Corrigendum 1 - CC27SVP008

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

A. Summary of the tendered packages:

Sr. No.	Description	Tender Reference no.	Bid Guarantee Fee / EMD (Rs.)	Tender Fee (Rs.)
1.	CC27SVP008_Outline Agreement (OLA) of 02 years for Construction of Transmission Tower Foundation (Pile) at Mumbai Operation region.	CC27SVP008	1,20,000/-	2,000 /-

Please note, above is Corrigendum 1 to the Tender CC27SVP008 advertised on 12th June 2026. The bidder who has already participated in the Tender shall be retained as "participant" & they shall not be required to participate again by submitting the Tender Fee of INR 2,000 /.

Note –

1. **Last date & time for Payment of Tender Participation Fee is being extended up to 26th June 2026, Tuesday up to 15:00 Hrs**

   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:

1. Interested bidder to refer to the Section C: "Pre-Qualification Requirement" (PQR).
2. Eligible and Interested Bidder to submit duly signed and stamped letter on Bidder's letterhead indicating,
   a. Tender Enquiry number.
   b. Name of authorized person.
   c. Contact number.
   d. e-mail id.
   e. Details of submission of Tender Participation Fee.
3. Non-Refundable Tender Participation Fee, as indicated in table above, to be submitted in the form of Direct deposit in the following bank account and submit the receipt along with a covering letter clearly indicating the Tender Reference number –

   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

4. 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 shallalso mandatorily include payment details of Tender fee and Tender Reference no **CC27SVP008.**

Authorization Letter along with proof of submission of tender fee should be e-mail to **Ms. Sujata Vishnu Patil** (sujatavishnu.patil@tatapower.com) and copy to **Mr. Vivek Mittal** (vivek.mittal@tatapower.com)

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

5. It is clarified that Bid Guarantee/EMD as mentioned in section "A" above, is not requiredto 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. Pre-qualification Requirement Criteria:

Sr No	Parameter	Tata Power Requirement	Documents to be submitted by vendor to ascertain meeting of Pre-Qualification Requirement
1	**2**	**3**	**4**
(A)	**Bidder's Technical Capability to handle jobs detailed in the Tender**	**Experience:** Bidder should have minimum 05 years' experience of civil works such as civil maintenance works, foundations for civil structures and structural steel work. Selected sub vendors (if any) will be subject to approval of Tata Power. Bidder must have experience of successfully completing a minimum of following Tower pile foundations works during the past 5 years as on the date of bid opening. • Experience in Various dia (i.e.250mm,300mm, 1000mm 1200mm Dia)Pile foundation work. • Experience in Rotary pile work - 2 foundations in last 5 years. • Experience in Tower Micro pile foundation conventional pile – 5 and 10 towers in 5 years respectively • 400 cubic meters of RCC works. • 500 cubic meters of excavation works. • Structural work 30 MT	Experience Certificate/PO copies validating the requirements.

		In case the bidder has a previous association with any of Tata Power Group companies for similar products and services, the performance feedback of the bidder by the Tata Power Group companies shall only be considered for evaluation purpose, irrespective of performance certificates issued by any third organization.	
(B)	**Safety**	The said package being high risk service job .The Bidder will have to go through requirement Tata Power Skilled Development Institute (TPSDI) training for workmen, Certifications etc. 100% workmen shall be L1 & L2 and supervisor should be L3 trained & certified by Tata Power Skill Development Institute (TPSDI). Bidder should possess ISO-9001, ISO-14001 and OHSAS-18001 / ISO-45001 Certification or they should provide an undertaking that they will obtain these certifications for their organization if the work is awarded to them.	Bidder to submit credentials for supporting the noted criteria. Owner has the right to reject the bid in case it is observed that the Bidder does not meet the relevant experience for the subject works. List of TPSDI trained workmen OR undertaking for completion of training.
(C)	**Commercial Capability**	Average annual turnover of the Vendor for last three financial years shall not be less than INR 2 Crore.	Audited Profit & Loss statement along with UDIN No. to be attached.

D. Bill of Quantities: (BOQ)

CC27SVP008_Outline Agreement of 02 years for Construction of Transmission Tower Foundation (Pile) at Mumbai Operation region.			
Sr. No	**Long Description**	**Quantity for 1st year**	**UOM**
1	Providing motorable approach road (In forest / Mangrooves area) for accessing the Tower locations including forming base at Tower locations as per Statutory Approval complete. Construction debris shall be used as filling material. The entire filling shall be removed and disposed to approved dumping yard as per the permissions granted. The rates quoted shall include providing necessary cross drainage to maintain flow of water across the approach. Permission for obtaining filling material and disposal of the same shall be obtained by Vendor. #Mode of Measurement: Levels shall be take before and after removal of Approach road. Quantity shall be calculated based on difference of level and shall be paid off. For RA bills purpose after completion of approach road (Truck Measurement minus 30% voids shall be recorded and paid for. The same shall be deducted from final Quantity.) Payment for the Approach road shall be made in two parts 70% after completion of filling and making approach road and balance 30% after removal of complete filling and disposing the same in authorized dumping ground	100	M3
2	Providing motorable approach road (Non Forest/ salt pan and other areas) for accessing the Tower locations including forming base at Tower locations as per Statutory Approval complete. Construction debris shall be used as filling material. The entire filling shall be removed and disposed to approved dumping yard as per the permissions granted. The rates quoted shall include providing necessary cross drainage to maintain flow of water across the approach. Permission for obtaining filling material and disposal of the same shall be obtained by Vendor. #Mode of Measurement: Levels shall be take before and after removal of Approach road. Quantity shall be calculated based on difference of level and shall be paid off. For RA bills purpose after completion of approach road (Truck Measurement minus 30% voids shall be recorded and paid for. The same shall be deducted from final Quantity.) Payment for the Approach road shall be made in two parts 70% after completion of filling and making approach road and balance 30% after removal of complete filling and disposing the same in authorized dumping ground.	100	M3

3	CISE, Boring/drilling/concreting for micro pile 250mm dia through all kinds of soils as per the drawing including hard murrum with gravels and rock fragments, making of trail pit of 1.5 m depth including transportation of all necessary plant equipment including Dewatering pump of desire capacity piling/boring rigs material to be furnished by CONTRACTOR, experienced personnel to site of work etc. Complete for setting of piling / boring equipment with all accessories and tools, survey at each of the locations on land based on the sequence of operation as directed by ENGINEER and distance involved in movement of the piling / boring equipment and forming piles by conventional/Rotary method (tripod, winch machine, boring rigs) using permanent liner to prevent side collapse in all kinds of soils at all depths below ground from tip to cut off elevation of piles as shown on the drawings or as instructed by the OWNER / ENGINEER. Filling the bore with M30 grade concrete & 20 mm downgraded coarse concrete with a minimum cement content of 400 Kg/cum of concrete with necessary approved admixture and with water-cement ratio not exceeding 0.50 as specified inclusive of concreting a minimum 700 mm above specified cut-off level with M-30 concrete etc. Complete. (Note: Boring through rock pile cut off and reinforcement measured separately. Concrete for piles shall be of RMC from Batching plant set up outside the plant). Mode of Measurement for this item shall measure from cut-off level to start of Soft Rock / Hard Rock including concreting. Rate quoted shall include, mobilization of rig, surveying and setting of rigs, boring of piles, carting away bored spoils to an area outside owner premises to an MCGM approved dumping yard including MCGM permission. Inclusive of obtaining the approval from MCGM authority or any authority beyond MCGM, paying required premium/deposits etc. (methodology to be submitted and approval from Tata Power to be obtained before execution)	1	M
4	**Pilling in soft rock for micro pile 250m** Piling incl. Concreting boring through soft rock for micro pile 250mm dia. Mobilizing, including transportation of all necessary plant equipment including dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional/Rotary boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete & 20mm downgraded aggregates, with a minimum cement content of 400 Kg/cum of concrete, with necessary approved admixture and with water-cement ratio not exceeding 0.50 as specified adding plasticizing admixture of approved brand to proportion recommended by the manufacturers to ensure proper flow of concrete and concreting through tremie pipes and all connected works, etc. Complete. For micro pile 250mm dia, Mode of Measurement for this item shall measure from start of Soft Rock to start of Hard Rock / Pile Terminations Level including concreting.	1	M

