

Annexture - 'B'**SCHEDULE OF QUANTITY (Electrical Portion)**

Name of Work : Repairing and Renovation of duty officer room at Regional Meteorological Centre Kolkata during 2026-27. SH: - Providing and fixing False Ceiling, Wall Paneling, Painting work and furniture work in duty officer room.

S N.	Description	Qty	Unit	Rate	Amount	Remarks
	Sub-Head-I (Wiring)					
1.1	Wiring for light point/ fan point/ exhaust fan point/ call bell point with 1.5 sq.mm FRLS/HFFR PVC insulated copper conductor single core cable in surface/ recessed steel conduit, with modular switch, modular plate, suitable GI box and earthing the point with 1.5 sq.mm. FRLS/HFFR PVC insulated copper conductor single core cable etc as required.					
a)	Group C	25.00	Point	2101.00	₹ 52,525.00	1.3.3
1.2	Wiring for circuit/ submain wiring along with earth wire with the following sizes of FRLS/HFFR PVC insulated copper conductor, single core cable in surface/ recessed steel conduit as required					
a)	2 X 1.5 sq. mm + 1 X 1.5 sq. mm earth wire	100.00	Metre	370.00	₹ 37,000.00	1.7.1
b)	4 X 10 sq. mm + 2 X 6 sq. mm earth wire	100.00	Metre	1253.00	₹ 1,25,300.00	1.7.10
1.3	Wiring for light/ power plug with 2X4 sq. mm FRLS/HFFR PVC insulated copper conductor single core cable in surface/ recessed steel conduit along with 1 No 4 sq. mm FRLS/HFFR PVC insulated copper conductor single core cable for loop earthing as required..	300.00	Metre	480.00	₹ 1,44,000.00	1.5
1.4	Wiring for light/ power plug with 4X4 sq. mm FRLS/HFFR PVC insulated copper conductor single core cable in surface/ recessed steel conduit along with 2 Nos 4 sq. mm FRLS/HFFR PVC insulated copper conductor single core cable for loop earthing as required..	200.00	Metre	724.00	₹ 1,44,800.00	1.6
1.5	Supplying and fixing suitable size GI box with modular plate and cover in front on surface or in recess, including providing and fixing 3 pin 5/6 amps modular socket outlet and 5/6 amps modular switch, connection etc. as required. (For light plugs to be used in non residential buildings)..	10.00	Each	545.00	₹ 5,450.00	1.31
1.6	Supplying and fixing suitable size GI box with modular plate and cover in front on surface or in recess, including providing and fixing 6 pin 5/6 A & 15/16 A modular socket outlet and 15/16 A modular switch, connections etc. as required.	32.00	Each	659.00	₹ 21,088.00	1.32
1.7	Supplying & fixing suitable size GI box with modular plate and cover in front on surface or in recess including providing and fixing 25 A modular socket outlet and 25 A modular SP MCB, "C" curve including connections, painting etc. as required.	6.00	Each	807.00	₹ 4,842.00	1.57
1.8	Supplying and fixing following modular switch/ socket on the existing modular plate & switch box including connections but excluding modular plate etc. as required.					
a)	Telephone socket outlet	2.00	Each	127.00	₹ 254.00	1.23.6
1.9	Supplying, Installation, Testing and commissioning of CAT6 Copper Information Outlet (IO) with face plate of color as per site requirement, should have ETL/UL verification program certificate for compliance with ANSI/TIA-568.2-D. All copper Cable and Components should be from same OEM to maintain compatibility and interoperability.	14.00	Each	212.00	₹ 2,968.00	39.14
1.10	Supplying and fixing following size/ modules, GI box along with modular base & cover plate for modular switches in recess etc as required.					
a)	1 or 2 Module (75mmX75mm)	14.00	Nos	354.00	₹ 4,956.00	1.27.1
1.11	Supplying and fixing of following sizes of steel conduit along with accessories in surface/recess including painting in case of surface conduit, or cutting the wall and making good the same in case of recessed conduit as required.					

