



भारत हेवी इलेक्ट्रिकल्स लिमिटेड

(भारत सरकार का उपक्रम)

BHARAT HEAVY ELECTRICALS LIMITED

(A Govt. of India Undertaking)

TCN - 03

Ref: PSER:SCT:NKP-E1890:18:TCN-03

Date: 03-04-2018

Sub	Tender Change Notice (TCN) - 03.	
Job	PACKAGE-1: Erection, Testing & Commissioning of Electrical System for Unit # 1 and Common System of 3x660 MW North Karanpura STPP, Jharkhand. PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.	
Ref	1.0	Tender no: PSER:SCT:NKP-E1890:18.
	2.0	BHEL's NIT, vide reference no PSER:SCT:NKP-E1890:6609 Date: 16-03-2018.
	3.0	BHEL's TCN-01, vide reference no: PSER:SCT:NKP-E1890:18:TCN-01, Date: 23-03-2018.
	4.0	BHEL's TCN-02, vide reference no: PSER:SCT:NKP-E1890:18:TCN-02, Date: 27-03-2018.
	5.0	Other References, if any.

With reference to above, following points/ documents, relevant to tender, may please be noted and complied with while submitting offer.

- 1) BOQ cum Price Schedule format "VOLUME-III-PRICE SCHEDULE (PACKAGE-2), REV-02" has been revised as "VOLUME-III- PRICE SCHEDULE (PACKAGE-2), REV-03" which is enclosed herewith.

Bidders are requested to submit their offer as per revised BOQ/Price Schedule only and quote their price accordingly. Offer from bidders in superseded price schedule (Vol-III- Price schedule (Package-2)-REV-02) shall not be considered. Bidders are also requested to submit a declaration in techno-commercial offer that they have submitted their price bid in sealed envelope as per **REVISED Price Schedule** format.

- 2) Introduction of Annexure-VI (A) - DIMENSION/WEIGHT SCHEDULE OF VARIOUS MAJOR EQUIPMENTS for Package-1 under VOLUME-IF- TCC-CML, attached herewith.
- 3) Introduction of Annexure-VI (B) - DIMENSION/WEIGHT SCHEDULE OF VARIOUS MAJOR EQUIPMENTS for Package-2 under VOLUME-IF- TCC-CML, attached herewith.
- 4) Revised 'No deviation certificate' as per enclosed Annexure-2. Bidder shall submit no deviation certificate as per enclosed format only.
- 5) All other terms & conditions shall remain unchanged.

Thanking you,

Yours faithfully,
for BHARAT HEAVY ELECTRICALS LTD

Sr.Engineer (SCT)

Encl: As Above.

पावर सेक्टर पूर्वी क्षेत्र (मुख्यालय)

POWER SECTOR EASTERN REGION, DJ-9/1, SECTOR-II, SALT LAKE CITY, KOLKATA - 700 091

फैक्स/Fax : (033) 23211960

फोन/Phone : बोर्ड/EPABX : (033) 2339-8000/ 2339 8236

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.

TENDER NO PSER:SCT:NKP-E1890:18

PREAMBLE

SL NO	DESCRIPTION
1	This preamble forms part of tender document and schedule of items. The tenderer should read this preamble carefully before filling in rates for various items. Clauses under this preamble shall be read in conjunction with various volumes of tender and other tender sections as applicable and shall have precedence over any contrary statement mentioned any where in this document.
2	The work shall be carried out strictly as per specifications, description of the items in these schedule and / or engineer's instructions. Drawings enclosed with the tender are only preliminary and for tender purposes and giving some idea of the work involved. The work is to be executed as per drawings & documents, which shall be furnished during execution.
3	Items of work provided in this schedule but not covered in this specification shall be executed strictly as per instruction of the engineer.
4	Unless specifically mentioned otherwise in the tender document, the tenderer shall quote for the finished items and shall provide for the complete cost towards power, fuel, tools, tackles, equipment, constructional plants, temporary works, labour, dismantling of all temporary piping, structures, valves, pumps, tanks & other misc. equipment, strengthening of roads/culverts/bridges etc. including arranging all clearances etc. required for carrying out different activities & tests, materials, levies, transport, layout, repairs, rectification, maintenance till handing over, supervisions, colonies, shops, establishments, overheads, profits and all incidental items not specifically mentioned but reasonably implied and necessary to complete the work according to the complete tender document and this schedule.
5	The quantities of the various items mentioned in this schedule of items are approximate, based on very preliminary information and may vary to any extent or be deleted altogether. The quoted rates of each item will remain firm throughout the period of execution including extension, for reasons whatsoever, as long as variation in the total value of work executed under any part of this contract including extra items, if any but excluding any price variation remains, within plus minus fifteen percent ($\pm 15\%$) of the awarded price as per LOI .
6	Prior written approval of BHEL shall be sought by the contractor in case quantity variation of any item crosses +50% (plus fifty percent) limit during execution and approval to be obtained before execution of further quantity for this item.
7	In case Sealed /Paper Price Bids are opened for finalisation of the tender, for any Item Rate/BOQ based contract, possibility of variation of quantity/ addition/deletion of items can not be ruled out. Under such circumstances, after execution of work, if it is observed that standing as L-1 is changed based on actual quantity executed, the bidder shall give suitable rebate to maintain your standing as L-1. Since this aspect can be assessed at the end of execution, necessary adjustment will be effected at the end of execution in final bill. This condition shall not be applicable where the tender is finalised through Reverse Auction.
8	BHEL reserve the right to rationalize the rates, quoted by L-1 bidder against unit rate items and/ or other optional items with respect to item-wise lowest rates (amongst the participating bidders), before placement of order.
9	The rates quoted shall be inclusive of cleaning of site of any vegetation, dressing , clearing of old structures and leveling etc. including fixing of grid pillars, benchmarks etc. required for commencement of site activities. No separate payment will be made towards the same. However, if separate rate for such item is available in the rate schedule, the same shall be considered.
10	Rates shall be quoted in figures and in words in clear legible writing. No overwriting is allowed. All scoring and cancellations should be countersigned and in case of illegibility the interpretation of engineer shall be final. All entries shall be in English language.
11	All works item wise shall be measured upon completion and paid for at the rates quoted and accepted as per BHEL approved payment schedule/billing break-up.
12	The tender shall be deemed to have visited site and made himself aware of all the site conditions, studied the specifications and details of work to be done within the time schedule attached and to have acquainted himself of the conditions prevailing at site.
13	No splitting of the job is envisaged. Decision of BHEL in this regard shall be final and binding to the bidders.
14	Bidders are not allowed to alter the Price Schedule format including item description, quantity etc. and the offer is liable for rejection if the bidders submit their prices in Price Schedules modified by them. BHEL reserves the right to reject the offers of bidders who submit offers in Price Formats which are modified/ altered by them. Also putting any comments instead of rates/price in the designated column of the rate schedule shall make the offer liable for rejection.
15	Bidders to note that for Civil &/Structural packages, against a particular item against a ST No. appearing in more than one schedule of the BOQ, same rate must be quoted in all schedules for that particular items with same descriptions. If by error, different rates are quoted in different schedules for same ST No. (i.e. item with same description), then the higher of the rates shall be considered for evaluation but awarding shall be done with the lower rate ,if the bidder becomes L-1."
16	For Lumpsum Service Contract : The items/components indicated in the tender is indicative and may vary to any extent. No compensation shall be payable in case of any variation in the items/components listed in the bill of quantities if the executed weight remains within the variation limit. However, in case of deletion of any item or addition of new items over and above the items listed or variation of existing quantity beyond variation limit specified, adjustment (i.e. Payment or recovery as the case may be) shall be done on pro-rata basis based on the Rate per MT worked out from the quoted lump-sum Price and the total weight of components listed /indicated in price schedule plus 15% weight variation limit.
17	Engineer's decision shall be final and binding on the contractor regarding clarification of items in the schedule with respect to the other sections/volumes of the contract.
18	In case of tender for Civil and/or Structural works, if the Non-schedule items are not quoted by the bidder, it will be treated at par with rate of corresponding item of CPWD/PWD/DSR schedule as prescribed in the tender/BOQ cum Rate Schedule.
19	No interest, whatsoever, shall be payable by BHEL on the security deposit, any bank guarantee submitted or any amount due to successful bidder/contractor.
20	Size and weights of various items are mentioned in the attached BOQ cum rate/price schedule for reference purpose only & these shall not be taken into consideration for quoting/calculating amount in the rate schedule. These shall be utilised as per relevant sections of tender. Bidders shall quote for each item in the rate column, taking unit as mentioned in the quantity column. Rates shall be filled in both figures and words. Amount shall be calculated based upon these rates multiplied by the mentioned quantity for the respective items.
21	Bidder's Total price will be shall be considered for evaluation unless stated otherwise.
22	In case of BOP packages, if Bidder does not quote/indicate the price for freight chagses against indicated rate schedule, the same shall be considered as 2% of basic price and adjusted with the total quoted price against each item keeping the total quoted price unaltered.

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-1 MAIN PRICE

SL NO	ITEM/SCHEDULE	ALLOCATED %AGE FOR DERIVING THE JOB VALUE	QUOTED PRICE (RS.) (IN FIGURES AND WORDS)
1	TOTAL PRICE FOR SERVICE PART AS PER SCH-2	0.97140102	
2	TOTAL PRICE FOR SUPPLY PART AS PER SCH-3	0.02859898	
3	GRAND TOTAL (SL. NO.1+ SL.NO.2)	1.00000000	
NOTE:			
A)	BIDDER'S QUOTED GRAND TOTAL PRICE AT SL NO 3 ABOVE SHALL BE TAKEN INTO ACCOUNT FOR EVALUATION AND AWARDING AND HENCE, SHALL BE COMPLETE IN ALL RESPECT FOR THE FULL SCOPE DEFINED IN SPECIFICATION AND IN ACCORDANCE WITH ALL TERMS & CONDITIONS OF TENDER.		
B)	BIDDER SHALL QUOTE THE TOTAL PRICE AT SRL. NO 3 AND THE CORRESPONDING VALUES FOR SERVICE AND SUPPLY SCOPE SHALL BE DERIVED ACCORDING TO THE ALLOCATED PERCENTAGE.		
C)	INDIVIDUAL ITEM RATES FOR THE SERVICE AND SUPPLY SCOPE AS PER SCH-2 AND SCH-3 SHALL BE CALCULATED W.R.T THE QUOTED PRICES AT SRL. NO. 1 & 2 RESPECTIVELY.		
D)	PRICE FORMAT SHALL NOT BE CHANGED BY BIDDER IN ANY CASE, SINCE IT MAY LEAD TO CANCELLATION OF OFFER.		

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

**JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP,
Jharkhand.**

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
A	CABLE TRAYS (complete with Coupler plate, Fastners, clamp, and fixing hardware etc.) (including site modifications required for 'A', 'B', 'C' & 'D' types of bends / turns as required to suit site layout)			
A.1	GALVANISED MS LADDER TYPE CABLE TRAY			
1.0	600mm wide	Metres	22855.00	0.023555
2.0	450mm wide	Metres	3966.67	0.00327053
3.0	300mm wide	Metres	8852.20	0.00643999
4.0	150mm wide	Metres	4200.00	0.00259718
5.0	100mm wide	Metres	166.67	0.00010306
A.2	GALVANISED MS PERFORATED TYPE CABLE TRAY			
1.0	600mm wide	Metres	6300.00	0.00779155
2.0	450mm wide	Metres	840.00	0.00086573
3.0	300mm wide	Metres	1050.00	0.00086573
4.0	150mm wide	Metres	1700.00	0.00123675
5.0	100mm wide	Metres	4200.00	0.00305551
6.0	50mm wide (ladder/ perforated/solid bottom)	Metres	500.00	0.00030919
A.3	CABLE TROUGH			
1.0	CABLE TROUGH 2 MM THICK 50 MM WIDTH	Metres	200.00	0.00012368
2.0	CABLE TROUGH 2 MM THICK 75 MM WIDTH	Metres	200.00	0.00012368
B	CABLE TRAY ACCESSORIES			
B.1	(LADDER TYPE)			
B.1.1	HORIZONTAL 90 DEG. BEND 600 MM RADIUS			
1.0	600mm wide	Nos.	220	0.00113369
2.0	450mm wide	Nos.	20	0.00010306
3.0	300mm wide	Nos.	45	0.00018551
B.1.2	VERTICAL 90 DEG. BEND 600 MM RADIUS (INSIDE)			
1.0	600mm wide	Nos.	65	0.00033495
2.0	450mm wide	Nos.	20	0.00010306
3.0	300mm wide	Nos.	30	0.00012368
B.1.3	VERTICAL 90 DEG. BEND 600 MM RADIUS (OUTSIDE)			
1.0	600mm wide	Nos.	100	0.00072144
2.0	450mm wide	Nos.	20	0.00014429
3.0	300mm wide	Nos.	40	0.00028858
B.1.4	TEES 600 MM RADIUS			