5	**Pilling in Hard rock for micro pile 250m** CISE,Piling incl. Concreting boring through hard rock for micro pile 250mm dia. Mobilizing, including transportation of all necessary plant equipment including dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional/rotary boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete & 20mm downgraded aggregates, with a minimum cement content of 400 Kg/cum of concrete, with necessary approved admixture and with water-cement ratio not exceeding 0.50 as specified adding plasticizing admixture of approved brand to proportion recommended by the manufacturers to ensure proper flow of concrete and concreting through tremie pipes and all connected works, etc. Complete. (Note: boring through hard rock with N value above 400 for socketing of piles measured from where such socketing commences. (Socketing shall start when N value is 100 to 400 is encountered. Rate for boring in rock shall include cost of conducting Chisel Energy).For micro pile 250mm dia, Mode of Measurement for this item shall measure from start of Hard Rock to Pile Terminations Level including concreting.	1	M
6	**Pilling incl concrete for 300mm dia micro pile** CISE, Boring/drilling/concreting for micro pile 300mm dia through all kinds of soils as per the drawing including hard murrum with gravels and rock fragments, making of trail pit of 1.5 m depth including transportation of all necessary plant equipment including Dewatering pump of desire capacity piling/boring rigs material to be furnished by CONTRACTOR, experienced personnel to site of work etc. Complete for setting of piling / boring equipment with all accessories and tools, survey at each of the locations on land based on the sequence of operation as directed by ENGINEER and distance involved in movement of the piling / boring equipment and forming piles by conventional/Rotary method (tripod, winch machine, boring rigs) using permanent liner to prevent side collapse in all kinds of soils at all depths below ground from tip to cut off elevation of piles as shown on the drawings or as instructed by the OWNER / ENGINEER. Filling the bore with M30 grade concrete & 20 mm downgraded coarse concrete with a minimum cement content of 400 Kg/cum of concrete with necessary approved admixture and with water-cement ratio not exceeding 0.50 as specified inclusive of concreting a minimum 700 mm above specified cut-off level with M-30 concrete etc. Complete. (Note: Boring through rock pile cut off and reinforcement measured separately. Concrete for piles shall be of RMC from Batching plant set up outside the plant). Mode of Measurement for this item shall measure from cut-off level to start of Soft Rock / Hard Rock including concreting. Rate quoted shall include, mobilization of rig, surveying and setting of rigs, boring of piles, carting away bored spoils to an area outside owner premises to an MCGM approved dumping yard including MCGM	10	M

	permission. Inclusive of obtaining the approval from MCGM authority or any authority beyond MCGM, paying required premium/deposits etc. (methodology to be submitted and approval from Tata Power to be obtained before execution)		
7	**Pilling in soft rock for micro pile 300mm dia.** Piling incl. Concreting boring through soft rock for micro pile 300mm dia. Mobilizing, including transportation of all necessary plant equipment including dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional/Rotary boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete & 20mm downgraded aggregates, with a minimum cement content of 400 Kg/cum of concrete, with necessary approved admixture and with water-cement ratio not exceeding 0.50 as specified adding plasticizing admixture of approved brand to proportion recommended by the manufacturers to ensure proper flow of concrete and concreting through tremie pipes and all connected works, etc. Complete. For micro pile 300mm dia, Mode of Measurement for this item shall measure from start of Soft Rock to start of Hard Rock / Pile Terminations Level including concreting.	10	M
8	**Pilling in Hard rock for micro pile 300mm dia** CISE,Piling incl. Concreting boring through hard rock for micro pile 300mm dia. Mobilizing, including transportation of all necessary plant equipment including dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional/rotary boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete & 20mm downgraded aggregates, with a minimum cement content of 400 Kg/cum of concrete, with necessary approved admixture and with water-cement ratio not exceeding 0.50 as specified adding plasticizing admixture of approved brand to proportion recommended by the manufacturers to ensure proper flow of concrete and concreting through tremie pipes and all connected works, etc. Complete. (Note: boring through hard rock with N value above 400 for socketing of piles measured from where such socketing commences. (Socketing shall start when N value is 100 to 400 is encountered. Rate for boring in rock shall include cost of conducting Chisel Energy).For micro pile 300mm dia, Mode of	10	M

	Measurement for this item shall measure from start of Hard Rock to Pile Terminations Level including concreting.		
9	**Pilling incl concrete 1000mm Dia(Conventional Rig)** Piling incl. Concreting through all types of soil (with Conventional Rig) For Dia 1000mm. Mobilising, making trail pit of 1.5 m depth, including transportation of all necessary plant equipment including Dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete, using Portland Pozzolana cement conforming to BIS, with a minimum cement content of 400 Kg/cum of concrete, with necessary approved admixture and with water-cement ratio not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with M-30 concrete, etc. Complete. Cost of concrete in length above cut-off level is included in this item and shall not be paid separately. (Note : Boring through rock, pile cut off and reinforcement measured separately. Concrete for piles shall be of RMC from Batching plant set up outside the plant). Mode of Measurement for this item shall measured from cut-off level to start of Soft Rock / Hard Rock including concreting. The rates shall also include necessary area development for erecting piling rig as per site requirement (methodology to be submitted and approval from Tata Power to be obtained before execution)	50	M
10	**CISE,Pilling in soft rock 1000mm dia (Conventional Rig)** Piling incl.concreting boring through soft rock (with Conventional Rig) For Dia 1000mm. Mobilising, making trail pit of 1.5 m depth, including transportation of all necessary plant equipment including dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete, using Portland Pozzolana cement conforming to IS:1489 with calcined clay as Pozzolana of specified make, with a minimum cement content of 400 Kg/cum of concrete,with necessary approved admixture and with water-cement ratio including the water cement ratio, not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off	30	M

	level with M-30 concrete, etc. Complete. For 1000mm dia., Mode of Measurement for this item shall measured from start of Soft Rock to start of Hard Rock / Pile Terminations Level including concreting.		
11	**CISE,Pilling in Hard rock 1000 mm dia (Conventional Rig)** CISE,Piling incl.concreting boring through Hard rock (with Conventional Rig) For Dia 1000mm. Mobilising, making trail pit of 1.5 m depth, including transportation of all necessary plant equipment including Dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete, using Portland Pozzolana cement conforming to IS:1489 with calcined clay as Pozzolana of specified make, with a minimum cement content of 400 Kg/cum of concrete, with necessary approved admixture and with water-cement ratio including the water cement ratio, not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with M-30 concrete, etc. Complete. (Note : Boring through rock, pile cut off and reinforcement measured separately. Concrete for piles shall be of RMC from Batching plant set up outside the plant). But for boring through hard rock with N value above 400 for socketing of piles measured from where such socketing commences. (Socketing shall start when N value of >400 is encountered. Rate for boring in rock shall include cost of conducting Chisel Energy). For 1000mm dia., Mode of Measurement for this item shall measured from start of Hard Rock to Pile Terminations Level including concreting.	15	M