S N.	Description	Qty	Unit	Rate	Amount	Remarks
a)	20 mm	100.00	Meter	254.00	₹ 25,400.00	1.20.1
b)	25 mm	150.00	Meter	289.00	₹ 43,350.00	1.20.2
1.12	Supplying and fixing modular blanking plate on the existing modular plate & switch box excluding modular plate as required.	6.00	No	47.00	₹ 282.00	1.26
1.13	Supplying, drawing, Installation, Testing and commissioning of CAT6 UTP LSZH 23AWG Twisted Pair Cable in existing conduit/ on surface, Category 6 Unshielded Twisted Pair, 4 pair should be complied as per UL/ETL verification program for compliance with ANSI/TIA-568.2-D standard. Outer diameter should be in the range of 6.1mm nominal with Operating Temperature Range : -5° to +60°C. Bending Radius: < 4 X Cable Diameter at -5°C ± 1°C and Pulling Force : 11.5 Kg					
a)	1 Run of cable	400.00	Meter	60.00	₹ 24,000.00	39.17.1
1.14	Supplying and fixing of following sizes of G.I. Raceway / trunking cable management system i/c all other accessories i.e. end cap, bracket, riser, coupler etc, on surface/ in recess including cutting the wall/ Floor and making good the same in case of recess as required.					
a)	75 mm x 25 mm	10.00	Meter	1592.00	₹ 15,920.00	MR
1.15	Supplying and fixing of following sizes height adjustable Junction box with fly over for above GI Raceway etc as required.	1.00	No	5216.00	₹ 5,216.00	MR
2	SH-II (MCCB, MCB & DB'S)					
2.1	Supplying and fixing following way, horizontal type three pole and neutral, sheet steel, MCB distribution board, 415 volts, on surface/ recess, complete with tinned copper bus bar, neutral bus bar, earth bar, din bar, interconnections, powder painted including earthing etc. as required. (But without MCB/RCCB/Isolator)					
a)	6 way (4 + 18), Double door	1.00	No	5299.00	₹ 5,299.00	2.4.2
b)	8 way (4 + 24), Double door	1.00	No	6337.00	₹ 6,337.00	2.4.3
2.2	Supplying and fixing 5 amps to 32 amps rating, 240/415 volts, "C" curve, miniature circuit breaker suitable for inductive load of following poles in the existing MCB DB complete with connections, testing and commissioning etc. as required.					
a)	Single pole	42.00	No	285.00	₹ 11,970.00	2.10.1
2.3	Supplying and fixing following rating, four pole, 415 volts, 'C' Curve MCB in the existing MCB DB complete with connections, testing and commissioning etc. as required.					
a)	63A FP MCB	2.00	No	3797.00	₹ 7,594.00	MR

S N.	Description	Qty	Unit	Rate	Amount	Remarks
2.4	Supply and Fixing of Timer DB for setting the time of AC operations which i/c 12 way SPN DB, 40 Amp DP MCB, 32 Amp Contactor 240 Volt, Time Switch, Indicating Lamp, Toggle Switch etc. complete with connections, testing, commissioning etc. as required.	1.00	No	22090.00	₹ 22,090.00	MR
2.5	Supplying and fixing of following ways surface/ recess mounting, vertical type, 415 volts, TPN MCB distribution board of sheet steel, dust protected, duly powder painted, inclusive of 200 amps tinned copper bus bar, common neutral link, earth bar, din bar for mounting MCB's (but without MCB's and incomer) as required . (Note : Vertical type MCB TPDB is normally used where 3 phase outlets are required.)					
a)	4 way (4 + 12), Double door	1.00	No	7951.00	₹ 7,951.00	2.5.1
3	SH-III (Fittings & Accessories)					
3.1	LED Panel light 2x2 ft. (System lumen efficacy $\geq 105 < 120$ lm/Watt) Supplying, installation, Testing & Commissioning of Panel light 2x2 ft., of following body material and construction as per IS: 10322 with driver as per the requirement with Driver efficiency $> 85\%$, Operating voltage AC 140-270 Volt, freq 50/60 hz, Operating temp range -5 deg to 40 deg centigrade, internal surge protection of 2.5 KV with Short & Open circuit protection, THD $< 10\%$, P. F. ≥ 0.95 , IP20, CRI ≥ 80 , UGR (Unified Glare Rating) < 19 , Flicker free, (flicker should be below 5 %), life time (LED, Driver & electrical circuitry), of minimum 50000 Burning Hours with, 70% of initial Lumen maintained till life ends as per LM80 extrapolation IES TM-21-11 report, CCT 3000°K / 4000°K/ 5700°K /6500°K (As per ANSI Bin), SDCM (Standard Deviation Colour Matching) < 3 , Maximum power consumption should not more than the specified rating and Fixture shall be of relevant BIS standard and trade mark certificate (T.C). Manufactures Word Mark/ Name Engraved/ Embossing/ Screen printing on housing. complete in all respect i/c external connections with 1.5 sq. mm FRLS/HFFR, PVC insulated copper conductor single core cable and earthing etc. as required with Minimum 5 year OEM warranty. System lumen efficacy $\geq 105 < 120$ lm/Watt output. LM79 & LM80 Test report and all testing required for LED fixtures as per BIS shall be submitted. Shape size and CCT shall be as approved by Engineer-in-Charge as per requirement. (Thermal management: heat sink of aluminium housing such that LED junction temperature shall not rise above 90°C).					
	Powder Coated CRCA Sheet Body (Thickness > 0.50 mm)					
a)	36 watt	9.00	Each	2059.00	₹ 18,531.00	8.6.10
3.2	Supply, Installation, Testing and commissioning of 400mm sweep Wall fan including connection and interconnections etc, and suitable to work on 230Volts single phase, 50Hz, AC supply etc. complete as required.					
a)	1200mm, service value ≥ 6.0 CM/Min/Watt, air delivery 210 CM/Min (Minimum)	10.00	Each	3806.00	₹ 38,060.00	MR