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

**JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP,
Jharkhand.**

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
1.0	600mm wide	Nos.	400	0.00288576
2.0	450mm wide	Nos.	20	0.00014429
3.0	300mm wide	Nos.	35	0.0002525
B.1.5 CROSSES 600 MM RADIUS				
1.0	600mm wide	Nos.	25	0.00018036
2.0	450mm wide	Nos.	20	0.00014429
3.0	300mm wide	Nos.	4	0.00002886
B.1.6 REDUCERS LHS /RHS				
1.0	600mm wide - 450mm wide	Nos.	7	0.00003607
2.0	600mm wide - 300mm wide	Nos.	18	0.00009276
3.0	450mm wide - 300mm wide	Nos.	4	0.00002061
B.2 (PERFORATED TYPE)				
B.2.1 HORIZONTAL 90 DEG. BEND 600 MM RADIUS				
1.0	600mm wide	Nos.	196	0.00101002
2.0	450mm wide	Nos.	7	0.00003607
3.0	300mm wide	Nos.	28	0.00011543
4.0	150mm wide	Nos.	7	0.00002886
B.2.2 VERTICAL 90 DEG. BEND 600 MM RADIUS (INSIDE)				
1.0	600mm wide	Nos.	15	0.0000773
2.0	450mm wide	Nos.	7	0.00003607
3.0	300mm wide	Nos.	14	0.00005772
B.2.3 VERTICAL 90 DEG. BEND 600 MM RADIUS (OUTSIDE)				
1.0	600mm wide	Nos.	25	0.00018036
2.0	450mm wide	Nos.	7	0.0000505
3.0	300mm wide	Nos.	42	0.00021643
B.2.4 TEES 600 MM RADIUS				
1.0	600mm wide	Nos.	266	0.00191903
2.0	450mm wide	Nos.	7	0.0000505
3.0	300mm wide	Nos.	14	0.000101
B.2.5 CROSSES 600 MM RADIUS				
1.0	600mm wide	Nos.	300	0.00216432
2.0	450mm wide	Nos.	7	0.0000505
3.0	300mm wide	Nos.	4	0.00002886

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

**JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP,
Jharkhand.**

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
B.2.6	REDUCERS LHS /RHS			
1.0	600mm wide - 450mm wide	Nos.	7	0.00003607
2.0	600mm wide - 300mm wide	Nos.	7	0.00003607
3.0	450mm wide - 300mm wide	Nos.	4	0.00002061
C	GALVANISED CABLE TRAY COVER COMPLETE WITH ACCESSORIES			
1.0	600mm wide	Metres	1400	0.00432864
2.0	450mm wide	Metres	500	0.00154594
3.0	300mm wide	Metres	850	0.00175207
4.0	150mm wide	Metres	200	0.0003104
D	CABLE TRAY SUPPORT MATERIAL (INCLUDING FABRICATION OF BASE FRAME OF SWITCHGEAR, PANEL,LPB. STARTER ETC.) (Angles, Channels, beams etc.)	MT	100	0.03091398
DA	CABLE TRAY SUPPORT MATERIAL (BOLTABLE TYPE)			
1.0	CABLE TRAY SUPPORT SYSTEM, WITH ANGLE FITTING, CLAMP, CHANNEL, ETC (BOLTABLE TYPE)			
1.1	SINGLE CHANNEL SC1	Mtr.	15000	0.02334008
1.2	DOUBLE CHANNEL DC1	Mtr.	4000	0.00726095
2.0	CANTILEVER ARM WITH HEX BOLT & WASHER, SPRING NUT, PAN HEAD SCREW & WASHER, ETC			
2.1	CANTILEVER ARM 750 MM FOR 600MM WIDE CABLE TRAY	No	400	0.00029047
2.2	CANTILEVER ARM 620/650 MM FOR 600 MM WIDE CABLE TRAY	No	23000	0.01670187
2.3	CANTILEVER ARM 500 MM FOR 450 MM WIDE CABLE TRAY	No	250	0.00015887
2.4	CANTILEVER ARM 320 MM FOR 300MM WIDE CABLE TRAY	No	8000	0.00377622
2.5	CANTILEVER ARM 170 MM FOR 150MM WIDE CABLE TRAY	No	1200	0.00034862
AE.1	FABRICATION OF IRREGULAR BEND TO BE DONE FROM THE EXISTING LADDER TYPE CABLE TRAY AS PER SITE REQUIREMENT (cable tray material will be issued by BHEL free of cost) (CONSUMABLES etc. TO BE PROVIDED BY VENDOR) (Applicable for BEND TYPE 'E', 'F' & G)			
1.0	IRREGULAR BEND FOR LADDER 600 MM WIDE TRAYS	NOS	350	0.0018036
2.0	IRREGULAR BEND FOR LADDER 450 MM WIDE TRAYS	NOS	280	0.0011543
3.0	IRREGULAR BEND FOR LADDER 300 MM WIDE TRAYS	NOS	280	0.00086573
4.0	IRREGULAR BEND FOR LADDER 150 MM WIDE TRAYS	NOS	500	0.00103063
AE.2	FABRICATION OF IRREGULAR BEND TO BE DONE FROM THE EXISTING PERFORATED TYPE CABLE TRAY AS PER SITE REQUIREMENT (cable tray material will be issued by BHEL free of cost) (CONSUMABLES etc. TO BE PROVIDED BY VENDOR) (Applicable for BEND TYPE 'E', 'F' & G)			

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
2.0	IRREGULAR BEND FOR PERF 600 MM WIDE TRAYS	NOS	170	0.00122645
3.0	IRREGULAR BEND FOR PERF 450 MM WIDE TRAYS	NOS	200	0.00123675
4.0	IRREGULAR BEND FOR PERF 300 MM WIDE TRAYS	NOS	200	0.00103063
5.0	IRREGULAR BEND FOR PERF 150 MM WIDE TRAYS	NOS	260	0.00107185
E	GALVANISED MS CONDUIT/ PIPE WITH COUPLER, BEND, CLAMP, ETC			
E.1	GALVANISED MS RIGID CONDUITS			
1.0	20-30 mm diameter	Metres	500	0.00038194
2.0	50 mm diameter	Metres	100	0.00009336
3.0	75 mm diameter	Metres	300	0.00030919
4.0	100-125 mm diameter	Metres	300	0.00045833
E.2	FLEXIBLE CONDUIT (MADE OF COLD ROLLED ANNEALED ELECTRO GALVANISED MS STRIP, CLAMP, ETC)			
1.0	20-25 mm diameter	Metres	300	0.00015278
2.0	40-50 mm diameter	Metres	150	0.0001164
3.0	75-100 mm diameter	Metres	70	0.00007214
F	<u>CABLE LAYING</u> <u>(INCLUDES SUPPLY & INSTALLATION OF REQUIRED CLAMP, AL STRIP, SADDLE, ETC FOR CABLE DRESSING, CLAMPING, ETC. TREFOIL CLAMP FOR SINGLE CORE CABLE OF OD 30 MM TO 50 MM, WILL BE SUPPLIED BY BHEL FREE OF COST)</u>			
F.1	33/ 19 KV AL CONDUCTOR/ XLPE INSULATED/ ARMOURED/ UNEARTHED GRADE POWER CABLE	DELETED		
F.2	11/ 11 KV AL CONDUCTOR/ XLPE INSULATED/ ARMOURED/ GRADE POWER CABLE			
1.0	1C-300 SQMM	KM	0.5	0.00030919
2.0	1CX630 SQMM	KM	5	0.00363751
3.0	3C-185 SQMM	KM	1	0.0008245
F.3	11/ 11 KV AL CONDUCTOR/ XLPE INSULATED/ UN-ARMOURED/ GRADE POWER CABLE			
1.0	1CX630 SQMM	KM	7	0.00509251
2.0	3C-185 SQMM	KM	9	0.00742052
F.4	3.3/ 3.3 KV AL CONDUCTOR/ XLPE INSULATED/ ARMOURED/ UNEARTHED GRADE POWER CABLE			
1.0	1C-630 SQMM	KM	1	0.00061838
F.5	3.3/ 3.3 KV AL CONDUCTOR/ XLPE INSULATED/ UN-ARMOURED/ UNEARTHED GRADE POWER CABLE			
1.0	1C-185 SQMM	KM	1	0.00052138
2.0	3C-185 SQMM	KM	8	0.00582002

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

**JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP,
Jharkhand.**

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
F.6	1.1 KV LT ALUMINIUM .XLPE POWER CABLE (ARMOURED/UNARMOURED)			
1.0	1C-6 sq mm	KM	0.5	0.00005471
2.0	1C-10 sq mm	KM	0.5	0.00005471
3.0	1C-25 sq mm	KM	0.5	0.00005471
4.0	1C-35 sq mm	KM	15	0.00309188
5.0	1C-50 sq mm	KM	0.5	0.00010306
6.0	1C-70 sq mm	KM	13	0.00346776
7.0	1C-95 sq mm	KM	0.5	0.00013338
8.0	1C-120 sq mm	KM	4	0.001649
9.0	1C-185 sq mm	KM	0.5	0.00020613
10.0	1C-400 sq mm	KM	6	0.00371026
11.0	1C-630 sq mm	KM	20	0.01236753
12.0	2C-2.5 sqmm	KM	42	0.00407401
13.0	2C-10 sqmm	KM	4	0.000485
14.0	2C-25 sqmm	KM	1	0.00020613
15.0	2C-50 sqmm	KM	0.5	0.00013338
16.0	2C-95 sqmm	KM	8	0.00252201
17.0	2C-120 sq mm	KM	80	0.03298009
18.0	2C-150 sqmm	KM	0.5	0.00020613
19.0	2C-185 sqmm	KM	0.5	0.00020613
20.0	3C-2.5 sq mm	KM	180	0.01746005
21.0	3C-6 sq mm	KM	0.5	0.00006063
22.0	3C-10 sq mm	KM	18	0.00218251
23.0	3C-16 sq mm	KM	10	0.0012125
24.0	3C-25 sq mm	KM	40	0.00485001
25.0	3C-35 sq mm	KM	0.5	0.00006063
26.0	3C-50 sq mm	KM	10	0.00206126
27.0	3C-70 sq mm	KM	3	0.00061838
28.0	3C-95 sq mm	KM	6	0.0016005
29.0	3C-120 sq mm	KM	0.5	0.00013338
30.0	3C-150 sq mm	KM	4	0.00247351
31.0	3C-240 sq mm	KM	18	0.01113078
32.0	3C-400 sq mm	KM	0.5	0.00036375
33.0	3.5C-25 sq mm	KM	12	0.0018915
34.0	3.5C-50 sq mm	KM	20	0.00533501
35.0	3.5C-95 sq mm	KM	8	0.00252201
36.0	3.5C-120 sq mm	KM	0.5	0.00015763
37.0	3.5C-150 sq mm	KM	0.5	0.00015763
38.0	3.5C-185 sq mm	KM	4	0.00247351
39.0	3.5C-300 sq mm	KM	0.5	0.00030919
40.0	4C- 4 sq mm	KM	10	0.0012125
41.0	4C-10 sq mm	KM	0.5	0.00006063
42.0	4C-16 sq mm	KM	0.5	0.00006063
43.0	4C-50 sq mm	KM	1.5	0.00030919
F.7	1.1 KV LT COPPER XLPE POWER CABLE			
1.0	1C-70 sq mm	KM	0.5	0.00013338
2.0	1C-240 sq mm	KM	0.5	0.00020613
3.0	1C-630 sq mm	KM	0.5	0.00030919
4.0	2C-2.5 sq mm	KM	12	0.001164
5.0	2C-6 sq mm	KM	0.5	0.00006063
6.0	2C-10 sq mm	KM	0.5	0.00006063