12	**Pilling incl concrete 1000mm Dia(Rotary Rig)** Piling incl. Concreting through all types of soil (with Rotary Rig) For Dia 1000mm. Making trail pit of 1.5 m depth, all necessary plant equipment including Dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by Rotary boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete, using Portland Pozzolana cement conforming to BIS, with a minimum cement content of 400 Kg/cum of concrete, with necessary approved admixture and with water-cement ratio not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with M-30 concrete, etc. Complete. Cost of concrete in length above cut-off level is included in this item and shall not be paid separately. (Note : Boring through rock, pile cut off and reinforcement measured separately. Concrete for piles shall be of RMC from Batching plant set up outside the plant). Mode of Measurement for this item shall measured from cut-off level to start of Soft Rock / Hard Rock including concreting. The rates shall also include necessary area development for erecting piling rig as per site requirement (methodology to be submitted and approval from Tata Power to be obtained before execution)	1	M
13	**CISE,Pilling in soft rock 1000mm dia (Rotary Rig)** Piling incl.concreting boring through soft rock (with Rotary Rig) For Dia 1000mm. Making trail pit of 1.5 m depth, all necessary plant equipment including dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by Rotary boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete, using Portland Pozzolana cement conforming to IS:1489 with calcined clay as Pozzolana of specified make, with a minimum cement content of 400 Kg/cum of concrete,with necessary approved admixture and with water-cement ratio including the water cement ratio, not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with M-30 concrete, etc. Complete. . For 1000mm dia., Mode of Measurement for this item shall measured from start of Soft Rock to start of Hard Rock / Pile Terminations Level including concreting.	1	M

14	**CISE,Pilling in Hard rock 1000 mm dia (Rotary Rig)** CISE,Piling incl.concreting boring through Hard rock (with Rotary Rig) For Dia 1000mm. Making trail pit of 1.5 m depth, all necessary plant equipment including Dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by Rotary boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete, using Portland Pozzolana cement conforming to IS:1489 with calcined clay as Pozzolana of specified make, with a minimum cement content of 400 Kg/cum of concrete, with necessary approved admixture and with water-cement ratio including the water cement ratio, not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with M-30 concrete, etc. Complete. (Note : Boring through rock, pile cut off and reinforcement measured separately. Concrete for piles shall be of RMC from Batching plant set up outside the plant). But for boring through hard rock with N value above 400 for socketing of piles measured from where such socketing commences. (Socketing shall start when N value of >400 is encountered. Rate for boring in rock shall include cost of conducting Chisel Energy). For 1000mm dia., Mode of Measurement for this item shall measured from start of Hard Rock to Pile Terminations Level including concreting.	1	M
15	**Pilling incl concrete 1200mm Dia(Conventional Rig)** Piling incl. Concreting through all types of soil (with Conventional Rig) For Dia 1200mm. Mobilising, making trail pit of 1.5 m depth, including transportation of all necessary plant equipment including Dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete, using Portland Pozzolana cement conforming to BIS, with a minimum cement content of 400 Kg/cum of concrete, with necessary approved admixture and with water-cement ratio not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with M-30 concrete, etc. Complete. Cost of concrete in length above cut-off level is included in this item and shall not be paid separately. (Note : Boring through rock, pile cut off and reinforcement measured	100	M

	separately. Concrete for piles shall be of RMC from Batching plant set up outside the plant). Mode of Measurement for this item shall measured from cut-off level to start of Soft Rock / Hard Rock including concreting. The rates shall also include necessary area development for erecting piling rig as per site requirement (methodology to be submitted and approval from Tata Power to be obtained before execution)		
16	**CISE,Pilling in soft rock 1200mm dia (Conventional Rig)** Piling incl.concreting boring through soft rock (with Conventional Rig) For Dia 1200mm. Mobilising, making trail pit of 1.5 m depth, including transportation of all necessary plant equipment including dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete, using Portland Pozzolana cement conforming to IS:1489 with calcined clay as Pozzolana of specified make, with a minimum cement content of 400 Kg/cum of concrete,with necessary approved admixture and with water-cement ratio including the water cement ratio, not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with M-30 concrete, etc. Complete. For 1200mm dia., Mode of Measurement for this item shall measured from start of Soft Rock to start of Hard Rock / Pile Terminations Level including concreting.	40	M

17	**CISE,Pilling in Hard rock 1200 mm dia (Conventional Rig)** CISE,Piling incl.concreting boring through Hard rock (with Conventional Rig) For Dia 1200mm. Mobilising, making trail pit of 1.5 m depth, including transportation of all necessary plant equipment including Dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete, using Portland Pozzolana cement conforming to IS:1489 with calcined clay as Pozzolana of specified make, with a minimum cement content of 400 Kg/cum of concrete, with necessary approved admixture and with water-cement ratio including the water cement ratio, not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with M-30 concrete, etc. Complete. (Note : Boring through rock, pile cut off and reinforcement measured separately. Concrete for piles shall be of RMC from Batching plant set up outside the plant). But for boring through hard rock with N value above 400 for socketing of piles measured from where such socketing commences. (Socketing shall start when N value of >400 is encountered. Rate for boring in rock shall include cost of conducting Chisel Energy). For 1200mm dia., Mode of Measurement for this item shall measured from start of Hard Rock to Pile Terminations Level including concreting.	30	M
18	**Pilling incl concrete 1200mm Dia(Rotary Rig)** Piling incl. Concreting through all types of soil (with Rotary Rig) For Dia 1200mm. Making trail pit of 1.5 m depth, all necessary plant equipment including Dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by Rotary boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete, using Portland Pozzolana cement conforming to BIS, with a minimum cement content of 400 Kg/cum of concrete, with necessary approved admixture and with water-cement ratio not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with M-30 concrete, etc. Complete. Cost of concrete in length above cut-off level is included in this item and shall not be paid separately. (Note : Boring through rock, pile cut off and reinforcement measured	1	M

	separately. Concrete for piles shall be of RMC from Batching plant set up outside the plant). Mode of Measurement for this item shall measured from cut-off level to start of Soft Rock / Hard Rock including concreting. The rates shall also include necessary area development for erecting piling rig as per site requirement (methodology to be submitted and approval from Tata Power to be obtained before execution)		
19	**CISE,Pilling in soft rock 1200mm dia (Rotary Rig)** Piling incl.concreting boring through soft rock (with Rotary Rig) For Dia 1200mm. Making trail pit of 1.5 m depth, all necessary plant equipment including dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by Rotary boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete, using Portland Pozzolana cement conforming to IS:1489 with calcined clay as Pozzolana of specified make, with a minimum cement content of 400 Kg/cum of concrete,with necessary approved admixture and with water-cement ratio including the water cement ratio, not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with M-30 concrete, etc. Complete. For 1200mm dia., Mode of Measurement for this item shall measured from start of Soft Rock to start of Hard Rock / Pile Terminations Level including concreting.	1	M

