

## NOTICE INVITING TENDER

**The Tata Power Company Limited Invites Tenders** (Two-Part Bidding Process), from interested and eligible Vendors for the following Works required for its various Transmission Receiving Stations.

**A. Summary of the tendered packages:**

| <b>Tender Enquiry No.</b> | <b>Work Description</b>                                        | <b>EMD (Rs.)</b> | <b>Tender Participation Fee (Rs.)</b> | <b>Last date and time for Payment of Tender Participation Fee*</b> |
|---------------------------|----------------------------------------------------------------|------------------|---------------------------------------|--------------------------------------------------------------------|
| CC27NK015                 | SITC of HVAC System for various Transmission Receiving Station | 45,000/-         | Rs. 2,000/-                           | 1500 Hrs. 03 <sup>rd</sup> September 2026                          |

**Interested bidder is strongly advised not to wait by above time and purchase the tender immediately to get the link for bid submission. This will enable them to communicate/raise queries against the subject tender in time.**

For additional technical details and Pre-qualification criteria for the subject works please refer section C below.

**B. Guidelines for Participating:**

Interested and eligible vendors can participate by submitting the following up to 1500 hours on **Thursday – 03<sup>rd</sup> September 2026**.

1. Payment of non-refundable Tender Fee, as indicated in table above to be paid by direct deposit in following bank account

Beneficiary Name – The Tata Power Co. Ltd.

Bank Name – HDFC Bank Ltd.

Branch Name – Fort Branch, Mumbai

Address – Maneckji Wadia Building, Nanik Motwani Marg, Fort, Mumbai 400023.

Branch Code – 60

Bank & Branch Code – 400240015

Account No – 00600110000763

Account type – CC

IFSC Code – HDFC0000060

2. Submission of duly signed and stamped Authorization Letter indicating name of authorized person, contact number and e-mail id (mandatory) on Vendor's letterhead. The letter shall also mandatorily include payment details of Tender fee and Tender Reference no **CC27NK015**.

Authorization Letter along with proof of submission of tender fee should be e-mail to **Mr. Nithishkumar Kuppusami** ([n.kuppusami@tatapower.com](mailto:n.kuppusami@tatapower.com)) and copy to **Ms. Vaishali Kachare** ([vaishali.Kachare@tatapower.com](mailto:vaishali.Kachare@tatapower.com))

**Note:** - Once the above-mentioned documents are received, detailed RFP shall be issued through our e-tender system.

3. It is clarified that Bid Guarantee/EMD as mentioned in section "A" above, is not required to be submitted at this stage, and it will be required to be submitted in the form of Bank guarantee at the time of Bid Submission.

**C. Addition technical details: Prequalification Criteria (Technical & Commercial):**

| <b>Pre-qualification Requirement Criteria</b> |                     |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |                                                                                                                                                                                                                                                                                                                                                                                                                       |
|-----------------------------------------------|---------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 1                                             | 2                   | 3                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          | 4                                                                                                                                                                                                                                                                                                                                                                                                                     |
| S No                                          | Parameter           | Tata Power Requirement                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     | Documents To be submitted by Vendor to ascertain meeting of Pre-qualification requirement                                                                                                                                                                                                                                                                                                                             |
| 1                                             | Infrastructure      | <p>i. Bidder can either be OEM or a Channel Partner of AC machine manufacturer, having manufacturing and testing facility in India. Either OEM of HVAC system or a Channel partner can be the Lead Bidder. The overall liability of execution of the contract shall lie with OEM / channel partner.</p> <p>ii. The bidder shall confirm that design, manufacturing process and service support of offered equipment in Indian facility are identical to that in Bidder's parent factory without any change and approved by the parent.</p> <p>iii. Bidder must have support service Centre in India to cater after sales services.</p>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     | <p>Self-undertaking to be submitted in this regard. Tata Power reserves the right to inspect the said manufacturing facility as a proof of compliance to this parameter.</p> <p>In case of Channel Partner participates, then the Authorization undertaking on OEM's letterhead shall be submitted by channel partner for the respective System</p>                                                                   |
| 2                                             | Supply & Experience | <p>i. The bidder shall have carried out design, engineering, manufacturing, supply and supervision of installation, testing and commissioning of type tested products for a minimum 5 projects having min capacity of 50 TR and above.</p> <p>ii. The system supplied should have been in satisfactory commercial operation for a minimum period of 05 years as on scheduled date of the bid opening.</p> <p>iii. From amongst the above projects, minimum 3 projects should have been in commercial operation for minimum period of 2 years.</p> <p>iv. In case of channel partner, the bidder must share the Manufactures Authorization certificate specific to this tender and back-to-back support letter from OEMs for providing Comprehensive support and services of the OEM's product covered under the RFP for warranty period.</p> <p>Indian Subsidiaries of global companies having plant in India are also eligible to bid if the qualification requirements stated above are met independently or in combination with the parent company. Declaration from parent company needs to be submitted.</p> <p>In case the bidder has a previous association with Tata Power for similar products and services, the performance feedback for that bidder by Tata Power shall only be considered irrespective of performance certificates issued by any other organization. Technical performance, delivery timelines, service and support records of past executed projects in Tata Power will be considered for technical evaluation of bidder.</p> | <p>Purchase Order / Work completion certificate. Supply List/Performance Certificates from the utilities / clients.</p> <p>Bidder to submit OEM MAF.</p> <p>Self-undertaking to be submitted in this regard. TATA Power reserves the right to inspect the said manufacturing facility as a proof of compliance to this parameter.</p> <p>Bidder to submit PO reference and Performance Certificates for the same.</p> |

