

**BOQ OF ELECTRICAL WORKS TO BE CARRY OUT IN THE PREMISES OF USGAON  
BRANCH RO NORTH MUMBAI**

S.No	Description	Qty	Unit	Rate	Amount
<b>1</b>	<b>Main Panel &amp; D.B.</b>				
<b>A</b>	S & I of 125A, MCCB in sheet metal enclosure for main switch at meter cabin complete in all respects.	1	No		
<b>B</b>	<b>Main Panel:</b>				
	Supply and installation of main LT panel, wall mounted front operated totally enclosed vermin proof, indoor non-drawout-cubicle type power panel fabricated out of 2mm thk CRCA sheet having gasketed hinged cover on each cubicle fully powder coated after 7 Tank treatment, incorporating horizontal and vertical sleeved copper busbars, complete with all internal wiring, danger board, 2 earthing legs, cable chamber etc as required, housing below mentioned switch gears / meter ( GA drawing of the panel got to be approved by Bank / Architect)				
	<b>a) INCOMMER :</b>				
	100A,TPN MCCB with 25KA breaking capacity - 1 No. with meter indicater including RYB indicater lamps.				
	<b>b) OUTGOING :</b>				
	63A TPN MCB - 1 No. for lighting / RAW Power				
	63A TPN MCB - 1 No. for ATM				
	63A TPN MCB - 1 No. for UPS Power				
	32A SP MCB - 1 No. for Glow sign board				
	63A TPN MCB - 1 No. for AC				
	1Set, TPN, Copper busbars of size 25mm x 5mm thk PVC insulated suitable for 100 Amp load				
	1 no., 0-150A, Ammeter with CTand selector switch				
	1no., 0-500V, Voltmeter with selector switch and fuse				
	1 Set of LED- R, Y, B, indicating lamps with resistors and fuses				
	full set as above	1	Set		
<b>C</b>	<b>DB BOX</b>				
<b>i</b>	Suply and installation of <b>AC power Distribution Board</b> (double door) flush mounted on wall, sheet metal fabricated, powder coated, having dust-proof and vermin 'proof, gasketed and hinged door with all internals such as DIN rails, neutral. <b>INPUT-</b> 63A TPN MCB , <b>OUTPUT</b> - 16/20A SP MCB 6 NOS FOR SPLIT AC.	1	Set		
<b>II</b>	Suply and installation of <b>Lighting/Raw power Distribution Board</b> (double door) flush mounted on wall, sheet metal fabricated, powder coated, having dust-proof and vermin 'proof, gasketed and hinged door with all internals such as DIN rails, neutral.				
	1 no., 40A, TPN, MCB(100mA) incomer				
	10/16/20/25A SP MCB - 12 Nos for lighting/RAW POWER				
	Full Set as above	2	Set		
	<b>UPS MAIN PANEL</b>				