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

**JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP,
Jharkhand.**

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
7.0	2C-25 sq mm	KM	0.5	0.00010306
8.0	2C-70 sq mm	KM	0.5	0.00013338
9.0	3C-2.5 sq mm	KM	73	0.00708102
10.0	3C-6 sq mm	KM	0.5	0.00006063
11.0	3C-50 sq mm	KM	0.5	0.00010306
12.0	4C-1.5 sq mm	KM	0.5	0.0000485
13.0	4C-35 sq mm	KM	0.5	0.00007881
F.8	LT. COPPER FIRE SURVIVAL CABLE			
1.0	1C-150 sq mm	KM	0.5	0.00020613
2.0	1C-400 sq mm	KM	0.5	0.00030919
3.0	2C-95 sq mm	KM	0.5	0.00015763
4.0	3C-2.5 sq mm	KM	0.5	0.0000485
5.0	5C-2.5 sq mm	KM	0.5	0.00006063
F.9	1.1 KV LT. COPPER CONTROL CABLE (AROURED/UNARMoured)			
1.0	2C-1.5 sq mm	KM	72	0.00698402
2.0	2C-2.5 sq mm	KM	1	0.000097
3.0	2C-4 sq mm	KM	0.5	0.00006063
4.0	3C-1.5 sq mm	KM	90	0.00873002
5.0	3C-2.5 sq mm	KM	5	0.000485
6.0	4C-1.5 sq mm	KM	15	0.00181875
7.0	4C-4 sq mm	KM	0.5	0.00006063
8.0	4C-2.5 sq mm	KM	0.5	0.00006063
9.0	5C - 1.5 sqmm	KM	52	0.00630502
10.0	5C - 2.5 sqmm	KM	30	0.00363751
11.0	5C - 4 sqmm	KM	0.5	0.00007881
12.0	5C - 10 sqmm	KM	0.5	0.00007881
13.0	7C - 1.5 sqmm	KM	41	0.00596552
14.0	7C - 2.5 sqmm	KM	5	0.0007275
15.0	10C - 1.5 sqmm	KM	40	0.00582002
16.0	10C - 2.5 sqmm	KM	10	0.001455
17.0	12C - 1.5 sqmm	KM	46	0.00669302
18.0	12C - 2.5 sqmm	KM	0.5	0.00007275
19.0	14C-1.5 sq mm	KM	0.5	0.00009094
20.0	16C-2.5 sq mm	KM	3	0.00054563
21.0	19C-1.5 sq mm	KM	2	0.00036375

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
22.0	19C-2.5 sq mm	KM	0.5	0.00009094
23.0	24C-1.5 sq mm	KM	1.5	0.00030777
24.0	24C-2.5 sq mm	KM	1	0.00020518
25.0	1C-2.5 sq mm COPPER Wire for ACC system (including termination)	KM	8	0.000776
F.10	1.1 KV SCREENED CABLE			
1.0	Individual & Overall Screened Cable (Type-F) - Unarmoured cable			
	Multi pair (twisted) individual & overall shielded instrumentation cables (Type-F)			
1.1	225V Type-F(IO) 2P-0.5 unarmoured	KM	16	0.001552
1.2	225V Type-F(IO) 4P-0.5 unarmoured	KM	68	0.00824502
1.3	225V Type-F(IO) 8P-0.5 unarmoured	KM	26	0.00378301
1.4	225V Type-F(IO) 12P-0.5 unarmoured	KM	18	0.00305551
1.5	225V Type-F(IO) 20P-0.5 unarmoured	KM	7	0.00178238
2.0	Overall Screened cable (Type-G) - Unarmoured cable			
	Multi pair (twisted) overall shielded instrumentation cables (Type-G)			
2.1	225V Type-G(O) 2P-0.5 unarmoured	KM	12	0.001164
2.2	225V Type-G(O) 4P-0.5 unarmoured	KM	160	0.01940005
2.3	225V Type-G(O) 8P-0.5 unarmoured	KM	40	0.00582002
2.4	225V Type-G(O) 12P-0.5 unarmoured	KM	12	0.00203701
3.0	Overall Screened cable (Type-G) - Armoured cable			
	Multi pair (twisted) overall shielded instrumentation cables (Type-G)			
3.1	225V Type-G(O) 2P-0.5 Armoured	KM	1	0.000097
3.2	225V Type-G(O) 4P-0.5 Armoured	KM	4	0.000485
3.3	225V Type-G(O) 12P-0.5 Armoured	KM	2.5	0.00042438
F.11	OTHER CABLES (including termination)			
1.0	CAT - 5e COMMUNICATION CABLE WITHOUT CONDUIT	KM	1	0.0000684
2.0	CAT - 5e COMMUNICATION CABLE WITH CONDUIT	KM	1	0.0001455
3.0	OPTICAL FIBRE CABLE WITHOUT CONDUIT	KM	1.5	0.00016414
4.0	OPTICAL FIBRE CABLE WITH CONDUIT	KM	1.5	0.0003283
5.0	PTFE signal cable, earthing cable alongwith flexible GI conduit for Hopper Ash level indicator system.	KM	3	0.0004365
6.0	LT SCREENED CU UNARMoured CABLE - 4C x 1.5 SQ. MM FOR ESP	KM	59	0.00715377

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
G	CABLE TERMINATION & JOINT KITS			
G.1	FOR 11/11 KV GRADE, XLPE INSULATED, ALUMINIUM CONDUCTOR CABLES FOR THE FOLLOWING SIZES			
1.0	1CX630 Unarmoured (Indoor type)	Nos	80	0.00329801
2.0	1CX630 Armoured (Indoor type)	Nos	12	0.0004947
3.0	03C X 185 SQ. MM Unarmoured (Indoor type)	Nos	80	0.00329801
4.0	03C X 185 SQ. MM Armoured (Indoor type)	Nos	4	0.0001649
G.2	FOR 3.3/3.3 KV GRADE, XLPE INSULATED, ALUMINIUM CONDUCTOR CABLES FOR THE FOLLOWING SIZES			
1.0	1C X 185 SQ. MM Unarmoured (Indoor type)	Nos.	10	0.00036375
2.0	3C X 185 SQ. MM Unarmoured (Indoor type)	Nos.	70	0.00288576
3.0	1C X 630 Armoured (Indoor type)	Nos.	15	0.00061838
4.0	1C X 400 SQ. MM Unarmoured (Indoor type)	Nos.	6	0.00024735
G.3	19/33kV,XLPE INSULATED ARMOURED AL CABLE FOR THE FOLLOWING SIZES	DELETED		
	STRAIGHT THROUGH JOINTING KITS			
G.4	FOR 11/11 KV GRADE, XLPE INSULATED, ALUMINIUM CONDUCTOR CABLES FOR THE FOLLOWING SIZES			
1.0	1CX630 Unarmoured (Indoor type)	Nos.	1	0.00005153
2.0	1CX630 Armoured (Indoor type)	Nos.	6	0.00030919
3.0	03C X 185 SQ. MM Unarmoured (Indoor type)	Nos.	2	0.00010306
4.0	03C X 185 SQ. MM Armoured (Indoor type)	Nos.	1	0.00005153
G.5	FOR 3.3/3.3 KV GRADE, XLPE INSULATED, ALUMINIUM CONDUCTOR CABLES FOR THE FOLLOWING SIZES			
1.0	3C X 185 SQ. MM Unarmoured (Indoor type)	Nos.	1	0.00005153
G.6	1.1 KV LT ALUMINIUM .XLPE POWER CABLE			
1.0	1C-6 sq mm	Nos.	10	0.00001867
2.0	1C-10 sq mm	Nos.	10	0.00002049
3.0	1C-25 sq mm	Nos.	10	0.00002049
4.0	1C-35 sq mm	Nos.	40	0.00010331
5.0	1C-50 sq mm	Nos.	10	0.00002583
6.0	1C-70 sq mm	Nos.	30	0.00007748
7.0	1C-95 sq mm	Nos.	10	0.00002583
8.0	1C-120 sq mm	Nos.	10	0.00007736
9.0	1C-185 sq mm	Nos.	4	0.00003094
10.0	1C-400 sq mm	Nos.	20	0.00015472
11.0	1C-630 sq mm	Nos.	60	0.00046415
12.0	2C-2.5 sqmm	Nos.	150	0.00030919
13.0	2C-10 sqmm	Nos.	16	0.00004132
14.0	2C-25 sqmm	Nos.	6	0.0000155
15.0	2C-50 sqmm	Nos.	6	0.0000155
16.0	2C-95 sqmm	Nos.	26	0.00006715
17.0	2C-120 sq mm	Nos.	240	0.00185658
18.0	2C-150 sqmm	Nos.	10	0.00007736

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

**JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP,
Jharkhand.**

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
19.0	2C-185 sqmm	Nos.	10	0.00007736
20.0	3C-2.5 sq mm	Nos.	600	0.00123675
21.0	3C-6 sq mm	Nos.	30	0.00006184
22.0	3C-10 sq mm	Nos.	80	0.00020661
23.0	3C-16 sq mm	Nos.	60	0.00015496
24.0	3C-25 sq mm	Nos.	120	0.00030992
25.0	3C-35 sq mm	Nos.	10	0.00002583
26.0	3C-50 sq mm	Nos.	40	0.00010331
27.0	3C-70 sq mm	Nos.	12	0.00003099
28.0	3C-95 sq mm	Nos.	26	0.00006715
29.0	3C-120 sq mm	Nos.	6	0.0000155
30.0	3C-150 sq mm	Nos.	12	0.00009283
31.0	3C-240 sq mm	Nos.	62	0.00047962
32.0	3C-400 sq mm	Nos.	6	0.00004641
33.0	3.5C-25 sq mm	Nos.	46	0.0001188
34.0	3.5C-50 sq mm	Nos.	60	0.00015496
35.0	3.5C-95 sq mm	Nos.	20	0.00005165
36.0	3.5C-120 sq mm	Nos.	6	0.0000155
37.0	3.5C-150 sq mm	Nos.	6	0.0000155
38.0	3.5C-185 sq mm	Nos.	12	0.00009283
39.0	3.5C-300 sq mm	Nos.	4	0.00003094
40.0	4C- 4 sq mm	Nos.	30	0.00006184
41.0	4C-10 sq mm	Nos.	10	0.00007736
42.0	4C-16 sq mm	Nos.	8	0.00006189
43.0	4C-50 sq mm	Nos.	8	0.00006189
G.7	1.1 KV LT COPPER .XLPE POWER CABLE			
1.0	1C-70 sq mm	Nos.	6	0.0000155
2.0	1C-240 sq mm	Nos.	4	0.00003094
3.0	1C-630 sq mm	Nos.	4	0.00003094
4.0	2C-2.5 sq mm	Nos.	40	0.00008245
5.0	2C-6 sq mm	Nos.	10	0.00002061
6.0	2C-10 sq mm	Nos.	10	0.00002061
7.0	2C-25 sq mm	Nos.	10	0.00002061
8.0	2C-70 sq mm	Nos.	6	0.00001237
9.0	3C-2.5 sq mm	Nos.	1400	0.00288576
10.0	3C-6 sq mm	Nos.	10	0.00002061
11.0	3C-50 sq mm	Nos.	8	0.00001649
12.0	4C-1.5 sq mm	Nos.	10	0.00002061
13.0	4C-35 sq mm	Nos.	8	0.00006189
G.8	LT. COPPER FIRE SURVIVAL CABLE			
1.0	1C-150 sq mm	Nos.	10	0.00007736

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

**JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP,
Jharkhand.**

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
2.0	1C-400 sq mm	Nos.	10	0.00007736
3.0	3C-2.5 sq mm	Nos.	10	0.00002061
4.0	5C-2.5 sq mm	Nos.	10	0.00002061
G.9	1.1 KV LT. COPPER PVC FRLS CONTROL CABLE; ARMOURED/UNARMOURED (for cable sizes 1.5 sqmm and 4.0 sqmm cable termination rate shall be inclusive of supply of Heavy duty Copper lugs suitable to terminal box also).			
1.0	2C-1.5 sq mm	Nos.	260	0.00053593
2.0	2C-2.5 sq mm	Nos.	16	0.00003298
3.0	2C-4 sq mm	Nos.	10	0.00002061
4.0	3C-1.5 sq mm	Nos.	360	0.00074205
5.0	3C-2.5 sq mm	Nos.	26	0.00005359
6.0	4C-1.5 sq mm	Nos.	60	0.00012368
7.0	4C-4 sq mm	Nos.	10	0.00002061
8.0	4C-2.5 sq mm	Nos.	12	0.00002474
9.0	5C - 1.5 sqmm	Nos.	200	0.0008245
10.0	5C - 2.5 sqmm	Nos.	180	0.00074205
11.0	5C - 4 sqmm	Nos.	10	0.00004123
12.0	5C - 10 sqmm	Nos.	8	0.00003298
13.0	7C - 1.5 sqmm	Nos.	180	0.00074205
14.0	7C - 2.5 sqmm	Nos.	24	0.00009894
15.0	10C - 1.5 sqmm	Nos.	280	0.00173145
16.0	10C - 2.5 sqmm	Nos.	24	0.00014841
17.0	12C - 1.5 sqmm	Nos.	140	0.00101002
18.0	12C - 2.5 sqmm	Nos.	490	0.00353505
19.0	14C-1.5 sq mm	Nos.	14	0.000101
20.0	14C-2.5 sq mm	Nos.	14	0.000101
21.0	19C-1.5 sq mm	Nos.	8	0.00007421
22.0	19C-2.5 sq mm	Nos.	14	0.00012986
23.0	24C-1.5 sq mm	Nos.	14	0.00012986
24.0	24C-2.5 sq mm	Nos.	14	0.00012986
G.10	1.1 KV SCREENED CABLE			

