Agreement has been duly and validly executed and delivered by the Selected Bidder and constitutes its legal, valid and binding obligations, enforceable against it in accordance with its terms;

4.1.2 The execution, delivery and performance of this Agreement by the Selected Bidder will not violate or contravene any provision of the Memorandum of Association or Articles of the Selected Bidder, (ii) will not violate or contravene any law, statute, rule, regulation, licensing requirement, order, writ, injunction or decree of any court, governmental instrumentality or other regulatory, governmental or public body, agency or authority by which the Selected Bidder are bound or by which any of its and/or their properties or assets are bound, and (iii) except to the extent that the same have been duly and properly completed or obtained, will not require any filing with, or permit, consent or approval of or license from, or the giving of any notice to, any court, governmental instrumentality or other regulatory, governmental or public body, agency or authority, joint venture party, or any other entity or person whatsoever; and

4.1.3 The Selected Bidder is not restricted in any manner whatsoever, including without limitation, on account of any judicial or governmental order, action or proceeding, or any contractual obligation assumed by the Selected Bidder, from purchasing the Sale Shares from the Shares Seller in the manner provided for in this Agreement.



- 4.2 The Shares Seller hereby represents and warrants to the Selected Bidder that;
- 4.2.1 The Shares Seller and the Nominees are the legal and beneficial owners of the Sale Shares, free and clear of any Encumbrance and the delivery to the Selected Bidder of the Sale Shares pursuant to the provisions of this Agreement will transfer to the Selected Bidder a good title to the Sale Shares.
- 4.2.2 The Shares Seller has full legal right, power and authority to enter into, execute and deliver this Agreement and to perform the obligations, undertakings and transactions set forth herein. The execution, delivery and performance of this Agreement will not violate the Memorandum and Articles of Association of the Shares Seller or contravene any contract by which it is bound.
- 4.2.3 The Shares Seller has obtained requisite authorizations to sell and transfer the Sale Shares to the Selected Bidder. The Shares Seller also represent that it is not prevented from transferring and selling the Sale Shares. Also, to the best of its knowledge, the Sale Shares are not the subject matter of any claim or pending proceeding or threatened by any legal proceeding made by any third party.
- 4.3 Except as specified in Clause 4.2, above the Shares Seller shall not be deemed to have, made any representation or warranty whatsoever, whether express or implied, in relation to the Sale Shares or Company, including but not limited to any implied warranty or representation as to the business or affairs of the Company.
- 4.4 The Representations and Warranties are given as on the date of this Agreement except that where a Representation and Warranty is expressed to be made as on another date, the Representation and Warranty is given with respect to that date only.
- 4.5 Each Representation and Warranty is to be construed independently of the others and is not limited by reference to any other Warranty. The Representations, Warranties and undertakings contained in this **Clause 4** hereto or in any document delivered pursuant to or in connection with this Agreement are continuing in nature and shall survive the Closing Date for one (1) year.
- 4.6 The Parties represent to each other that all Representations and Warranties provided herein by the respective Party shall be true as of Closing Date.

## 5. OBLIGATIONS OF THE SELECTED BIDDER

The Selected Bidder agrees that the Shares Seller shall not be liable in any manner, nor shall it assume any responsibility or liability whatsoever, in respect of the business of the Company and its operations or activities, arising after Closing Date, to any Person or any authority, central, state, local or municipal or otherwise and the same shall be the sole responsibility of the Selected Bidder.

## 6. MISCELLANEOUS

### 6.1 NOTICES



- a) All notices to be given under this Agreement shall be in writing and in the English language.
- b) All notices must be delivered personally or by registered or speed post or by recognised courier to the addresses below:

<b>Selected Bidder</b>	<b>The Tata Power Company Limited</b> Bombay House, 24, Homi Mody Street, Mumbai-400001
<b>Name of the Holding Company of the SPV</b>	<b>Company Secretary, PFC Consulting Limited</b> First Floor, "Urjanidhi", 1 Barakhamba Lane, Connaught Place, New Delhi- 110001
<b>Company (Before Closing Date)</b>	<b>Project In-charge BIKANER III NEEMRANA II TRANSMISSION LIMITED</b> First Floor, "Urjanidhi", 1 Barakhamba Lane, Connaught Place, New Delhi- 110001
<b>Company (After Closing Date)</b>	<b>BIKANER III NEEMRANA II TRANSMISSION LIMITED</b> Flat no. 94, 3 <sup>rd</sup> floor, Pocket 4, LIG flats, sector 11, Dwarka, West Delhi, New Delhi 110075

- c) Any Party may by notice of at least fifteen (15) days to the other Parties change the address and / or addresses to which such notices and communications to it are to be delivered or mailed.