|   |                                                 |                                                                                                                                                                                                                                                                          |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
|---|-------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 3 | Type Test                                       | All offered equipment should have been successfully type tested at any of the internationally accredited laboratories in line with relevant standards. The bidder shall submit the Type test certificate of respective equipment and shall not be more than 5 years old. | Type Test Report.<br>Undertaking that there is no change in design / material of construction (MOC) if Type Test Report older than 5 years but less than 10 years prior to date of bid opening has to be considered (if applicable)<br>Undertaking that type test shall be carried out for the offered equipment / material from NABL / International Accredited Lab without any cost implication to the owner and the Type Test reports shall be submitted before dispatch of the equipment / material, in case type test reports furnished are not for the quoted equipment / material but for the equipment / material with higher voltage class and/or different capacity, (if applicable) |
| 4 | Capability of Handle Job financially if awarded | Average Annual turnover of the bidder for last three years shall not be less than INR 50 Lakhs                                                                                                                                                                           | Copy of audited Balance Sheet and P&L Account to be submitted in this regard.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |

**Note -**

1) The Prequalification Criteria published along with the tender "In Section C.1 Techno-Commercial PQR" is the total & complete pre-qualification requirement for the tender and shall prevail over any other/additional pre-qualification requirement mentioned elsewhere in the tender.

2) Tata Power reserves the right to review and approve / reject the Bidder based on Document Submission.

3) In case the bidder has a previous association with any of the Tata Group companies for similar products and services, the performance feedback for that bidder by Tata Group companies shall only be considered for evaluation, irrespective of performance certificates issued by any third organization.

4) Apart from the above PQR bidder must also qualify in Safety evaluation. Details will be shared along with tender documents.

**Note:** Above Pre-qualification details need not be submitted at this stage. These shall be required to be submitted along with bid submission. At this stage, Interested Vendors who fulfill above criteria need to participate in tender by paying tender fee and submitting authorization letter as detailed in section "B" above.

**D. Price Bid Format: (BOM)**

| SITC of HVAC system for Ambernath RSS |                            |           |      |
|---------------------------------------|----------------------------|-----------|------|
| Sr. No.                               | Description                | Total QTY | Unit |
| <b>A</b>                              | <b>SITC of HVAC Units</b>  |           |      |
| <b>1</b>                              | <b>Hi Wall Split Units</b> |           |      |