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
1.0	Individual & Overall Screened Cable (Type-F) - Unarmoured cable			
	Multi pair (twisted) individual & overall shielded instrumentation cables (Type-F)			
1.1	225V Type-F(IO) 2P-0.5 unarmoured	Nos.	60	0.00012368
1.2	225V Type-F(IO) 4P-0.5 unarmoured	Nos.	240	0.0004947
1.3	225V Type-F(IO) 8P-0.5 unarmoured	Nos.	100	0.00020613
1.4	225V Type-F(IO) 12P-0.5 unarmoured	Nos.	90	0.00018551
1.5	225V Type-F(IO) 20P-0.5 unarmoured	Nos.	30	0.00006184
2.0	Overall Screened cable (Type-G) - Unarmoured cable			
	Multi pair (twisted) overall shielded instrumentation cables (Type-G)			
2.1	225V Type-G(O) 2P-0.5 unarmoured	Nos.	40	0.00008245
2.2	225V Type-G(O) 4P-0.5 unarmoured	Nos.	600	0.00123675
2.3	225V Type-G(O) 8P-0.5 unarmoured	Nos.	200	0.00041225
2.4	225V Type-G(O) 12P-0.5 unarmoured	Nos.	50	0.00010306
3.0	Overall Screened cable (Type-G) - Armoured cable			
	Multi pair (twisted) overall shielded instrumentation cables (Type-G)			
3.1	225V Type-G(O) 2P-0.5 Armoured	Nos.	20	0.00004123
3.2	225V Type-G(O) 4P-0.5 Armoured	Nos.	30	0.00006184
3.3	225V Type-G(O) 12P-0.5 Armoured	Nos.	24	0.00004947
G.11	CABLE JOINTS (thru jointing kit)			
G.11.1	DELETED			
G.11.2	11/ 11 KV AL CONDUCTOR/ XLPE INSULATED/ ARMoured/ GRADE POWER CABLE			
1.0	1C-300 SQMM	Nos.	2	0.00008245
2.0	1CX630 SQMM	Nos.	10	0.00051531
3.0	3C-185 SQMM	Nos.	4	0.00020613
G.11.3	11/ 11 KV AL CONDUCTOR/ XLPE INSULATED/ UN-ARMoured/ GRADE POWER CABLE			
1.0	1CX630 SQMM	Nos.	20	0.00103063
2.0	3C-185 SQMM	Nos.	24	0.00123675
G.11.4	3.3/ 3.3 KV AL CONDUCTOR/ XLPE INSULATED/ ARMoured/ UNEARTHED GRADE POWER CABLE			
1.0	1C-630 SQMM	Nos.	2	0.00010306
G.11.5	3.3/ 3.3 KV AL CONDUCTOR/ XLPE INSULATED/ UN-ARMoured/ UNEARTHED GRADE POWER CABLE			

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

**JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP,
Jharkhand.**

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
1.0	1C-185 SQMM	Nos.	2	0.00008245
2.0	3C-185 SQMM	Nos.	18	0.00092756
G.11.6	Supply and installation of St. Thru' Jointing Kit for 1.1 KV LT ALUMINIUM XLPE POWER CABLE			
1.0	1C-6 sq mm	Nos.	14	0.00002614
2.0	1C-10 sq mm	Nos.	14	0.00002869
3.0	1C-25 sq mm	Nos.	14	0.00002869
4.0	1C-35 sq mm	Nos.	14	0.00003005
5.0	1C-50 sq mm	Nos.	14	0.00003005
6.0	1C-70 sq mm	Nos.	14	0.00003123
7.0	1C-95 sq mm	Nos.	14	0.00003395
8.0	1C-120 sq mm	Nos.	14	0.00003395
9.0	1C-185 sq mm	Nos.	14	0.00003395
10.0	1C-400 sq mm	Nos.	14	0.0000365
11.0	1C-630 sq mm	Nos.	14	0.00004176
12.0	2C-2.5 sqmm	Nos.	14	0.00001952
13.0	2C-10 sqmm	Nos.	14	0.00001952
14.0	2C-25 sqmm	Nos.	14	0.00001952
15.0	2C-50 sqmm	Nos.	14	0.00002614
16.0	2C-95 sqmm	Nos.	14	0.00003123
17.0	2C-120 sq mm	Nos.	14	0.00003123
18.0	2C-150 sqmm	Nos.	14	0.0000365
19.0	2C-185 sqmm	Nos.	14	0.00004176
20.0	3C-2.5 sq mm	Nos.	14	0.00002343
21.0	3C-6 sq mm	Nos.	14	0.00002478
22.0	3C-10 sq mm	Nos.	14	0.00002869
23.0	3C-16 sq mm	Nos.	14	0.00002869
24.0	3C-25 sq mm	Nos.	14	0.00002869
25.0	3C-35 sq mm	Nos.	14	0.00003005
26.0	3C-50 sq mm	Nos.	14	0.00003123
27.0	3C-70 sq mm	Nos.	14	0.00003123
28.0	3C-95 sq mm	Nos.	14	0.00003123
29.0	3C-120 sq mm	Nos.	14	0.0000365
30.0	3C-150 sq mm	Nos.	14	0.00004176

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

**JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP,
Jharkhand.**

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
31.0	3C-240 sq mm	Nos.	14	0.0000443
32.0	3C-400 sq mm	Nos.	14	0.00005211
33.0	3.5C-25 sq mm	Nos.	14	0.00002614
34.0	3.5C-50 sq mm	Nos.	14	0.00002869
35.0	3.5C-95 sq mm	Nos.	14	0.00003259
36.0	3.5C-120 sq mm	Nos.	14	0.0000365
37.0	3.5C-150 sq mm	Nos.	14	0.00004176
38.0	3.5C-185 sq mm	Nos.	14	0.0000443
39.0	3.5C-300 sq mm	Nos.	14	0.00004685
40.0	4C-4 sq mm	Nos.	14	0.00002614
41.0	4C-10 sq mm	Nos.	14	0.00002869
42.0	4C-16 sq mm	Nos.	14	0.00003123
43.0	4C-50 sq mm	Nos.	14	0.00003123
G.11.7	Supply and installation of St. Thru' Jointing Kit for 1.1 KV LT COPPER XLPE POWER CABLE			
1.0	1C-70 sq mm	Nos.	14	0.00003395
2.0	1C-240 sq mm	Nos.	14	0.00003904
3.0	1C-630 sq mm	Nos.	14	0.00005211
4.0	2C-2.5 sq mm	Nos.	14	0.00001952
5.0	2C-6 sq mm	Nos.	14	0.00002088
6.0	2C-10 sq mm	Nos.	14	0.00002207
7.0	2C-25 sq mm	Nos.	14	0.00002614
8.0	2C-70 sq mm	Nos.	14	0.00003123
9.0	3C-2.5 sq mm	Nos.	14	0.00002343
10.0	3C-6 sq mm	Nos.	14	0.00002478
11.0	3C-50 sq mm	Nos.	14	0.00003123
12.0	4C-1.5 sq mm	Nos.	14	0.00002869
13.0	4C-35 sq mm	Nos.	14	0.0000443
G.11.8	Supply and installation of St. Thru' Jointing Kit for LT. COPPER FIRE SURVIVAL CABLE			
1.0	1C-150 sq mm	Nos.	14	0.00004566
2.0	1C-400 sq mm	Nos.	14	0.00005856
3.0	3C-2.5 sq mm	Nos.	14	0.00002343
4.0	2C-95 sq mm	Nos.	14	0.00003123

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

**JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP,
Jharkhand.**

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
4.0	5C-2.5 sq mm	Nos.	14	0.00003005
G.11.9	Supply and installation of St. Thru' Jointing Kit for 1.1 KV LT. COPPER PVC FRLS CONTROL CABLE			
1.0	2C-1.5 sq mm	Nos.	14	0.00001698
2.0	2C-2.5 sq mm	Nos.	14	0.00001816
3.0	2C-4 sq mm	Nos.	14	0.00001816
4.0	3C-1.5 sq mm	Nos.	14	0.00001816
5.0	3C-2.5 sq mm	Nos.	14	0.00002343
6.0	4C-1.5 sq mm	Nos.	14	0.00002343
7.0	4C-4 sq mm	Nos.	14	0.00002478
8.0	4C-2.5 sq mm	Nos.	14	0.00002088
9.0	5C - 1.5 sqmm	Nos.	14	0.00002207
10.0	5C - 2.5 sqmm	Nos.	14	0.00002343
11.0	5C - 4 sqmm	Nos.	14	0.00002614
12.0	5C - 10 sqmm	Nos.	14	0.00002614
13.0	7C - 1.5 sqmm	Nos.	14	0.00002869
14.0	7C - 2.5 sqmm	Nos.	14	0.00003005
15.0	10C - 1.5 sqmm	Nos.	14	0.00003123
16.0	10C - 2.5 sqmm	Nos.	14	0.00003123
17.0	12C - 1.5 sqmm	Nos.	14	0.00003259
18.0	12C - 2.5 sqmm	Nos.	14	0.00003259
19.0	14C-1.5 sq mm	Nos.	14	0.00003395
20.0	16C-2.5 sq mm	Nos.	14	0.00003395
21.0	19C-1.5 sq mm	Nos.	14	0.00003395
22.0	19C-2.5 sq mm	Nos.	14	0.00003514
23.0	24C-1.5 sq mm	Nos.	14	0.0000365
24.0	24C-2.5 sq mm	Nos.	14	0.00003904
H	ABOVE GROUND EARTHING AND LIGHTNING PROTECTION MATERIAL			
H.1	INSTALLATION OF VERTICAL AIR TERMINATION (20 MM DIA GALVANISED MS ROD 1000 MM LONG)	Nos.	140	0.00057545
H.2	GALVANISED MS FLAT FOR EARTHING SYSTEM			
1.0	GALVANISED MS/GI FLAT 60 X 8 mm	MT	1	0.00025762
2.0	GALVANISED MS FLAT 70 X 10 mm	MT	1	0.00025762
3.0	GALVANISED MS FLAT 50 X 10	MT	1	0.00025762

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
4.0	GALVANISED MS FLAT 65 X 8	MT	100	0.02576205
5.0	GALVANISED MS/GI FLAT 50 X 6	MT	63	0.01623009
6.0	GALVANISED MS FLAT 50 X 3	MT	1	0.00025762
7.0	GALVANISED MS FLAT 25 X 6	MT	20	0.00515241
8.0	GALVANISED MS FLAT 25 X 3	MT	4	0.00103048
9.0	GALVANISED MS/GI FLAT 30 X 5	MT	7.2	0.00185487
10.0	GI WIRE 8 SWG	Metres	56000	0.00543201
H.3	FLEXIBLE COPPER BRAID FOR GATE EARTHING	NOS.	10	0.0000274
H.4	GS ROD 20 mm DIA 1000 mm LONG	NOS.	50	0.00020552
H.5	TEST LINK 150x50x6 mm GS FLAT WITH BOX	NOS.	120	0.00049325
H.6	GALVANISED MS PIPE , 3000mm LENGTH, 25 NB/50 NB, 2.5 mm Tthick WITH HOLES BELOW 1000 mm ALONG THE LENGTH WITH SUITABLE CAP FUNNEL & WIRE MESH AT ONE END AND SUITABLE CAP AT OTHER END.	NOS.	80	0.00038315
I	MINOR CIVIL WORK			
1.0	Minor Civil work (chipping)	SQM	5	0.00003425
2.0	Breaking of concrete wall/ floors including finishing	CU. M	2	0.0000137
3.0	Breaking of brick walls including finishing	SQM	10	0.00006851
4.0	EARTH EXCAVATION & BACK FILLING	CU. M	10	0.0001027
J	HT Switchgear			
1.0	11KV ,2500A,Unit Switch Board -2BA	NO.OF BOARDS	1	0.00315978
2.0	11KV ,2500A,Unit Switch Board -2BB	NO.OF BOARDS	1	0.00315978
3.0	11KV ,3500A, Station Switch Board -0BC	NO.OF BOARDS	1	0.00175088
4.0	11KV ,3500A, Station Switch Board -0BD	NO.OF BOARDS	1	0.00175088
5.0	11KV ,1250A,Switch Board -0BG	NO.OF BOARDS	1	0.00201077
6.0	11KV ,1000A, Switch Board -0BH	NO.OF BOARDS	1	0.00124477
7.0	3.3 KV, 3150A, UNIT - 2 SWITCHBOARD (2CA)	NO.OF BOARDS	1	0.00153202
8.0	3.3 KV, 2000A, UNIT-2 SWITCHBOARD (OCB)	NO.OF BOARDS	1	0.00153202
9.0	33/11/3.3 KV EARTHING TRUCKS	SET	12	0.00016427
10.0	11 KV BUS TRANSFER PANEL	NO.	2	0.00041218
11.0	HT DATA CONCENTRATOR PANEL WITH ACCESSORIES	NO.	2	0.00041218
K	LT SWBD AND DC DB FOR UNIT # 2			
1.0	EMERGENCY MCC #2DG (3000A)	NO.OF BOARDS	1	0.00277678