S N.	Description	Qty	Unit	Rate	Amount	Remarks
3.3	LED Down lighter (SMD Type) (System lumen efficacy $\geq 105 < 120$ lm/Watt) Supplying, installation, Testing & Commissioning of LED Recessed/ surface Down lighter (Round/ square/ Rectangular) SMD type of following body material with PMMA and prismatic diffuser and construction as per IS: 10322 with driver as per the requirement with Driver efficiency $>85\%$, Operating voltage AC 140-270 Volt, frequency 50/60 hz, Operating temp range -5 deg to 40 deg centigrade, internal surge protection of 2.5 KV with Short & Open circuit protection, THD $< 10\%$, P.F. ≥ 0.95 , IP20, CRI ≥ 80 , UGR (Unified Glare Rating) < 19 , Flicker free (flicker should be below 5%), life time (LED, Driver & electrical circuitry), of minimum 50000 Burning Hours with 70% of initial Lumen maintained till life ends, CCT 3000°K / 4000°K / 5700°K / 6500°K (As per ANSI Bin), SDCM (Standard Deviation Colour Matching) < 3 , Maximum power consumption should not more than the specified rating and Fixture shall be confirming to relevant BIS standards and trade mark certificate (T.C.). Manufactures Word Mark/ Name Engraved/ Embossing/ Screen printing on housing Complete in all respect i/c external connections with 1.5 sq. mm FRLS/HFFR, PVC insulated copper conductor single core cable and earthing etc. as required with Minimum 5 year OEM warranty. System lumen efficacy $\geq 105 < 120$ lm/Watt output. LM79 & LM80 Test report and all testing required for LED fixtures as per BIS shall be submitted. Shape size and CCT shall be as approved by Engineer-in-Charge as per requirement. (Thermal management: heat sink of aluminium housing such that LED junction temperature shall not rise above 90°C).					
	Powder coated die cast/ Extruded aluminium Body including trim					
a)	12 -15 watt	6.00	Each	715.00	₹ 4,290.00	8.1.3

S N.	Description	Qty	Unit	Rate	Amount	Remarks
4	SH-IV (CASSETTE TYPE SPLIT UNITS AC)					
4.1	Supplying, Installation, Testing and Commissioning of Air Cooled Cassette type Air conditioners complete with Indoor unit(IDU), Out door unit (ODU), R-32 Green Refrigerant, wireless Remote, inbuilt drain pump, suitable for 400/230V, 50 Hz, 1 /3 phase AC supply, the system shall be capable of performing cooling, dehumidification, Air circulation, filtration & ventilation of following capacity with Scroll/twin rotary compressor with min 1 year Complete machine and another 4 year warranty on both compressor and Printed Circuit Board (PCB) as specified. The system shall be able to deliver 100% of the rated capacity as per relevant IS Code. The lab testing reports as per IS: 1391 shall be submitted from National Accreditation Board for Testing and Calibration Laboratories (NABL) accredited as per International Electrotechnical Commission (IEC) 17025 standards/Central Power Research Institute (CPRI)/Electrical Research and Development Association (ERDA)with Original Equipment Manufacturer (OEM) etc. complete as per CPWD specification and as per IS: 1391 as required.					
a)	2.0 TR with 4 Star BEE Rating	6.00	Nos	89306.00	₹ 5,35,836.00	MR
4.2	Supplying & laying of 4 core X 2.5 Sq.m FRLS flexible PVC sheathed PVC insulated copper conductor cable I.S.I marked in 25 mm dia medium class PVC conduit for power connection from indoor to outdoor unit etc. with all accessories etc. complete as reqd.	150.00	Mtrs	333.00	₹ 49,950.00	A.S 05/ESD-II/26-27
4.3	Supply, Installation, testing and commissioning including vaccumiazation and Nitrogen testing of following nominal sizes of soft drawn copper refrigerant piping, complete with fittings, with suitable adjustable ring type hanger supports, jointing/brazing including accessories, insulated with XPLE Class-O tubular insulation/with Class-O closed cell elastomeric nitrile rubber tubular sleeves sections of 19 mm thick insulation as given below for Suction and Liquid lines, all accessories as per specifications etc. as required :					
a)	3/8" dia (OD) (Soft drawn)	75.00	Mtrs	416.00	₹ 31,200.00	MR
b)	5/8" dia (OD) (Soft drawn)	75.00	Mtrs	815.00	₹ 61,125.00	MR
4.4	Supply, Installation,Testing and Commissioning of UPVC pipes complete with coupler, elbow, tee etc. all type of fittings, supports as per specification and duly insulated with "Class O" closed cell nitrile rubber/XLPE insulation complete etc. as reqd.					
a)	25 mm dia	20.00	Mtrs	71.00	₹ 1,420.00	A.S 05/ESD-II/26-27
b)	32 mm dia	100.00	Mtrs	100.00	₹ 10,000.00	A.S 05/ESD-II/26-27
4.5	Supply & Installation of Hevy duty 'L' Shape ODU Bracket for resting the ODU of AC unit complete etc. as required	6.00	Mtrs	2263.00	₹ 13,578.00	MR
Total					₹ 14,82,582.00	

Executive Engineer
KCD-IV,CPWD,Kol-20