20	**CISE,Pilling in Hard rock 1200 mm dia (Rotary Rig)** CISE,Piling incl.concreting boring through Hard rock (with Rotary Rig) For Dia 1200mm. Making trail pit of 1.5 m depth, all necessary plant equipment including Dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by Rotary boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete, using Portland Pozzolana cement conforming to IS:1489 with calcined clay as Pozzolana of specified make, with a minimum cement content of 400 Kg/cum of concrete, with necessary approved admixture and with water-cement ratio including the water cement ratio, not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with M-30 concrete, etc. Complete. (Note : Boring through rock, pile cut off and reinforcement measured separately. Concrete for piles shall be of RMC from Batching plant set up outside the plant). But for boring through hard rock with N value above 400 for socketing of piles measured from where such socketing commences. (Socketing shall start when N value of >400 is encountered. Rate for boring in rock shall include cost of conducting Chisel Energy). For 1200mm dia., Mode of Measurement for this item shall measured from start of Hard Rock to Pile Terminations Level including concreting.	1	M
21	**Pile cut off to reqd level_250mm** For Pile 250mm dia, Providing all adequate tools, equipment, machinery and man power for carrying out pile cut off to required levels. Disposal of debris & MS Liner of cut off to be done in the areas approved by MCGM / Debris Management Cell in dumping yards with all valid challans as directed. Care to be taken that concrete debris is not to be mixed with soil during disposal of material.	10	M
22	**Pile cut off to required level_300mm** For Pile 300mm dia, Providing all adequate tools, equipment, machinery and man power for carrying out pile cut off to required levels. Disposal of debris & MS Liner of cut off to be done in the areas approved by MCGM / Debris Management Cell in dumping yards with all valid challans as directed. Care to be taken that concrete debris is not to be mixed with soil during disposal of material.	10	M
23	**Carry out pile cut off to level_1000 dia** For Pile 1000mm dia, Providing all adequate tools, equipment, machinery and man power for carrying out pile cut off to required levels. Disposal of debris & MS Liner of cut off to be done in the areas approved by MCGM / Debris Management Cell in dumping yards with all valid challan as directed. Care to be taken that concrete debris is not to be mixed with soil during disposal of material.	20	M

24	**Pile cut off to required level_1200mm** For Pile 1200mm dia, Providing all adequate tools, equipment, machinery and man power for carrying out pile cut off to required levels. Disposal of debris & MS Liner of cut off to be done in the areas approved by MCGM / Debris Management Cell in dumping yards with all valid challans as directed. Care to be taken that concrete debris is not to be mixed with soil during disposal of material.	22.5	M
25	**Providing laying MS liner of 6mm thk** Providing all materials, tools, equipment, manpower, fabrication, cleaning, cutting, bending, welding of 6mm thk MS liner confirming to IS:816-1969 and IS:9595-1980, lowering by manual or mechanical means, placing and maintaining it in position for pile (This item is optional and will be operated at the discretion of Tata Power, where liner is not required Direct Mud Circulation should be adopted). Material to be supplied by contractor. All Material shall be procured from Prime Manufacturer.	25	MT
26	**Providing laying MS liner of 5mm thk** CISE, Providing all materials, tools, equipment, manpower, fabrication, cleaning, cutting, bending, welding of 5mm thk MS liner confirming to IS:816-1969 and IS:9595-1980, lowering by manual or mechanical means, placing and maintaining it in position for pile (This item is optional and will be operated at the discretion of Tata Power, where liner is not required Direct Mud Circulation should be adopted). Material to be supplied by contractor. All Material shall be procured from Prime Manufacturer.	10	MT
27	**Prov & Placing Reinfc for Pile** Providing & placing Reinforcement Steel for piles Reinforcement for the piles, HYSD generally conforming to the requirements of IS: 1786, including procurement, storage, transportation, cleaning, cutting, bending, tack welding, of laps in the longitudinal bars and lateral steel to prevent disturbance during lowering of steel cage into the bore, tying the rods using binding wire of soft annealed black wire of 16 G, and placing the reinforcement cage into the bore hole to correct position etc. Complete. No separate payment will be made for binding wires. All Material shall be procured from Prime Manufacturer.	40	MT
28	**P & F Reinforcement Steel** Providing all the materials including binding wires, cleaning, bending, cutting, hoisting, placing in position, lapping and binding with 16 SWG annealed soft iron wire or tack welding reinforcement steel for all types of RCC work irrespective of locations & levels all as per drawings including handling and transporting steel from stores to site complete as directed for HYSD Bars confirming to I.S. 1786 (Spec to be wrt to DRG). Steel to be used shall be from primary manufacturers SAIL, RINL, TATA Steel, Jindal	40	MT
29	**Providing & Placing RCC M30 at all level** CISE, Providing and placing in position reinforced cement concrete of M-30 grade for all shapes, at all levels above & below ground including admixtures if any, vibrating, compacting, curing, de-watering, levelling wherever necessary, providing construction joints, leaving cut-outs/ pockets, placing of inserts/ embedment, etc., complete, including cost of providing form work & removal of formwork for all shapes & for all leads & lifts to obtain class F1 finish (including scaffolding, centering, shuttering etc.), but excluding the cost of providing reinforcement all as per specifications and as directed by the ENGINEER. All materials including cement shall be in Contractor's scope.	100	M3

	(Note: Contractor should certify scaffold from competent third-party agency before starting the work)		
30	**Excavn-upto 1.5 m, disposal inside** service type: excavation of ordinary soil, including dewatering and depositing/stacking of all material, removal of vegetation backfilling with excavated earth in layer well watered compacted transporting of surplus excavated material for backfilling or stacking or spreading or removal of surplus excavated earth from 00 to 1.5 m deep within basic lead of 100 m, rate does not include payment against royalty and debris management cell charges	25	M3
31	**Excavation 0-1.5 m disposal outside** Excavation from 0 to 1.5 meter in all types of ordinary soils (natural / backfilled) including dewatering and depositing / stacking of all materials, removal of wild growth vegetation, backfilling with excavated earth in layers, well watered, compacted, transporting of surplus excavated material for backfilling or stacking or spreading or removal of surplus excavated earth material to authorized dumping sites outside owner#s premises.	**25**	M3
32	**Prov. Cartage services** Providing cartage service & transporting, excavated soil, debris, bricks, concrete, dry garbage etc.and disposing off to municipal corporation area approved dumping sites outside premises incl submission of relevant documents. Note: measurement will be made on truck measurement.	25	M3
33	**Demolishing brick masonry** Providing all necessary tools tackles services etc for demolishing brick masonry of variable thickness with plaster and disposing off the debris to the approved dumping ground of municipal corporation area etc complete as per specifications and as directed by the enginee	25	M3
34	**Breaking PCC** Providing all necessary tools tackles services etc for demolishing PCC and disposing of the debris to the approved dumping ground of municipal corporation area etc complete as per specifications and as directed by the engineer., rate shall be inclusive of storing debris up to 200 m lead until taken for disposal	25	M3
35	**Breaking pointing** Providing all necessary tools tackles services etc for breaking pointing and disposing of the debris to the approved dumping ground of municipal corporation area / outside owner premises etc complete as per specifications and as directed by the engineer	25	M2
36	**Demolishing RCC** Providing all necessary tools tackles services etc for demolishing all types of RCC structures at floor level manually or by means of chipper breaker (exclusive of air compressor breaker / JCB breaker / Poclain breaker) including transportation of debris, cutting of reinforcement, disposing salable scrap material to the tata power stores etc. Complete as per the requirement of drawing and as directed by the site-engineer and disposing of the debris to the outside company premises etc complete	25	M3
37	**Breaking cement / lime plaster** Providing all necessary tool tackles services etc for breaking plaster of all thicknesses as directed by the site-engineer and disposing of the debris to the	25	M2