III	Supply and installation of <b>UPS MAIN DB</b> flush mounted on wall, sheet metal fabricated, powder coated, having dust-proof and vermin 'proof, gasketed and hinged door with all internals such as DIN rails, neutral. <b>INPUT- 63A TPN MCB</b> , <b>OUTPUT - 40A TPN MCB - 2 NOS</b> (For UPS)	1	Nos		
IV	S & I of 1 NO 40 A DP MCB, housed in sheet metal powder coated box for giving output supply of UPS	2	Nos		
V	S & I of 63 A TPN MCB, housed in sheet metal powder coated box	1	Nos		
VI	Supply and installation of SP&N 'MCB type <b>UPS Distribution Box</b> (double door) flush mounted on wall, sheet metal fabricated, powder coated, having dust-proof and vermin 'proof, gasketed and hinged door with all internals such as DIN rails, neutral.				
	Incomer :				
	40A DP MCB - 1 No				
	Outgoing:				
	10 A SP MCB -7 Nos				
	Full Set as above	1	Nos		
VII	Supply and installation of <b>ATM Distribution Box</b> (double door) flush mounted on wall, sheet metal fabricated, powder coated, having dust-proof and vermin 'proof, gasketed and hinged door with all internals such as DIN rails, neutral.				
	Incomer :				
	63A TPN MCB - 1 No				
	Outgoing:				
	10 A/16 A SP MCB -6 Nos				
	Full Set as above	1	Set		
D	Supply and installation of 30 KVAR <b>Microprocessor controlled APFC panel</b> , floor/wall mounted front operated totally enclosed vermin proof, indoor non-drawout-cubicle type power panel fabricated out of 2mm thk CRCA sheet having gasketed hinged cover on each cubicle fully powder coated with following accessories				
	1No.125A,TP, MCCB as incomer				
	2 nos. of 40A 3P contactor & 2 no. 25A 3P contactor				
	2 nos. 40A MCB & 2 no. 25A MCB				
	1 no 7.5 KVAR , 5 KVAR & 1 nos of 2.2 KVAR Capacitor of EPCOS				
	Suitable bus bar for connecting the contactors and MCB's, Capacitors				
	1 no. 4 step APFC relay suitable for above arrangement				
	ON/OFF/TRIP push button for each capacitor				
	ON/OFF/TRIP indication lamp for each capacitor				
	1 Set, RYB, indicating LED lamps with resistors and fuses for incomer.				
	Full Set as above	1	SET		
E	S&I TESTING AND COMMISSIONING <b>AC TIMER SWITCH</b> FOR IN ATM	1	NO		
2	<b>CABELS / MAINS/WIRES</b>				

	S & I of 1100V grade armoured cables/Flexible Wires <b>(FRLS)</b> having sector / circular shaped aluminium / copper conductor PVC insulated cores, laid up, PVC tape wrapped inner sheathed, GI strip / wire armoured and overall extruded PVC sheathed conforming to IS: 1554, laid on Wall /Ceiling etc. complete in all respects. The rate also to include providing identification tags, at each end of the cable ( the identification tag shall mention the size of the cable and the names of panels on either ends). The rate to include testing & commissioning.				
<b>a</b>	3.5C x 50 sqmm Al armoured cable with bare 8 SWG G.I earth wire ( Meter room to Main Panel)	15	Rmt		
<b>c</b>	3.5C x 6 Sq.mm Copper cable with bare 12 SWG G.I earth wire (From Panel to LDBs,UPS,)	45	Rmt		
<b>d</b>	2 runs of 4.0 Sq.mm and 1 run of 1.5 sqmm PVC insulated flexible multistrand Cu wire	45	Rmt		
<b>e</b>	Supply & wiring with mutli strand copper wire of 4 runs- 6sqmm, 1 run- 2.5sqmm through 1" PVC pipe fixed to the wall as per the site condition for the UPSs I/P etc	25	Rmt		
<b>f</b>	3.5C x 4.0 Sq.mm Copper cable with bare 12 SWG G.I earth wire (For AC Units)	75	Rmt		
<b>g</b>	<b>Termination of the above cables with Heavy duty cu lugs &amp; Brasscable lands</b>				
<b>i</b>	3.5 C x 50 sqmm	2	Nos		
<b>ii</b>	3.5 C x 25 sqmm	2	Nos		
<b>iii</b>	3.5 C x 6 sqmm	2	Nos		
<b>iv</b>	3.5C x 4 sqmm	6	Nos		
<b>v</b>	3 C x 6 sqmm	0	Nos		
<b>vi</b>	3 C x 2.5 sqmm	0	Nos		
<b>3</b>	<b>LIGHT /FAN POINT WIRING</b>				
<b>3.1</b>	Supply & Installation of Light/Fan <b>point wiring</b> with 3 x 1.5 Sqmm wire & <b>Circuit Wiring</b> of 1100v grade 2 x 2.5 sqmm & 1 x 1.5 sqmm copper conductor PVC insulated wires (with proper R,Y,B color code ) pulled through heavy gauge PVC conduits laid concealed over false ceiling or in wall chases including circuit wires. Rate shall include Supply & installation of Modular Switch Boards, Modular Switches/scokets, boxes, plates and all realted accessorie. <b>(Rate to include supply &amp; installation of PVC conduits of required size) 6 Lights in one circuit, 4 Raw /Fan point in one circuit)</b>				
<b>a</b>	Primary light Points	14	Pts		
<b>b</b>	Primary Fan points with 5 A socket installed on walls	8	Pts		
<b>c</b>	Secondary light points looped from the above point	20	Pts		
<b>d</b>	Secondary 5A Plug point on switch board	6	Pts		
<b>e</b>	Exhaust fan point consisting of 5A socket near fan and switch on light switch board	3	Pts		