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
2.0	BOILER SERVICE PMCC #2DA (3500A)	NO.OF BOARDS	1	0.00137471
3.0	BLR VALVE & DAMPER ACDB #2HA (250A)	NO.OF BOARDS	1	0.00157989
4.0	BOILER ACDB #2HB (400A)	NO.OF BOARDS	1	0.00174917
5.0	TURBINE SERVICE PMCC #2DB (3500A)	NO.OF BOARDS	1	0.00143627
6.0	SERVICE ACDB #2QA (600A)	NO.OF BOARDS	1	0.00108917
7.0	TURBINE VALVE DB #2KA (250A)	NO.OF BOARDS	1	0.00121313
8.0	STATION SERVICE PMCC #0DB (3500A)	NO.OF BOARDS	1	0.00108917
9.0	AIR CONDITIONING MCC #0TB (800A)	NO.OF BOARDS	1	0.00153886
10.0	VENTILATION MCC #2TA (1000A)	NO.OF BOARDS	1	0.00123109
11.0	MISC SERVICES MCC #0QB (400A)	NO.OF BOARDS	1	0.00108917
12.0	AIR WASHER CUM VENTILATION MCC #0SB (1600A)	NO.OF BOARDS	1	0.00087202
13.0	220V MAIN DCDB #2FA (1250A)	NO.OF BOARDS	1	0.00136787
14.0	ESP & ID FAN AREA MCC #2HD (250A)	NO.OF BOARDS	1	0.00128238
15.0	ESP AC & VENT MCC #2TB (400A)	NO.OF BOARDS	1	0.00128238
16.0	415V AC DBs (WALL MOUNTED)	NO.OF BOARDS	20	0.00164149
17.0	220V DC DBs (WALL MOUNTED)	NO.OF BOARDS	6	0.00049245
18.0	SOOT BLOWER MCC	NO.OF BOARDS	1	0.00184663
19.0	415V ACDB (WALL MOUNTED)	NO.OF BOARDS	15	0.00123112
20.0	220V DCDB (WALL MOUNTED)	NO.OF BOARDS	4	0.0003283
21.0	ESP LT MAIN SWITCHBOARD	NO. OF BOARDS	8	0.00816616
22.0	ESP SWITCH GEAR PANEL (17700mm L x 1700mm D X 2450mm H)	NO. OF PANELS	6	0.00612462
23.0	DIGITAL AUTOMATIC VOLTAGE REGULATOR BOARD (COMPRISING OF TRANSFORMER, REGULATION, THYRISTOR & FIELD SUPPRESSION CUBICLE - INCLUDING FITTINGS OF LOOSE ITEMS LIKE PC MONITOR AND OTHER ITEMS)	SET	1	0.00102806
24.0	LT DATA CONCENTRATOR PANEL WITH ACCESSORIES	SET	1	0.00010305
	<u>FOR ACC SYSTEM</u>			
25.0	LT MCC Switch Board	SET	15	0.016158
26.0	FILE-2-SCT-NKP-E 1890-TCN-02-VOLUME-III-PRICE SCHEDULE-PKG-2-REV-02	SET	1	0.00010305
L	GENERATOR RELAY PANEL AND UNIT CONTROL & AUX CONTROL BOARD , VARIOUS CONTROL PANELS AND OTHER PANELS			

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
1.0	Generator Relay Panel (GEN/GT/UT PROT. PANELS)	SET	1	0.00051523
2.0	Electrical Control Panel (ERECTION IS EXCLUDED, COMMISSIONING RATE INCL. MOUNTING OF LOOSE COMPONENTS)	SET	1	0.00051523
3.0	Electrical Control Panel for outside Power House area	SET	5	0.00257614
4.0	Only Commissioning of 'Electrical Control Panel for outside PH area' (in case erected by other vendor) (COMMISSIONING RATE INCL. MOUNTING OF LOOSE COMPONENTS)	SET	5	0.00060625
5.0	MASTER CLOCK SYSTEM PANEL	Nos.	1	0.00009575
6.0	HART MANAGEMENT SYSTEM	Nos.	2	0.0001915
M	MISCELLANEOUS ITEMS OF ESP & ACC			
1.0	Electronic Control Panel (with ARECA-II CONTROLLER) (Including internal wirings with ACP and other associated panels).	No. Of Panel	120	0.01236608
2.0	DATA LOGGER PC WITH COLOR MONITOR	Set	1	0.00001369
3.0	IOS PC WITH COLOUR MONITOR	Set	1	0.00001369
4.0	COLOUR LASER PRINTER (INKJET)	Nos	1	0.00001369
5.0	SAFETY INTERLOCKS	Set	6	0.00008213
6.0	IOS PANEL	NO	1	0.00001369
7.0	DUST DENCITY MONITER (OPM)	Set	6	0.00036375
8.0	ELECTRICAL OPEARTION AND CONTROL SYSTEM OF FANS FOR ACC SYSTEM (BROAD LIST OF ITEMS INVOLVED ARE: DUAL SPEED SWITCH BOX, 1 SET SAFE SLIDE WIRE AND IT'S ACCESSOPRIES, LOCAL OPEARTION BOX ETC.)	Set	90	0.00061656
	(ONLY COMMISSIONING RATE TO BE QUOTED FOR ITEMS SL. NO. 9 TO 37 BELOW) - ERECTION IS EXCLUDED			
9.0	HEATING ELEMENTS FOR HOPPER- (PANEL TYPE HOPPER HEATER)	SET	240	0.00131532
10.0	HEATING ELEMENTS FOR SUPPORT INSULATOR HEATER	Nos	480	0.00263065
11.0	HEATING ELEMENTS FOR SHAFT INSULATOR HEATERS	Nos	120	0.00073914
12.0	THERMOSTAT FOR HOPPER	Nos	240	0.00147828
13.0	THERMOSTAT FOR SUPPORT INSULATOR HOUSING	Nos	12	0.00007391
14.0	ASH LEVEL INDICATOR (HIGH / LOW)	Nos	240	0.00082353
15.0	OPACITY MONITOR	Nos	6	0.00036375
16.0	DISCONNECTING SWITCH ASSY 95KV (VAR-05)	Nos	120	0.00041177
17.0	ELECTRICALLY OPERATED HOIST 3T (EOH)	SETS	6	0.00028729
18.0	GEARED MOTOR FOR COLLECTING ELECTRODE RAPPING, 0.5 HP, 1.1 RPM (CERM)	Nos	120	0.00246332
19.0	GEARED MOTOR FOR GD SCREEN RAPPING MOTOR 0.5HP, 1.1 RPM (GDRM)	Nos	12	0.00024633

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
20.0	GEARED MOTOR FOR EMITTING ELECTRODE RAPPING MOTOR 0.5HP, 2.5 RPM (EERM)	Nos	120	0.00246332
21.0	LINK CHAIN FOR INSULATOR HOUSING	Nos	960	0.0004656
22.0	GALVANIZED ADAPTOR 1/2" (HALF INCH) FEMALE CONDUIT	Nos	5760	0.00055872
23.0	GALVANIZED MALE CONDUIT WITH CCHK NUT 1/2" (HALF INCH)	Nos	5760	0.00055872
24.0	1/2" (HALF INCH) GALVANIZED FLEXIBLE METALIC CONDUIT	MTR.	28800	0.01466644
25.0	GALVANIZED CLAMP SET FOR 1/2" (HALF INCH) GI CONDUIT	SET	28800	0.0010476
26.0	SHAFT INSULATOR 95KV	Nos	120	0.0001746
27.0	BUSHINGS INSULATORS 95KV	Nos	120	0.0001746
28.0	SUPPORT INSULATOR	Nos	480	0.0006984
29.0	REFRIGERATION GAS DRYER	Nos	2	0.00010306
30.0	STROBOSCOPE	Nos	1	0.00001455
31.0	3 PH UPS FOR GENERATOR	SET	1	0.00004365
32.0	ROTOR FLUX PROBE DATA ACQUISITION SYSTEM	SET	1	0.00005153
33.0	MOTORISED TEMP CONTROL VALVE	Nos	1	0.00002061
34.0	GROUNDING BRUSH MONITOR SYSTEM	Nos	1	0.00005153
35.0	BRUSHLESS EXCITER	SET	1	0.00005153
36.0	ILLUMINATION, SPACE HEATER AND BLOWER COMMNG. OF PMG ENCLOSURE	SET	1	0.000097
37.0	CO2 VAPORIZER SYSTEM	SET	1	0.00005153
N	DC Strater Panel/ STARTING CABINET/ Local Motor Starter			
1.0	STARTER CABINET FOR DC JACKING OIL MOTOR WITH RESISTANCE BOX	SET	1	0.00005153
2.0	STARTER CABINET FOR DC EMERGENCY LUB .OIL MOTOR WITH RESISTANCE BOX	SET	1	0.00005153
3.0	STARTER CABINET FOR DC SEAL OIL MOTOR WITH RESISTANCE BOX	SET	1	0.00005153
4.0	FURNACE TEMPERATURE PROBE STARTER BOX	Nos	2	0.00010306
5.0	STARTER CABINET FOR DC SCANNER AIR MOTOR WITH RESISTANCE BOX	Nos	1	0.00005153
6.0	LOCAL MOTOR STARTER UPTO 3.7 KW	Nos	75	0.0005138
7.0	DC STARTER CONTROL PANEL OF TDBFP WITH RESISTANCE BOX	Nos	2	0.00010306
8.0	LOCAL MOTOR STARTER	Nos	450	0.00308279
O	JUNCTION BOX, PUSH BUTTON ETC.			
O.1	JUNCTION BOX			
1.0	JUNCTION BOX -6 WAY	NO	5	0.00002395

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
2.0	JUNCTION BOX -12 WAY	NO	5	0.00002395
3.0	JUNCTION BOX -24 WAY	NO	10	0.00004789
4.0	JUNCTION BOX -36 WAY	NO	10	0.00004789
5.0	JUNCTION BOX -48 WAY	NO	8	0.00003832
6.0	JUNCTION BOX -75 WAY	Nos.	10	0.00004789
7.0	JUNCTION BOX -96 WAY	Nos.	10	0.00004789
8.0	FRP JUNCTION BOX : 24/48/72 WAY	Nos.	250	0.00119735
	(CONTROL BOX / JUNCTION BOX FOR ESP)			
9.0	LOCAL CONTROL BOX FOR PANEL TYPE HOPPER HEATERS	SETS	240	0.00131532
10.0	FRB POWER JB VARIANT- P3	Nos	26	0.00014249
11.0	FRB POWER JB VARIANT- P1	Nos	14	0.00007673
12.0	FRB CONTROL JB VARIANT- C2	Nos	130	0.00071247
13.0	FRB CONTROL JB VARIANT- C2 FOR FD, ID	Nos	10	0.00005481
14.0	LOCAL FRP JUNCTION BOX FOR ASH LEVEL INDICATOR (HIGH)- VAR-C2 FOR NTPC USE	Nos	24	0.00013153
15.0	FRB JB VAR-C4 FOR GATES AND DAMPER.	Nos	18	0.00009865
O.2	PUSH BUTTONS			
1.0	LOCAL START STOP PUSH BUTTON FOR RAPPING MOTOR	Nos.	252	0.0015522
2.0	Local Push Button Stations (TYPE A)	Nos.	1600	0.00985523
3.0	Local Push Button Stations (TYPE C)	Nos.	25	0.00015399
4.0	FIRE PROTECTION EMERGENCY PUSH BUTTON	Nos.	7	0.00004795
P	<u>DC System (Including fittings of loose items, like thyristors, transformer etc. with necessary internal wirings)</u>			
1.0	220V Battery (Ni-Cd)	Set	2	0.00379756
2.0	220V Battery Rack	Set	4	0.00020613
3.0	220V DC BATTERY HEALTH MONITORING SYSTEM	Set	2	0.000291
4.0	Float cum Boost Battery Charger	Set	6	0.00215442
5.0	220V DC ISOLATION BOX	Nos	6	0.00024626
6.0	Battery Fuse Box	Nos	2	0.00008209
Q	MISCELLANEOUS			
Q.1	MOTORS & ACTUATORS (EXCLUDING ERECTION)(TO BE ERECTED BY OTHER VENDORS)			
1.0	DRYING OUT /TESTING OF HT MOTORS	No.	150	0.00772971
2.0	DRYING OUT /TESTING OF LT MOTORS	No.	100	0.00206126