## 6.2 RESOLUTION OF DISPUTES

6.2.1 If any dispute arises between the Parties, in connection with the validity, interpretation, implementation or alleged breach of any provision of this Agreement ("Dispute"), the disputing Parties hereto shall endeavour to settle such Dispute amicably. The attempt to bring about an amicable settlement shall be considered to have failed if not resolved within 60 days from the date of the Dispute.

6.2.2 If the Parties are unable to amicably settle the Dispute in accordance with Clause 6.2.1 within the period specified therein, any of the Parties shall be entitled to within 30 days after expiry of the aforesaid period refer the Dispute to the Company Secretary of PFCCL and Chief Executive/Managing Director of the



PFCCL



BIINIITL



TTPCL

Selected Bidder for resolution of the said Dispute. The attempt to bring about such resolution shall be considered to have failed if not resolved within 30 days from the date of receipt of a written notification in this regard.

- 6.2.3 In the event the Dispute is not settled in accordance with Clause 6.2.2 above, any Party to the Dispute shall be entitled to serve a notice invoking this Clause and making a reference to a sole arbitrator. If the Parties to the Dispute cannot agree as to the appointment of the sole arbitrator within 30 days of receipt of the notice of the Party making the reference, then the Shares Seller along with the Company shall appoint one arbitrator and the Selected Bidder shall appoint one arbitrator and the two arbitrators, so appointed shall appoint a third arbitrator. However, after the Closing Date, in such an event the Shares Seller shall appoint one arbitrator and the Selected Bidder along with the Company shall appoint one arbitrator and the two arbitrators, so appointed shall appoint the third arbitrator.
- 6.2.4 The place of the arbitration shall be New Delhi. The Arbitration proceedings shall be governed by the Arbitration and Conciliation Act, 1996.
- 6.2.5 The proceedings of arbitration shall be in English language.
- 6.2.6 The arbitrator's award shall be substantiated in writing. The arbitrators shall also decide on the costs of the arbitration proceedings. In case the arbitrators have not decided on the costs of the arbitration proceedings, each Party to the Dispute shall bear its own costs, in relation to the arbitration proceedings.

### 6.3 AUTHORISED PERSON

For the purposes of this Agreement, the Selected Bidder is represented by Mr. Piyush Kumar, Head BD-T&D (International), pursuant to an authorization granted to Mr. Piyush Kumar, Head BD-T&D (International) through Committee of Directors. Further, Mr. Piyush Kumar, Head BD-T&D (International) is also authorized by such resolutions to take any decision which may be required to be taken, do all acts and execute all documents which are or may be required by the Selected Bidder for the proper and effective fulfillment of the rights and obligations under this Agreement. Any action taken or document executed by Mr. Piyush Kumar, Head BD-T&D (International) shall be deemed to be acts done or documents executed by the Selected Bidder and shall be binding on the Selected Bidder.

### 6.4 RESERVATION OF RIGHTS

No forbearance, indulgence or relaxation or inaction by any Party at any time to require performance of any of the provisions of this Agreement shall in any way affect, diminish or prejudice the right of such Party to require performance of that provision, and any waiver or acquiescence by any Party of any breach of any of the provisions of this Agreement shall



PFCCL



BIHINIITL



TTPCL

not be construed as a waiver or acquiescence of any continuing or succeeding breach of such provisions, a waiver of any right under or arising out of this Agreement or acquiescence to or recognition of rights other than that expressly stipulated in this Agreement.