f	<b>Power point wiring</b> : Supply, installation, testing & commissioning of power point wiring from D.B.s to power points with 2 No.4sq.mm. PVC insulated FRLS copper wires (with proper R,Y,B color code ) pulled through heavy gauge PVC conduits laid concealed over false ceiling or in wall chases including circuit wires. Rate shall include Supply & installation of Modular Switch Boards, Modular Switches/scokeys, boxes, plates and all related accessorie. (Rate to include supply & installation of PVC conduits of required size generally as per the drawing. for hotplate/geyser / zerox / fridge (With Circuit wiring specifications)	6	Pts		
g	<b>A.C. point wiring:</b> Supply, installation, testing & commissioning of A.C. point wiring from MCB DB to A.C. point with <b>2 nos. 4 sq.mm. PVC insulated copper earth FRLS copper wire and 1 no. 2.5sq.mm. PVC insulated FRLS wire</b> (with proper R,Y,B color code ) pulled through heavy gauge PVC conduits laid concealed over false ceiling or in wall chases including circuit wires. Rate shall include Supply & installation of <b>1 No of 25A industrial socket and plug top &amp; controlling MCB</b> and all related accessorie. (Rate to include supply & installation of PVC conduits of required size generally as per the drawing. (With Circuit wiring specifications)	3	Pts		
3.2	S & I of point wiring for UPS power plug points (with 1-16A switch and 3 sockets on modular switch box) on workstations / table for computers using Circuit Wiring of 2x 4 Sqmm & 1 x 2.5 Sqmm flexible copper wire and point wiring with 3 X 2.5 Sqmm flexible copper wire, pulled through already laid floor raceways and taken upto table top using PVC rigid or flexible pipes. Complete in all respects. <b>(Rate to include supply &amp; installation of PVC conduits of required size)</b>	4	Pts		
3.3	S & I of points similar to above but to be used as Raw power point on the tables consisting of one 5/15A socket with switch of other color and flexible cable of black color & circuit taken from Lighting DB ( 4 tables served by one circuit from LDB/PDB) <b>(Rate to include supply &amp; installation of PVC conduits of required size)</b>	7	Pts		
4	<b>LIGHTING FIXTURES(Philips/Wipro)/FANS</b>				
	S & I of lighting fixtures as per the details givenbelow including necessary hardware such as , clamps,nuts, bolts, nails, screws and suspension echains as required for fixing the fixtures in position as per approved manufacturers list				