	approved dumping ground of municipal corporation outside company premises etc complete as per specifications and as directed by the engineer		
38	**Dmlsh asphalt road,disposing debris** service type: demolishing of asphalt road and providing all necessary tools & tackles services and disposing of the debris to the approved dumping ground of mcgm	25	M3
39	**Dismantling structural steel** Providing all necessary tools tackles & services for dismantling structural steel sections i.e. Angles / channels / beams / plates etc (not inclusive of ferrana / crane), listing the scrap material and returning the structural steel to Owner's store as directed by the Engineer-in-Charge with all leads and lifts, etc. Complete in all aspects as described and as directed by the Engineer-in-Charge. The rate quoted shall be inclusive of factors like Statutory Authority disposal, Royalty & Collector's permission, stacking, etc. (Bidder to take permission from Collector/Statutory Authority or any other authorities beyond Statutory Authority limit for the dumping place in consultation with the Municipal and/or other Local Authorities & Debris Management Cell. Bidder should ensure that this disposal cause no nuisance to the residents of town. Disposal is at the risk and cost of the Bidder.)	25	MT
40	**Removing chainlink fencing** Providing services for removal of chain-link fencing and dispose to outside the company premises etc complete as per specifications and as directed by the engineer after completion of the job, including providing & erecting necessary steel tubular scaffolding (up to 2 meter) as per the tata power standards etc. Complete as directed. Rate shall inclusive of providing necessary tools tackles, cutting set, welding set wherever required & inclusive of factors like Statutory Authority disposal, Royalty & Collector's permission, stacking, etc. (Bidder to take permission from Collector/Statutory Authority or any other authorities beyond Statutory Authority limit for the dumping place in consultation with the Municipal and/or other Local Authorities & Debris Management Cell. Bidder should ensure that this disposal cause no nuisance to the residents of town. Disposal is at the risk and cost of the Bidder.)	25	M2
41	**Removing concertina coil** Providing services for removal of concertina coil and dispose to outside the company premises etc complete as per specifications and as directed by the engineer with proper documentation after completion of the job, including providing & erecting necessary steel tubular scaffolding (up to 2 meter) as per the tata power standards etc. Complete as directed. Rate shall inclusive of providing necessary tools tackles, cutting set, welding set wherever required & inclusive of factors like Statutory Authority disposal, Royalty & Collector's permission, stacking, etc. (Bidder to take permission from Collector/Statutory Authority or any other authorities beyond Statutory Authority limit for the dumping place in consultation with the Municipal and/or other Local Authorities & Debris Management Cell. Bidder should ensure that this disposal cause no nuisance to the residents of town. Disposal is at the risk and cost of the Bidder.)	25	M

42	**REMOVING OF AC/GI/FRP SHEET** Providing all necessary tools tackles & services for removing old AC / GI / FRP sheets from existing shed or boundary and dispose to outside the company premises etc complete as per specifications and as directed by the engineer. Rate shall inclusive of providing necessary tools tackles, cutting set, welding set wherever required & inclusive of factors like Statutory Authority disposal, Royalty & Collector's permission, stacking, etc. (Bidder to take permission from Collector/Statutory Authority or any other authorities beyond Statutory Authority limit for the dumping place in consultation with the Municipal and/or other Local Authorities & Debris Management Cell. Bidder should ensure that this disposal cause no nuisance to the residents of town. Disposal is at the risk and cost of the Bidder.)	25	M2
43	**Breaking of tile work** Providing all necessary tools tackles services etc for breaking of flooring & dado tiles as directed by the site-engineer and disposing of the debris to the outside company premises etc complete as per specifications and as directed by the engineer.	25	M2
44	**Dismantling MS gate** Removing any type of ms gate and and dispose to outside the company premises etc complete as per specifications and as directed by the engineer with proper documentation after completion of the job	25	M2
45	**Removing & disposing paver block** Removal of existing paver blocks 60 - 80 mm thick & sand bedding and disposing outside tata power premises at designated local municipal authority dumping ground.	25	M2
46	**Removing & stacking paver block** Removal of existing paver blocks 60 - 80 mm thick including sand bedding and stacking in owner premises within 200 meter lead	25	M2
47	**PRVD&LAYING,PCC,M15,MIXER MACHINE MIX** Providing and laying Ready Mix Concrete of M15 Grade using 20 mm downgraded aggregates bellow ground for for blinding layer under R.C. foundation and bedding, bottom of pits, sumps, chambers, trenches, anchor blocks, rubble masonry and brick walls etc. As per drawing or as directed by the Engineer-in-Charge including vibrating, compacting, curing, shuttering if required, etc. Complete.	25	M3
48	**Shifting of temp_Store to Site** Providing all tools, equipment, and manpower and transporting of templates & its component from transmission store and returning the template back in good condition after completion of work to the store including octroi. Vendor to check and assemble the template at Store / Division before transporting.	6.5	AU
49	**Shifting of temp within 1.0 Km lead** Providing all tools, equipment, and manpower and transporting of templates & it's component within lead of 1.0 KM and returning the template back in good condition after completion of work. Vendor to check and assemble the template at Store / Division before transporting.	2.5	AU
50	**CISE,Providing services for Fixing of st** Fixing of stub angle Providing all services tools and tackles for assembling , fixing and erecting in position Templets and Assembling & Fixing of Stub angle in the column as per drawing	6.5	AU

51	**Fab & Fixing Galvanized steel Ru** Supply, Fab, and erection in position G I rungs Fabricating, Erecting and fixing in position rungs made of galvanised (80 microns DFT) structural steel / Mild Steel round bars as per drawings and as approved by Engineer-In-Charge. Rate shall be inclusive of providing steel from Prime Manufacturer.	1300	KG
52	**Prvd&fix,anchr fstnr,16mm,100mm,hilti** service type: providing and fixing of anchor fastener, diameter: upto 16 mm, length: 100 mm, including drilling the hole, make: hilti	130	NO
53	**Prov. & laying plum concrete M - 15** Providing and placing in position plum concrete of required thickness, at all depths with 33% boulders of size 150mm to 230mm and 67% ready mix concrete of M15 grade including shuttering, vibrating, compacting, curing, dewatering, levelling, finishing, removal of formwork, etc. Complete as per specifications/drawings and as directed by the engineer-in-charge.	25	M3
54	**Prvov. & const. Brick masonry 230mm** Providing all material and constructing brick masonry 230mm. Thick and above in cement mortar (1:5) using approved quality class 35 conforming to IS 1077 : 1992 table molded bricks, including scaffolding, curing, raking joints, etc. Complete as per specifications & drawings at all levels & locations.	6.5	M3
55	**Prov. & const Brick Masonry 115mm** Providing all material and constructing brick masonry 115mm. Thick and above in cement mortar (1:5) using approved quality class 35 conforming to IS 1077 : 1992 table molded bricks, including scaffolding, curing, raking joints, etc. Complete as per specifications & drawings at all levels & locations.	6.5	M3
56	**P/L uncoursed rubble masonry** Supplying, providing and laying, un-coursed random rubble masonry in cement mortar 1:5 with approved local stones of good quality for wall footings, etc. And as fill under foundations, including curing, de-watering wherever necessary, etc. Complete for work below ground/grade level at all depths and grade level up to plinth etc., complete as per specification and as directed by the engineer.	6.5	M3
57	**P/L pitching stone work** Providing all material for dry stone pitching : providing all the materials and laying 225 mm thick. Dry rubble pitching at all heights to correct line and level dry stone pitching with individual stones of 22 cm depth and minimum size 0.014cum. Complete with all leads and lifts for all materials and machinery including all charges and as directed by engineer-in-charge	6.5	M2
58	**P/A Internal plaster 12 mm** Providing 12mm. Thick smooth finished cement plaster in cement mortar (1:3) for RCC, brick work, sides and undersides of the slabs, canopies, chajjas with drip molding etc. Including scaffolding, curing, etc. Complete as per specifications.	25	M2
59	**P/A external plaster 20mm** Providing all materials and carrying out sand faced plaster 20 mm thick in two layers (first layer of 14 mm and second layer of 6 mm thickness) with waterproofing compound. Including bands drip molds in cement mortar 1:4 including scaffolding (the rates shall include provision for chicken mesh 230 mm wide at the junction of masonry with RCC).	25	M2

