



सत्यमेव जयते

GOVERNMENT OF INDIA
CENTRAL PUBLIC WORKS DEPARTMENT

DELHI SCHEDULE OF RATES

(E & M)

2013



PUBLISHED
By
DIRECTOR GENERAL, CPWD, NEW DELHI



**GOVERNMENT OF INDIA
CENTRAL PUBLIC WORKS DEPARTMENT**

**DELHI SCHEDULE OF RATES
(E & M)**

2013



**PUBLISHED
By
DIRECTOR GENERAL, CPWD, NEW DELHI**

वी. के. गुप्ता
महानिदेशक
V. K. Gupta
Director General



केन्द्रीय लोक निर्माण विभाग
निर्माण भवन, नई दिल्ली-110011
Central Public Works Department
Nirman Bhawan, New Delhi-110011
Tel.:23062556/1317, Fax : 23061884
E-Mail: cpwd_dgw@nic.in

FOREWORD

This Delhi Schedule of Rates (E&M) 2013 is a comprehensive document for the execution of Electrical Works and is useful not only to the Engineers of the CPWD but also to those of other Government Departments and Undertakings which follow the CPWD Schedule of Rates in their works.

The Schedule of Rates for Electrical Works was first compiled in 1935 followed by number of revisions from time to time in order to bring it in line with the prevailing technology and market rate. In previous years the Schedule of Rates for Electrical Works were published in two parts (Part-I Internal & Part-II External) till 2007.

The last Schedule of Rates for Electrical Works were published in 2012. Now Schedule of Rates for Electrical Works is named as Delhi Schedule of Rates (E&M) 2013 as it incorporates items for HVAC Works of plumbing, ducting and AHU also. The Schedule of Rates has now been revised to take care of not only the increased cost on account of revised labour and material rates but also the technological changes and improvements since the last revision. A new chapter-15 lighting control has been incorporated in this DSR for adding green features in the building. Accordingly, this Delhi Schedule of Rates (E&M) 2013 has been prepared.

I acknowledge the hard work put in by Sh. S.S.Garg, SE(E) TLQA and Sh. R.R. Meena EE(E) TAS under the guidance of Sh. R.K. Singhal, Spl. DG (NR) and Sh.C.K. Varma,CE(E)CSQ without which the revision would not have been possible. I also acknowledge the valuable suggestions of other members of specification committee as well as all those involved in the process of revision and finalisation of Delhi Schedule of Rates (E&M) 2013.

I am sure that this Schedule of Rates will be useful to all concerned.

PLACE : NEW DELHI
DATE : July ' 2013

(V.K.Gupta)
Director General , CPWD



राकेश कुमार सिंघल
विशेष महानिदेशक (उत्तरी क्षेत्र)
RAKESH KUMAR SINGHAL
SPECIAL DIRECTOR GENERAL (NR)



केन्द्रीय लोक निर्माण विभाग
सेवा भवन, नई दिल्ली - 110066
CENTRAL PUBLIC WORKS DEPARTMENT
SEWA BHAWAN, NEW DELHI-110066
Phone : 26166507, 26166891
Fax : 011-26175189 • Email : sdgnr.cpwd@nic.in

PREFACE

The Delhi Schedule of Rates (E&M) 2013 is the revised edition of Delhi Schedule of Rates (Electrical) 2012 and combines Schedule of Rates for Electrical Works Part-I Internal, Part –II External and Schedule of Rates for items relating to plumbing , ducting and AHU of HVAC works.

Under chapter 1– wiring , FRLS wires in place of FR wires have been adopted due to the superior fire properties. New items like CAT 6 cable in chapter-1, 4 pole MCCB's in chapter-2 and sandwich type rising mains in chapter-3 have also been added.

A new chapter on lighting control has been added as chapter 15 in which items for occupancy sensor , daylight sensor and astronomical time switches have been added.

In this DSR under chapter 16 items of low side of HVAC works have been considered for the first time. The items included here are chilled water pipes , condenser water pipes, insulation on existing pipes, valves, ducting, insulation, acoustic lining, grills and diffusers etc. The items for chilled water pipes insulation have been conceived with three types of insulation namely resin bonded fibre glass, expanded polystyrene and nitrile rubber. However, AHUs have also been added here to facilitate detailed estimation of HVAC.

This Schedule of Rates is based on the study of current market rates of materials at Delhi collected during May-June 2013 and labour rates are the current minimum wages issued by the Government of Delhi w.e.f. 01-04-2013.

This Schedule of Rates will be read along with relevant CPWD Specifications for Electrical Works. The Delhi schedule of Rates (E&M) 2013 now replaces the Delhi Schedule of Rates (Electrical) 2012 .

Errors, omissions and / or suggestions for improvement, if any, may kindly be brought to the notice of the Superintending Engineer (E) TAS in the office of the Chief Engineer (E) CSQ, CPWD, Vidyut Bhawan, New Delhi -110001 (Telephone No. 011-23413837 & 011-23411136).

PLACE : NEW DELHI
DATE : July ' 2013


(R.K.SINGHAL)
SPL DG(NR),CPWD
CHAIRMAN SPECIFICATION COMMITTEE

MEMBERS OF SPECIFICATION COMMITTEE FOR E&M WORKS

1.	Shri R.K.Singhal Spl. DG (NR)	Chairman of the Committee
2.	Sh. S. Khan ADG PWD , NCTD , Delhi	Member
3.	Sh. Mukesh Vij, CE(E) IBBFLZ, Siliguri	Special Invitee
4.	Sh. P.K Garg, CE(NDZ-VI)	Member
5.	Sh. Pyare Lal, CE(E) BFLZ	Member
6.	Sh. Prabhakar Singh, CE(NDZ-I)	Member
7.	Sh. A.S. Arora, CE(E) Trg.	Member
8.	Sh. S.K.Chawla, C.E.(E) PWEZ	Member
9.	Sh. A.K. Ahuja CPM, IIM Manesar	Member
10.	Sh. Gurvindar Singh C.E.(NDZ-VII)	Member
11.	Sh. C.K. Varma C.E.(E) CSQ	Member
12.	Sh. Surender Singh, DDG(Pers)	Member
13.	Chief Technical Examiner	Member
14.	Chief Architect (NDR)	Member
15.	Sh. M.K. Verma S.E.(E)	Member
16.	Sh. J.M. Paswan S.E.(E)	Member
17.	Sh. Mathura Prasad S.E.(TAS)	Member
18.	Sh. Harish Kumar S.E.Vig.	Special Invitee
19.	Sh. Vimal Kumar S.E.(E) PWD , NCTD	Special Invitee
20.	Sh. Rajeev Kumar Sao SE(E) Chandigarh	Special Invitee
21.	Sh. N.K. Bansal S.E.(E) DCEC VI	Special Invitee
22.	Sh. S.S. Garg SE (E)TAS	Member Secretary

CONTENTS

S.N.	NAME OF CHAPTER/ SUBHEAD	PAGE NO.
0	GENERAL NOTE	ix
1	WIRING	1
2	MCCB, MCB & DB'S	9
3	RISING MAINS & BUS TRUNKING	14
4	CABLE TRAYS	19
5	EARTHING	22
6	LIGHTNING CONDUCTOR	24
7	MV CABLE LAYING	25
8	HT CABLE LAYING	27
9	MV CABLE JOINTING & END TERMINATION	29
10	HV CABLE JOINTING & END TERMINATION	33
11	POLE ERECTION	35
12	MV OVER HEAD LINE WORK	36
13	HV OVER HEAD LINE WORK	40
14	CIVIL ITEMS	43
15	LIGHTING CONTROL	45
16	HVAC(ONLY PLUMBING,DUCTING &AHU)	46
17	Appendix-I LABOUR RATE	56
18	Appendix-II BASIC MATERIAL RATE	57

0 - GENERAL NOTE

The Schedule of Rate(E&M)-2013 has been prepared on the following.

1. The items of works are to be executed as per CPWD General Specification for Electrical Work Part-I Internal, Part-II External, Part-IV Sub-Station and CPWD General Specification for HVAC works 2004, with amendments as on June-2013.
2. The rates of labour and material have been provided in appendix-I & II
3. The rates are complete i.e. including all material, labour, taxes & duties (in Delhi), T&P etc. and over head & Profit as per orders of the department applicable as on date.
4. The rates in this DSR are for working height upto 4.5 meter from floor level wherever height not specified.
5. For electrical panels, CPWD General Specification for Electrical Works Part-IV shall be applicable.
6. The rates of material are for reputed brands, factory fabricated and tested where ever available from manufacturers as submitted by field units.
7. In case of HVAC works, adopted quantum of labour and sundries have been rationalized as per the assessment at site as well as works awarded within last one year i.e. 2012 .
8. While preparing Analysis of rates the Labour cess has not been included and same shall be taken in justification as per prevailing norms.
9. The rates of AHUs have been incorporated only for four and six rows deep cooling coils. For any change in the parameter, the rates have to be analyzed by the NIT approving authority .

CHAPTER 1 - WIRING

Item Code	Description	Unit	Rate ₹
WIRING IN STEEL CONDUIT			
1.1	Wiring for light point/ fan point/ exhaust fan point/ call bell point with 1.5 sq.mm FRLS PVC insulated copper conductor single core cable in surface / recessed steel conduit, with piano type switch, phenolic laminated sheet, suitable size MS box and earthing the point with 1.5 sq.mm. FRLS PVC insulated copper conductor single core cable etc as required.		
1.1.1	Group A	Point	621
1.1.2	Group B	Point	779
1.1.3	Group C	Point	967
1.2	Wiring for twin control light point with 1.5 sq.mm FRLS PVC insulated copper conductor single core cable in surface / recessed steel conduit, 2 way piano type switch, phenolic laminated sheet, suitable size MS box and earthing the point with 1.5 sq.mm. FRLS PVC insulated copper conductor single core cable etc as required.	Point	973
1.3	Wiring for light point/ fan point/ exhaust fan point/ call bell point with 1.5 sq.mm FRLS 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 PVC insulated copper conductor single core cable etc as required.		
1.3.1	Group A	Point	665
1.3.2	Group B	Point	822
1.3.3	Group C	Point	1011
1.4	Wiring for twin control light point with 1.5 sq.mm FRLS PVC insulated copper conductor single core cable in surface / recessed steel conduit, 2 way modular switch, modular plate, suitable GI box and earthing the point with 1.5 sq.mm. FRLS PVC insulated copper conductor single core cable etc as required.	Point	1112
1.5	Wiring for light/ power plug with 2X4 sq. mm FRLS PVC insulated copper conductor single core cable in surface/ recessed steel conduit alongwith 1 No 4 sq. mm FRLS PVC insulated copper conductor single core cable for loop earthing as required.	Metre	242
1.6	Wiring for light/ power plug with 4X4 sq. mm FRLS PVC insulated copper conductor single core cable in surface/ recessed steel conduit alongwith 2 Nos 4 sq. mm FRLS PVC insulated copper conductor single core cable for loop earthing as required.	Metre	375

Item Code	Description	Unit	Rate ₹
1.7	Wiring for circuit/ submain wiring alongwith earth wire with the following sizes of FRLS PVC insulated copper conductor, single core cable in surface/ recessed steel conduit as required		
1.7.1	2 X 1.5 sq. mm + 1 X 1.5 sq. mm earth wire	Metre	183
1.7.2	2 X 2.5 sq. mm + 1 X 2.5 sq. mm earth wire	Metre	207
1.7.3	2 X 4 sq. mm + 1 X 4 sq. mm earth wire	Metre	238
1.7.4	2 X 6 sq. mm + 1 X 6 sq. mm earth wire	Metre	309
1.7.5	2 X 10 sq. mm + 1 X 10 sq. mm earth wire	Metre	409
1.7.6	2 X 16 sq. mm + 1 X 16 sq. mm earth wire	Metre	565
1.7.7	4 X 2.5 sq. mm + 2 X 2.5 sq. mm earth wire	Metre	310
1.7.8	4 X 4 sq. mm + 2 X 4 sq. mm earth wire	Metre	381
1.7.9	4 X 6 sq. mm + 2 X 6 sq. mm earth wire	Metre	495
1.7.10	4 X 10 sq. mm + 2 X 10 sq. mm earth wire	Metre	789
1.7.11	4 X 16 sq. mm + 2 X 16 sq. mm earth wire	Metre	1105
WIRING IN PVC CONDUIT			
1.8	Wiring for light point/ fan point/ exhaust fan point/ call bell point with 1.5 sq.mm FRLS PVC insulated copper conductor single core cable in surface / recessed medium class PVC conduit, with piano type switch, phenolic laminated sheet, suitable size M.S. box and earthing the point with 1.5 sq.mm. FRLS PVC insulated copper conductor single core cable etc as required.		
1.8.1	Group A	Point	467
1.8.2	Group B	Point	548
1.8.3	Group C	Point	682
1.9	Wiring for twin control light point with 1.5 sq.mm FRLS PVC insulated copper conductor single core cable in surface / recessed medium class PVC conduit, 2 way piano type switch, phenolic laminated sheet, suitable size MS box and earthing the point with 1.5 sq.mm. FRLS PVC insulated copper conductor single core cable etc as required.	Point	688
1.10	Wiring for light point/ fan point/ exhaust fan point/ call bell point with 1.5 sq.mm FRLS PVC insulated copper conductor single core cable in surface / recessed medium class PVC conduit, with modular switch, modular plate, suitable GI box and earthing the point with 1.5 sq.mm. FRLS PVC insulated copper conductor single core cable etc as required.		
1.10.1	Group A	Point	512
1.10.2	Group B	Point	593
1.10.3	Group C	Point	727
1.11	Wiring for twin control light point with 1.5 sq.mm FRLS PVC insulated copper conductor single core cable in surface / recessed medium class PVC conduit, 2 way modular switch, modular plate, suitable GI box and earthing the point with 1.5 sq.mm. FRLS PVC insulated copper conductor single core cable etc as required.	Point	782
1.12	Wiring for light/ power plug with 2X4 sq. mm FRLS PVC insulated copper conductor single core cable in surface/ recessed medium		