|              |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |            |             |
|--------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------|-------------|
|              | Supply, installing, testing and commissioning of AIR COOLED HIGH WALL SPLIT AIR CONDITIONING UNITS . The unit shall be complete with indoor decorative type unit, fans, Drain pan, and external condensing unit complete in all respects, inclusive of copper refrigerant piping & Drain piping ( UPTO 15 MTR LENGTH standard ), valves and insulation & cordless remote. It shall be inclusive of cooling thermostat with wiring, first fill of refrigerant, Control & power wiring ( 15 mtr Length ) and earthing. The unit capacities shall be selected after taking deration into account due to copper piping lengths & Ambient temperature. Unit Selected Should be of inverter type with minimum 3 Star Rating & for industrial application. Refrigerant Should be CFC Free, either R-32 / R- 407/R-410a. Unit to be provided with cordless remote controller.                                                          |            |             |
|              | Ambient Summer DB: 40°C                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |            |             |
|              | 2 TR                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | 4          | Nos         |
|              | Notes :<br>1. All outdoor units should be designed at Ambient temperature 40°C.<br>2. Auto switchover facility between working and stand by unit<br>3. Condensing unit with hydrophilic coating fins and coil<br>4. Ductable indoor unit noise level should be 45 Dba                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |            |             |
| <b>2</b>     | <b>DX Ductable Unit</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |            |             |
|              | Supply, installing, testing and commissioning of ceiling Suspended AIR COOLED DUCTED SPLIT AIR CONDITIONING UNITS. The unit shall be complete with cabinet type fan coil unit and external condensing unit complete in all respects, with corded remote controller, insulated drain pan, inclusive of copper refrigerant piping & Drain piping ( UPTO 15 MTR LENGTH SINGLE RUN), valves and insulation. It shall be inclusive of cooling thermostat with wiring, first fill of refrigerant, Control & power wiring ( UPTO 15 MTR LENGTH ) and earthing. The unit capacities shall be selected after taking deration into account due to copper piping lengths & Ambient temperature. Refrigerant Should be CFC Free, either -404A/R-410a/R32. Indoor units shall be ceiling suspended inside the rooms, hence consider all necessary arrangement for the same. Refrigerant piping & cables should be routed in the cable tray. |            |             |
|              | Ambient Summer DB: 40°C                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |            |             |
|              | 5.5 TR ductable unit                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | 4          | Nos         |
|              | Notes :<br>1. All outdoor units should be designed at Ambient temperature 40°C.<br>2. Auto switchover facility between working and stand by unit<br>3. Condensing unit with hydrophilic coating fins and coil                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |            |             |
| <b>3</b>     | <b>Drain Piping</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |            |             |
|              | Supply, Installation, Testing and Commissioning of Drain Piping System of suitable sizes, from indoor unit to nearest drain point. Piping material U-PVC with 6mm thick closed-cell Nitrile insulation; with all necessary components as required for complete installation,testing, performance etc.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |            |             |
|              | 25NB                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | 30         | rmt         |
|              | <b>TOTAL-BASIC PRICE EXCLUDING TAXES</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |            |             |
|              | <b>GST @ 18%</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |            |             |
|              | <b>TOTAL - INCLUSIVE OF ALL TAXES</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |            |             |
| <b>B</b>     | <b>LOW SIDE WORK</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |            |             |
| <b>SR NO</b> | <b>DESCRIPTION</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             | <b>QTY</b> | <b>UNIT</b> |
| <b>B.1</b>   | <b>Air Distribution</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |            |             |

|            |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |     |      |
|------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----|------|
| a          | Supply, installation, testing & commissioning of factory fabricated Rectangular Type GI sheet ducting (275 GSM as total) as per SMACNA with silicon sealant, neoprene gaskets minimum 3mm thick, Turning Vanes for the complete air distribution. Ducts and plenum of more than 1600mm to be provided with 50x50x 5mm angle bracing. Ducting to be designed as per SMACNA and fan pressure. Ducts within the plant to be supported from roof structure using Gripples / threaded Rods. GI Threaded Rods with Anchor Fasteners, GI Nut Bolts, with M.S Angle Flanges & secondary supports duly epoxy painted etc if required are part of Ducting itself. No separate cost considered for the same.                                 |     |      |
| 1          | 22 G GI Rectangular Ducting.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      | 20  | Sqmt |
| 2          | 24 G GI Rectangular Ducting.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      | 100 | Sqmt |
| b          | Supply, installation, testing and balancing of Powder coated extruded aluminium construction. Square / rectangular shape Supply air Grilles with volume control damper.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | 3   | Sqmt |
| c          | Supply, installation, testing and balancing of Powder coated extruded aluminium construction. Square / rectangular shape Return air Grilles without volume control damper.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        | 3   | Sqmt |
| d          | Supply, installation, testing and commissioning of very low leakage, aluminium <b>duct volume control damper</b> with aerofoil blade, calibration knob, suitable for motorized actuator operation, mounting plate to install actuator. These dampers will be installed in branches of ducts. (dampers along with diffuser, grill & drum louver are not part of this line item).                                                                                                                                                                                                                                                                                                                                                   | 2   | Sqmt |
| e          | SITC of Flexible Canvas Connection (150 mm width)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 | 4   | Sqmt |
| f          | Supply, Installation, Testing and Commissioning of Thermal Insulation for Internal ducting with closed cell elastomeric Nitrile rubber with Al foil or equivalent covering material. The density minimum 40-60Kg/m <sup>3</sup> and fire performance to pass Class 1 as per BS 476 Part 7 & class O as per BS 476 part 6 and use OEM recommended adhesives for installation. 50mm width adhesive tap shall be used for all insulation joint & overlap. Insulation thickness 19mm                                                                                                                                                                                                                                                  | 140 | Sqmt |
| g          | Supply, Installation, Testing and Commissioning of Acoustic Insulation for Supply air ducts with Open cell elastomeric Nitrile rubber with fire performance to pass Class 1 as per BS 476 Part 7 & class O as per BS 476 part 6 and use recommended adhesives / SR Fevicol 505 grade. Acoustic insulation shall be provided within the supply air duct from the unit discharge point. The acoustic insulation shall be suitable to withstand the high moist & high temperature (upto 80 deg C) air. Contractor to confirm the life of acoustic insulation with this harsh environment. Contractor also required to provide the performance guarantee of acoustic insulation to meet the noise criteria. Insulation thickness 13mm | 25  | Sqmt |
| h          | Lifting And Shifting Charges for HVAC Systems (ODU shall be installed on roof at 15 mtr height)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   | 1   | Lot  |
| i          | Fabrication & Erection of MS Stand (Galvanized) for Table top of ODU's                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            | 8   | Nos. |
| j          | MS Structure (For ducting & refrigerant pipe tray support ) All MS structure to be galvanized                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     | 200 | kg   |
| <b>B.2</b> | <b>Electrical Work</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |     |      |
| a          | Electrical starter cum feeder panel                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               | 1   | Nos  |
| b          | Cable                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |     |      |
| 1          | 3C x 2.5 Sqmm Cu Flexible Cable for Indoor units Power supply(Cable is from IDU to nearest Socket)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                | 70  | Rmt  |
| 2          | 4C x 10 Sqmm Cu Flexible Cable for Outdoor units Power supply(Cable is from ODU to nearest MCB)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   | 60  | Rmt  |
| 3          | 2C x 1.5 Sqmm Cu Shielded Cable in PVC Conduit (Control cable)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    | 70  | Rmt  |
| c          | Earthing cable and strip for ODU                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  | 1   | Lot  |