60	**P/F Paver block - 60 mm** Providing and fixing interlocking concrete paver blocks of 60mm thick. Concrete paver blocks shall be uniformly shaped (monolithic single layer precast concrete blocks) of specified color and pattern, placed on avg. Thickness of 45 mm river / crushed sand cushioning with proper compacting with mechanical compactor with the proper level, grade & camber etc. The side joints should be filled by M-20 grade concrete if required etc. Including all taxes, duties, octroi etc.the testing of paver block	25	M2
61	**P/F paver block - 80 mm** Providing and fixing interlocking concrete paver blocks of 80mm thick. Concrete paver blocks shall be uniformly shaped (monolithic single layer precast concrete blocks) of specified color and pattern, placed on avg. Thickness of 45 mm river / crushed sand cushioning with proper compacting with mechanical compactor with the proper level, grade & camber etc. The side joints should be filled by M-20 grade concrete if required etc. Including all taxes, duties, octroi etc.the testing of paver block	25	M2
62	**Lay paver block available at site** Prov. Services for laying paver blocks available at site within 50 meter lead, rate shall be inclusive of shifting or transporting for given lead, 40 mm thick sand bedding, filling joints with sand	25	M2
63	**P/F M 30 - 100 mm paver block** Providing and fixing interlocking concrete paver blocks of 80mm thick. Concrete paver blocks shall be uniformly shaped (monolithic single layer precast concrete blocks) of specified color and pattern, placed on avg. Thickness of 45 mm river / crushed sand cushioning with proper compacting with mechanical compactor with the proper level, grade & camber etc. The side joints should be filled by M-20 grade concrete if required etc. Including all taxes, duties, octroi etc.the testing of paver block	25	M2
64	**P/L paver tile 20 mm** Prov. & laying 20 mm thick paver tile of M 20 grade on average sand bedding of 50 mm thickness to the line and level, rate shall be inclusive of man, material, transportation, tools, joint filling with sand so as to complete the job	25	M2
65	**Fab & Erect Structural Steel Work** Fab & erection all types of mild steel, work at all height including scaffolding, welding and gas cutting, drilling of hole, contractor shall use his own welding set, gas cutting set, gas, welding electrode, drill machine, required for carrying out the entire work, the rate shall include supply and fixing of mild steel bolt, nut, washer and applying one coat approved primer & 2 coat of approved synthetic enamel paint to all the exposed surfaces of steel (excluding chequered plate)	6.5	MT
66	**Prov./ Supply /Fab structural steel** Providing & fabricating & erecting all types of structural steel, work at all height incl. Scaffolding, welding & gas cutting, drilling of hole, with own welding set, gas cutting set, gas, approved quality of welding electrode, drill machine, required for carrying out work, the rate shall include supply & fixing of mild steel bolt, nut, washer & applying one coat of primer & 2 coats of approved synthetic enamel paint to all the exposed surfaces of steel(excluding chequered plate)	5	MT

67	**P/F 16 SWG SS Wire Mesh** Providing all tools, tackles, materials for fixing of 16 SWG SS wire mesh of opening size 12.5 mm x 12.5 mm fixed with 12 mm U bolts as mentioned in the drawing or as directed by EIC at any height incl scaffolding, ladder, machinery etc.	25	M2
68	**P/F/E MS Gate - Chainlink** Providing & fabrication of MS gate in single / double leaf with ISA 65 x 65 x 6 mm angle frame, both side MS flat of 10 mm x 6 mm to hold chainlink, 9 gauge chainlink within frame and painted by 2 coats of synthetic enamel preceded by red oxide primer, including hinges, MS aldrop, welding, gas cutting, shifting with 200 meter lead	25	M2
69	**Serv. Stretching chainlink fencing** Providing Services for stretching chain link fencing at all height, rate shall be inclusive of man, scaffolding up to 2 m, split pin of 16 gauge, shifting chain link within 200 m lead and stretching tools so as to complete the job	25	M2
70	**Serv. For Stretching barbed wire** Providing Services for stretching barbed wire at all height, rate shall be inclusive of man, scaffolding up to 2 m, split pin of 16 gauge, shifting chain link within 200 m lead and stretching tools so as to complete the job	25	M
71	**Serv for stretching concertina coil** Providing Services for stretching concertina coil at all height, rate shall be inclusive of man, scaffolding up to 2 m, split pin of 16 gauge, shifting chain link within 200 m lead and stretching tools so as to complete the job	25	M
72	**P/S GI chainlink fencing- 8 gauge** Providing & stretching GI chain link fencing of 8 gauge at all height, rate shall be inclusive of man, material, split pin, making hole in angle to receive pin, scaffolding up to 4 meter, including one coat of zinc primer and followed by two coats of synthetic enamel paint	25	M2
73	**Prov./strech PVC coated chainlink** Providing & stretching PVC coated chain link fencing of bare GI chain link of 8 gauge at all height, rate shall be inclusive of man, material, split pin, making hole in angle to receive pin, scaffolding up to 4 meter	25	M2
74	**Providing & fixing barbed wire** Providing & stretching IOWA type GI barbed wire conforming to IS 278: 2009 with 14 SWG x 14 SWG (main wire & barb wire) with spacing of barb at max. 5 inch c/c at required line & level including man, material & transportation	25	M
75	**P/stretch concertina coil 610mm dia** Providing Services for stretching concertina coil at all height, rate shall be inclusive of man, scaffolding up to 2 m, split pin of 16 gauge, shifting chain link within 200 m lead and stretching tools so as to complete the job	25	M
76	**P/F galvalume sheet 0.5 mm thick** Providing, placing & fixing profile pre-color coated galvalume sheets or equivalent of 0.50mm total coat thickness to match existing shade (bare galvalume thickness 0.47mm), trough type, zinc aluminum alloy coated (zinc aluminum coating not less than 150g/sqm), MS high tensile sheet having minimum yield strength of 550mpa including silicon modified polyester (SMP) coating of DFT 20 microns over 5 microns primer on exposed surface of sheeting & SMP coating of DFT 5 microns over 5 micron primer	250	M2
77	**Providing Plumbing Services** Providing Services for misc plumbing works, rate shall be inclusive of manpower of 1 plumber & helper	13	EA

78	**Prov services of carpenter (1+1)** Providing carpentry services for one shift, rate shall be inclusive of one carpenter & one helper	13	EA
79	**Providing & Carrying Out White Wash** Providing & carrying out Whitewash by cleaning the surface by using brush, making it free from any loose or foreign material, dirt, oil, grease etc., preparing white wash water with mixing 1kg class D lime with 6 litres of water, leaving it for 2 days for uniform thin cream, mixing glue 100 gm per 6l of whitewash water, then applying it in two coats to achieve uniformity in white wash.	6.5	M2
80	**P/A Synthetic Enamel Paint** Providing and applying two coats of synthetic enamel paint of approved make over one coat of primer on structural steel including scaffolding at all height, providing all material for process	25	M2
81	**Prov.& Supply Red Soil** Supplying natural red soil at site as directed by EIC	25	M3
82	**Const. Of earth pit 600 x 600** Providing all tools, material & manpower for constructing of new earth pit incl Providing and laying of fine sand in layer in earthing pit, salt, coal, bentonite in earthing pit in layers & 8mm thickness MS plate above it. Rate shall include the cost of loading, transporting and unloading, shifting of material at the designated place & number painting on earth pit plate with synthetic enamel paint as directed by EIC. Size of earth pit as follows 600mm x 600mm	6.5	EA
83	**Const of earth pit 900 x 900** Providing all tools, material & manpower for constructing of new earth pit incl Providing and laying of fine sand in layer in earthing pit, salt, coal, bentonite in earthing pit in layers & 8mm thickness MS plate above it. Rate shall include the cost of loading, transporting and unloading, shifting of material at the designated place & number painting on earth pit plate with synthetic enamel paint as directed by EIC. Size of earth pit as follows 900mm x 900mm	6.5	EA
84	**Providing Service F/Hiring JCB** Hiring of JCB with fuel, operator and carrying out work as directed for 8 hours shift	6.5	SFT
85	**Prov Services of Compressor Breaker** Prov. Services of compressor / tractor breaker for breaking of PCC / RCC / rock, rate shall be inclusive of manpower, transportation, fuel charges, mobilization charges, operator charges. Rate will be for 8 working hours shift	6.5	SFT
86	**Providing services of Ferrana** Providing service for hiring of Ferrana meeting all the requirement of Tata power safety norm, rate should be quoted for 8 hrs shift	6.5	SFT
87	**Prov. Diesel Operated Pump 2 HP** Prov. 2 HP submersible pump for dewatering of pits or other excavated space including diesel, transportation and operator service	6.5	SFT
88	**Prvd&sply dewatering w/diesel pump** service type: providing and supplying dewatering with diesel operated pump with 75 mm delivery and suction pipe, fuel and operator with length of delivery pipe 30 rm and all acessories, including transportation from depot to site and back for 5 & 10 hp pump including hiring of pump, additional information: to be paid per shift, shift to be considered of 8 hours	6.5	SFT