Item Code	Description	Unit	Rate ₹
	class PVC conduit alongwith 1 No 4 sq. mm FRLS PVC insulated copper conductor single core cable for loop earthing as required.	Metre	171
1.13	Wiring for light/ power plug with 4X4 sq. mm FRLS PVC insulated copper conductor single core cable in surface/ recessed medium class PVC conduit alongwith 2 Nos 4 sq. mm FRLS PVC insulated copper conductor single core cable for loop earthing as required.	Metre	278
1.14	Wiring for circuit/ submain wiring alongwith earth wire with the following sizes of FRLS PVC insulated copper conductor, single core cable in surface/ recessed medium class PVC conduit as required		
1.14.1	2 X 1.5 sq. mm + 1 X 1.5 sq. mm earth wire	Metre	116
1.14.2	2 X 2.5 sq. mm + 1 X 2.5 sq. mm earth wire	Metre	140
1.14.3	2 X 4 sq. mm + 1 X 4 sq. mm earth wire	Metre	171
1.14.4	2 X 6 sq. mm + 1 X 6 sq. mm earth wire	Metre	216
1.14.5	2 X 10 sq. mm + 1 X 10 sq. mm earth wire	Metre	320
1.14.6	2 X 16 sq. mm + 1 X 16 sq. mm earth wire	Metre	441
1.14.7	4 X 2.5 sq. mm + 2 X 2.5 sq. mm earth wire	Metre	214
1.14.8	4 X 4 sq. mm + 2 X 4 sq. mm earth wire	Metre	278
1.14.9	4 X 6 sq. mm + 2 X 6 sq. mm earth wire	Metre	371
1.14.10	4 X 10 sq. mm + 2 X 10 sq. mm earth wire	Metre	575
1.14.11	4 X 16 sq. mm + 2 X 16 sq. mm earth wire	Metre	803
1.15	Rewiring for light point/ fan point/ exhaust fan point/ call bell point with 1.5 sq.mm FRLS PVC insulated copper conductor single core cable and 1.5 sq.mm. FRLS PVC insulated copper conductor single core cable as earth wire in existing surface/ recessed steel /PVC conduit including dismantling as required.		
1.15.1	Group A	Point	272
1.15.2	Group B	Point	312
1.15.3	Group C	Point	428
1.16	Rewiring for twin control light point with 1.5 sq.mm FRLS PVC insulated copper conductor single core cable and 1.5 sq.mm. FRLS PVC insulated copper conductor single core cable as earth wire in existing surface/ recessed steel / PVC conduit including dismantling as required.	Point	428
1.17	Supplying and drawing following sizes of FRLS PVC insulated copper conductor, single core cable in the existing surface/ recessed steel / PVC conduit as required.		
1.17.1	1 x 1.5 sq. mm	Metre	21
1.17.2	2 x 1.5 sq. mm	Metre	35
1.17.3	3 x 1.5 sq. mm	Metre	52
1.17.4	4 x 1.5 sq. mm	Metre	66
1.17.5	5 x 1.5 sq. mm	Metre	83
1.17.6	6 x 1.5 sq. mm	Metre	96

Item Code	Description	Unit	Rate ₹
1.17.7	7 x 1.5 sq. mm	Metre	117
1.17.8	8 x 1.5 sq. mm	Metre	131
1.17.9	9 x 1.5 sq. mm	Metre	152
1.17.10	10 x 1.5 sq. mm	Metre	165
1.17.11	2 x 2.5 sq. mm	Metre	51
1.17.12	3 x 2.5 sq. mm	Metre	77
1.17.13	4 x 2.5 sq. mm	Metre	98
1.17.14	5 x 2.5 sq. mm	Metre	124
1.17.15	6 x 2.5 sq. mm	Metre	145
1.17.16	7 x 2.5 sq. mm	Metre	175
1.17.17	8 x 2.5 sq. mm	Metre	196
1.17.18	9 x 2.5 sq. mm	Metre	226
1.17.19	10 x 2.5 sq. mm	Metre	247
1.17.20	2 x 4 sq. mm	Metre	79
1.17.21	3 x 4 sq. mm	Metre	111
1.17.22	4 x 4 sq. mm	Metre	143
1.17.23	5 x 4 sq. mm	Metre	176
1.17.24	6 x 4 sq. mm	Metre	208
1.17.25	7 x 4 sq. mm	Metre	241
1.17.26	8 x 4 sq. mm	Metre	272
1.17.27	9 x 4 sq. mm	Metre	306
1.17.28	10 x 4 sq. mm	Metre	349
1.17.29	2 x 6 sq. mm	Metre	103
1.17.30	3 x 6 sq. mm	Metre	148
1.17.31	4 x 6 sq. mm	Metre	199
1.17.32	5 x 6 sq. mm	Metre	243
1.17.33	6 x 6 sq. mm	Metre	295
1.17.34	7 x 6 sq. mm	Metre	339
1.17.35	8 x 6 sq. mm	Metre	385
1.17.36	9 x 6 sq. mm	Metre	430
1.17.37	10 x 6 sq. mm	Metre	474
1.18	Supplying and drawing following pair 0.5 mm dia FRLS PVC insulated annealed copper conductor, unarmored telephone cable in the existing surface/ recessed steel/ PVC conduit as required.		
1.18.1	1 Pair	Metre	12
1.18.2	2 Pair	Metre	17
1.18.3	4 Pair	Metre	26
1.19	Supplying and drawing co-axial TV cable RG-6 grade, 0.7 mm solid copper conductor PE insulated, shielded with fine tinned copper braid and protected with PVC sheath in the existing surface/ recessed steel/ PVC conduit as required.	Metre	23

Item Code	Description	Unit	Rate ₹
1.20	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.		
1.20.1	20 mm	Metre	131
1.20.2	25 mm	Metre	152
1.20.3	32 mm	Metre	203
1.20.4	40 mm	Metre	301
1.20.5	50 mm	Metre	404
1.21	Supplying and fixing of following sizes of medium class PVC conduit along with accessories in surface/recess including cutting the wall and making good the same in case of recessed conduit as required.		
1.21.1	20 mm	Metre	64
1.21.2	25 mm	Metre	72
1.21.3	32 mm	Metre	91
1.21.4	40 mm	Metre	117
1.21.5	50 mm	Metre	152
1.22	Supplying and fixing metal box of following sizes (nominal size) on surface or in recess with suitable size of phenolic laminated sheet cover in front including painting etc as required.		
1.22.1	75 mm X 75 mm X 60 mm deep	Each	82
1.22.2	100 mm X 100 mm X 60 mm deep	Each	100
1.22.3	150 mm X 75 mm X 60 mm deep	Each	103
1.22.4	150 mm X 150 mm X 60 mm deep	Each	150
1.22.5	180 mm X 100 mm X 60 mm deep	Each	120
1.22.6	200 mm X 125 mm X 60 mm deep	Each	155
1.22.7	200 mm X 150 mm X 60 mm deep	Each	174
1.22.8	200 mm X 150 mm X 75 mm deep	Each	181
1.22.9	200 mm X 250 mm X 60 mm deep	Each	230
1.22.10	200 mm X 250 mm X 75 mm deep	Each	244
1.22.11	200 mm X 150 mm X 100 mm deep	Each	209
1.22.12	200 mm X 250 mm X 100 mm deep	Each	276
1.22.13	200 mm X 300 mm X 60 mm deep	Each	275
1.22.14	200 mm X 300 mm X 100 mm deep	Each	289
1.22.15	250 mm X 300 mm X 60 mm deep	Each	307
1.22.16	250 mm X 300 mm X 100 mm deep	Each	341
1.23	Supplying and fixing following piano type switch/ socket on the existing switch box/ cover including connections etc. as required.		
1.23.1	5/6 amps switch	Each	32
1.23.2	2 way 5/6 amps switch	Each	37
1.23.3	15/16 amp switch	Each	64

Item Code	Description	Unit	Rate ₹
1.23.4	3 pin 5/6 amp socket outlet	Each	38
1.23.5	6 pin 15/16 amp socket outlet	Each	75
1.23.6	Telephone socket outlet	Each	54
1.23.7	TV antenna socket outlet	Each	42
1.23.8	Bell push	Each	40
1.24	Supplying and fixing following modular switch/ socket on the existing modular plate & switch box including connections but excluding modular plate etc. as required.		
1.24.1	5/6 amps switch	Each	77
1.24.2	2 way 5/6 amps switch	Each	99
1.24.3	15/16 amp switch	Each	114
1.24.4	3 pin 5/6 amp socket outlet	Each	101
1.24.5	6 pin 15/16 amp socket outlet	Each	163
1.24.6	Telephone socket outlet	Each	92
1.24.7	TV antenna socket outlet	Each	94
1.24.8	Bell push	Each	105
1.25	Supplying and fixing stepped type electronic fan regulator on the existing modular plate switch box including connections but excluding modular plate etc. as required.	Each	362
1.26	Supplying and fixing modular blanking plate on the existing modular plate & switch box excluding modular plate as required.	Each	23
1.27	Supplying and fixing following size/ modules, GI box alongwith modular base & cover plate for modular switches in recess etc as required.		
1.27.1	1 or 2 Module (75mmX75mm)	Each	159
1.27.2	3 Module (100mmX75mm)	Each	172
1.27.3	4 Module (125mmX75mm)	Each	197
1.27.4	6 Module (200mmX75mm)	Each	241
1.27.5	8 Module (125mmX125mm)	Each	271
1.27.6	12 Module (200mmX150mm)	Each	365
1.28	Supplying and fixing following Modular base & cover plate on existing modular metal boxes etc. as required.		
1.28.1	1 or 2 Module	Each	73
1.28.2	3 Module	Each	82
1.28.3	4 Module	Each	91
1.28.4	6 Module	Each	109
1.28.5	8 Module	Each	135
1.28.6	12 Module	Each	183
1.29	Supplying and fixing metal box of 150mm X 75mm X 60mm deep (nominal size) on surface or in recess with suitable size of phenolic laminated sheet cover in front including providing and fixing 3 pin 5/6 amps socket outlet and 5/6 amps piano type switch, connection, painting etc. as required. (For light plugs to be used in non residential buildings).	Each	181

Item Code	Description	Unit	Rate ₹
1.30	Supplying and fixing metal box of 180mm X 100mm X 60mm deep (nominal size) on surface or in recess with suitable size of phenolic laminated sheet cover in front including providing and fixing 6 pin 5/6 & 15/16 amps socket outlet and 15/16 amps piano type switch, connection, painting etc. as required.	Each	250
1.31	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).	Each	320
1.32	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 & 15/16 amps modular socket outlet and 15/16 amps modular switch, connection etc. as required.	Each	411
1.33	Supplying and fixing 3 pin, 5 amp ceiling rose on the existing junction box/ wooden block including connection etc as required.	Each	42
1.34	Supplying and fixing brass batten/ angle holder including connection etc. as required.	Each	64
1.35	Erection of wall bracket /ceiling fittings of all sizes and shapes containing upto two GLS lamps per fitting, complete with all accessories including connection etc. as required.	Each	47
1.36	Supplying and fixing stiff pendent with 300 mm long, 20 mm dia X 1.6 mm thick steel conduit, aluminium cast back plate and brass holder complete, including wiring the down rod with 1.5 sq. mm FRLS PVC insulated, copper conductor, single core cable and painting etc. as required.	Each	146
1.37	Supplying and fixing stiff pendent with 600 mm long, 20 mm dia X 1.6 mm thick steel conduit, aluminium cast back plate and brass holder complete, including wiring the down rod with 1.5 sq. mm FRLS PVC insulated, copper conductor, single core cable and painting etc. as required.	Each	178
1.38	Supplying and fixing call bell/ buzzer suitable for single phase, 230 volts, complete as required.	Each	60
1.39	Providing and fixing plain 16/0.20mm (0.50sqmm) twin flat flexible, FRLS PVC insulated, copper cable, in PVC sleeve of suitable size on the floor/ wall, or side of the table/ door etc. as required.	Metre	20
1.40	Providing and fixing plain 16/0.20mm (0.50sqmm) twin circular flexible FRLS PVC insulated, PVC sheathed copper cable direct on the wall with PVC clips etc. as required.	Metre	18
1.41	Installation, testing and commissioning of pre-wired, fluorescent fitting / compact fluorescent fitting of all types, complete with all accessories and tube etc. directly on ceiling/ wall, including connection with 1.5 sq. mm FRLS PVC insulated, copper conductor, single core cable and earthing etc. as required.	Each	82
1.42	Installation, testing and commissioning of pre-wired, fluorescent fitting / compact fluorescent fitting of all types, complete with all accessories and tube etc., including supplying and fixing ball and socket arrangement, 2 no. down rods of 20 mm dia X 1.6 mm		