|          |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |   |     |
|----------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---|-----|
|          | Supply, unloading, unpacking & installation of GI strips / Cu strips or conductors / wire rope (multi stranded) including straightening , bending, welding them as per requirement, if required clamping them at suitable locations, galvanizing & painting (if required), end connection with lugs for earthing with earth dispatcher bus and equipment, wire rope or pvc insulated Cu. Cable shall be included with crimping and bolting of suitable tinned Cu, lugs on both sides, All connection shall be exothermal welding and shall be painted with anti-corrosive black bitumen paint. |   |     |
| d        | 3 Phase MCBs for outdoor units                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 | 4 | Nos |
| e        | 1 phase DBs & socket for indoor units                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          | 4 | Nos |
| <b>C</b> | <b>AIR BALANCING &amp; TEMPERATURE MEASUREMENT</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |   |     |
|          | Testing, commissioning & Validation of Complete HVAC Package. Validation Activities should cover Air Flow measurements, air balancing, temperature Measurements.                                                                                                                                                                                                                                                                                                                                                                                                                               | 1 | Lot |
|          | <b>Sub Total</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |   |     |
|          | GST @ 18%                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |   |     |
|          | <b>TOTAL LOW SIDE WITH TAXES</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |   |     |
|          | <b>GRAND TOTAL WITHOUT TAX</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |   |     |
|          | <b>GRAND TOTAL WITH TAXES</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |   |     |

| SITC of HVAC system for Bhokarpada RSS |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |           |      |
|----------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------|------|
| Sr. No.                                | Description                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    | Total QTY | Unit |
| <b>A</b>                               | <b>SITC of HVAC Units</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |           |      |
| <b>1</b>                               | <b>Hi Wall Split Units</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |           |      |
|                                        | Supply, installing, testing and commissioning of AIR COOLED HIGH WALL SPLIT AIR CONDITIONING UNITS . The unit shall be complete with indoor decorative type unit, fans, Drain pan, and external condensing unit complete in all respects, inclusive of copper refrigerant piping & Drain piping ( UPTO 15 MTR LENGTH standard ), valves and insulation & cordless remote. It shall be inclusive of cooling thermostat with wiring, first fill of refrigerant, Control & power wiring ( 15 mtr Length ) and earthing. The unit capacities shall be selected after taking deration into account due to copper piping lengths & Ambient temperature. Unit Selected Should be of inverter type with minimum 3 Star Rating & for industrial application. Refrigerant Should be CFC Free, either R-32 / R- 407/R-410a. Unit to be provided with cordless remote controller.                                                          |           |      |
|                                        | Ambient Summer DB: 40°C                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |           |      |
|                                        | 2 TR                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | 5         | Nos  |
|                                        | Notes<br>1. All outdoor units should be designed at Ambient temperature 40°C.<br>2. Auto switchover facility between working and stand by unit<br>3. Condensing unit with hydrophilic coating fins and coil<br>4. Ductable indoor unit noise level should be 45 Dba                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |           |      |
| <b>2</b>                               | <b>DX Ductable Unit</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |           |      |
|                                        | Supply, installing, testing and commissioning of ceiling Suspended AIR COOLED DUCTED SPLIT AIR CONDITIONING UNITS. The unit shall be complete with cabinet type fan coil unit and external condensing unit complete in all respects, with corded remote controller, insulated drain pan, inclusive of copper refrigerant piping & Drain piping ( UPTO 15 MTR LENGTH SINGLE RUN), valves and insulation. It shall be inclusive of cooling thermostat with wiring, first fill of refrigerant, Control & power wiring ( UPTO 15 MTR LENGTH ) and earthing. The unit capacities shall be selected after taking deration into account due to copper piping lengths & Ambient temperature. Refrigerant Should be CFC Free, either -404A/R-410a/R32. Indoor units shall be ceiling suspended inside the rooms, hence consider all necessary arrangement for the same. Refrigerant piping & cables should be routed in the cable tray. |           |      |
|                                        | Ambient Summer DB: 40°C                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |           |      |
|                                        | 5.5 TR ductable unit                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | 4         | Nos  |