#### 6.5 CUMULATIVE RIGHTS

All remedies of either Party under this Agreement whether provided herein or conferred by statute, civil law, common law, custom or trade usage, are cumulative and not alternative and may be enforced successively or concurrently.

#### 6.6 PARTIAL INVALIDITY

If any provision of this Agreement or the application thereof to any person or circumstance shall be invalid or unenforceable to any extent, the remainder of this Agreement and the application of such provision to persons or circumstances other than those as to which it is held invalid or unenforceable shall not be affected thereby, and each provision of this Agreement shall be valid and enforceable to the fullest extent permitted by law. Any invalid or unenforceable provision of this Agreement shall be replaced with a provision, which is valid and enforceable and most nearly reflects the original intent of the unenforceable provision.

#### 6.7 TERMINATION

If (i) the Closing does not occur on the Closing Date for any reason whatsoever, or (ii) the Letter of Intent is withdrawn or terminated for any reason, or (iii) due to termination of the TSA by Central Transmission Utility of India Limited in accordance with Article 3.3.2 or Article 13 of the TSA thereof, PFCCCL shall have a right to terminate this Agreement forthwith by giving a written notice to the other Parties hereto.

#### 6.8 AMENDMENTS

No modification or amendment of this Agreement and no waiver of any of the terms or conditions hereof shall be valid or binding unless made in writing and duly executed by all the Parties.

#### 6.9 ASSIGNMENT

This Agreement and the rights and liabilities hereunder shall bind and inure to the benefit of the respective successors of the Parties hereto, but no Party hereto shall assign or transfer its rights and liabilities hereunder to any other Person without the prior written consent of the other Parties, which will not be unreasonably withheld.



PFCCCL



BIINIITL



TPCL

## 6.10 ENTIRE AGREEMENT

This Agreement constitutes the entire Agreement between the Parties with respect to the subject matter herein and supersedes and cancels any prior oral or written agreement, representation, understanding, arrangement, communication or expression of intent relating to the subject matter of this Agreement.

## 6.11 COSTS

Each of the Parties hereto shall pay their own costs and expenses relating to the negotiation, preparation and execution of this Agreement and the transactions contemplated by this Agreement.

The Selected Bidder shall be liable to bear and pay the stamp duty and other costs in respect of this Agreement and the Share Transfer Forms.

## 6.12 RELATIONSHIP

None of the provisions of this Agreement shall be deemed to constitute a partnership between the Parties hereto and no Party shall have any authority to bind the other Party otherwise than under this Agreement or shall be deemed to be the agent of the other in any way.

## 6.13 GOVERNING LAW AND JURISDICTION

This Agreement shall be governed by and construed in accordance with the laws of India and shall be subject to the exclusive jurisdiction of the courts of Delhi.

## 6.14 COUNTERPARTS

This Agreement may be executed in counterparts by the Parties and each fully executed counterpart shall be deemed to be original.

## 6.15 CONFIDENTIALITY

The Parties undertake to hold in confidence and not to disclose the terms and conditions of the transaction contemplated hereby to third parties, except:

- (a) to their professional advisors;
- (b) to their officers, employees, agents or representatives, who need to have access to such information for the proper performance of their activities;

(c) disclosures required under Law;  
without the prior written consent of the other Parties.



Provided that Central Transmission Utility of India Limited and PFCCCL may at any time, disclose the terms and conditions of transactions contemplated hereby to any person, to the extent stipulated under the law or the Bidding Guidelines.

#### 6.16 INDEMNIFICATION

- The Parties hereby agree that transfer of Sale Shares to the Selected Bidder shall vest all the rights, privileges, licenses, responsibilities, liabilities and other obligations pertaining to the Company in the Selected Bidder.
- The Selected Bidder hereby agrees that the Selected Bidder shall not be entitled to any claims or initiate any legal proceedings, by itself or through the Transmission Service Provider against the Share Sellers, its directors, officers, employees and the subscribers including the members of any committees appointed by them in respect of any actions or decisions taken by any of them up to the Closing Date in furtherance of the Project referred to in recital A of this Agreement.
- Further, the Selected Bidder hereby indemnifies and holds harmless at all times the Share Seller against all losses, damages, charges, and expenses which the Share Seller may sustain or incur towards contractual obligations with respect to the contracts awarded by the Share Seller or any other liability arising with regard to any action/activity undertaken by the Share Seller for and on behalf of the Company in furtherance of the Project referred to above or otherwise concerning the Company. All such actions shall be defended by the Selected Bidder either itself or through the TSP at its own cost.
- The Parties hereby agree that the provisions of this clause shall survive the termination of this Agreement.