Item Code	Description	Unit	Rate ₹
	thick steel conduit upto 30 cm length, painting and wiring the down rods and connection with 1.5 sq. mm FRLS PVC insulated, copper conductor, single core cable and earthing etc. as required.	Each	218
1.43	Providing and fixing extra conduit down rod of 20 mm dia, 2 X 10 cm length wiring with 2 X 1.5 sq. mm FRLS PVC insulated, copper conductor, single core cable including painting etc. as required. (Note : More than 5 cm length shall be rounded to the nearest 10 cm and 5 cm or less shall be ignored)	Each	30
1.44	Installation, testing and commissioning of ceiling fan, including wiring the down rods of standard length (upto 30 cm) with 1.5 sq. mm FRLS PVC insulated, copper conductor, single core cable etc. as required.	Each	87
1.45	Installation, testing and commissioning of ceiling fan, including wiring the down rods of standard length (upto 30 cm) with 1.5 sq. mm FRLS PVC insulated, copper conductor, single core cable, including providing and fixing phenolic laminated sheet cover on the fan box etc. as required.	Each	112
1.46	Installation, testing and commissioning of resistance type ceiling fan regulator, in existing switch box including connection with 1.5 sq. mm FRLS PVC insulated, copper conductor, single core cable, earthing the regulator etc. as required.	Each	48
1.47	Supplying and fixing extra down rod of 10 cm length G.I. pipe ,15 mm dia, heavy gauge including painting etc. as required. (Note : More than 5 cm length shall be rounded to the nearest 10 cm and 5 cm or less shall be ignored)	Each	21
1.48	Supplying and fixing extra conduit down rod of 20 cm length G.I. pipe 15 mm dia, heavy gauge including painting etc. as required. (Note : More than 5 cm length shall be rounded to the nearest 10 cm and 5 cm or less shall be ignored)	Each	23
1.49	Numbering of ceiling fan/ exhaust fan/ fluorescent fittings as required.	Each	24
1.50	Installation of exhaust fan in the existing opening, including making good the damage, connection, testing, commissioning etc. as required.		
1.50.1	Upto 450 mm sweep	Each	189
1.50.2	510 mm sweep	Each	264
1.51	Extra for fixing the louvers/ shutters complete with frame for a exhaust fan of all sizes.	Each	81
1.52	Painting of ceiling fan in installed position with one or more coats of spray painting with synthetic enamel paint of approved brand and manufacture to give an even shade, including cleaning of surface with detergent etc as required.	Each	76
1.53	Supplying and drawing of UTP 4 pair CAT 6 LAN Cable in the existing surface/ recessed steel/ PVC conduit as required.	per m	31



CHAPTER 2 - MCCB, MCB & DB'S

Item Code	Description	Unit	Rate ₹
2.1	Providing and fixing following capacity TP&N disconnecter fuse switch unit inside the existing panel board with ISI marked HRC fuses including drilling holes in cubicle panel, making connections, etc. as required.		
2.1.1	32 Amp TP&N	Each	1524
2.1.2	63 Amp TP&N	Each	2097
2.1.3	100 Amp TP&N	Each	4217
2.1.4	125 Amp TP&N	Each	5595
2.1.5	160 Amp TP&N	Each	6221
2.1.6	200 Amp TP&N	Each	6554
2.1.7	320 Amp TP&N	Each	10952
2.1.8	400 Amp TP&N	Each	12782
2.2	Providing and fixing following rating and breaking capacity and pole MCCB in existing cubicle panel board including drilling holes in cubicle panel, making connections, etc. as required.		
2.2.1	100 Amp, 16 KA, TPMCCB	Each	3032
2.2.2	125 Amp, 16 KA, TPMCCB	Each	4233
2.2.3	160 Amp, 16 KA, TPMCCB	Each	5181
2.2.4	200 Amp, 16 KA, TPMCCB	Each	7488
2.2.5	200 Amp, 25 KA, TPMCCB	Each	7883
2.2.6	250 Amp, 25 KA, TPMCCB	Each	10341
2.2.7	250 Amp, 35 KA, TPMCCB	Each	14766
2.2.8	315 Amp, 35 KA, TPMCCB	Each	17942
2.2.9	400 Amp, 35 KA, TPMCCB	Each	17942
2.2.10	500 Amp, 35 KA, TPMCCB	Each	20667
2.2.11	630 Amp, 50 KA, TPMCCB	Each	21378
2.2.12	800 Amp, 50 KA, TPMCCB	Each	27464
2.2.13	100Amp,30KA,FPMCCB	Each	4647
2.2.14	125Amp,36KA,FPMCCB	Each	6622
2.2.15	200Amp,36KA,FPMCCB	Each	10995
2.2.16	250Amp,36KA,FPMCCB	Each	12831
2.2.17	250Amp,50KA,FPMCCB	Each	21507
2.2.18	400Amp,50KA,FPMCCB	Each	26036
2.2.19	630Amp,50KA,FPMCCB	Each	32195

Item Code	Description	Unit	Rate ₹
2.3	Supplying and fixing following way, single pole and neutral, sheet steel, MCB distribution board, 240 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)		
2.3.1	2 + 4 way, Single door	Each	531
2.3.2	2 + 6 way, Single door	Each	575
2.3.3	2 + 8 way, Single door	Each	619
2.3.4	2 + 12 way, Single door	Each	776
2.3.5	2 + 4 way, Double door	Each	780
2.3.6	2 + 6 way, Double door	Each	867
2.3.7	2 + 8 way, Double door	Each	954
2.3.8	2 + 12 way, Double door	Each	1185
2.4	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)		
2.4.1	4 way (4 + 12), Single door	Each	1367
2.4.2	6 way (4 + 18), Single door	Each	1591
2.4.3	8 way (4 + 24), Single door	Each	1752
2.4.4	4 way (4 + 12), Double door	Each	1833
2.4.5	6 way (4 + 18), Double door	Each	2265
2.4.6	8 way (4 + 24), Double door	Each	2795
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.)		
2.5.1	4 way (4 + 12), Single door	Each	2973
2.5.2	8 way (4 + 24), Single door	Each	4117
2.5.3	12 way (4 + 36), Single door	Each	5250
2.5.4	4 way (4 + 12), Double door	Each	4258
2.5.5	8 way (4 + 24), Double door	Each	5364
2.5.6	12 way (4 + 36), Double door	Each	6817
2.6	Supplying and fixing 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, with provision of 100 amps TP 16 KA MCCB as incomer, interconnection between incomer MCCB and bus bars (but without MCB's/ MCCB) as required . (Note : Vertical type MCB TPDB is normally used where 3 phase outlets are required.)		

Item Code	Description	Unit	Rate ₹
2.6.1	4 Way TP	Each	5260
2.6.2	8 Way TP	Each	6703
2.6.3	12 Way TP	Each	9075
2.7	Supplying and fixing following way prewired SP&N MCB distribution board of steel sheet for 240 volts on surface/ recess complete with loose wire box, terminal connectors for all incoming and outgoing circuits, duly prewired with suitable size FRLS PVC insulated copper conductor up to terminal blocks, tinned copper bus bar, neutral link, earth bar, din bar, detachable gland plate, interconnections, powder painted including earthing etc. as required. (But without MCB/ RCCB/ Isolator)		
2.7.1	2 + 4 way, Single door	Each	1903
2.7.2	2 + 8 way, Single door	Each	2265
2.7.3	2 + 12 way, Single door	Each	2648
2.7.4	2 + 4 way, Double door	Each	2381
2.7.5	2 + 8 way, Double door	Each	2844
2.7.6	2 + 12 way, Double door	Each	3432
2.8	Supplying and fixing following way prewired TP&N MCB distribution board of steel sheet for 415 volts on surface/ recess complete with loose wire box, terminal connectors for all incoming and outgoing circuits, duly prewired with suitable size FRLS PVC insulated copper conductor up to terminal blocks, tinned copper bus bar, neutral link, earth bar, din bar, detachable gland plate, interconnections, powder painted including earthing etc. as required.(But without MCB/ RCCB/ Isolator)		
2.8.1	4 way (4 + 12), Single door	Each	6116
2.8.2	6 way (4 + 18), Single door	Each	7887
2.8.3	8 way (4 + 24), Single door	Each	9024
2.8.4	12 way (4 + 36), Single door	Each	11082
2.8.5	4 way (4 + 12), Double door	Each	6997
2.8.6	6 way (4 + 18), Double door	Each	9034
2.8.7	8 way (4 + 24), Double door	Each	9899
2.8.8	12 way (4 + 36), Double door	Each	12163
2.9	Supplying and fixing following way prewired vertical type TP&N MCB distribution board of steel sheet for 415 volts on surface/ recess complete with loose wire box 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, terminal connectors for all incoming and outgoing circuits, duly prewired with adequate size of FRLS PVC insulated copper conductor upto the terminal connector/ neutral link, earthing etc as required (But without MCB/ RCCB/ Isolator). (Note : Prewired vertical type MCB TPDB is normally used where 3 phase outlets are required.)		
2.9.1	4 way Single door	Each	6569

Item Code	Description	Unit	Rate ₹
2.9.2	6 way Single door	Each	8481
2.9.3	8 way Single door	Each	9638
2.9.4	12 way Single door	Each	12797
2.9.5	4 way Double door	Each	7515
2.9.6	6 way Double door	Each	9708
2.9.7	8 way Double door	Each	10584
2.9.8	12 way Double door	Each	14055
2.10	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.		
2.10.1	Single pole	Each	146
2.10.2	Single pole and neutral	Each	399
2.10.3	Double pole	Each	412
2.10.4	Triple pole	Each	610
2.10.5	Triple pole and neutral	Each	784
2.11	Supplying and fixing single pole blanking plate in the existing MCB DB complete etc. as required.	Each	6
2.12	Supplying and fixing following rating, double pole, 240 volts, isolator in the existing MCB DB complete with connections, testing and commissioning etc. as required.		
2.12.1	40 amps	Each	267
2.12.2	63 amps	Each	330
2.13	Supplying and fixing following rating, four pole, 415 volts, isolator in the existing MCB DB complete with connections, testing and commissioning etc. as required.		
2.13.1	40 amps	Each	604
2.13.2	63 amps	Each	614
2.13.3	100 amps	Each	772
2.14	Supplying and fixing following rating, double pole, (single phase and neutral), 240 volts, residual current circuit breaker (RCCB), having a sensitivity current upto 300 milliamperes in the existing MCB DB complete with connections, testing and commissioning etc. as required.		
2.14.1	25 amps	Each	1427
2.14.2	40 amps	Each	1510
2.14.3	63 amps	Each	1974
2.15	Supplying and fixing following rating, four pole, (three phase and neutral), 415 volts, residual current circuit breaker (RCCB), having a sensitivity current upto 300 milliamperes in the existing MCB DB complete with connections, testing and commissioning etc. as required.		
2.15.1	25 amps	Each	1819