89	**P/F Scaffolding upto 5 M** Providing and fixing of tubular H-frame scaffolding/ pipe coupling / modular cup lock scaffolding, material: steel, Tata power standards upto 5 m height including covering it externally with nylon net and dismantling the same after completion of work, scaffolding material shall be in healthy condition and inspected before use by scaffolding inspector, additional information: payment will be made as per area of elevation	25	M2
90	**P/F Scaffolding Above 5 M** Providing and fixing of tubular H-frame scaffolding/ pipe coupling / modular cup lock scaffolding, material: steel, Tata power standards from 5 m & above height including covering it externally with nylon net and dismantling the same after completion of work, scaffolding material shall be in healthy condition and inspected before use by scaffolding inspector, additional information: payment will be made as per area of elevation	25	M2
91	**Providing and installing Portable Cabin** Providing and installing Portable Cabin of Size 10' x 10' in usable condition (approved by EIC) for Site office with necessary furniture's i.e. Tables & Chairs, Air conditioning, tube lights/ Equivalent CFL / LED, Fan. The bidder shall include cost of providing electricity area dressing loading and unloading of Porta Cabin at site and removing the same after completion of Job with the help of Farhana & Trailer with all necessary tools & tacles. The rates shall also include obtaining necessary temporary permission from Statutory Authorities if any	1	AU
92	**Prov. Electric supply for Porta Cabin** Providing services for power supply to Porta cabin office including necessary fixtures, sockets, cables, etc. Completed submission of relevant documents all complete as directed by Engr In charge.	1	MON
93	**Service for Hiring Tempo 10kms** Prov. Services for material shifting of any type of material in Tata magic or equivalent vehicle as approved by EIC, rate shall be quoted for one side travelling with max 4 workmen (for distance up to 10 kms)	6.5	SFT
94	**Service for Hiring Tempo 20kms** Prov. Services for material shifting of any type of material in Tata magic or equivalent vehicle as approved by EIC, rate shall be quoted for one side travelling with max 4 workmen (for distance up to 20 kms)	6.5	SFT
95	**Service for Hiring Tempo 30kms** Prov. Services for material shifting of any type of material in Tata magic or equivalent vehicle as approved by EIC, rate shall be quoted for one side travelling with max 4 workmen (for distance up to 30 kms)	6.5	SFT
96	**Services for Hiring Tempo 30-50 Kms** Prov. Services for material shifting of any type of material in Tata magic or equivalent vehicle as approved by EIC, rate shall be quoted for one side travelling with max 4 workmen (for distance 30 to 50 kms)	6.5	SFT
97	**Services for hiring Tata 407 10 kms** Prov. Services for material shifting of any type of material in Tata 407 or equivalent vehicle as approved by EIC, rate shall be quoted for one side travelling with max 4 workmen (for distance up to 10 kms)	6.5	SFT
98	**Services for hiring Tata 407 20 kms** Prov. Services for material shifting of any type of material in Tata 407 or equivalent vehicle as approved by EIC, rate shall be quoted for one side travelling with max 4 workmen (for distance up to 20 kms)	6.5	SFT

99	**Services for hiring Tata 407 30 kms** Prov. Services for material shifting of any type of material in Tata 407 or equivalent vehicle as approved by EIC, rate shall be quoted for one side travelling with max 4 workmen (for distance up to 30 kms)	6.5	SFT
100	**Serv. For hiring Tata 407 30-50 kms** Prov. Services for material shifting of any type of material in Tata 407 or equivalent vehicle as approved by EIC, rate shall be quoted for one side travelling with max 4 workmen (for distance 30 to 50 kms)	6.5	SFT
101	**Pile integrity test** Conducting low strain pile integrity test on all the working piles through a reputed specialised agency and submitting report on testing in their standard format. Test to be carried out at the pile cut off level. Item includes the necessary excavation and all other arrangement required for successful completion of the test.	26	No
102	**Conducting survey for piling** Conducting accurate survey to locate all the working piles in the correct location and setting up of Conventional/Rotary Rig at the location of the piles along with all the accessories.	6.5	No
103	Mobilization of Rotary Rig Mobilisation of Rotary rig and all other allied equipment like rotary rig and all other in-situ tests etc. With transporatation, erection and commisssioning of all equipments, mobilising material to be supplied by the CONTRACTOR including qualified personnel and demobilisation of same on completion and removal from site, all as per the specification and as directed by Engineer. (In case more equipment is required to be mobilised to the site for completing the work within the stipulated time frame of contract than the same shall be done without any extra cost.) Rates shall include for all necessary transportation, loading, unloading storage etc. Complete.	6.5	AU
104	**Removing Barbed wire** Providing services for removal of Barbed wireand dispose to outside the company premises etc complete as per specifications and as directed by the engineer after completion of the job, including providing & erecting necessary steel tubular scaffolding (up to 2 meter) as per the tata power standards etc. Complete as directed. Rate shall inclusive of providing necessary tools tackles, cutting set, welding set wherever required & inclusive of factors like Statutory Authority disposal, Royalty & Collector's permission, stacking, etc. (Bidder to take permission from Collector/Statutory Authority or any other authorities beyond Statutory Authority limit for the dumping place in consultation with the Municipal and/or other Local Authorities & Debris Management Cell. Bidder should ensure that this disposal cause no nuisance to the residents of town. Disposal is at the risk and cost of the Bidder.)	25	M

105	Piling incl. Concreting through all types of soil (with conventional rig) for dia 600mm (for fdn), #mobilising, including transportation of all necessary plant equipment, piling/boring rigs, material to be furnished by contractor, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by engineer, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional boring rigs in all kinds of soils, by using guide casing of adequate length, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the owner / engineer, filling the bore with m30 grade concrete, using portland pozzolana cement conforming to bis, with a minimum cement content of 400 kg/cum of concrete,#with necessary approved admixture and with water-cement ratio not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with m-30 concrete, etc. Complete. Cost of concrete in length above cut-off level is included in this item and shall not be paid separately).#(note: boring through rock, pile cut off and reinforcement measured separately. Concrete for piles shall be of rmc from batching plant set up outside the plant). Mode of measurement for this item shall measured from cut-off level to start of soft rock / hard rock including concreting. The rates shall also include necessary area development for erecting piling rig as per site requirement (methodology to be submitted and approval from tata power to be obtained before execution)	25	M
106	**CISE,Pilling in soft rock 600mm dia (Conventional Rig)** Piling incl.concreting boring through soft rock (with Conventional Rig) For Dia 600mm. Mobilising, making trail pit of 1.5 m depth, including transportation of all necessary plant equipment including dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete, using Portland Pozzolana cement conforming to IS:1489 with calcined clay as Pozzolana of specified make, with a minimum cement content of 400 Kg/cum of concrete,with necessary approved admixture and with water-cement ratio including the water cement ratio, not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with M-30 concrete, etc. Complete. For 1000mm dia., Mode of Measurement for this item shall measured from start of Soft Rock to start of Hard Rock / Pile Terminations Level including concreting.	2.5	M