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

**JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP,
Jharkhand.**

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
3.0	Actuators /Limit switches setting, position feedback calibration and operation/commissioning for motor operated valves/dampers / probe (actuator not to be erected)	No.	540	0.01113078
Q.2	COMMISSIONING OF SOOT BLOWER (EXCLUDING ERECTION) (TO BE ERECTED BY OTHER VENDORS)	No.	130	0.00401945
Q.3	COMMISSIONING OF ELECTRICAL OPERATED HOIST (EXCLUDING ERECTION) (TO BE ERECTED BY OTHER VENDORS)	No.	30	0.00154594
Q.4	COMMISSIONING OF CONTROL PANEL OF CENTRAL OIL PURIFICATION UNIT (EXCLUDING ERECTION) (TO BE ERECTED BY OTHER VENDORS)	No.	1	0.00005153
Q.5	Commissioning of Skid based Lub Oil system for different HT Motors	No.	20	0.00103063
Q.6	Commissioning of different types of Dosing Panels (NAOH/ NH3/Hydrazine/O2 etc.)	No.	8	0.00041225
Q.7	Self Cleaning Strainer	No.	4	0.00020613
Q.8	Sump Pump/ Submersible Pump (Commissioning only)	No.	4	0.00020613
Q.9	Commissioning of Electric Hoist	No.	15	0.00077297
Q.10	Assistance in installation of Electrical Lab. Equipment	Set	1	0.0001455
Q.11	Commissioning of Misc. AC Electrical Control Panel (TO BE ERECTED BY OTHER VENDORS)	No.	10	0.00051531
Q.12	FABRICATION AND ERECTION (SUPPLY OF MATL BY BHEL FREE OF COST)			
1.0	Fabrication & erection of foundation/ base frames for switchgear ,Control Panel,LCC/LPB/Starter ,Fuse Board etc.crosschannel etc from MS Structural items (Angle ,Starter ,Fuse Board etc., cross channel etc.from MS Structural items (Angle, Channel, flat, plate etc.for)including providing of all required consumables, paints etc.	MT	15	0.00328303
Q.13	CHEQUERED PLATES			
1.0	Fabrication & Installation of Chequered Plates 6 to 8 mm thick (Material by BHEL as free issue) for covering up leftover floor cutout / trench around switchgear / panels (inclusive of all consumables , paints).	MT	1.5	0.0003283
Q.14	INSERT PLATES /ANCHOR FASTENERS			
1.0	Fabrication of Insert Plates by gas cutting/grinding ,from 6-8 mm thick MS plates,Angle /Flats etc.(MS materials by BHEL as free issue)and its installation on wall /floor/ceiling.	MT	0.25	0.00005472
2.0	Installation of heavy duty galvanised friction anchor fasteners of Hilti/Bosch make of dia 16mm and 100 mm length in concrete (minimum grade M20)including supply of anchor fasteners material ,consumables and providing tollws,scaffolding etc.	Set	50	0.00013034
3.0	Supply and installation of Fasteners like nut, bolts, washer of all varriants	KG	25	0.0001552
Q.15	CANOPIES			

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
1.0	Fabrication and installation of canopies from 2mm thick GI sheet (free issue by BHEL)for protection of outdoor LPBs /starters etc.(inclusive of supply of all consumables /paints)	Square Metre	25	0.00034223
Q.16	Installation of MS HOT DIP GALVANISED THREADED & HEXAGONAL HEAD CABLE GLAND ADAPTORS/GLAND HOLE PLUGS AS PER REQUIRED SIZE AND SHAPES	KG.	125	0.00068506
Q.17	Application of Moisture Sealing compounds for wall, floor, panel openings for all variants	Sq. Mtr.	50	0.00036375
R	GENERATOR CIRCUIT BREAKER			
1	Generator Circuit Breaker (21KV, 24000A) complete set	Set	1	0.00002183
S	TRANSFORMERS			
S.1	<u>OIL FILLED TRANSFORMERS</u> (SCOPE OF WORK: a) SHIFTING OF TRANSFORMER FOR ERECTION PURPOSE (Job involving Loading from storage location at about maximum 500 Mtr. periphery inside the plant premises, Transportation through multi axle low bed trailer and unloading for erection purpose) b) Erection, Testing and commissioning of Transformer and associated Equipments / accessories.)			
1.0	265 MVA, 420/√3/21 Kv, OFAF or ODAF, YNd11, Z=15% ON 265 MVA BASE, OCTC +/- 5% IN STEPS OF 2.5% ON HV SIDE			
1.0 (a)	SHIFTING OF TRANSFORMER FOR ERECTION PURPOSE	Sets	3	0.00873002
1.0 (b)	Erection, Testing and commissioning of Transformer and associated Equipments / accessories.)	Sets	3	0.03586569
2.0	120/60/60 MVA, 400/11.5/11.5 kV, ONAN/ONAF, YNyn0yn0, OLTC +/-10% IN STEPS OF 1.25% ON HV SIDE, ZHV-LV1 = Z HV-LV2 = 28%, Z LV1-LV2 = 51% AT 120 MVA BASE WITH 02 NOS NGR (11.06 OHM, 600A FOR 10 SECS)			
2.0 (a)	SHIFTING OF TRANSFORMER FOR ERECTION PURPOSE	NOS	1	0.00291001
2.0 (b)	Erection, Testing and commissioning of Transformer and associated Equipments / accessories.)	NOS	1	0.01195528
3.0	45 MVA, 21/11.5 kV, ONAN/ONAF, Dyn1, Z=11.5% ON 45 MVA BASE, OLTC +/- 10%IN STEPS OF 1.25% ON HV SIDE WITH NGR (11.06 OHM, 600A FOR 10 SECS)			
3.0 (a)	SHIFTING OF TRANSFORMER FOR ERECTION PURPOSE	NOS	2	0.001455
3.0 (b)	Erection, Testing and commissioning of Transformer and associated Equipments / accessories.)	NOS	2	0.00630502
4.0	16 MVA, 11/3.45 KV, ONAN, DyN1, Z= 12.5% UAT and CHP Transformer with NGR (3.32OHM, 600A, 10Secs)and accessories complete. (UAT-02 Nos, CHP Transformer - 3 nos)			
4.0 (a)	SHIFTING OF TRANSFORMER FOR ERECTION PURPOSE	NOS	5	0.00242501

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
4.0 (b)	Erection, Testing and commissioning of Transformer and associated Equipments / accessories.)	NOS	5	0.00606252
5.0	95 KV/900 mA HVR TRANSFORMER(ERECTION IS EXCLUDED , RATE TO BE QUOTED FOR OIL FILTRATION & COMMISSIOING ONLY)	NOS	120	0.01236608
S.2	OIL FILLED SERVICE TRANSFORMER			
1.0	1600kVA, 11kV/0.433kV, 3 phase, 2 winding, outdoor, ONAN, Z=8.0%, Dyn1, OFF Circuit taps ±5% in steps of 2.5% (with cable box type HV, with bus-duct type LV and with solidly grounded LVN termination)	NOS	2	0.00157625
2.0	2000kVA, 11kV/0.433kV, 3 phase, 2 winding, outdoor, ONAN, Z=10.0%, Dyn1, OFF Circuit taps ±5% in steps of 2.5% (with cable box type HV, with bus-duct type LV and with solidly grounded LVN termination)	NOS	10	0.00788127
3.0	2000 KVA, 11kV/3.45kV, 3 phase, 2 winding, outdoor, ONAN, Z=7%, Dyn1, OFF Circuit taps ±5% in steps of 2.5% (with cable box type HV, with bus-duct type LV and with cable box type LVN termination)	NOS	1	0.00090938
4.0	2500kVA, 11kV/0.433kV, 3 phase, 2 winding, outdoor, ONAN, Z=13.0%, Dyn1, OFF Circuit taps ±5% in steps of 2.5% (with cable box type HV, with bus-duct type LV and with solidly grounded LVN termination)	NOS	15	0.01182191
S.3	Dry Type Type Transformer:			
1.0	11 / 0.433KV Dry Type Transformer (DTT), above 2 MVA	NOS	4	0.00315251
ZA	<u>BUSDUCTS</u>			
ZA.1	<u>IP BUSDUCT(24KV)</u>			
a)	Bus Duct of Rating 24000A (Weight 500Kg/Mtr.)	MTR	190	0.01497441
b)	Bus Duct of Rating 14000A (Weight 380Kg/Mtr.)	MTR	150	0.01182191
c)	Bus Duct of Rating 2800A (Weight 220Kg/Mtr.)	MTR	90	0.00491064
d)	Top Chamber	NO	2	0.000582
e)	NGR (0.628 Ohm with TAPs at 0.534, 0.471 & 0.094 Ohm, 240V, 400A for 5 Min) with Neutral Grounding Transformer(Rating: 13.5 KV/240V, Volt Class 22/1.1KV, AN, 1Ph, 50HZ, 65 KVA) (including assembly of loose components alongwith internal wiring, mounting of neutral CT etc.)	NO	1	0.000291
f)	LAVT Cubicle (including assembly of loose components alongwith internal wiring, mounting of VT etc.)	SET	1	0.000291
g)	SPVT Cubicle (including assembly of loose components alongwith internal wiring, mounting of VT etc.)	SET	1	0.000291
h)	Hot Air Blowing Equip. with piping and pipe support including air drying and compressing unit	SET	1	0.00194001
ZA.2	<u>SP BUSDUCT(11KV & 3.3KV)</u>			
1.0	11KV Bus Duct of Rating 3500A (Weight 180Kg/Mtr.)	MTR	155	0.0039467

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
2.0	11KV Bus Duct of Rating 2500A (Weight 100Kg/Mtr.)	MTR	170	0.00432864
3.0	3.3KV Bus Duct of Rating 3150A (Weight 150Kg/Mtr.)	MTR	120	0.00305551
4.0	11KV Bus Duct of Rating 3500A (Weight 180Kg/Mtr.) for Interconnecting	MTR	760	0.01935155
5.0	3.3KV Bus Duct of Rating 3150A (Weight 150Kg/Mtr.) for CHP	MTR	30	0.00076388
6.0	3.3KV Bus Duct of Rating 2000A (Weight 100Kg/Mtr.) for AHP	MTR	30	0.00076388
ZA.3	<u>LT BUSDUCTS</u> (each set comprising tentatively of following : Straight Run, 90 degree bend, Flexible Copper at Transformer end, Flexible at Switchgear end , Adapter, Expansion joint, Phase cross over, hardware at Transformer & SWBD end)			
1.0	SANDWICH TYPE BUSDUCT FOR EMERGENCY MCC FROM MAIN DG #1DG (3000A)	SET	1	0.00727502
2.0	SANDWICH TYPE BUSDUCT FOR EMERGENCY MCC FROM STAND BY DG #1DG (3000A)	SET	1	0.00727502
3.0	BUS DUCT FOR BOILER SERVICE PMCC #1DA (2500A)	SET	1	0.0001455
4.0	BUS DUCT FOR TURBINE SERVICE PMCC #1DB (3500A)	SET	1	0.0001455
5.0	BUS DUCT FOR STATION SERVICE PMCC #0DA (3500A)	SET	1	0.0001455
6.0	BUS DUCT FOR STATION SERVICE PMCC #0DB (3000A)	SET	1	0.0001455
7.0	BUS DUCT FOR STATION SERVICES PMCC #0DC (3000A)	SET	1	0.0001455
8.0	BUS DUCT FOR WATER SYSTEM PMCC #0DE (2500A)	SET	1	0.0001455
9.0	BUS DUCT FOR FW WATER PMCC#0DH (1600A)	SET	1	0.0001455
10.0	BUS DUCT FOR FUEL OIL SERVICE PMCC#0DF (3000A)	SET	1	0.0001455
11.0	BUS DUCT FOR ADMIN PMCC#0DD (3000A)	SET	1	0.0001455
12.0	BUS DUCT FOR CT, CW TREATMENT PMCC#0DJ (3000A)	SET	1	0.0001455
13.0	BUSDUCT FOR LTMSB INCOMER-1 #1DC (3000A)	SET	1	0.0001455
14.0	BUSDUCT FOR LTMSB INCOMER-2 #1DC (3000A)	SET	1	0.0001455
15.0	BUSDUCT FOR LTMSB INCOMER-1 #1DD (3000A)	SET	1	0.0001455
16.0	BUSDUCT FOR LTMSB INCOMER-2 #1DD (3000A)	SET	1	0.0001455
17.0	BUSDUCT FOR LTMSB INCOMER-1 #1DE (3000A)	SET	1	0.0001455
18.0	BUSDUCT FOR LTMSB INCOMER-2 #1DE (3000A)	SET	1	0.0001455
19.0	BUSDUCT FOR LTMSB INCOMER-1 #1DF (3000A)	SET	1	0.0001455
20.0	BUSDUCT FOR LTMSB INCOMER-2 #1DF (3000A)	SET	1	0.0001455
21.0	BUSDUCT FOR LTMSB INCOMER-1 #1DH (3000A)	SET	1	0.0001455
22.0	BUSDUCT FOR LTMSB INCOMER-2 #1DH (3000A)	SET	1	0.0001455
23.0	BUSDUCT FOR LTMSB INCOMER-1 #1DJ (3000A)	SET	1	0.0001455
24.0	BUSDUCT FOR LTMSB INCOMER-2 #1DJ (3000A)	SET	1	0.0001455
25.0	BUSDUCT FOR ACC-LTMSB INCOMER (4000A)	SET	15	0.00218251
ZB)	<u>DG SETS</u>			