Item Code	Description	Unit	Rate ₹
2.15.2	40 amps	Each	1845
2.15.3	63 amps	Each	2128
2.16	Supplying and fixing DP sheet steel enclosure on surface/ recess along with 25/32amps 240 volts "C" curve DP MCB complete with connections, testing and commissioning etc. as required.	Each	629
2.17	Supplying and fixing TP sheet steel enclosure on surface/ recess along with 16/25/32amps 415 volts "C" curve TP MCB complete with connections, testing and commissioning etc. as required.	Each	850
2.18	Supplying and fixing 20 amps, 240 volts, SPN industrial type, socket outlet, with 2 pole and earth, metal enclosed plug top alongwith 20 amps "C" curve, SP, MCB, in sheet steel enclosure, on surface or in recess, with chained metal cover for the socket out let and complete with connections, testing and commissioning etc. as required.	Each	796
2.19	Supplying and fixing 20 amps, 415 volts, TPN industrial type, socket outlet, with 4 pole and earth, metal enclosed plug top alongwith 20 amps "C" curve, TPMCB, in sheet steel enclosure, on surface or in recess, with chained metal cover for the socket out let and complete with connections, testing and commissioning etc. as required.	Each	1869
2.20	Supplying and fixing 30 amps, 415 volts, TPN industrial type, socket outlet, with 4 pole and earth, metal enclosed plug top alongwith 30 amps "C" curve, TPMCB, in sheet steel enclosure, on surface or in recess, with chained metal cover for the socket out let and complete with connections, testing and commissioning etc. as required.	Each	2156
2.21	Providing and fixing M.V. danger notice plate of 200 mm X 150 mm, made of mild steel, at least 2 mm thick, and vitreous enameled white on both sides, and with inscription in single red colour on front side as required.	Each	133
2.22	Providing and fixing H.T. danger notice plate of 250 mm X 200 mm, made of mild steel, at least 2 mm thick, and vitreous enameled white on both sides, and with inscription in single red colour on front side as required.	Each	146



CHAPTER 3 - RISING MAINS & BUS TRUNKING

Item Code	Description	Unit	Rate ₹
3.1	Supplying, installing on wall, testing and commissioning of following capacity rising mains made of 1.6mm thick sheet steel enclosure duly painted with powder coating, wall straps, fully PVC insulated 4 Nos aluminium bus bars in convenient sections and suitable for 415 volts, 3 phase, 4 wire, 50 Hz, A.C. supply with extension joints, fire proof barriers, expansion joints, thrust pads including jointing, and earthing with 2 runs of galvanised iron strips etc. as required. (Rising mains conforming to IS 8623, TEC 439)		
3.1.1	200 amps (S.C. rating for 1 sec - 15 KA)	Metre	4924
3.1.2	315 amps (S.C. rating for 1 sec - 20 KA)	Metre	5136
3.1.3	400 amps (S.C. rating for 1 sec - 25 KA)	Metre	6320
3.1.4	630 amps (S.C. rating for 1 sec - 45 KA)	Metre	7070
3.1.5	800 amps (S.C. rating for 1 sec - 50 KA)	Metre	8519
3.2	Supplying, installing, testing and commissioning of following capacity TPN tap off box made of 1.6mm thick sheet steel enclosure duly painted with powder coating on existing rising mains complete with TPN disconnecter FSU and HRC fuses, connections, earthing etc. as required.		
3.2.1	16 amps TPN	Each	5625
3.2.2	32 amps TPN	Each	5927
3.2.3	63 amps TPN	Each	6656
3.2.4	100 amps TPN	Each	7665
3.2.5	200 amps TPN	Each	12034
3.2.6	315 amps TPN	Each	12740
3.2.7	400 amps TPN	Each	13244
3.3	Supplying, installing, testing and commissioning of following capacity TPN distribution tap off box made of 1.6mm thick sheet steel enclosure duly painted with powder coating on existing rising mains complete with HRC fuses, interconnections, earthing etc. as required.		
3.3.1	16 amps TPN, 2 way	Each	8422
3.3.2	16 amps TPN, 4 way	Each	15736
3.3.3	16 amps TPN, 6 way	Each	22309
3.3.4	16 amps TPN, 8 way	Each	30900
3.3.5	32 amps TPN, 2 way	Each	8674
3.3.6	32 amps TPN, 4 way	Each	17754
3.3.7	32 amps TPN, 6 way	Each	23318

Item Code	Description	Unit	Rate ₹
3.3.8	32 amps TPN, 8 way	Each	32413
3.3.9	63 amps TPN, 2 way	Each	9885
3.3.10	63 amps TPN, 4 way	Each	17754
3.3.11	63 amps TPN, 6 way	Each	24831
3.3.12	63 amps TPN, 8 way	Each	34431
3.4	Supplying, installing, testing and commissioning of following capacity End Feed Unit made of 1.6mm thick sheet steel enclosure duly painted with powder coating to existing rising mains complete with TPN disconnecter FSU and HRC fuses, mounting stands, cable end box, brass compression gland, connections, earthing etc. as required.		
3.4.1	200 amps TPN	Each	14148
3.4.2	300 amps TPN	Each	15546
3.4.3	400 amps TPN	Each	17228
3.4.4	600 amps TPN	Each	18655
3.4.5	800 amps TPN	Each	21017
3.5	Supplying, installation, including suspension, testing and commissioning of following capacity bus trunking with aluminium bus bars in 1.6mm thick sheet steel enclosure in convenient sections for use on, 3 phase, 4 wire, 415 volts, 50 Hz, A.C. supply including jointing of sections, flexible joints, expansion joints, bends and earthing with 2 runs of galvanised iron strips, suspenders, angle iron bracket, steel fasteners, connecting to earthing system etc. as required.		
3.5.1	800 amps	Metre	8062
3.5.2	1000 amps	Metre	9525
3.5.3	1250 amps	Metre	12235
3.5.4	1400 amps	Metre	15262
3.5.5	1600 amps	Metre	15293
3.6	Supplying, installation, testing and commissioning of following capacity overhead distribution bus trunking with aluminium bus bars in 1.6mm thick sheet steel enclosure in convenient sections with provision of tapping points for use on, 3 phase, 4 wire, 415 volts, 50 Hz, A.C. supply including jointing of sections, bends, earthing with 2 runs of galvanised iron strips, all installation accessories etc. as required.		
3.6.1	200 amps	Metre	4682
3.6.2	400 amps	Metre	5993
3.7	Supplying, installing, testing and commissioning of following capacity TPN tap off box / plug-in box made of 1.6mm thick sheet steel enclosure duly painted with powder coating on existing overhead bus bar system complete with TPN disconnecter FSU and HRC fuses, connections, earthing etc. as required.		
3.7.1	32 amps	Each	5091

Item Code	Description	Unit	Rate ₹
3.7.2	63 amps	Each	5719
3.7.3	100 amps	Each	6584
3.8	Supplying, installing on wall, testing and commissioning of following capacity Air Insulated Compact Type Rising Mains for use on 3 phase 4 wire 415 volts, 50Hz A.C. supply with enclosure made of 1.6mm thick steel sheet duly powder coated in convenient sections complete with 4 Nos aluminium bus bars, necessary joints & expansion joints, fire barrier at each floor, provision of tapping at every metre, continuous earthing with 2 Nos aluminium strip of suitable size (one on each side) including, G.I. clamping brackets, angle iron bracket, steel fasteners, connecting to earthing system etc. as required		
3.8.1	200 amps 15KA SC for 1 sec	Metre	5091
3.8.2	315 amps 25KA SC for 1 sec	Metre	5495
3.8.3	400 amps 30KA SC for 1 sec	Metre	6101
3.8.4	500 amps 35KA SC for 1 sec	Metre	7007
3.8.5	630 amps 50KA SC for 1 sec	Metre	8350
3.8.6	800 amps 50KA SC for 1 sec	Metre	11483
3.8.7	1000 amps 50KA SC for 1 sec	Metre	13356
3.8.8	1250 amps 50KA SC for 1 sec	Metre	15797
3.9	Supplying, installing on wall, testing and commissioning of following capacity Air Insulated Compact Type Bus Trunking for use on 3 phase 4 wire 415 volts, 50Hz A.C. supply with metal clad enclosure made of 1.6mm thick steel sheet duly powder coated in convenient sections complete with 4 Nos aluminium bus bars, necessary joints, elbow joints & expansion joints, fire barrier at each floor, provision of tapping at every metre, continuous earthing with 2 Nos aluminium strip of suitable size (one on each side) including, G.I. clamping brackets, angle iron bracket, steel fasteners, connecting to earthing system etc. as required		
3.9.1	200 amps 15KA SC for 1 sec	Metre	5579
3.9.2	315 amps 25KA SC for 1 sec	Metre	6317
3.9.3	400 amps 30KA SC for 1 sec	Metre	6688
3.9.4	500 amps 35KA SC for 1 sec	Metre	7682
3.9.5	630 amps 50KA SC for 1 sec	Metre	9157
3.9.6	800 amps 50KA SC for 1 sec	Metre	12417
3.9.7	1000 amps 50KA SC for 1 sec	Metre	14456
3.9.8	1250 amps 50KA SC for 1 sec	Metre	17349
3.10	Supplying, installing suspension on ceiling, testing and commissioning of following capacity Air Insulated Compact Type Bus Trunking for use on 3 phase 4 wire 415 volts, 50Hz A.C. supply with metal clad enclosure made of 1.6mm thick steel sheet duly powder coated in convenient sections complete with 4 Nos aluminium bus bars, necessary joints, elbow joints & expansion joints, fire barrier at each floor, provision of tapping at		

Item Code	Description	Unit	Rate ₹
	every metre, continuous earthing with 2 Nos aluminium strip of suitable size (one on each side) including, G.I. clamping brackets, suspenders, angle iron bracket, steel fasteners, connecting to earthing system etc. as required		
3.10.1	200 amps 15KA SC for 1 sec	Metre	5612
3.10.2	315 amps 25KA SC for 1 sec	Metre	6350
3.10.3	400 amps 30KA SC for 1 sec	Metre	6721
3.10.4	500 amps 35KA SC for 1 sec	Metre	7723
3.10.5	630 amps 50KA SC for 1 sec	Metre	9198
3.10.6	800 amps 50KA SC for 1 sec	Metre	12458
3.10.7	1000 amps 50KA SC for 1 sec	Metre	14513
3.10.8	1250 amps 50KA SC for 1 sec	Metre	17406
3.11	Supplying, installing, connecting to existing Air Insulated Compact Type bus trunking/ rising mains, testing and commissioning of following capacity End Feed Unit for use on 3 phase 4 wire 415 volts, 50Hz A.C. supply made with 1.6mm thick steel sheet enclosure duly powder coated with provision of MCCB/ACB (but without MCCB/ACB) complete with necessary joints including clamping brackets, angle iron bracket, steel fasteners, connecting to earthing system etc. as required		
3.11.1	200 amps 15KA SC for 1 sec	Each	3800
3.11.2	315 amps 25KA SC for 1 sec	Each	3957
3.11.3	400 amps 30KA SC for 1 sec	Each	5038
3.11.4	500 amps 35KA SC for 1 sec	Each	5273
3.11.5	630 amps 50KA SC for 1 sec	Each	6440
3.11.6	800 amps 50KA SC for 1 sec	Each	8047
3.11.7	1000 amps 50KA SC for 1 sec	Each	8518
3.11.8	1250 amps 50KA SC for 1 sec	Each	8988
3.12	Supplying, installing, connecting to existing Air Insulated Compact Type bus trunking/ rising mains, testing and commissioning of following capacity Plug In/ Tap Off Box for use on 3 phase 4 wire 415 volts, 50Hz A.C. supply with 1.6mm thick steel sheet enclosure duly powder coated with provision of MCCB (but without MCCB) complete etc. as required		
3.12.1	125 amps 15KA SC for 1 sec	Each	4388
3.12.2	200 amps 25KA SC for 1 sec	Each	5564
3.12.3	250 amps 30KA SC for 1 sec	Each	7154
3.12.4	400 amps 35KA SC for 1 sec	Each	7154
3.12.5	500 amps 50KA SC for 1 sec	Each	10321
3.12.6	630 amps 50KA SC for 1 sec	Each	10321
3.13	Supplying, installing by suspension on ceiling, testing and commissioning of following capacity Sandwich Type Bus Trunking for use on 3 phase 4 wire 415 volts, 50Hz A.C. supply with metal		

Item Code	Description	Unit	Rate ₹
	clad enclosure made of 1.6mm thick steel sheet duly powder coated in convenient sections complete with 4 Nos aluminium bus bars, necessary joints, elbow joints & expansion joints and bends, fire barrier at each floor, provision of tapping at every metre, adopter box and copper flexible for joints, continuous earthing with 2 Nos aluminium strip of suitable size (one on each side) including, G.I. clamping brackets, suspenders, angle iron bracket, steel fasteners, connecting to earthing system etc. as required		
3.13.1	400 amps 25KA SC for 1 sec	per m	9037
3.13.2	500 amps 30KA SC for 1 sec	per m	9835
3.13.3	630 amps 50KA SC for 1 sec	per m	10621
3.13.4	800 amps 50KA SC for 1 sec	per m	12884
3.13.5	1000 amps 50KA SC for 1 sec	per m	14500
3.13.6	1250 amps 50KA SC for 1 sec	per m	16522
3.13.7	1600 amps 50KA SC for 1 sec	per m	20790
3.13.8	2000 amps 50KA SC for 1 sec	per m	24419
3.13.9	2500 amps 50KA SC for 1 sec	per m	32993
3.13.10	3200 amps 50KA SC for 1 sec	per m	36986
3.13.11	4000 amps 50KA SC for 1 sec	per m	47350