**IN WITNESS WHEREOF, THE PARTIES HERETO HAVE CAUSED THIS AGREEMENT TO BE DULY EXECUTED AND DELIVERED AS OF THE DAY AND YEAR FIRST ABOVE WRITTEN**



SIGNED AND DELIVERED  
BY THE WITHIN NAMED "PFCCCL" PFC CONSULTING LIMITED

BY THE HAND OF MR. SACHIN ARORA, COMPANY SECRETARY

PURSUANT TO THE RESOLUTION PASSED BY THE BOARD OF DIRECTORS ON 05<sup>th</sup> DECEMBER 2023.

ON THE 27<sup>th</sup> DAY OF DECEMBER, 2023



PFCCCL



BIKINIITL



TTPCL

Anupam Kashyap  
ANUPAM KASHYAP  
CM, PFCCCL

IN THE PRESENCE OF:  
WITNESS:  
NAME, SIGNATURE, DESIGNATION AND ADDRESS:




SIGNED AND DELIVERED  
BY THE WITHIN NAMED "Company" **BIKANER III NEEMRANA II TRANSMISSION LIMITED**  
BY THE HAND OF **MR. SACHIN SHUKLA, DIRECTOR**

PURSUANT TO THE RESOLUTION PASSED BY THE BOARD OF DIRECTORS ON 28<sup>th</sup> NOVEMBER 2023.  
ON THE 27<sup>th</sup> DAY OF DECEMBER, 2023

9/14/23  
(AM)

IN THE PRESENCE OF:  
WITNESS:  
NAME, SIGNATURE, DESIGNATION AND ADDRESS:




SIGNED AND DELIVERED  
BY THE WITHIN NAMED "Selected Bidder" **THE TATA POWER COMPANY LIMITED**  
BY THE HAND OF **MR. PIYUSH KUMAR, HEAD BD-T&D (INTERNATIONAL)**

PURSUANT TO THE RESOLUTION PASSED BY THE COMMITTEE OF DIRECTORS ON 14<sup>th</sup> SEPT. 2023.  
ON THE 27<sup>th</sup> DAY OF DECEMBER, 2023

H A Atre  
H A Atre

IN THE PRESENCE OF:  
WITNESS:  
NAME, SIGNATURE, DESIGNATION AND ADDRESS:



**ANNEXURE A****DESCRIPTION OF THE SALE SHARES**

S. No.	NAME OF THE SHAREHOLDER	NUMBER OF EQUITY SHARES HELD	PERCENTAGE OF THE TOTAL PAID UP EQUITY CAPITAL
1.	PFC Consulting Limited	9400	94 %
2.	Shri Manoj Kumar Rana (Nominee of PFC Consulting Limited)	100	1 %
3.	Shri Milind Madhusudan. Dafade (Nominee of PFC Consulting Limited)	100	1 %
4.	Shri Neeraj Singh (Nominee of PFC Consulting Limited)	100	1 %
5.	Shri Sanjay Kumar Nayak (Nominee of PFC Consulting Limited)	100	1 %
6.	Shri Sachin Shukla (Nominee of PFC Consulting Limited)	100	1 %
7.	Shri Rishab Jain (Nominee of PFC Consulting Limited)	100	1 %
	<b>Total</b>	<b>10,000</b>	<b>100%</b>



19.75  
PFCL



BIIINIITL



TTPCL

## VAKALATNAMA

BEFORE THE HON'BLE CENTRAL ELECTRICITY REGULATORY COMMISSION, AT  
NEW DELHI

PETITION NO. \_\_\_\_/TL/2024

## IN THE MATTER OF:

Bikaner III Neemrana II Transmission Limited

...Petitioner

Versus

Central Transmission Utility of India Ltd & Ors.