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
ZB.1	1750 KVA DG SETs along with Accoustic enclosure, Fuel tank(day tank, bulk oil tank), accoustic enclosure, fuel oil piping, exhaust piping,DG set stack Installation of Generator terminal adaptor/box, Current transformer, instruments, Power JB, Control JB, cleaning of radiator tubes (cleaning agent to be supplied by BHEL), replacement of engine oil and its filter, lub. oil filter, radiator coolant (Diesel for commissioning, engine oil & its filter, lub. oil filter, coolant being supplied by BHEL) Cabling, earthing, etc. complete.	SETS	2	0.00820722
ZB.2	PANELS. BATTERY ETC			
1.0	AMF PANEL	SET	2	0.00016415
2.0	DG Auxiliary Panel	No.	1	0.00030778
3.0	Battery charger Panel	Nos.	2	0.0001915
4.0	NGR Panel	No.	2	0.0001915
5.0	Single Breaker Panel	Nos.	2	0.000291
6.0	3 Breaker Panel	No.	1	0.000291
7.0	DC BATTERY for Engine Starting	SET	2	0.0000291
8.0	ELECTRONIC CONTROL PANEL	NO	2	0.00008209
9.0	INSULATION AND CLADDING	MT	4	0.0007113
10.0	FUEL TRANSFER PUMP	SET	4	0.00008211
11.0	PRE-LUB OIL PUMP	NO	2	0.00002738
ZC	SUPPORT STRUCTURE (FOR BUS DUCT, DG SET ETC) INCLUDING FABRICATION OF DG STRUCTURE (supply of materials is by BHEL Units free of cost)	MT	100	0.01778257
ZD	LIGHTING AND MAINTENANCE SYSTEM OF ACC (Erection and Commissioning Assistance Services)			
1.0	Lighting Panel	Set	2	0.0001455
2.0	Maintenance Box	Set	4	0.0000388
3.0	Metal Halide Lighting Fixture with Lamps	Set	150	0.0007275
4.0	Main Lighting Distribution Board	Set	1	0.0001398
5.0	Street Lighting Pole with lifghting fixtures and accessories	Set	25	0.00069901
ZF	ELECTRICAL AND ASSOCIATED WORKS FOR PLANT FIRE PROTECTION SYSTEM (Erection and Commissioning Assistance Services)			
1.0	Electric Motors (3.3 KV, 220 KW, Unidirectional Starter) for Hydrant Pump and accessory	Set	3	0.00065475
2.0	DG Set for opearting above Hydrant Pump and accessory.	Set	1	0.00097
3.0	Electric Motors (3.3 KV, 220 KW, Unidirectional Starter) for Spray Pump and accessory	Set	2	0.0004365

**VOLUME-III
PRICE SCHEDULE, REV-03
(PACAKGE-2)**

JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.

TENDER NO: PSER:SCT:NKP-E1890:18

SCH-2: SERVICE PRICE

SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 1 of SCH-1
4.0	DG Set for opearting above Spray Pump and accessory.	Set	1	0.00097
5.0	Electric Motors (415V, 45KW, Unidirectional Starter) for Jockey Pump and accessory	Set	2	0.000194
6.0	Electric Motors (415V, 45KW, Unidirectional Starter) for Hydrant Booster Pump and accessory	Set	1	0.000097
7.0	DG Set for opearting above Hydrant Booster Pump and accessory.	Set	1	0.0007275
8.0	Electric Motors (415V, 110KW, Unidirectional Starter) for Spray Booster Pump and accessory	Set	1	0.00012125
9.0	DG Set for opearting above Spray Booster Pump and accessory.	Set	2	0.001455
10.0	Control Panel for Fire Water Pumps	Set	1	0.00021825
11.0	Control Panel for Booster Pumps	Set	2	0.0004365
12.0	Deluge valve Control Panel and other similar types of control Panel	No	250	0.01288285
13.0	Cable laying and Termination of 2C-1.5 sq. mm armoured control cable	KM	8	0.000776
TOTAL				0.97140102

VOLUME-III PRICE SCHEDULE, REV-03 (PACAKGE-2)					
JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.					
TENDER NO: PSER:SCT:NKP-E1890:18					
SCH-3: SUPPLY PRICE					
SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 2 of SCH-1	
A	RUBBER MAT				
1.0	Supply of 6mm thick black chequered rubber mat of appropriate voltage class Size for laying in front of switchgears upto 3.3KV. (as required under IE Rule).	Pieces	250		0.01545941
B	DISPLAY BOARD				
1.0	Supply of Electric Shock Treatment Display board as per IE Rules, Laminated on hardboard material (size : 2.5 ft x 3.5 ft) and mounted on wooden frame) for switchgear rooms / substations	Pieces	200		0.00309188
2.0	Supply of 33KV/11 KV/3.3 KV/415V DANGER PLATE	Pieces	50		0.00025766
C	Supply of MS HOT DIP GALVANISED THREADED & HEXAGONAL HEAD CABLE GLAND ADAPTORS/GLAND HOLE PLUGS AS PER REQUIRED SIZE AND SHAPES	KG.	125		0.00064414
D	Supply of Moisture Sealing compounds for wall, floor, panel openings for all variants	Sq. Mtr.	450		0.00327376
E	CABLE GLANDS & LUGS				
E.1	Supply of DOUBLE COMPRESSION HEAVY DUTY CABLE GLANDS (Use upto 11KV level)				
	ABOVE (MM)	UP TO (MM)			
1.0	--	15	Nos.	25	0.00012883
2.0	15	18	Nos.	25	0.00015459
3.0	18	21	Nos.	25	0.00018036
4.0	21	24	Nos.	25	0.00020613
5.0	24	27	Nos.	25	0.00023189
6.0	27	30	Nos.	25	0.00025766
7.0	30	33	Nos.	25	0.00028342
8.0	33	36	Nos.	25	0.00030919
9.0	36	39	Nos.	25	0.00033495
10.0	39	42	Nos.	25	0.00036072
11.0	42	46	Nos.	25	0.00038649
12.0	46	50	Nos.	25	0.00041225
13.0	54	58	Nos.	25	0.00046378
14.0	58	62	Nos.	25	0.00046378
15.0	62	70	Nos.	25	0.00046378
16.0	70	78	Nos.	25	0.00051531

VOLUME-III PRICE SCHEDULE, REV-03 (PACAKGE-2)				
JOB: PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.				
TENDER NO: PSER:SCT:NKP-E1890:18				
SCH-3: SUPPLY PRICE				
SI No	ITEM DESCRIPTION	Unit	Quantity	Allocated %age for deriving the job value w.r.t. the Quoted price at Srl. No. 2 of SCH- 1
E.2	Supply of AL./CU. LUGS (HEAVY DUTY TYPE) - SOLDERLESS CRIMPING TYPE (Use upto 11KV level)			
1.0	4 sq mm	Nos.	25	0.00000273
2.0	6 sq mm	Nos.	25	0.00000515
3.0	10 sq mm	Nos.	25	0.00000515
4.0	16 sq mm	Nos.	25	0.00000667
5.0	25 sq mm	Nos.	25	0.00000788
6.0	35 sq mm	Nos.	25	0.00000788
7.0	50 sq mm	Nos.	25	0.00001303
8.0	70 sq mm	Nos.	25	0.00001303
9.0	95 sq mm	Nos.	25	0.00002061
10.0	120 sq mm	Nos.	25	0.00002577
11.0	150 sq mm	Nos.	25	0.00003092
12.0	185 sq mm	Nos.	25	0.00005153
13.0	240 sq mm	Nos.	25	0.00006457
14.0	300 sq mm	Nos.	25	0.00009033
15.0	400 sq mm	Nos.	25	0.00014186
16.0	630 sq mm	Nos.	25	0.00023189
TOTAL				0.02859898

**PACKAGE-1: Erection, Testing & Commissioning of Electrical System for Unit # 1 and Common System of 3x660 MW North
Karanpura STPP, Jharkhand.**

TENDER NO PSER:SCT:NKP-E1890:18 (TCN-03)

ANNEXURE-VI (A)

(PACKAGE-1)

DIMENSION/WEIGHT SCHEDULE OF VARIOUS MAJOR EQUIPMENTS

SI No	ITEM DESCRIPTION	Unit	Total Qty	TENTATIVE DIMENSIONS (Each)			TENTATIVE WIEGHT (each) (in MT)
				L (mm)	B (mm)	H (mm)	
1	<u>HT Switchgear</u>						
1.0	11 KV, 2500A UNIT SWITCHBOARD #1BA	NO.OF BOARDS	1	17820	2927	2600	
2.0	11 KV, 2500A UNIT SWITCHBOARD #1BB	NO.OF BOARDS	1	17820	2927	2600	
3.0	11 KV, 3500A STN SWITCHBOARD #OBA	NO.OF BOARDS	1	16980	2927	2600	
4.0	11 KV, 3500A STN SWITCHBOARD #OBB	NO.OF BOARDS	1	14520	2927	2600	
5.0	3.3 KV, 3150A UNIT AUX SWITCHBOARD #1CA	NO.OF BOARDS	1	24380	2927	2600	
6.0	3.3 KV, 1250A MISC SWITCHBOARD #OCC	NO.OF BOARDS	1	17820	2927	2600	
7.0	11 KV, CHP SWITCHBOARD #OBG	NO.OF BOARDS	1	18640	2927	2600	
8.0	11 KV, AHP SWITCHBOARD #OBH	NO.OF BOARDS	1	14540	2927	2600	
9.0	11 KV, MISC SWITCHBOARD	NO.OF BOARDS	1	12900	2927	2600	
10.0	3.3 KV, AHP SWITCHBOARD #OCA	NO.OF BOARDS	1	38320	2927	2600	
11.0	3.3 KV, INPLANT CHP SWITCHBOARD #OCB	NO.OF BOARDS	1	33400	2927	2600	
12.0	3.3 KV, MUP SWITCHBOARD	NO.OF BOARDS	1	10440	2927	2600	
13.0	3.3 KV, MINE END CHP SWITCHBOARD	NO.OF BOARDS	1	25420	2927	2600	
14.0	33 KV, MISC SWITCHBOARD	NO.OF BOARDS	1	20100	2927	2600	
15.0	33 KV, MINE END SWITCHBOARD	NO.OF BOARDS	1	14900	2927	2600	
16.0	3.3kV External CHP	NO.OF BOARDS	1	16180	2927	2600	
17.0	HT DATA CONCENTRATOR PANEL WITH ACCESSORIES	NO.	2	2000	800	800	
2	<u>LT SWBD AND DC DB</u>						
1.0	EMERGENCY MCC #1DG (3000A)	NO.OF BOARDS	1	18150	1000	2400	
2.0	BOILER SERVICE PMCC #1DA (3500A)	NO.OF BOARDS	1	20800	1000	2400	
3.0	BLR VALVE & DAMPER ACDB #1HA (250A)	NO.OF BOARDS	1	14650	1000	2400	
4.0	BOILER ACDB #1HB (400A)	NO.OF BOARDS	1	8550	1000	2400	
5.0	TURBINE SERVICE PMCC #1DB (3500A)	NO.OF BOARDS	1	20800	1000	2400	
6.0	SERVICE ACDB #1QA (600A)	NO.OF BOARDS	1	13350	1000	2400	
7.0	TURBINE VALVE DB #1KA (250A)	NO.OF BOARDS	1	20800	1000	2400	
8.0	STATION SERVICE PMCC #0DA (3500A)	NO.OF BOARDS	1	11800	1000	2400	
9.0	AIR CONDITIONING MCC #OTA (250A)	NO.OF BOARDS	1	7850	1000	2400	
10.0	VENTILATION MCC #1TA (1000A)	NO.OF BOARDS	1	11650	1000	2400	