CHAPTER 4 - CABLE TRAYS

Item Code	Description	Unit	Rate ₹
4.1	Supplying and installing following size of perforated pre-painted M.S. cable trays with perforation not more than 17.5%, in convenient sections, joined with connectors, suspended from the ceiling with M.S. suspenders including bolts & nuts, painting suspenders etc as required.		
4.1.1	100 mm width X 50 mm depth X 1.6 mm thickness	Metre	459
4.1.2	150 mm width X 50 mm depth X 1.6 mm thickness	Metre	523
4.1.3	200 mm width X 50 mm depth X 1.6 mm thickness	Metre	640
4.1.4	300 mm width X 50 mm depth X 1.6 mm thickness	Metre	756
4.1.5	375 mm width X 50 mm depth X 2.0 mm thickness	Metre	941
4.1.6	450 mm width X 50 mm depth X 2.0 mm thickness	Metre	1082
4.1.7	600 mm width X 50 mm depth X 2.0 mm thickness	Metre	1338
4.1.8	300 mm width X 62.5 mm depth X 2.0 mm thickness	Metre	841
4.1.9	375 mm width X 62.5 mm depth X 2.0 mm thickness	Metre	940
4.1.10	450 mm width X 62.5 mm depth X 2.0 mm thickness	Metre	1138
4.1.11	600 mm width X 62.5 mm depth X 2.0 mm thickness	Metre	1399
4.1.12	750 mm width X 62.5 mm depth X 2.0 mm thickness	Metre	1632
4.1.13	900 mm width X 62.5 mm depth X 2.0 mm thickness	Metre	1944
4.1.14	600 mm width X 75 mm depth X 2.0 mm thickness	Metre	1440
4.1.15	750 mm width X 75 mm depth X 2.0 mm thickness	Metre	1665
4.1.16	900 mm width X 75 mm depth X 2.0 mm thickness	Metre	1973
4.2	Supplying and installing following size of perforated pre-painted M.S. cable trays bends with perforation not more than 17.5%, joined with connectors, suspended from the ceiling with M.S. suspenders including bolts & nuts, painting suspenders etc as required.		
4.2.1	100 mm width X 50 mm depth X 1.6 mm thickness	Each	760
4.2.2	150 mm width X 50 mm depth X 1.6 mm thickness	Each	880
4.2.3	200 mm width X 50 mm depth X 1.6 mm thickness	Each	1101
4.2.4	300 mm width X 50 mm depth X 1.6 mm thickness	Each	1329
4.2.5	375 mm width X 50 mm depth X 2.0 mm thickness	Each	1668
4.2.6	450 mm width X 50 mm depth X 2.0 mm thickness	Each	1936
4.2.7	600 mm width X 50 mm depth X 2.0 mm thickness	Each	2420
4.2.8	300 mm width X 62.5 mm depth X 2.0 mm thickness	Each	1491
4.2.9	375 mm width X 62.5 mm depth X 2.0 mm thickness	Each	1757
4.2.10	450 mm width X 62.5 mm depth X 2.0 mm thickness	Each	2042

Item Code	Description	Unit	Rate ₹
4.2.11	600 mm width X 62.5 mm depth X 2.0 mm thickness	Each	2538
4.2.12	750 mm width X 62.5 mm depth X 2.0 mm thickness	Each	2977
4.2.13	900 mm width X 62.5 mm depth X 2.0 mm thickness	Each	3534
4.2.14	600 mm width X 75 mm depth X 2.0 mm thickness	Each	2616
4.2.15	750 mm width X 75 mm depth X 2.0 mm thickness	Each	3046
4.2.16	900 mm width X 75 mm depth X 2.0 mm thickness	Each	3589
4.3	Supplying and installing following size of perforated pre-painted M.S. cable trays reducers with perforation not more than 17.5%, joined with connectors, suspended from the ceiling with M.S. suspenders including bolts & nuts, painting suspenders etc as required.		
4.3.1	100 mm width X 50 mm depth X 1.6 mm thickness	Each	1043
4.3.2	150 mm width X 50 mm depth X 1.6 mm thickness	Each	1230
4.3.3	200 mm width X 50 mm depth X 1.6 mm thickness	Each	1559
4.3.4	300 mm width X 50 mm depth X 1.6 mm thickness	Each	1896
4.3.5	375 mm width X 50 mm depth X 2.0 mm thickness	Each	2391
4.3.6	450 mm width X 50 mm depth X 2.0 mm thickness	Each	2778
4.3.7	600 mm width X 50 mm depth X 2.0 mm thickness	Each	3488
4.3.8	300 mm width X 62.5 mm depth X 2.0 mm thickness	Each	2135
4.3.9	375 mm width X 62.5 mm depth X 2.0 mm thickness	Each	2516
4.3.10	450 mm width X 62.5 mm depth X 2.0 mm thickness	Each	2911
4.3.11	600 mm width X 62.5 mm depth X 2.0 mm thickness	Each	3644
4.3.12	750 mm width X 62.5 mm depth X 2.0 mm thickness	Each	4287
4.3.13	900 mm width X 62.5 mm depth X 2.0 mm thickness	Each	5102
4.3.14	600 mm width X 75 mm depth X 2.0 mm thickness	Each	3759
4.3.15	750 mm width X 75 mm depth X 2.0 mm thickness	Each	4392
4.3.16	900 mm width X 75 mm depth X 2.0 mm thickness	Each	5196
4.4	Supplying and installing following size of perforated pre-painted M.S. cable trays Tee's with perforation not more than 17.5%, joined with connectors, suspended from the ceiling with M.S. suspenders including bolts & nuts, painting suspenders etc as required.		
4.4.1	100 mm width X 50 mm depth X 1.6 mm thickness	Each	1328
4.4.2	150 mm width X 50 mm depth X 1.6 mm thickness	Each	1561
4.4.3	200 mm width X 50 mm depth X 1.6 mm thickness	Each	2017
4.4.4	300 mm width X 50 mm depth X 1.6 mm thickness	Each	2462
4.4.5	375 mm width X 50 mm depth X 2.0 mm thickness	Each	3112
4.4.6	450 mm width X 50 mm depth X 2.0 mm thickness	Each	3620
4.4.7	600 mm width X 50 mm depth X 2.0 mm thickness	Each	4561
4.4.8	300 mm width X 62.5 mm depth X 2.0 mm thickness	Each	2781
4.4.9	375 mm width X 62.5 mm depth X 2.0 mm thickness	Each	3277

Item Code	Description	Unit	Rate ₹
4.4.10	450 mm width X 62.5 mm depth X 2.0 mm thickness	Each	3799
4.4.11	600 mm width X 62.5 mm depth X 2.0 mm thickness	Each	4753
4.4.12	750 mm width X 62.5 mm depth X 2.0 mm thickness	Each	5604
4.4.13	900 mm width X 62.5 mm depth X 2.0 mm thickness	Each	6668
4.4.14	600 mm width X 75 mm depth X 2.0 mm thickness	Each	4906
4.4.15	750 mm width X 75 mm depth X 2.0 mm thickness	Each	5738
4.4.16	900 mm width X 75 mm depth X 2.0 mm thickness	Each	6803
4.5	Supplying and installing following size of perforated pre-painted M.S. cable trays cross members with perforation not more than 17.5%, joined with connectors, suspended from the ceiling with M.S. suspenders including bolts & nuts, painting suspenders etc as required.		
4.5.1	100 mm width X 50 mm depth X 1.6 mm thickness	Each	618
4.5.2	150 mm width X 50 mm depth X 1.6 mm thickness	Each	701
4.5.3	200 mm width X 50 mm depth X 1.6 mm thickness	Each	876
4.5.4	300 mm width X 50 mm depth X 1.6 mm thickness	Each	1047
4.5.5	375 mm width X 50 mm depth X 2.0 mm thickness	Each	1310
4.5.6	450 mm width X 50 mm depth X 2.0 mm thickness	Each	1520
4.5.7	600 mm width X 50 mm depth X 2.0 mm thickness	Each	1852
4.5.8	300 mm width X 62.5 mm depth X 2.0 mm thickness	Each	1170
4.5.9	375 mm width X 62.5 mm depth X 2.0 mm thickness	Each	1375
4.5.10	450 mm width X 62.5 mm depth X 2.0 mm thickness	Each	1600
4.5.11	600 mm width X 62.5 mm depth X 2.0 mm thickness	Each	1985
4.5.12	750 mm width X 62.5 mm depth X 2.0 mm thickness	Each	2320
4.5.13	900 mm width X 62.5 mm depth X 2.0 mm thickness	Each	2749
4.5.14	600 mm width X 75 mm depth X 2.0 mm thickness	Each	2042
4.5.15	750 mm width X 75 mm depth X 2.0 mm thickness	Each	2370
4.5.16	900 mm width X 75 mm depth X 2.0 mm thickness	Each	2785

□□□□□

CHAPTER 5 - EARTHING

Item Code	Description	Unit	Rate ₹
5.1	Earthing with G.I. earth pipe 4.5 metre long, 40 mm dia including accessories, and providing masonry enclosure with cover plate having locking arrangement and watering pipe etc. (but without charcoal/ coke and salt) as required.	Set	2781
5.2	Earthing with G.I. earth pipe 4.5 metre long, 40 mm dia including accessories, and providing masonry enclosure with cover plate having locking arrangement and watering pipe etc. with charcoal/ coke and salt as required.	Each	3753
5.3	Earthing with G.I. earth plate 600 mm X 600 mm X 6 mm thick including accessories, and providing masonry enclosure with cover plate having locking arrangement and watering pipe of 2.7 metre long etc. (but without charcoal/ coke and salt) as required.	Set	3317
5.4	Earthing with G.I. earth plate 600 mm X 600 mm X 6 mm thick including accessories, and providing masonry enclosure with cover plate having locking arrangement and watering pipe of 2.7 metre long etc. with charcoal/ coke and salt as required.	Set	4367
5.5	Earthing with copper earth plate 600 mm X 600 mm X 3 mm thick including accessories, and providing masonry enclosure with cover plate having locking arrangement and watering pipe of 2.7 metre long etc. (but without charcoal/ coke and salt) as required.	Set	7889
5.6	Earthing with copper earth plate 600 mm X 600 mm X 3 mm thick including accessories, and providing masonry enclosure with cover plate having locking arrangement and watering pipe of 2.7 metre long etc. with charcoal/ coke and salt as required.	Set	8939
5.7	Supplying and laying 6 SWG G.I. wire at 0.50 metre below ground level for conductor earth electrode, including connection/ termination with GI thimble etc. as required.	Metre	25
5.8	Supplying and laying 25 mm X 5 mm copper strip at 0.50 metre below ground as strip earth electrode, including connection/ terminating with nut, bolt, spring, washer etc. as required. (Jointing shall be done by overlapping and with 2 sets of brass nut bolt & spring washer spaced at 50mm)	Metre	714
5.9	Supplying and laying 25 mm X 5 mm G.I strip at 0.50 metre below ground as strip earth electrode, including connection/ terminating with G.I. nut, bolt, spring, washer etc. as required. (Jointing shall be done by overlapping and with 2 sets of G.I. nut bolt & spring washer spaced at 50mm)	Metre	103
5.10	Providing and fixing 25 mm X 5 mm copper strip in 40 mm dia G.I. pipe from earth electrode including connection with brass nut, bolt, spring, washer excavation and re-filling etc. as required.	Metre	1019

Item Code	Description	Unit	Rate ₹
5.11	Providing and fixing 25 mm X 5 mm G.I. strip in 40 mm dia G.I. pipe from earth electrode including connection with G.I. nut, bolt, spring, washer excavation and re-filling etc. as required.	Metre	391
5.12	Providing and laying earth connection from earth electrode with 6 SWG dia G.I. Wire in 15 mm dia G.I. pipe from earth electrode including connection with G.I. thimble excavation and re-filling as required.	Metre	136
5.13	Providing and laying earth connection from earth electrode with 4.00 mm dia copper wire in 15 mm dia G.I. pipe from earth electrode including connection with copper thimble excavation and re-filling as required.	Metre	194
5.14	Providing and fixing 25 mm X 5 mm copper strip on surface or in recess for connections etc. as required.	Metre	812
5.15	Providing and fixing 25 mm X 5 mm G.I. strip on surface or in recess for connections etc. as required.	Metre	133
5.16	Providing and fixing 6 SWG dia G.I. wire on surface or in recess for loop earthing as required.	Metre	34
5.17	Providing and fixing 4.00 mm dia copper wire on surface or in recess for loop earthing as required.	Metre	94
5.18	Providing and fixing 6 SWG dia G.I. wire on surface or in recess for loop earthing along with existing surface/ recessed conduit/ submain wiring/ cable as required.	Metre	22
5.19	Providing and fixing 4.00 mm dia copper wire on surface or in recess for loop earthing along with existing surface/ recessed conduit/ submain wiring/ cable as required.	Metre	82
5.20	Providing and fixing earth bus of 50 mm X 5 mm copper strip on surface for connections etc. as required.	Metre	1519