...Respondents

I, Tarun Katiyar, Authorized Representative of Bikaner III Neemrana II Transmission Limited, the Petitioner in the above-mentioned matter do hereby appoint and retain Mr. Shri Venkatesh, Mr. Shryeshth Ramesh Sharma, Mr. Ashutosh Kumar Srivastava, Mr. Bharath Gangadharan, Mr. Abhishek Nangia, Mr. Nihal Bhardwaj, Mr. Siddharth Nigotia, Mr. Shivam Kumar, Mr. Kartikay Trivedi, Mr. Mohit Gupta, Mr. Aashwyn Singh, Mr. Punyam Bhutani, Mr. Harsh Vardhan, Mr. Suhael Buttan, Ms. Himangi Kapoor, Mr. Anant Singh, Mr. Vineet Kumar, Mr. Aditya Tiwari, Ms. Nehal Jain, Mr. Nikunj Bhatnagar, Mr. Kunal Veer Chopra, Mr. Vedant Choudhary and Mr. Aayush Sinha, **(SKV Law Offices)** to appear, plead and act for me/us in the abovementioned Petition and to conduct and prosecute all proceedings that may be taken in respect thereof and applications for return of documents, enter into compromise and to draw any moneys payable to me/us in the said proceeding and also to appear in all petitions, applications for review before the Central Electricity Regulatory Commission.

Place: New Delhi

Date: 29.12.2023

Signature of the Party

*Tkatiyar*



Executed in my presence

"Accepted"

Signature with date

\*Signature with date  
(Name and Designation)

**Advocate for the Petitioner**

(Address for service on the Counsel for Petitioner)

Shri Venkatesh

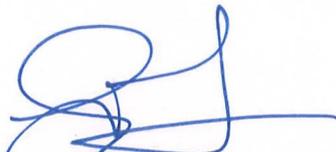
B-50, Defence Colony, New Delhi-110024

Phone No. 9818771818

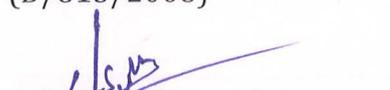
Phone No. 011-47099951-99

Email: [lawyers@skvlawoffices.com](mailto:lawyers@skvlawoffices.com)





Shri Venkatesh  
(D/815/2008)



Ashutosh Kumar Srivastava  
(D/268/2017)



Abhishek Nangia  
(D/2691/2019)



Siddharth Nigotia  
(D/6850/2019)



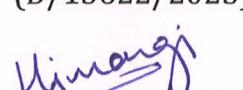
Mohit Gupta  
(D/5916/2020)



Kartikay Trivedi  
(D/5863/2021)



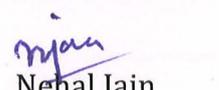
Harsh Vardhan  
(D/13622/2023)



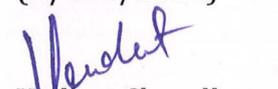
Himangi Kapoor  
(D/3156/2017)



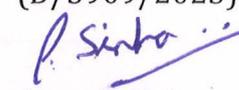
Vineet Kumar  
(D/4863/2019)



Nehal Jain  
(D/166/2022)



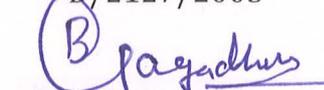
Vedant Choudhary  
(D/3909/2023)



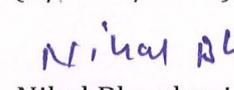
Aayush Sinha  
(D/8839/2023)



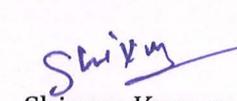
Shryeshth Ramesh Sharma  
(D/2127/2003)



Bharath Gangadharan  
(D/7325/2017)



Nihal Bhardwaj  
(D/9517/2019)



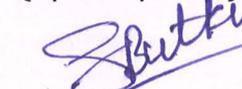
Shivam Kumar  
(D/3458/2019)



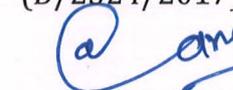
Aashwyn Singh  
(D/462/2023)