4.1	<b>600 X 600 LED LIGHT FITTING</b> SITC of 36 W LED light fixture Philips Green Square 1 or Wipro CRESS LM 11 or SYSKA or As Selected By Bank (Catalog No - RC140B LED29S-6500 PSEWH OR EQUIVALENT)	7	Nos.		
4.2	<b>LED LIGHT FITTING - Down lighter</b> SITC of Philips/ wipro or SYSKA make Green LED down lighter fitting (Catalog No - BBS170 1xDLED-5000 PSUWH OR EQUIVALENT)	12	Nos		
4.3	<b>GREEN LED SQUARE LIGHT FITTING : SITC</b> of Philips or SYSKA make Green LED down lighter fitting (Catalog No - BBS175 1xDLED-5000 PSUWH OR EQUIVALENT)	2	Nos		
4.4	1 X 36/18W Miroalta Patti Tubelight having white end caps & 4Mfd capacitor with lamp	8	Nos		
4.5	250 mm dia wall mounted exhaust fan of decorative plastic body and blade with louvers on the outside (Newtek/Cromton/Approved Equivalent)	3	Nos		
4.6	1200 mm diameter Ceiling fans with regulator	1	Nos.		
4.7	400 mm diameter wall mounted fans with inbuilt regulator with rope (Metallic body only-Crompton, Havells, bajaj)	3	Nos		
4.8	Warmwhite LED Strip Light with Driver	25	Mtrs.		
5	<b>EARTHING</b>				
5.1	S & I of earth pit comprising of 600mm x 600mm x 3mm. thick copper plate buried at a minimum depth of 2.5 meter including necessary materials like charcoal,salt etc as required conforming to BIS standards having brick masonry chamber with hinged cover.	1	Nos.		
	<b>S &amp; I of copper /GI earthing wires/strips with PVC Sleeve in following sizes</b>				
5.2	25mm x 3mm thick GI strip	20	Mtrs		
5.3	S/I/T/Commissioning of 1 No. of 10 Sq.mm. single core PVC flexible copper wire for UPS in 25mm PVC conduit with all required accessories etc.	25	Mtrs		
5.4	S & I of Main bus for isolated earth comprising of 200mm x 40mm x 6mm th copper bar fixed on insulated support and having 20 nos of holes and nut bolts studs for clamping the earth leads,all contained in MS/PVCbox of size 300mm x 200mm x 50mm deep.	1	Set		
6.0	<b>WIRING FOR DATA AND VOICE OUTLETS</b>				
6.1	Providing and laying Cat 6 cable (Make : D-link) for data in PVC conduits and providing & terminating with RJ-45 pin (Krone make) with face plates / I/O Ports in suitable modular / MS box from server / EPABX room to individual work stations and term. <b>(Rate to include supply &amp; installation of PVC conduits of required size)</b>				
a	RJ-45 for data points	6	point		

6.2	Providing and laying Cat 5 cable (Make: D-Link) for voice in existing conduits for voice and providing & terminating with RJ-11 pin (Krone make) with face plates / I/O Ports in suitable modular / MS box from server / EPABX room to individual work stations. <b>(Rate to include supply &amp; installation of PVC conduits of required size)</b>				
a	1 No RJ-11 for Voice	6	point		
b	1 set with 2 Nos of RJ-11 socket point in manager cabin	1	point		
6.3	Providing, laying and connecting armoured PVC insulated copper telephone jelly cable of following sizes including termination in approved manner.				
a	20-pair	50	mtr.		
6.4	Providing and fixing of telephone tag block (Krone) of following sizes housed in GI box with cover of suitable size including termination				
a	20 pair	2	No.		
6.5	Supply & instal CAT 6 factory crimped patch cables 1 mtr	6	Nos		
6.6	Supply & instalCAT 6 factory crimped patch cables 2 mtr	6	Nos		
6.7	Supplying & Fixing 24 port Patch Panel	1	No		
6.8	Supplying & Fixing 24 port Net work Switch	1	No		
6.9	Suppluing & Fixing 12U Rack	0	No		
6.1	Shifting and fixing of Rack with accessories	1	No		
7	<b>FLOOR JUNCTION BOXES</b>				
	Supply & Installation of Floor Junction boxes with 2mm thick removable cover plate for the above raceways				
7.1	300mm x 300mm x 50mm GI Junction Box	2	nos		
7.2	200mm x 200mm x 50mm GI Junction Box	6	nos		
7.3	25sqmm PVC conduit pipe	75	mtrs		
<b>GRAND TOTAL Rs. (GST Extra)</b>					