CHAPTER 6 - LIGHTNING CONDUCTOR

Item Code	Description	Unit	Rate ₹
6.1	Providing and fixing of lightning conductor finial, made of 25 mm dia 300 mm long, copper tube, having single prong at top, with 85 mm dia 3 mm thick copper base plate including holes etc. complete as required.	Each	741
6.2	Providing and fixing of lightning conductor finial, made of 25 mm dia 300 mm long, G.I. tube, having single prong at top, with 85 mm dia 6 mm thick G.I. base plate including holes etc. complete as required.	Each	352
6.3	Fixing of lightning conductor finial (single prong) with base plate including holes etc. complete as required.	Each	142
6.4	Jointing copper / G.I. tape (with another copper/ G I tape, base of the finial or any other metallic object) by riveting / nut bolting/ sweating and soldering etc as required.	Each	68
6.5	Providing and fixing copper tape 20 mm X 3 mm thick on parapet or surface of wall for lightning conductor complete as required. (For horizontal run)	Metre	356
6.6	Providing and fixing copper tape 20 mm X 3 mm thick on parapet or surface of wall for lightning conductor complete as required. (For vertical run)	Metre	384
6.7	Providing and fixing G.I. tape 20 mm X 3 mm thick on parapet or surface of wall for lightning conductor complete as required. (For horizontal run)	Metre	64
6.8	Providing and fixing G.I. tape 20 mm X 3 mm thick on parapet or surface of wall for lightning conductor complete as required. (For vertical run)	Metre	91
6.9	Fixing of copper/ G.I. tape 20 mm X 3 mm thick on parapet or surface of wall for lightning conductor complete as required. (For horizontal run)	Metre	32
6.10	Fixing of copper/ G.I. tape 20 mm X 3 mm thick on parapet or surface of wall for lightning conductor complete as required. (For vertical run)	Metre	66
6.11	Providing and fixing testing joint, made of 20 mm X 3 mm thick copper strip, 125 mm long, with 4 nos. of tinned brass bolts, nuts, chuck nuts and spring washers etc. complete as required.	Each	185
6.12	Providing and fixing testing joint, made of 20 mm X 3 mm thick G.I. strip, 125 mm long, with 4 nos. of G.I. bolts, nuts, chuck nuts and spring washers etc. complete as required.	Each	69
6.13	Providing and laying copper tape 32 mm X 6 mm from earth electrode directly in ground as required.	Metre	1067
6.14	Providing and laying G.I. tape 32 mm X 6 mm from earth electrode directly in ground as required.	Metre	135
6.15	Laying copper/ G.I. tape 32 mm X 6 mm from earth electrode directly in ground as required.	Metre	30

CHAPTER 7 - MV CABLE LAYING

Item Code	Description	Unit	Rate ₹
7.1	Laying of one number PVC insulated and PVC sheathed / XLPE power cable of 1.1 KV grade of following size direct in ground including excavation, sand cushioning, protective covering and refilling the trench etc as required.		
7.1.1	Upto 35 sq. mm	Metre	181
7.1.2	Above 35 sq. mm and upto 95 sq. mm	Metre	188
7.1.3	Above 95 sq. mm and upto 185 sq. mm	Metre	195
7.1.4	Above 185 sq. mm and upto 400 sq. mm	Metre	215
7.2	Laying of one number additional PVC insulated and PVC sheathed / XLPE power cable of 1.1 KV grade of following size direct in ground in the same trench in one tier horizontal formation including excavation, sand cushioning, protective covering and refilling the trench etc as required.		
7.2.1	Upto 35 sq. mm	Metre	124
7.2.2	Above 35 sq. mm and upto 95 sq. mm	Metre	131
7.2.3	Above 95 sq. mm and upto 185 sq. mm	Metre	138
7.2.4	Above 185 sq. mm and upto 400 sq. mm	Metre	159
7.3	Laying of one number PVC insulated and PVC sheathed / XLPE power cable of 1.1 KV grade of following size direct in ground including excavation and refilling the trench etc as required, but excluding sand cushioning and protective covering.		
7.3.1	Upto 35 sq. mm	Metre	79
7.3.2	Above 35 sq. mm and upto 95 sq. mm	Metre	86
7.3.3	Above 95 sq. mm and upto 185 sq. mm	Metre	92
7.3.4	Above 185 sq. mm and upto 400 sq. mm	Metre	113
7.4	Laying of one number additional PVC insulated and PVC sheathed / XLPE power cable of 1.1 KV grade of following size direct in ground in the same trench in one tier horizontal formation including excavation and refilling the trench etc as required, but excluding sand cushioning and protective covering.		
7.4.1	Upto 35 sq. mm	Metre	50
7.4.2	Above 35 sq. mm and upto 95 sq. mm	Metre	57
7.4.3	Above 95 sq. mm and upto 185 sq. mm	Metre	63
7.4.4	Above 185 sq. mm and upto 400 sq. mm	Metre	84
7.5	Laying of one number PVC insulated and PVC sheathed / XLPE power cable of 1.1 KV grade of following size in the existing RCC/ HUME/ METAL pipe as required.		

Item Code	Description	Unit	Rate ₹
7.5.1	Upto 35 sq. mm	Metre	15
7.5.2	Above 35 sq. mm and upto 95 sq. mm	Metre	23
7.5.3	Above 95 sq. mm and upto 185 sq. mm	Metre	30
7.5.4	Above 185 sq. mm and upto 400 sq. mm	Metre	53
7.6	Laying of one number PVC insulated and PVC sheathed / XLPE power cable of 1.1 KV grade of following size in the existing masonry open duct as required.		
7.6.1	Upto 35 sq. mm	Metre	11
7.6.2	Above 35 sq. mm and upto 95 sq. mm	Metre	18
7.6.3	Above 95 sq. mm and upto 185 sq. mm	Metre	25
7.6.4	Above 185 sq. mm and upto 400 sq. mm	Metre	45
7.7	Laying and fixing of one number PVC insulated and PVC sheathed / XLPE power cable of 1.1 KV grade of following size on wall surface as required.		
7.7.1	Upto 35 sq. mm (clamped with 1mm thick saddle)	Metre	22
7.7.2	Above 35 sq. mm and upto 95 sq. mm (clamped with 25x3mm MS flat clamp)	Metre	67
7.7.3	Above 95 sq. mm and upto 185 sq. mm (clamped with 25/40x3mm MS flat clamp)	Metre	77
7.7.4	Above 185 sq. mm and upto 400 sq. mm (clamped with 40x3mm MS flat clamp)	Metre	107
7.8	Laying and fixing of one number PVC insulated and PVC sheathed / XLPE power cable of 1.1 KV grade of following size on cable tray as required.		
7.8.1	Upto 35 sq. mm (clamped with 1mm thick saddle)	Metre	19
7.8.2	Above 35 sq. mm and upto 95 sq. mm (clamped with 25x3mm MS flat clamp)	Metre	44
7.8.3	Above 95 sq. mm and upto 185 sq. mm (clamped with 25/40x3mm MS flat clamp)	Metre	54
7.8.4	Above 185 sq. mm and upto 400 sq. mm (clamped with 40x3mm MS flat clamp)	Metre	84
7.9	Supplying and making cable route marker with cement concrete 1:2:4 (1 cement : 2 coarse sand : 4 graded stone aggregate 20 mm nominal size) of size 60 cm X 60 cm at the bottom and 50 cm X 50 cm at the top with a thickness of 10cm including inscription duly engraved as required.	each	283
7.10	Supplying and fixing cable route marker with 10 cm X 10 cm X 5 mm thick G.I. plate with inscription there on, bolted /welded to 35 mm X 35 mm X 6 mm angle iron, 60 cm long and fixing the same in ground as required.	each	270



CHAPTER 8 - HT CABLE LAYING

Item Code	Description	Unit	Rate ₹
8.1	Laying of one number PVC insulated and PVC sheathed / XLPE power cable of 11 KV grade of following size direct in ground including excavation, sand cushioning, protective covering and refilling the trench etc as required.		
8.1.1	Upto 120 sq. mm	Metre	235
8.1.2	Above 120 sq. mm and upto 400 sq. mm	Metre	256
8.2	Laying of one number additional PVC insulated and PVC sheathed / XLPE power cable of 11 KV grade of following size direct in ground in the same trench in one tier horizontal formation including excavation, sand cushioning, protective covering and refilling the trench etc as required.		
8.2.1	Upto 120 sq. mm	Metre	161
8.2.2	Above 120 sq. mm and upto 400 sq. mm	Metre	182
8.3	Laying of one number PVC insulated and PVC sheathed / XLPE power cable of 11 KV grade of following size in the existing RCC/ HUME/ METAL pipe as required.		
8.3.1	Upto 120 sq. mm	Metre	30
8.3.2	Above 120 sq. mm and upto 400 sq. mm	Metre	53
8.4	Laying of one number PVC insulated and PVC sheathed / XLPE power cable of 11 KV grade of following size in the existing masonry open duct as required.		
8.4.1	Upto 120 sq. mm	Metre	25
8.4.2	Above 120 sq. mm and upto 400 sq. mm	Metre	45
8.5	Laying of one number XLPE power cable of 33 KV grade of following size direct in ground including excavation, sand cushioning, protective covering and refilling the trench etc as required.		
8.5.1	Upto 120 sq. mm	Metre	238
8.5.2	Above 120 sq. mm and upto 400 sq. mm	Metre	258
8.6	Laying of one number additional XLPE power cable of 33 KV grade of following size direct in ground in the same trench in one tier horizontal formation including excavation, sand cushioning, protective covering and refilling the trench etc as required.		
8.6.1	Upto 120 sq. mm	Metre	163
8.6.2	Above 120 sq. mm and upto 400 sq. mm	Metre	184
8.7	Laying of one number XLPE power cable of 33 KV grade of following size in the existing RCC/ HUME/ METAL pipe as required.		
8.7.1	Upto 120 sq. mm	Metre	32

Item Code	Description	Unit	Rate ₹
8.7.2	Above 120 sq. mm and upto 400 sq. mm	Metre	55
8.8	Laying of one number XLPE power cable of 33 KV grade of following size in the existing masonry open duct as required.		
8.8.1	Upto 120 sq. mm	Metre	27
8.8.2	Above 120 sq. mm and upto 400 sq. mm	Metre	47

□□□□□

CHAPTER 9 - MV CABLE JOINTING & END TERMINATION

Item Code	Description	Unit	Rate ₹
9.1	Supplying and making end termination with brass compression gland and aluminium lugs for following size of PVC insulated and PVC sheathed / XLPE aluminium conductor cable of 1.1 KV grade as required.		
9.1.1	2 X 6 sq. mm (19mm)	Each	125
9.1.2	2 X 10 sq. mm (19mm)	Each	126
9.1.3	2 X 16 sq. mm (22mm)	Each	134
9.1.4	2 X 25 sq. mm (22mm)	Each	136
9.1.5	2 X 35 sq. mm (25mm)	Each	178
9.1.6	2 X 50 sq. mm (28mm)	Each	226
9.1.7	3 X 10 sq. mm (22mm)	Each	136
9.1.8	3 X 16 sq. mm (25mm)	Each	162
9.1.9	3 X 25 sq. mm (25mm)	Each	164
9.1.10	3 X 35 sq. mm (28mm)	Each	225
9.1.11	3 X 50 sq. mm (32mm)	Each	241
9.1.12	3 X 70 sq. mm (35mm)	Each	294
9.1.13	3 X 95 sq. mm (38mm)	Each	354
9.1.14	3 X 120 sq. mm (45mm)	Each	407
9.1.15	3 X 150 sq. mm (50mm)	Each	489
9.1.16	3 X 185 sq. mm (57mm)	Each	659
9.1.17	3 X 225 sq. mm (62mm)	Each	788
9.1.18	3 X 240 sq. mm (62mm)	Each	808
9.1.19	3 X 300 sq. mm (70mm)	Each	918
9.1.20	3½ X 25 sq. mm (28mm)	Each	210
9.1.21	3½ X 35 sq. mm (32mm)	Each	245
9.1.22	3½ X 50 sq. mm (35mm)	Each	286
9.1.23	3½ X 70 sq. mm (38mm)	Each	324
9.1.24	3½ X 95 sq. mm (45mm)	Each	401
9.1.25	3½ X 120 sq. mm (45mm)	Each	417
9.1.26	3½ X 150 sq. mm (50mm)	Each	501
9.1.27	3½ X 185 sq. mm (57mm)	Each	671
9.1.28	3½ X 225 sq. mm (62mm)	Each	805
9.1.29	3½ X 240 sq. mm (62mm)	Each	824
9.1.30	3½ X 300 sq. mm (70mm)	Each	940
9.1.31	3½ X 400 sq. mm (82mm)	Each	1203