|              |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |            |             |
|--------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------|-------------|
|              | Notes<br>1. All outdoor units should be designed at Ambient temperature 40°C.<br>2. Auto switchover facility between working and stand by unit<br>3. Condensing unit with hydrophilic coating fins and coil                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |            |             |
| <b>3</b>     | <b>Drain Piping</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |            |             |
|              | Supply, Installation, Testing and Commissioning of Drain Piping System of suitable sizes, from indoor unit to nearest drain point. Piping material U-PVC with 6mm thick closed-cell Nitrile insulation; with all necessary components as required for complete installation, testing, performance etc.                                                                                                                                                                                                                                                                                                                                                                                            |            |             |
|              | 25NB                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              | 40         | rmt         |
|              | <b>TOTAL-BASIC PRICE EXCLUDING TAXES</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |            |             |
|              | <b>GST @ 18%</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |            |             |
|              | <b>TOTAL - INCLUSIVE OF ALL TAXES</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |            |             |
|              |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |            |             |
| <b>B</b>     | <b>LOW SIDE WORK</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |            |             |
| <b>SR NO</b> | <b>DESCRIPTION</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                | <b>QTY</b> | <b>UNIT</b> |
| <b>B.1</b>   | <b>Air Distribution</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |            |             |
| <b>a</b>     | Supply, installation, testing & commissioning of factory fabricated Rectangular Type GI sheet ducting (275 GSM as total) as per SMACNA with silicon sealant, neoprene gaskets minimum 3mm thick, Turning Vanes for the complete air distribution. Ducts and plenum of more than 1600mm to be provided with 50x50x 5mm angle bracing. Ducting to be designed as per SMACNA and fan pressure. Ducts within the plant to be supported from roof structure using Gripples / threaded Rods. GI Threaded Rods with Anchor Fasteners, GI Nut Bolts, with M.S Angle Flanges & secondary supports duly epoxy painted etc if required are part of Ducting itself. No separate cost considered for the same. |            |             |
| 1            | 22 G GI Rectangular Ducting.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      | 20         | Sqmt        |
| 2            | 24 G GI Rectangular Ducting.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      | 100        | Sqmt        |
| b            | Supply, installation, testing and balancing of Powder coated extruded aluminium construction. Square / rectangular shape Supply air Grilles with volume control damper.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | 3          | Sqmt        |
| c            | Supply, installation, testing and balancing of Powder coated extruded aluminium construction. Square / rectangular shape Return air Grilles without volume control damper.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        | 3          | Sqmt        |
| d            | Supply, installation, testing and commissioning of very low leakage, aluminium <b>duct volume control damper</b> with aerofoil blade, calibration knob, suitable for motorized actuator operation, mounting plate to install actuator. These dampers will be installed in branches of ducts. (dampers along with diffuser, grill & drum louver are not part of this line item).                                                                                                                                                                                                                                                                                                                   | 2          | Sqmt        |
| e            | SITC of Flexible Canvas Connection (150 mm width)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 | 4          | Sqmt        |
| f            | Supply, Installation, Testing and Commissioning of Thermal Insulation for Internal ducting with closed cell elastomeric Nitrile rubber with Al foil or equivalent covering material. The density minimum 40-60Kg/m3 and fire performance to pass Class 1 as per BS 476 Part 7 & class O as per BS 476 part 6 and use OEM recommended adhesives for installation. 50mm width adhesive tap shall be used for all insulation joint & overlap.<br>Insulation thickness 19mm                                                                                                                                                                                                                           | 140        | Sqmt        |