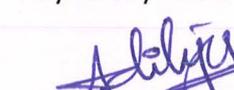
Punyam Bhutani  
(D/4057/2022)



Suhael Buttan  
(D/2324/2017)



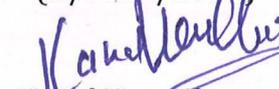
Anant Singh  
(D/2353/2018)



Aditya Tiwari  
(D/6276/2019)



Nikunj Bhatnagar  
(D/7122/2022)



Kunal Veer Chopra  
(D/6836/2022)

**BIKANER III NEEMRANA II TRANSMISSION LIMITED**

---

Certified True Copy of the Resolution passed at the  
Board Meeting held on 27<sup>th</sup> December 2023

“RESOLVED THAT any of the Director of the Company be and is hereby severally authorized to sign and submit the various forms/returns/applications required to be filed with the office of the Registrar of Companies, Ministry of Corporate Affairs, Income Tax and Goods & Services Tax Authorities and other Regulatory bodies, if any, in electronic or physical form as prescribed under their respective statutory laws, and to do all such acts, deeds and things as may be necessary in this regard including obtaining and affixing his/her Digital Signatures thereon.

FURTHER RESOLVED THAT any directors of the Company, the Chief Executive Officer, the Chief Financial Officer or any other officials who will be designated as Project Manager be and hereby authorised to undertake statutory registrations before appropriate authorities in connection with the project including signing and submission of various documents, applications, letter and returns electronically or otherwise and to make necessary applications, representations, modifications, or alterations on behalf of the Company before the any other regulators or authorities, as and when required.

FURTHER RESOLVED THAT any of the Directors of the Company, the Chief Executive Officer, the Chief Financial Officer or Company Secretary be and are hereby severally authorized to take such action as may be necessary, desirable or expedient on behalf of the Company to give effect to this Resolution”.

Certified True Copy  
For **Bikaner III Neemrana II Transmission Limited**

**Nita Jha**  
Digitally signed  
by Nita Jha  
Date: 2023.12.28  
17:06:35 +05'30'  
Nita Jha  
(Director)  
DIN: 10066247

Reg. office: Flat No. 94, 3rd Floor, Pocket-4,  
LIG Flats, Sector-11, Dwarka, New Delhi-  
110075

---

**Regd. Office** - Flat No. 94, 3rd Floor, Pocket-4, LIG Flats, Sector-11, Dwarka, New Delhi-110075

● Tel.: +022- 6717- 3424 ● Email ID: haatre@tatapower.com;

CIN: U42201DL2023GOI415740

1.	Name of the Petitioner/Applicant	Bikaner III Neemrana II Transmission Limited
2.	Address of the Petitioner/Applicant	Flat No. 94, 3rd Floor, Pocket-4, LIG Flats, Sector-11, Dwarka, New Delhi-110075
3.	Subject Matter	Petition/Application under Section 14, 15, 79 (1)(e) of the Electricity Act, 2003 read with the Central Electricity Regulatory Commission (Procedure, terms and Conditions for grant of Transmission License and other related matters) Regulations, 2009 for grant of Transmission License
4.	Petition No., or Application No, if any	Petition No._____/TL/2024
5.	Details of generation assets (a) Generating station/units (b) Capacity in MW (c) Date of commercial operation (d) Period for which fee paid (e) Amount of fee paid (f) Surcharge, if any	NA
6.	Details of transmission assets (a) Transmission line and sub-stations (b) Date of commercial operation (c) Period for which fee paid (d) Amount of fee paid (e) Surcharge, if any	NA
7.	Fee paid for Adoption of tariff for (a) Generation asset (b) Transmission asset	NA
8.	Application fee for licence (a) Trading licence (b) Transmission licence (c) Period for which paid (d) Amount of fee paid	Rs.1,00,000/-