Item Code	Description	Unit	Rate ₹
9.1.32	4 X 10 sq. mm (25mm)	Each	163
9.1.33	4 X 16 sq. mm (28mm)	Each	208
9.1.34	4 X 25 sq. mm (28mm)	Each	211
9.1.35	4 X 35 sq. mm (32mm)	Each	246
9.1.36	4 X 50 sq. mm (35mm)	Each	290
9.2	Supplying and making outdoor end termination with cast resin compound including aluminium lugs and other jointing materials for following size of PVC insulated and PVC sheathed / XLPE aluminium conductor cable of 1.1 KV grade as required.		
9.2.1	2 X 16 sq. mm	Each	549
9.2.2	2 X 25 sq. mm	Each	592
9.2.3	2 X 35 sq. mm	Each	592
9.2.4	2 X 50 sq. mm	Each	592
9.2.5	3 X 16 sq. mm	Each	592
9.2.6	3 X 25 sq. mm	Each	592
9.2.7	3 X 35 sq. mm	Each	592
9.2.8	3 X 50 sq. mm	Each	633
9.2.9	3 X 70 sq. mm	Each	633
9.2.10	3 X 95 sq. mm	Each	747
9.2.11	3 X 120 sq. mm	Each	747
9.2.12	3 X 150 sq. mm	Each	747
9.2.13	3 X 185 sq. mm	Each	1011
9.2.14	3 X 225 sq. mm	Each	1011
9.2.15	3 X 240 sq. mm	Each	1179
9.2.16	3 X 300 sq. mm	Each	1179
9.2.17	3½ X 25 sq. mm	Each	592
9.2.18	3½ X 35 sq. mm	Each	633
9.2.19	3½ X 50 sq. mm	Each	633
9.2.20	3½ X 70 sq. mm	Each	695
9.2.21	3½ X 95 sq. mm	Each	756
9.2.22	3½ X 120 sq. mm	Each	756
9.2.23	3½ X 150 sq. mm	Each	1011
9.2.24	3½ X 185 sq. mm	Each	1011
9.2.25	3½ X 225 sq. mm	Each	1179
9.2.26	3½ X 240 sq. mm	Each	1179
9.2.27	3½ X 300 sq. mm	Each	1307
9.2.28	3½ X 400 sq. mm	Each	1499
9.2.29	4 X 16 sq. mm	Each	592
9.2.30	4 X 25 sq. mm	Each	592
9.2.31	4 X 35 sq. mm	Each	633
9.2.32	4 X 50 sq. mm	Each	633

Item Code	Description	Unit	Rate ₹
9.3	Supplying and making straight through joint with cast resin compound including ferrules and other jointing materials for following size of PVC insulated and PVC sheathed / XLPE aluminium conductor cable of 1.1 KV grade as required.		
9.3.1	2 X 16 sq. mm	Each	1144
9.3.2	2 X 25 sq. mm	Each	1144
9.3.3	2 X 35 sq. mm	Each	1144
9.3.4	2 X 50 sq. mm	Each	1308
9.3.5	3 X 16 sq. mm	Each	1144
9.3.6	3 X 25 sq. mm	Each	1144
9.3.7	3 X 35 sq. mm	Each	1308
9.3.8	3 X 50 sq. mm	Each	1308
9.3.9	3 X 70 sq. mm	Each	1523
9.3.10	3 X 95 sq. mm	Each	1626
9.3.11	3 X 120 sq. mm	Each	1815
9.3.12	3 X 150 sq. mm	Each	1815
9.3.13	3 X 185 sq. mm	Each	2165
9.3.14	3 X 225 sq. mm	Each	2451
9.3.15	3 X 240 sq. mm	Each	2491
9.3.16	3 X 300 sq. mm	Each	3147
9.3.17	3½ X 25 sq. mm	Each	1308
9.3.18	3½ X 35 sq. mm	Each	1308
9.3.19	3½ X 50 sq. mm	Each	1523
9.3.20	3½ X 70 sq. mm	Each	1565
9.3.21	3½ X 95 sq. mm	Each	1815
9.3.22	3½ X 120 sq. mm	Each	2165
9.3.23	3½ X 150 sq. mm	Each	2165
9.3.24	3½ X 185 sq. mm	Each	2451
9.3.25	3½ X 225 sq. mm	Each	2491
9.3.26	3½ X 240 sq. mm	Each	3018
9.3.27	3½ X 300 sq. mm	Each	3697
9.3.28	3½ X 400 sq. mm	Each	4478
9.3.29	4 X 16 sq. mm	Each	1144
9.3.30	4 X 25 sq. mm	Each	1308
9.3.31	4 X 35 sq. mm	Each	1308
9.3.32	4 X 50 sq. mm	Each	1523
9.4	Supplying and making straight through joint with heat shrinkable kit including ferrules and other jointing materials for following size of PVC insulated and PVC sheathed / XLPE aluminium conductor cable of 1.1 KV grade as required.		
9.4.1	2 X 16 sq. mm	Each	565

Item Code	Description	Unit	Rate ₹
9.4.2	2 X 25 sq. mm	Each	637
9.4.3	2 X 35 sq. mm	Each	637
9.4.4	2 X 50 sq. mm	Each	637
9.4.5	3 X 16 sq. mm	Each	804
9.4.6	3 X 25 sq. mm	Each	966
9.4.7	3 X 35 sq. mm	Each	966
9.4.8	3 X 50 sq. mm	Each	966
9.4.9	3 X 70 sq. mm	Each	1017
9.4.10	3 X 95 sq. mm	Each	1078
9.4.11	3 X 120 sq. mm	Each	1078
9.4.12	3 X 150 sq. mm	Each	1078
9.4.13	3 X 185 sq. mm	Each	1274
9.4.14	3 X 225 sq. mm	Each	1274
9.4.15	3 X 240 sq. mm	Each	1274
9.4.16	3 X 300 sq. mm	Each	1403
9.4.17	3½ X 25 sq. mm	Each	1145
9.4.18	3½ X 35 sq. mm	Each	1145
9.4.19	3½ X 50 sq. mm	Each	1598
9.4.20	3½ X 70 sq. mm	Each	1598
9.4.21	3½ X 95 sq. mm	Each	1658
9.4.22	3½ X 120 sq. mm	Each	2128
9.4.23	3½ X 150 sq. mm	Each	2128
9.4.24	3½ X 185 sq. mm	Each	2128
9.4.25	3½ X 225 sq. mm	Each	2725
9.4.26	3½ X 240 sq. mm	Each	2725
9.4.27	3½ X 300 sq. mm	Each	2854
9.4.28	3½ X 400 sq. mm	Each	3716
9.4.29	4 X 16 sq. mm	Each	975
9.4.30	4 X 25 sq. mm	Each	1145
9.4.31	4 X 35 sq. mm	Each	1145
9.4.32	4 X 50 sq. mm	Each	1598



CHAPTER 10 - HV CABLE JOINTING & END TERMINATION

Item Code	Description	Unit	Rate ₹
11 KV CABLE JOINTING			
10.1	Supplying and making indoor cable end jointing with cast resin compound, including lugs and other jointing materials, for following size of 3 core, XLPE aluminium conductor cable of 11 KV grade as required :		
10.1.1	70 sq. mm	Each	2339
10.1.2	120 sq. mm	Each	2876
10.1.3	240 sq. mm	Each	3428
10.1.4	300 sq. mm	Each	3428
10.2	Supplying and making outdoor cable end jointing with cast resin compound, including lugs and other jointing materials, for following size of 3 core, XLPE aluminium conductor cable of 11 KV grade as required :		
10.2.1	70 sq. mm	Each	5338
10.2.2	120 sq. mm	Each	6663
10.2.3	240 sq. mm	Each	8156
10.2.4	300 sq. mm	Each	8156
10.3	Supplying and making straight through cable jointing with cast resin compound, including ferrule and other jointing materials, for following size of 3 core, XLPE aluminium conductor cable of 11 KV grade as required :		
10.3.1	70 sq. mm	Each	3553
10.3.2	120 sq. mm	Each	3553
10.3.3	240 sq. mm	Each	5178
10.3.4	300 sq. mm	Each	6322
10.4	supplying and making indoor cable end termination with heat shrinkable jointing kit complete with all accessories including lugs suitable for following size of 3 core, XLPE aluminium conductor cable of 11 KV grade as required :		
10.4.1	70 sq. mm	Each	5455
10.4.2	120 sq. mm	Each	6551
10.4.3	240 sq. mm	Each	7007
10.4.4	300 sq. mm	Each	7007
10.5	Supplying and making outdoor cable end termination with heat shrinkable jointing kit complete with all accessories including lugs suitable for following size of 3 core, XLPE aluminium conductor cable of 11 KV grade as required :		
10.5.1	70 sq. mm	Each	7549

Item Code	Description	Unit	Rate ₹
10.5.2	120 sq. mm	Each	8289
10.5.3	240 sq. mm	Each	9400
10.5.4	300 sq. mm	Each	9400
10.6	Supplying and making straight through cable jointing with heat shrinkable jointing kit complete with all accessories including ferrules suitable for following size of 3 core, XLPE aluminium conductor cable of 11 KV grade as required :		
10.6.1	70 sq. mm	Each	12515
10.6.2	120 sq. mm	Each	15777
10.6.3	240 sq. mm	Each	17331
10.6.4	300 sq. mm	Each	17331
10.7	Supplying and making indoor cable end termination with heat shrinkable jointing kit complete with all accessories including lugs suitable for following size of 3 core, XLPE aluminium conductor cable of 33 KV grade as required :		
10.7.1	70 sq. mm	Each	8946
10.7.2	120 sq. mm	Each	9621
10.7.3	240 sq. mm	Each	14352
10.8	Supplying and making outdoor cable end termination with heat shrinkable jointing kit complete with all accessories including lugs suitable for following size of 3 core, XLPE aluminium conductor cable of 33 KV grade as required :		
10.8.1	70 sq. mm	Each	11949
10.8.2	120 sq. mm	Each	14905
10.8.3	240 sq. mm	Each	19255
10.9	Supplying and making straight through cable jointing with heat shrinkable jointing kit complete with all accessories including ferrules suitable for following size of 3 core, XLPE aluminium conductor cable of 33 KV grade as required :		
10.9.1	70 sq. mm	Each	30182
10.9.2	120 sq. mm	Each	38269
10.9.3	240 sq. mm	Each	53086



CHAPTER 11 - POLE ERECTION

Item Code	Description	Unit	Rate ₹
11.1	Erection of RCC/ PCC pole of following length in brick ballast and ramming the foundation, finishing with 150mm thick cement concrete (1:3:6) layer on top with including excavation and refilling etc as required.		
11.1.1	Above 4.5 metre and upto 6.5 metre	Each	2392
11.1.2	Above 6.5 metre and upto 8.0 metre	Each	2664
11.1.3	Above 8.0 metre and upto 11.0 metre	Each	3182
11.1.4	Above 11.00 metre and upto 13.00 metre	Each	3507
11.2	Erection of RCC/ PCC pole strut in brick ballast and ramming the foundation including excavation and refilling and secured with holding clamps, bolts, nuts, etc. as required.	Each	4047
11.3	Erection of metallic pole of following length in cement concrete 1:3:6 (1 cement : 3 coarse sand : 6 graded stone aggregate 40 mm nominal size) foundation including excavation and refilling etc. as required.		
11.3.1	Above 4.5 metre and upto 6.5 metre	Each	2311
11.3.2	Above 6.5 metre and upto 8.0 metre	Each	2796
11.3.3	Above 8.0 metre and upto 10.0 metre	Each	3322
11.3.4	Above 10.00 metre and upto 12.00 metre	Each	3897
11.4	Erection of steel tubular or rail pole strut in cement concrete 1:3:6 (1 cement : 3 coarse sand : 6 graded stone aggregate 40 mm nominal size) foundation including excavation and refilling and secured with holding clamps, bolts, nuts, etc. as required.	Each	3936
11.5	Providing and making steel pole collar with cement concrete (1 cement : 3 coarse sand : 6 stone aggregate 20mm) of specified size and shape including form work, plastering if required, curing etc as required. (volume of pole/ pipe not to be deducted)	cum	4189
11.6	Supplying and embedding following dia G.I. pipe (medium class) in pole collar/ foundation (during casting) for cable entry including bending the pipe to the required shape complete as required.		
11.6.1	32 mm dia	metre	259
11.6.2	40 mm dia	metre	292