**PACKAGE-1: Erection, Testing & Commissioning of Electrical System for Unit # 1 and Common System of 3x660 MW North
Karanpura STPP, Jharkhand.**

TENDER NO PSER:SCT:NKP-E1890:18 (TCN-03)

ANNEXURE-VI (A)

(PACKAGE-1)

DIMENSION/WEIGHT SCHEDULE OF VARIOUS MAJOR EQUIPMENTS

SI No	ITEM DESCRIPTION	Unit	Total Qty	TENTATIVE DIMENSIONS (Each)			TENTATIVE WIEGHT (each) (in MT)
				L (mm)	B (mm)	H (mm)	
11.0	MISC SERVICES MCC #0QA (400A)	NO.OF BOARDS	1	11400	1000	2400	
12.0	AIR WASHER MCC #0SA (800A)	NO.OF BOARDS	1	13350	1000	2400	
13.0	220V MAIN DCDB #1FA (1250A)	NO.OF BOARDS	1	14300	1000	2400	
14.0	ESP & ID FAN AREA MCC #1HD (250A)	NO.OF BOARDS	1	4750	1000	2400	
15.0	ESP AC & VENT MCC #1TB (400A)	NO.OF BOARDS	1	4750	1000	2400	
16.0	SERVICE BUILDING MCC#0SD (1600A)	NO.OF BOARDS	1	15000	1000	2400	
17.0	WATER SYSTEM PMCC #0DE (2500A)	NO.OF BOARDS	1	20000	1000	2400	
18.0	DM PLANT MCC #0WB (400A)	NO.OF BOARDS	1	15000	1000	2400	
19.0	CPU MCC #0WC (800A)	NO.OF BOARDS	1	15000	1000	2400	
20.0	FW WATER PMCC #0DH (1600A)	NO.OF BOARDS	1	15000	1000	2400	
21.0	PTP MCC #0WD (400A)	NO.OF BOARDS	1	15000	1000	2400	
22.0	ETP/STP MCC #0WE (600A)	NO.OF BOARDS	1	15000	1000	2400	
23.0	FUEL OIL SERVICE PMCC #0DF (3000A)	NO.OF BOARDS	1	20000	1000	2400	
24.0	AUX. BOILER MCC #0HA (600A)	NO.OF BOARDS	1	15000	1000	2400	
25.0	WORKSHOP MCC #0SF (600A)	NO.OF BOARDS	1	15000	1000	2400	
26.0	ADMIN PMCC #0DD (3000A)	NO.OF BOARDS	1	20000	1000	2400	
27.0	CT, CW TREATMENT PMCC #0DJ (3000A)	NO.OF BOARDS	1	20000	1000	2400	
28.0	HYDROGEN PLANT MCC#0SE (600A)	NO.OF BOARDS	1	15000	1000	2400	
29.0	SOOT BLOWER MCC	NO.OF BOARDS	1	15000	1000	2400	
30.0	415V ACDB (WALL MOUNTED)	NO.OF BOARDS	15	15000	1000	2400	
31.0	220V DCDB (WALL MOUNTED)	NO.OF BOARDS	4	15000	1000	2400	
32.0	ESP LT MAIN SWITCHBOARD	NO. OF BOARDS	8	12300	1000	2400	
33.0	ESP AUXILIARY CONTROL PANEL	NO. OF BOARDS	8	11750	1000	2400	
34.0	DIGITAL AUTOMATIC VOLTAGE REGULATOR BOARD (COMPRISING OF TRANSFORMER, REGULATION, THYRISTOR & FIELD SUPPRESSION CUBICLE - INCLUDING FITTINGS OF LOOSE ITEMS LIKE PC MONITOR AND OTHER ITEMS)	SET	1	4053	800	2295	
3.0	TRANSFORMERS						
	<u>OIL FILLED TRANSFORMERS</u>						
1.0	Generator Transformer (1 phase 265MVA, {(420/√3)/21KV}) alongwith all accessories complete	Sets	3	7300	4000	4500	185.7
2.0	Spare GT 1X1 Phase 200MVA, {(420/√3)/21KV}) alongwith all accessories complete	Sets	1	7300	4000	4500	185.7
3.0	Station Transformer (120/60/60 MVA, 400/11.5/11.5 kV, ONAN/ONAF) and all accessories complete	NOS	1	8000	4000	4500	130

**PACKAGE-1: Erection, Testing & Commissioning of Electrical System for Unit # 1 and Common System of 3x660 MW North
Karanpura STPP, Jharkhand.**

TENDER NO PSER:SCT:NKP-E1890:18 (TCN-03)

ANNEXURE-VI (A)

(PACKAGE-1)

DIMENSION/WEIGHT SCHEDULE OF VARIOUS MAJOR EQUIPMENTS

SI No	ITEM DESCRIPTION	Unit	Total Qty	TENTATIVE DIMENSIONS (Each)			TENTATIVE WIEGHT (each) (in MT)
				L (mm)	B (mm)	H (mm)	

ANNEXURE-VI(B)
(PACKAGE-2)

DIMENSION/WEIGHT SCHEDULE OF VARIOUS MAJOR EQUIPMENTS

SI No	ITEM DESCRIPTION	Unit	Total Qty	TENTATIVE DIMENSIONS (Each)			TENTATIVE WIEGHT (each) (in MT)
				L (mm)	B (mm)	H (mm)	
1.0	<u>HT Switchgear</u>						
1.0	11KV ,2500A,Unit Switch Board -2BA	NO.OF BOARDS	1	17820	2927	2600	
2.0	11KV ,2500A,Unit Switch Board -2BB	NO.OF BOARDS	1	17820	2927	2600	
3.0	11KV ,3500A, Station Switch Board -0BC	NO.OF BOARDS	1	18200	2927	2600	
4.0	11KV ,3500A, Station Switch Board -0BD	NO.OF BOARDS	1	16560	2927	2600	
5.0	11KV ,1250A,Switch Board -0BG	NO.OF BOARDS	1	18640	2927	2600	
6.0	11KV ,1000A, Switch Board -0BH	NO.OF BOARDS	1	14540	2927	2600	
7.0	3.3 KV, 3150A, UNIT - 2 SWITCHBOARD (2CA)	NO.OF BOARDS	1	22740	2927	2600	
8.0	3.3 KV, 2000A, UNIT-2 SWITCHBOARD (OCB)	NO.OF BOARDS	1	33400	2927	2600	
9.0	HT DATA CONCENTRATOR PANEL WITH ACCESSORIES	NO.	2	2000	800	800	
2.0	<u>LT SWBD AND DC DB</u>						
1.0	EMERGENCY MCC #2DG (3000A)	NO.OF BOARDS	1	22800	1000	2400	
2.0	BOILER SERVICE PMCC #2DA (3500A)	NO.OF BOARDS	1	21200	1000	2400	
3.0	BLR VALVE & DAMPER ACDB #2HA (250A)	NO.OF BOARDS	1	14650	1000	2400	
4.0	BOILER ACDB #2HB (400A)	NO.OF BOARDS	1	8550	1000	2400	
5.0	TURBINE SERVICE PMCC #2DB (3500A)	NO.OF BOARDS	1	14000	1000	2400	
6.0	SERVICE ACDB #2QA (600A)	NO.OF BOARDS	1	13350	1000	2400	
7.0	TURBINE VALVE DB #2KA (250A)	NO.OF BOARDS	1	20275	1000	2400	
8.0	STATION SERVICE PMCC #0DB (3500A)	NO.OF BOARDS	1	9150	1000	2400	
9.0	AIR CONDITIONING MCC #0TB (800A)	NO.OF BOARDS	1	15000	1000	2400	
10.0	VENTILATION MCC #2TA (1000A)	NO.OF BOARDS	1	11650	1000	2400	
11.0	MISC SERVICES MCC #0QB (400A)	NO.OF BOARDS	1	11900	1000	2400	
12.0	AIR WASHER CUM VENTILATION MCC #0SB (1600A)	NO.OF BOARDS	1	13550	1000	2400	
13.0	220V MAIN DCDB #2FA (1250A)	NO.OF BOARDS	1	15000	1000	2400	
14.0	ESP & ID FAN AREA MCC #2HD (250A)	NO.OF BOARDS	1	4750	1000	2400	
15.0	ESP AC & VENT MCC #2TB (400A)	NO.OF BOARDS	1	9750	1000	2400	
16.0	415V AC DBs (WALL MOUNTED)	NO.OF BOARDS	20	4053	800	2295	
17.0	220V DC DBs (WALL MOUNTED)	NO.OF BOARDS	6	15000	1000	2400	
18.0	SOOT BLOWER MCC	NO.OF BOARDS	1	15000	1000	2400	
19.0	415V ACDB (WALL MOUNTED)	NO.OF BOARDS	15	15000	1000	2400	

ANNEXURE-VI(B)
(PACKAGE-2)

DIMENSION/WEIGHT SCHEDULE OF VARIOUS MAJOR EQUIPMENTS

SI No	ITEM DESCRIPTION	Unit	Total Qty	TENTATIVE DIMENSIONS (Each)			TENTATIVE WIEGHT (each) (in MT)
				L (mm)	B (mm)	H (mm)	
20.0	220V DCDB (WALL MOUNTED)	NO.OF BOARDS	4	5310	2345	1000	
21.0	ESP LT MAIN SWITCHBOARD	NO. OF BOARDS	8	5190	2355	1000	
22.0	ESP SWITCH GEAR PANEL (17700mm L x 1700mm D X 2450mm H)	NO. OF PANELS	6	17700	2450	1700	
23.0	DIGITAL AUOTOMATIC VOLTAGE REGULATOR BOARD (COMPRISING OF TRANSFORMER, REGULATION, THYRISTOR & FIELD SUPPRESSION CUBICLE - INCLUDING FITTINGS OF LOOSE ITEMS LIKE PC MONITOR AND OTHER ITEMS)	SET	1	600	550	2000	
3.0	TRANSFORMERS						
	<u>OIL FILLED TRANSFORMERS</u>						
1.0	Generator Transformer (1 phase 265MVA, $\{(420/\sqrt{3})/21KV\}$ alongwith all accessories complete	Sets	3	7300	4000	4500	185.7
2.0	Spare GT 1X1 Phase 200MVA, $\{(420/\sqrt{3})/21KV\}$ alongwith all accessories complete	Sets	1	7300	4000	4500	185.7
3.0	Station Transformer (120/60/60 MVA, 400/11.5/11.5 kV, ONAN/ONAF) and all accessories complete	NOS	1	8000	4000	4500	130

FORMAT FOR NO DEVIATION CERTIFICATE
(To be submitted in the bidder's letter head)

BHARAT HEAVY ELECTRICALS LIMITED,
Power Sector - Eastern Region,
Plot no 9/1, DJ Block, Sector – II, Salt Lake City,
Kolkata – 700 091

Sub	No Deviation Certificate.	
Job	PACKAGE-1: Erection, Testing & Commissioning of Electrical System for Unit # 1 and Common System of 3x660 MW North Karanpura STPP, Jharkhand. PACKAGE-2: Erection, Testing & Commissioning of Electrical System for Unit # 2 of 3x660 MW North Karanpura STPP, Jharkhand.	
Ref	1.0	Tender no: PSER:SCT:NKP-E1890:18.
	2.0	BHEL's NIT, vide reference no: PSER:SCT:NKP-E1890:6609 Date: 16-03-2018.
	3.0	BHEL's TCN-01, vide reference no: PSER:SCT:NKP-E1890:18:TCN-01, Date: 23-03-2018.
	4.0	BHEL's TCN-02, vide reference no: PSER:SCT:NKP-E1890:18:TCN-02, Date: 27-03-2018.
	5.0	BHEL's TCN-03, vide reference no: PSER:SCT:NKP-E1890:18:TCN-03, Date: 03-04-2018.
	6.0	All other pertinent issues till date.

Dear Sirs,

With reference to above, this is to confirm that as per tender conditions, we have visited site before submission of our offer and noted the job content & site conditions etc. We also confirm that we have not changed/ modified the tender documents as appeared in the website/ issued by you and in case of such observance at any stage, it shall be treated as null and void.

We hereby confirm that we have not taken any deviation from tender clauses together with other references as enumerated in the above referred NIT. We hereby confirm our unqualified acceptance to all terms & conditions, unqualified compliance to technical specification, integrity pact (if applicable) and acceptance to reverse auctioning process.

In the event of observance of any deviation in any part of our offer at a later date whether implicit or explicit, the deviations shall stand null & void.

We confirm to have submitted offer in accordance with tender instructions and as per aforesaid references.

Thanking you,

Yours faithfully,

(Signature, date & seal of authorized
representative of the bidder)