|            |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |     |      |
|------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----|------|
| g          | Supply, Installation, Testing and Commissioning of Acoustic Insulation for Supply air ducts with Open cell elastomeric Nitrile rubber with fire performance to pass Class 1 as per BS 476 Part 7 & class O as per BS 476 part 6 and use recommended adhesives / SR Fevicol 505 grade. Acoustic insulation shall be provided within the supply air duct from the unit discharge point. The acoustic insulation shall be suitable to withstand the high moist & high temperature (upto 80 deg C) air. Contractor to confirm the life of acoustic insulation with this harsh environment. Contractor also required to provide the performance guarantee of acoustic insulation to meet the noise criteria. Insulation thickness 13mm | 25  | Sqmt |
| h          | Lifting And Shifting Charges for HVAC Systems (ODU shall be installed on roof at 15 mtr height)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   | 1   | Job  |
| i          | Fabrication & Erection of MS Stand (Glvanzed) for Table top of ODU's                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              | 8   | Nos. |
| j          | MS Structure (For ducting & refrigerant pipe tray support ) All MS structure to be galvanized                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     | 200 | kg   |
| <b>B.2</b> | <b>Electrical Work</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |     |      |
| a          | Electrical starter cum feeder panel                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               | 1   | Nos  |
| b          | Cable                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |     |      |
| 1          | 3C x 2.5 Sqmm Cu Flexible Cable for Indoor units Power supply(Cable is from IDU to nearest Socket)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                | 80  | Rmt  |
| 2          | 4C x 10 Sqmm Cu Flexible Cable for Outdoor units Power supply(Cable is from ODU to nearest MCB)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   | 60  | Rmt  |
| 3          | 2C x 1.5 Sqmm Cu Shielded Cable in PVC Conduit (Control cable)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    | 80  | Rmt  |
| c          | Earthing cable and strip for ODU                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  | 1   | Lot  |
|            | Supply, unloading, unpacking & installation of GI strips / Cu strips or conductors / wire rope (multi stranded) including straightening , bending, welding them as per requirement, if required clamping them at suitable locations, galvanizing & painting (if required), end connection with lugs for earthing with earth dispatcher bus and equipment, wire rope or pvc insulated Cu. Cable shall be included with crimping and bolting of suitable tinned Cu, lugs on both sides, All connection shall be exothermal welding and shall be painted with anti-corrosive black bitumen paint.                                                                                                                                    |     |      |
| d          | 3 Phase MCBs for outdoor units                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    | 4   | Nos  |
| e          | 1 phase DBs & socket for indoor units                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             | 5   | Nos  |
| <b>C</b>   | <b>AIR BALANCING &amp; TEMPERATURE MEASUREMENT</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |     |      |
|            | Testing, commissioning & Validation of Complete HVAC Package. Validation Activities should cover Air Flow measurements, air balancing, temperature Measurements.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  | 1   | Lot  |
|            | <b>Sub Total</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |     |      |
|            | GST @ 18%                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |     |      |
|            | <b>TOTAL LOW SIDE WITH TAXES</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |     |      |
|            | <b>GRAND TOTAL WITHOUT TAX</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |     |      |
|            | <b>GRAND TOTAL WITH TAXES</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |     |      |

| SITC of HVAC system for Kalyan RSS |                            |           |      |
|------------------------------------|----------------------------|-----------|------|
| Sr. No                             | Description                | Total QTY | Unit |
| <b>A</b>                           | <b>SITC of HVAC Units</b>  |           |      |
| <b>1</b>                           | <b>Hi Wall Split Units</b> |           |      |