9.	Fees paid for Miscellaneous Petition	NA
10.	Fees paid for Interlocutory Application	NA
11.	Fees paid for Regulatory Compliance Petition	NA
12.	Fees paid for Review Application	NA
13.	Licence fees for inter-State Trading (a) Category (b) Period (c) Amount of fee paid (d) Surcharge, if any	NA
14.	Licence fees for inter-State Transmission (a) Expected/Actual transmission charge (b) Period (c) Amount of fee calculated as a percentage of transmission charge. (d) Surcharge, if any	NA
15.	Annual Registration Charge for Power Exchange/OTC Platform (a) Period (b) Amount of turnover (c) Fee paid (d) Surcharge, if any	NA
16.	Details of fee remitted (a) Transaction id, Reference No./ Payment id (b) Date of remittance (c) Amount remitted	BIL/ONL/000774538498  30.12.2023 Rs.1,00,000/-

Note: While Sl.No.1 to Sl. No.3 and Sl. No.16 are compulsory, the rest may be filled up as applicable



Signature of the authorized signatory with date

		<b>DTDC Express Limited</b> Regd. Office: No-3, Victoria Road Bengaluru - 560047		<b>ORIGIN</b>	<b>DEST.</b>
<b>Non Negotiable Consignment Note / Subject to Bengaluru Jurisdiction.</b>		The consignment note is not a tax invoice. A tax invoice will be made available by DTDC or it's channel partner as the case may be, upon request.		<b>POUCH NO.</b>	<b>DATE</b> 30/12/2023
<b>1</b> Sender's (Consignor) Name: <u>SIXY Law OFFICES,</u> Ph: _____ Company Name & Address: <u>Defence Colony</u> City: <u>Delhi</u> State: <u>Delhi</u> PIN Code: <u>110024</u> Sender's GSTIN*: _____ *Where Applicable		<b>2</b> Recipient's (Consignee) Name: _____ Ph: _____ Company Name & Address: <u>PFC Consulting Ltd.</u> <u>Connaught Place</u> City: <u>Delhi</u> State: <u>Delhi</u> PIN Code: <u>110007</u> Recipient's GSTIN*: _____ *Where Applicable		Download MyDTDC app  Available at select cities & pin codes	
<b>3</b> Nature of consignment (✓) <input type="checkbox"/> Dox <input type="checkbox"/> Non-Dox <input type="checkbox"/> Total Num Pcs: _____ DIM 1: L _____ cm X B _____ cm X H _____ cm X _____ Pcs Actual Wt.: _____ kg DIM 2: L _____ cm X B _____ cm X H _____ cm X _____ Pcs Volumetric Wt.: _____ kg DIM 3: L _____ cm X B _____ cm X H _____ cm X _____ Pcs Chargeable Wt.: _____ kg		<b>4</b> Description of Content _____ Total Value of consignment for carriage / E-Way bill _____ ₹		Download MyDTDC app  Available at select cities & pin codes	
<b>5</b> Paper Work Enclosures <u>30/12/2023</u>		<b>6</b> Type of consignment (✓) <input type="checkbox"/> Commercial <input type="checkbox"/> Non Commercial <input type="checkbox"/> <b>7</b> Value Added Services <input type="checkbox"/> Not Available <input type="checkbox"/> CN Expiry Date _____		Download MyDTDC app  Available at select cities & pin codes	
<b>10</b> I/We declare that this consignment does not contain personal mail, cash, jewellery, contraband, illegal drugs, any prohibited items and commodities which can cause safety hazards while transporting		<b>9</b> Charges Amount(₹) a) Tariff (Incl. Of FSC + Taxes) _____ b) Risk Surcharge _____ c) Total amount (a+b) _____ Above charges are inclusive of GST & other taxes if applicable Mode of Payment: Cash <input type="checkbox"/> Card <input type="checkbox"/> Wallet <input type="checkbox"/>		<b>8</b> Mode (✓) <input checked="" type="checkbox"/> Surface <input type="checkbox"/> Air Cargo <input type="checkbox"/> Express <input type="checkbox"/> Consignment Number:  <b>Z33355490</b>	
Sender's Signature & Seal _____ Date: _____ Time: _____ AM/PM I have read and understood terms & conditions printed overleaf of this consignment note and I agree to the same.		<b>11</b> Booking Branch / Franchisee Code _____ Courier Signature _____		<b>12</b> Risk Surcharge Owner _____ Carrier _____	
<a href="http://www.dtdc.in">http://www.dtdc.in</a>    <a href="mailto:customersupport@dtdc.com">customersupport@dtdc.com</a>    +91-7305770577				SENDER COPY March 2023	