107	Piling incl. Concreting through all types of rock (with conventional rig) for dia 600mm (for fdn), #mobilising, including transportation of all necessary plant equipment, piling/boring rigs, material to be furnished by contractor, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by engineer, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional boring rigs in all kinds of soils, by using guide casing of adequate length, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the owner / engineer, filling the bore with m30 grade concrete, using portland pozzolana cement conforming to bis, with a minimum cement content of 400 kg/cum of concrete,#with necessary approved admixture and with water-cement ratio not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with m-30 concrete, etc. Complete. Cost of concrete in length above cut-off level is included in this item and shall not be paid separately).#(note: boring through rock, pile cut off and reinforcement measured separately. Concrete for piles shall be of rmc from batching plant set up outside the plant). Mode of measurement for this item shall measured from cut-off level to start of soft rock / hard rock including concreting. The rates shall also include necessary area development for erecting piling rig as per site requirement (methodology to be submitted and approval from tata power to be obtained before execution)	25	M
108	Piling incl. Concreting through all types of rock (with conventional rig) for dia 600mm (for fdn), #mobilising, including transportation of all necessary plant equipment, piling/boring rigs, material to be furnished by contractor, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by engineer, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional boring rigs in all kinds of soils, by using guide casing of adequate length, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the owner / engineer, filling the bore with m30 grade concrete, using portland pozzolana cement conforming to bis, with a minimum cement content of 400 kg/cum of concrete,#with necessary approved admixture and with water-cement ratio not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with m-30 concrete, etc. Complete. Cost of concrete in length above cut-off level is included in this item and shall not be paid separately).#(note: boring through rock, pile cut off and reinforcement measured separately. Concrete for piles shall be of rmc from batching plant set up outside the plant). Mode of measurement for this item shall measured from cut-off level to start of soft rock / hard rock including concreting. The rates shall also include necessary area development for erecting piling rig as per site requirement (methodology to be submitted and approval from tata power to be obtained before execution)	25	M

109	Piling incl. Concreting through all types of soil (with conventional rig) for dia 600mm (for fdn), #mobilising, including transportation of all necessary plant equipment, piling/boring rigs, material to be furnished by contractor, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by engineer, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional boring rigs in all kinds of soils, by using guide casing of adequate length, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the owner / engineer, filling the bore with m30 grade concrete, using portland pozzolana cement conforming to bis, with a minimum cement content of 400 kg/cum of concrete,#with necessary approved admixture and with water-cement ratio not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with m-30 concrete, etc. Complete. Cost of concrete in length above cut-off level is included in this item and shall not be paid separately).#(note: boring through rock, pile cut off and reinforcement measured separately. Concrete for piles shall be of rmc from batching plant set up outside the plant). Mode of measurement for this item shall measured from cut-off level to start of soft rock / hard rock including concreting. The rates shall also include necessary area development for erecting piling rig as per site requirement (methodology to be submitted and approval from tata power to be obtained before execution)	25	M
110	**CISE,Pilling in soft rock 750mm dia (Conventional Rig)** Piling incl.concreting boring through soft rock (with Conventional Rig) For Dia 750mm. Mobilising, making trail pit of 1.5 m depth, including transportation of all necessary plant equipment including dewatering pump of desire capacity, piling/boring rigs, material to be furnished by CONTRACTOR, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by ENGINEER, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional boring rigs in all kinds of soils, by using guide casing of adequate length, using mud / bentonite circulation method as specified, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the OWNER / ENGINEER, filling the bore with M30 grade concrete, using Portland Pozzolana cement conforming to IS:1489 with calcined clay as Pozzolana of specified make, with a minimum cement content of 400 Kg/cum of concrete,with necessary approved admixture and with water-cement ratio including the water cement ratio, not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with M-30 concrete, etc. Complete. For 1000mm dia., Mode of Measurement for this item shall measured from start of Soft Rock to start of Hard Rock / Pile Terminations Level including concreting.	2.5	M

111	Piling incl. Concreting through all types of rock (with conventional rig) for dia 750mm (for fdn), #mobilising, including transportation of all necessary plant equipment, piling/boring rigs, material to be furnished by contractor, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by engineer, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional boring rigs in all kinds of soils, by using guide casing of adequate length, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the owner / engineer, filling the bore with m30 grade concrete, using portland pozzolana cement conforming to bis, with a minimum cement content of 400 kg/cum of concrete,#with necessary approved admixture and with water-cement ratio not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with m-30 concrete, etc. Complete. Cost of concrete in length above cut-off level is included in this item and shall not be paid separately).#(note: boring through rock, pile cut off and reinforcement measured separately. Concrete for piles shall be of rmc from batching plant set up outside the plant). Mode of measurement for this item shall measured from cut-off level to start of soft rock / hard rock including concreting. The rates shall also include necessary area development for erecting piling rig as per site requirement (methodology to be submitted and approval from tata power to be obtained before execution)	25	M
112	Piling incl. Concreting through all types of rock (with conventional rig) for dia 750mm (for fdn), #mobilising, including transportation of all necessary plant equipment, piling/boring rigs, material to be furnished by contractor, experienced personnel to site of work, etc. Complete for, setting of piling / boring equipment with all accessories and tools including necessary survey at each of the locations on land, based on the sequence of operation as directed by engineer, irrespective of the location and of the distance involved in movement of the piling / boring equipment and forming piles by conventional boring rigs in all kinds of soils, by using guide casing of adequate length, all depths below ground from tip to cut off elevation of piles as shown and called for on the drawings or as instructed by the owner / engineer, filling the bore with m30 grade concrete, using portland pozzolana cement conforming to bis, with a minimum cement content of 400 kg/cum of concrete,#with necessary approved admixture and with water-cement ratio not exceeding 0.50 as specified, inclusive of concreting a minimum 700 mm above specified cut-off level with m-30 concrete, etc. Complete. Cost of concrete in length above cut-off level is included in this item and shall not be paid separately).#(note: boring through rock, pile cut off and reinforcement measured separately. Concrete for piles shall be of rmc from batching plant set up outside the plant). Mode of measurement for this item shall measured from cut-off level to start of soft rock / hard rock including concreting. The rates shall also include necessary area development for erecting piling rig as per site requirement (methodology to be submitted and approval from tata power to be obtained before execution)	25	M

113	**Providing & Placing RCC M25 at all level** CISE, Providing and placing in position reinforced cement concrete of M-25 grade for all shapes, at all levels above & below ground including admixtures if any, vibrating, compacting, curing, de-watering, levelling wherever necessary, providing construction joints, leaving cut-outs/ pockets, placing of inserts/ embedment, etc., complete, including cost of providing form work & removal of formwork for all shapes & for all leads & lifts to obtain class F1 finish (including scaffolding, centering, shuttering etc.), but excluding the cost of providing reinforcement all as per specifications and as directed by the ENGINEER. All materials including cement shall be in Contractor's scope. (Note: Contractor should certify scaffold from competent third-party agency before starting the work)	2.5	M3

Note: Quantity for 2nd year will remain same as quantity of 1st year.