|          |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |    |     |
|----------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----|-----|
|          | Supply, installing, testing and commissioning of AIR COOLED HIGH WALL SPLIT AIR CONDITIONING UNITS . The unit shall be complete with indoor decorative type unit, fans, Drain pan, and external condensing unit complete in all respects, inclusive of copper refrigerant piping & Drain piping ( UPTO 15 MTR LENGTH standard ), valves and insulation & cordless remote. It shall be inclusive of cooling thermostat with wiring, first fill of refrigerant, Control & power wiring ( 15 mtr Length ) and earthing. The unit capacities shall be selected after taking deration into account due to copper piping lengths & Ambient temperature. Unit Selected Should be of inverter type with minimum 3 Star Rating & for industrial application. Refrigerant Should be CFC Free, either R-32 / R- 407/R-410a. Unit to be provided with cordless remote controller.                                                          |    |     |
|          | Ambient Summer DB: 40°C                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |    |     |
|          | 1.5 TR                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         | 2  | Nos |
|          | Notes<br>1. All outdoor units should be designed at Ambient temperature 40°C.<br>2. Auto switchover facility between working and stand by unit<br>3. Condensing unit with hydrophilic coating fins and coil<br>4. Ductable indoor unit noise level should be 45 Dba                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |    |     |
| <b>2</b> | <b>DX Ductable Unit</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |    |     |
|          | Supply, installing, testing and commissioning of ceiling Suspended AIR COOLED DUCTED SPLIT AIR CONDITIONING UNITS. The unit shall be complete with cabinet type fan coil unit and external condensing unit complete in all respects, with corded remote controller, insulated drain pan, inclusive of copper refrigerant piping & Drain piping ( UPTO 15 MTR LENGTH SINGLE RUN), valves and insulation. It shall be inclusive of cooling thermostat with wiring, first fill of refrigerant, Control & power wiring ( UPTO 15 MTR LENGTH ) and earthing. The unit capacities shall be selected after taking deration into account due to copper piping lengths & Ambient temperature. Refrigerant Should be CFC Free, either -404A/R-410a/R32. Indoor units shall be ceiling suspended inside the rooms, hence consider all necessary arrangement for the same. Refrigerant piping & cables should be routed in the cable tray. |    |     |
|          | Ambient Summer DB: 40°C                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |    |     |
|          | 5.5 TR ductable unit                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | 5  | Nos |
|          | 3.5 TR ductable unit                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | 3  | Nos |
|          | Notes<br>1. All outdoor units should be designed at Ambient temperature 40°C.<br>2. Auto switchover facility between working and stand by unit<br>3. Condensing unit with hydrophilic coating fins and coil<br>4. Ductable indoor unit noise level should be 45 Dba                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |    |     |
| <b>3</b> | <b>Drain Piping</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |    |     |
|          | Supply, Installation, Testing and Commissioning of Drain Piping System of suitable sizes, from indoor unit to nearest drain point. Piping material U-PVC with 6mm thick closed-cell Nitrile insulation; with all necessary components as required for complete installation,testing, performance etc.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |    |     |
|          | 25NB                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | 50 | rmt |
| <b>4</b> | Supply, installation, testing and commissioning of low noise box type <b>Inline centrifugal fans</b> with motor duly installed in single skin box as per manufacturer's specification, with mounting arrangement flexible connection, vibration isolator and inspection windows & accessories like bird screen, fixed louvers and GI sheet canopy for weather protection as required suitable to install in duct work.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |    |     |
|          | 450 CMH, 20 mm WC static pressure                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              | 2  | Nos |
|          | <b>TOTAL-BASIC PRICE EXCLUDING TAXES</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |    |     |
|          | <b>GST @ 18%</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |    |     |
|          | <b>TOTAL - INCLUSIVE OF ALL TAXES</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |    |     |