Vendor Code : 107445

Item : LO Desk Bag : 8.5x42

Download MyDTDC app



Available at select cities & pin codes




Z33355490

Download MyDTDC app



Available at select cities & pin codes

TCL

		<b>DTDC Express Limited</b> Regd. Office: No-3, Victoria Road Bengaluru - 560047		<b>ORIGIN</b>	<b>DEST.</b>
<b>POUCH NO.</b>		<b>DATE</b> 30/12/2023		The consignment note is not a tax invoice. A tax invoice will be made available by DTDC or it's channel partner as the case may be, upon request.	
Non Negotiable Consignment Note / Subject to Bengaluru Jurisdiction.					
<b>1</b> Sender's (Consignor) Name: <u>S.K.V. Law Offices</u> Ph: _____ Company Name & Address: <u>Defence Colony</u> City: _____ State: <u>Delhi</u> PIN Code: <u>110024</u> Sender's GSTIN*: _____ *Where Applicable			<b>2</b> Recipient's (Consignee) Name: _____ Ph: _____ Company Name & Address: <u>Central Transmission</u> <u>Utility of India</u> City: <u>IFCO Chowk</u> State: _____ PIN Code: _____ Recipient's GSTIN*: _____ *Where Applicable		
<b>3</b> Nature of consignment (✓) <input type="checkbox"/> Dox <input type="checkbox"/> Non-Dox <input type="checkbox"/> Total Num Pcs: _____ DIM 1: L _____ cm X B _____ cm X H _____ cm X _____ Pcs Actual Wt.: _____ kg DIM 2: L _____ cm X B _____ cm X H _____ cm X _____ Pcs Volumetric Wt.: _____ kg DIM 3: L _____ cm X B _____ cm X H _____ cm X _____ Pcs Chargeable Wt.: _____ kg		<b>4</b> Description of Content _____ Total Value of consignment for carriage / E-Way bill ₹ _____			
<b>5</b> Paper Work Enclosures <u>30/12/2023</u>		<b>6</b> Type of consignment (✓) <input type="checkbox"/> Commercial <input type="checkbox"/> Non Commercial <input type="checkbox"/>		<b>7</b> Value Added Services <input type="checkbox"/> Not Available <input type="checkbox"/> CN Expiry Date _____	
<b>10</b> I/We declare that this consignment does not contain personal mail, cash, jewellery, contraband, illegal drugs, any prohibited items and commodities which can cause safety hazards while transporting		<b>Charges</b>		<b>8</b> Mode (✓) <input checked="" type="checkbox"/> Surface <input type="checkbox"/> Air Cargo <input type="checkbox"/> Express <input type="checkbox"/>	
Sender's Signature & Seal _____ Date: _____ Time: _____ AM/PM I have read and understood terms & conditions printed overleaf of this consignment note and I agree to the same.		a) Tariff (incl. Of FSC + Taxes) _____ b) Risk Surcharge _____ c) Total amount (a+b) _____ Above charges are inclusive of GST & other taxes if applicable Mode of Payment: Cash <input type="checkbox"/> Card <input type="checkbox"/> Wallet <input type="checkbox"/>		Consignment Number:  <b>233355489</b>	
<b>11</b> Booking Branch / Franchisee Code _____		<b>12</b> Risk Surcharge _____		Owner _____ Carrier _____	
Courier Signature _____					
<a href="http://www.dtdc.in">http://www.dtdc.in</a>    <a href="mailto:customersupport@dtcd.com">customersupport@dtcd.com</a>    +91-7305770577			SENDER COPY		March 2023

Vendor Code : 107245

Form : LOI Create Book : 16/5/2022

Download MyDTDC app



Available at select cities & pin codes




233355489

Download MyDTDC app



Available at select cities & pin codes