|              |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |            |             |
|--------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------|-------------|
|              |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |            |             |
| <b>B</b>     | <b>LOW SIDE WORK</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |            |             |
| <b>SR NO</b> | <b>DESCRIPTION</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                | <b>QTY</b> | <b>UNIT</b> |
| <b>B.1</b>   | <b>Air Distribution</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |            |             |
| <b>a</b>     | Supply, installation, testing & commissioning of factory fabricated Rectangular Type GI sheet ducting (275 GSM as total) as per SMACNA with silicon sealant, neoprene gaskets minimum 3mm thick, Turning Vanes for the complete air distribution. Ducts and plenum of more than 1600mm to be provided with 50x50x 5mm angle bracing. Ducting to be designed as per SMACNA and fan pressure. Ducts within the plant to be supported from roof structure using Gripples / threaded Rods. GI Threaded Rods with Anchor Fasteners, GI Nut Bolts, with M.S Angle Flanges & secondary supports duly epoxy painted etc if required are part of Ducting itself. No separate cost considered for the same.                                 |            |             |
| 1            | 22 G GI Rectangular Ducting.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      | 30         | Sqm<br>t    |
| 2            | 24 G GI Rectangular Ducting.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      | 170        | Sqm<br>t    |
| b            | Supply, installation, testing and balancing of Powder coated extruded aluminium construction. Square / rectangular shape Supply air Grilles with volume control damper.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | 5          | Sqm<br>t    |
| c            | Supply, installation, testing and balancing of Powder coated extruded aluminium construction. Square / rectangular shape Return air Grilles without volume control damper.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        | 5          | Sqm<br>t    |
| d            | Supply, installation, testing and commissioning of very low leakage, aluminium <b>duct volume control damper</b> with aerofoil blade, calibration knob, suitable for motorized actuator operation, mounting plate to install actuator. These dampers will be installed in branches of ducts. (dampers along with diffuser, grill & drum louver are not part of this line item).                                                                                                                                                                                                                                                                                                                                                   | 4          | Sqm<br>t    |
| e            | SITC of Flexible Canvas Connection (150 mm width)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 | 8          | Sqm<br>t    |
| f            | Supply, Installation, Testing and Commissioning of Thermal Insulation for Internal ducting with closed cell elastomeric Nitrile rubber with Al foil or equivalent covering material. The density minimum 40-60Kg/m <sup>3</sup> and fire performance to pass Class 1 as per BS 476 Part 7 & class O as per BS 476 part 6 and use OEM recommended adhesives for installation. 50mm width adhesive tap shall be used for all insulation joint & overlap. Insulation thickness 19mm                                                                                                                                                                                                                                                  | 240        | Sqm<br>t    |
| g            | Supply, Installation, Testing and Commissioning of Acoustic Insulation for Supply air ducts with Open cell elastomeric Nitrile rubber with fire performance to pass Class 1 as per BS 476 Part 7 & class O as per BS 476 part 6 and use recommended adhesives / SR Fevicol 505 grade. Acoustic insulation shall be provided within the supply air duct from the unit discharge point. The acoustic insulation shall be suitable to withstand the high moist & high temperature (upto 80 deg C) air. Contractor to confirm the life of acoustic insulation with this harsh environment. Contractor also required to provide the performance guarantee of acoustic insulation to meet the noise criteria. Insulation thickness 13mm | 50         | Sqm<br>t    |
| h            | Lifting And Shifting Charges for HVAC Systems (ODU shall be installed on roof at 15 mtr height)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   | 1          | Lot         |
| i            | Fabrication & Erection of MS Stand (Galvanized) for Table top of ODU's                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            | 10         | Nos.        |
| j            | MS Structure (For ducting & refrigerant pipe tray support ) All MS structure to be galvanized                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     | 400        | kg          |
| k            | Supply, installation, testing and balancing of Powder coated/Anodised extruded aluminium construction inlet air louvers with SS 304 insect screen, volume damper for fresh air as per specifications as required.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 | 0.5        | Sqm         |
| <b>B.2</b>   | <b>Electrical Work</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |            |             |

|          |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |     |     |
|----------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----|-----|
| a        | Electrical starter cum feeder panel                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            | 1   | Nos |
| b        | Cable                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |     |     |
| 1        | 3C x 2.5 Sqmm Cu Flexible Cable for Indoor units Power supply(Cable is from IDU to nearest Socket)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             | 120 | Rmt |
| 2        | 4C x 10 Sqmm Cu Flexible Cable for Outdoor units Power supply(Cable is from ODU to nearest MCB)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                | 100 | Rmt |
| 3        | 2C x 1.5 Sqmm Cu Shielded Cable in PVC Conduit (Control cable)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 | 120 | Rmt |
| c        | Earthing cable and strip for ODU                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               | 1   | Lot |
|          | Supply, unloading, unpacking & installation of GI strips / Cu strips or conductors / wire rope (multi stranded) including straightening , bending, welding them as per requirement, if required clamping them at suitable locations, galvanizing & painting (if required), end connection with lugs for earthing with earth dispatcher bus and equipment, wire rope or pvc insulated Cu. Cable shall be included with crimping and bolting of suitable tinned Cu, lugs on both sides, All connection shall be exothermal welding and shall be painted with anti-corrosive black bitumen paint. |     |     |
| d        | 3 Phase MCBs for outdoor units                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 | 8   | Nos |
| e        | 1 phase DBs & socket for indoor units                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          | 5   | Nos |
| <b>C</b> | <b>AIR BALANCING &amp; TEMPERATURE MEASUREMENT</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |     |     |
|          | Testing, commissioning & Validation of Complete HVAC Package. Validation Activities should cover Air Flow measurements, air balancing, temperature Measurements.                                                                                                                                                                                                                                                                                                                                                                                                                               | 1   | Lot |
|          | <b>Sub Total</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |     |     |
|          | GST @ 18%                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |     |     |
|          | <b>TOTAL LOW SIDE WITH TAXES</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |     |     |
|          | <b>GRAND TOTAL WITHOUT TAX</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |     |     |
|          | <b>GRAND TOTAL WITH TAXES</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |     |     |

**Note:**

The above mentioned Quantities are tentative only, Bidder to visit the site and confirm with the quantities.  
Accordingly, Bidder has to submit their offers.  
Bidder has to consider all electrical work related to HVAC in the scope of supply

It may be noted that all future correspondence will be strictly done only with Interested Vendors who have done the above steps (As mentioned in section "B") in time with Authorized Person, and only through Tata Power E-Tender System.