CHAPTER 12 - MV OVER HEAD LINE WORK

Item Code	Description	Unit	Rate ₹
12.1	Supplying and erection of stay set complete (galvanised) with 19/20 mm dia X 1.8 metres long stay rod, anchor plate of size 45 cm X 45 cm X 7.5 mm, thimble, stay clamps, turn buckle (20 mm X 60 cm), 7/ 4.00 mm dia G.I. stay wire and strain insulator etc in cement concrete 1:3:6 (1 cement : 3 coarse sand : 6 graded stone aggregate 40 mm nominal size) foundation including excavation and refilling etc. as required.	Each	3440
12.2	Supplying and erection of stay set complete (galvanised) with 19/20 mm dia X 1.8 metres long stay rod, anchor plate of size 45 cm X 45 cm X 7.5 mm, thimble, stay clamps, turn buckle (20 mm X 60 cm), 7/ 3.15 mm dia G.I. stay wire and strain insulator etc in cement concrete 1:3:6 (1 cement : 3 coarse sand : 6 graded stone aggregate 40 mm nominal size) foundation including excavation and refilling etc. as required.	Each	3291
12.3	Supplying and erection of stay set complete (galvanised) with 19/20 mm dia X 1.8 metres long stay rod, anchor plate of size 45 cm X 45 cm X 7.5 mm, thimble, stay clamps, bow tightener, 7/ 4.00 mm dia G.I. stay wire and strain insulator etc in cement concrete 1:3:6 (1 cement : 3 coarse sand : 6 graded stone aggregate 40 mm nominal size) foundation including excavation and refilling etc. as required.	Each	3440
12.4	Supplying and erection of stay set complete (galvanised) with 19/20 mm dia X 1.8 metres long stay rod, anchor plate of size 45 cm X 45 cm X 7.5 mm, thimble, stay clamps, bow tightener, 7/ 3.15 mm dia G.I. stay wire and strain insulator etc in cement concrete 1:3:6 (1 cement : 3 coarse sand : 6 graded stone aggregate 40 mm nominal size) foundation including excavation and refilling etc. as required.	Each	3285
12.5	Supplying and erection of bow stay set complete (galvanised) with 19/20 mm dia X 1.8 metres long stay rod, anchor plate of size 45 cm X 45 cm X 7.5 mm, thimble, stay clamps, turn buckle (20 mm X 60 cm), 7/ 4.00 mm dia G.I. stay wire and strain insulator etc in cement concrete 1:3:6 (1 cement : 3 coarse sand : 6 graded stone aggregate 40 mm nominal size) foundation including excavation and refilling and also with 0.6 m long brace of size 50 mm X 50 mm X 6 mm angle iron with 50 mm dia pulley fixed at one end of the brace as required.	Each	3763
12.6	Supplying and erection of bow stay set complete (galvanised) with 19/20 mm dia X 1.8 metres long stay rod, anchor plate of size 45 cm X 45 cm X 7.5 mm, thimble, stay clamps, turn buckle (20 mm X 60 cm), 7/ 3.15 mm dia G.I. stay wire and strain		

Item Code	Description	Unit	Rate ₹
	insulator etc in cement concrete 1:3:6 (1 cement : 3 coarse sand : 6 graded stone aggregate 40 mm nominal size) foundation including excavation and refilling and also with 0.6 m long brace of size 50 mm X 50 mm X 6 mm angle iron with 50 mm dia pulley fixed at one end of the brace as required.	Each	3608
12.7	Supplying and erection of bow stay set complete (galvanised) with 19/20 mm dia X 1.8 metres long stay rod, anchor plate of size 45 cm X 45 cm X 7.5 mm, thimble, stay clamps, bow tightener), 7/ 4.00 mm dia G.I. stay wire and strain insulator etc in cement concrete 1:3:6 (1 cement : 3 coarse sand : 6 graded stone aggregate 40 mm nominal size) foundation including excavation and refilling and also with 0.6 m long brace of size 50 mm X 50 mm X 6 mm angle iron with 50 mm dia pulley fixed at one end of the brace as required.	Each	3763
12.8	Supplying and erection of bow stay set complete (galvanised) with 19/20 mm dia X 1.8 metres long stay rod, anchor plate of size 45 cm X 45 cm X 7.5 mm, thimble, stay clamps, bow tightener), 7/ 3.15mm dia G.I. stay wire and strain insulator etc in cement concrete 1:3:6 (1 cement : 3 coarse sand : 6 graded stone aggregate 40 mm nominal size) foundation including excavation and refilling and also with 0.6 m long brace of size 50 mm X 50 mm X 6 mm angle iron with 50 mm dia pulley fixed at one end of the brace as required.	Each	3608
12.9	Erection of stay set complete (galvanised) in cement concrete 1:3:6 (1 cement : 3 coarse sand : 6 graded stone aggregate 40 mm nominal size) foundation including excavation and refilling etc. as required.	Each	2033
12.10	Supplying of channel iron 75 mm X 40 mm X 6 mm (7.14 kg per metre) cross arm for 2 wire over head line complete with clamps, bolts, nuts and washer etc including drilling of holes for insulator pins etc (as per drawing) and painting with primer and finished paint as required.	Set	455
12.11	Supplying of channel iron 75 mm X 40 mm X 6 mm (7.14 kg per metre) cross arm for 4 wire over head line complete with clamps, bolts, nuts and washer etc including drilling of holes for insulator pins etc (as per drawing) and painting with primer and finished paint as required .	Set	776
12.12	Erection of angle iron/ channel iron cross arm on wood/ RCC/ PCC/ steel tubular/ rail pole etc. as required.	set	121
12.13	Supplying and erection of galvanised 'D' iron clamps complete with shackle insulator (75 mm X 90 mm),G. I. bolts, nuts and washers, coach screws etc. as required.	Set	190
12.14	Supplying and erection of galvanised 'D' iron clamps complete with shackle insulator (100 mm X 110 mm), G.I. bolts, nuts and washers, coach screws etc. as required.	Set	216
12.15	Erection of galvanised 'D' iron clamps and insulator on pole as required.	Set	31

Item Code	Description	Unit	Rate ₹
12.16	Supplying and erection of 75 mm X 90 mm shackle insulator with G. I. Bolt, nuts and straps etc. as required .	Set	135
12.17	Supplying and erection of 100 mm X 110 mm shackle insulator with G. I. Bolt, nuts and straps etc. as required .	Set	161
12.18	Supplying and erection of 100 mm X 65 mm pin insulator complete with G. I. Spindle and nuts etc. as required .	Set	72
12.19	Supplying and erection of 100 mm X 80 mm pin insulator complete with G. I. Spindle and nuts etc. as required .	Set	74
12.20	Erection of LV/MV shackle/pin insulator etc. as required.	Set	33
12.21	Erection of ACSR conductor of 7/2.11 mm to 7/3.00 mm diameter including binding etc. as required.	Kg	80
12.22	Erection of ACSR conductor of 7/3.35 mm to 7/4.00 diameter and above including binding etc. as required.	Kg	105
12.23	Erection of all aluminium conductor of 7/1.96 mm to 7/3.10 mm diameter including binding etc. as required.	Kg	105
12.24	Erection of all aluminium conductor of 7/3.40 mm to 7/4.00 mm diameter and above including binding etc. as required.	Kg	81
12.25	Erection of G.I. Wire No. 8 SWG including binding etc. as required.	Kg	16
12.26	Erection of hexagonal type guard as required.	Each	87
12.27	Erection of ring type guard as required.	Each	29
12.28	Erection of cradle guard as required.	Each	58
12.29	Supplying and erection of 15 A aerial fuse complete as required.	Each	62
12.30	Supplying and erection of 30 A aerial fuse complete as required.	Each	73
12.31	Erection of aerial fuse as required.	Each	44
12.32	Supplying and fixing MV horn gap lightning arrestor as required.	Each	170
12.33	Fixing of MV lightning arrestor as required.	Each	66
12.34	Supplying and fixing of 32 mm dia X 2.00 metres long G.I. pipe (medium class) bracket for mounting of fluorescent / HPMV / HPSV street light fitting on pole including bending the pipe to the required shape, 2 nos 40 mm X 3 mm flat iron clamps with nuts, bolts and washer, painting the flat iron with primer and finish paint etc. as required.	Each	749
12.35	Providing and fixing 50 mm dia X 3.2 metres G.I. pipe (including accessories) complete with 50 mm X 50 mm X 6 mm angle iron bracket on wall and 75 mm X 90 mm shackle insulator with straps for house service connection including painting the angle and flat iron with primer and finish paint etc. as required.	Each	1807
12.36	Providing and fixing 50 mm dia X 5.6 metres G.I. pipe (including accessories) complete with 50 mm X 50 mm X 6 mm angle iron cross arm and 40 mm X 3mm M.S. flat iron clamps bends for guard wire, 75 mm X 90 mm shackle insulator and straps, 7/ 3.15 mm G.I. wire stay set for house service connection including painting the angle and flat iron with primer and finish paint etc. as required.	Each	2713

Item Code	Description	Unit	Rate ₹
12.37	Supplying and fixing of light class G.I. pipe of 50 mm dia. (nominal) 3 metres length along the pole for protection of under ground cable as required.	Each	1276
12.38	Supplying and fixing of light class G.I. pipe of 80 mm dia. (nominal) 3 metres length along the pole for protection of under ground cable as required.	Each	1821
12.39	Supplying and fixing of light class G.I. pipe of 100 mm dia. (nominal) 3 metres length along the pole for protection of under ground cable as required.	Each	2448
12.40	Dismantling of over head lines comprising of copper/ aluminium over head conductor, G.I. wire, cross arms, insulators etc. as required.	Kg	35
12.41	Dismantling of pole/ street light standard/ strut embedded in brick ballast foundation etc. as required.	Each	787
12.42	Dismantling of pole/ street light standard/ strut embedded in cement concrete foundation etc. as required.	Each	1046

□□□□□

CHAPTER 13 - HV OVER HEAD LINE WORK

Item Code	Description	Unit	Rate ₹
11 KV OVER HEAD LINE			
13.1	Supplying and erection of galvanised stay set for 11 KV over head lines complete with 19/ 20 mm dia X 1.8 metres long stay rod, anchor plate of size 45 cm X 45 cm X 7.5 mm thick, thimble, stay clamps, turn buckle (20 mm X 600 mm), 7/ 4.00 mm dia G.I. stay wire and 11 KV strain insulator etc in cement concrete 1:3:6 (1 cement : 3 coarse sand : 6 graded stone aggregate 40 mm nominal size) foundation including excavation and refilling etc. as required.	Set	3502
13.2	Supplying of channel iron 75 mm X 40 mm X 6 mm (7.14 kg per metre) pole top bracket/ cross arm for single 11 KV over head line conductor complete with 50 mm X 6mm flat iron clamp, bolts, nuts and washers including drilling holes for insulator pins, bolts and nuts etc and painting with primer and finish paint as required.	Each	318
13.3	Supplying of 50 mm X 8 mm M.S. flat iron pole top bracket/ cross arm for single 11/22/33 KV over head line conductor complete with fixing clamps, bolts, nuts and washers drilling holes for insulator pins, bolts and nuts etc and painting with primer and finish paint as required.	Each	345
13.4	Supplying of channel iron 75 mm X 40 mm X 6 mm (7.14 kg per metre) cross arm for two 11 KV over head line conductors complete with 50 mm X 50 mm X 6 mm (angle iron bracket welded to the channel iron and complete with 50 mm X 6mm M.S. flat iron clamps, bolts and nuts including drilling holes for insulator pins, bolts, nuts and washers etc (as per drawing) and painting with primer and finish paint as required.	Each	1467
13.5	Supplying of channel iron 75 mm X 40 mm X 6 mm (7.14 kg per metre) V shape cross arm for two 11 KV over head line conductors complete with 50 mm X 6mm M.S. flat iron clamps, bolts and nuts including drilling holes for insulator pins, bolts, nuts and washers etc (as per drawing) and painting with primer and finish paint as required.	Each	1174
13.6	Erection of pole top/ straight two wire/ V shape two wire, angle iron/ channel iron, cross arm on steel tubular/ rail/ PCC pole for 11/22/33 KV as required.	Set	220
13.7	Supplying of two lengths of channel iron 75 mm X 40 mm X 6 mm (7.14 kg per metre) double pole cross arm for three wire 11KV over head line conductors complete with through bolts and nuts for clamping to the poles, 50 mm X 6 mm M.S. flats welded on one side to the channel iron and with bolts and nuts on the other side for tying the cross arms together, including drilling holes for insulator pins/ fittings, bolts, nuts and washers etc (as per drawing) and painting with primer and finish paint as required.	Set	3108

Item Code	Description	Unit	Rate ₹
13.8	Supplying and erection of a set of cross bracing FRL Same work for 11 KV over head line double pole structure having four members fabricated out of 50 mm X 50 mm X 6 mm angle iron to form a rectangle of minimum size 1400 mm width X 2500 mm height , complete with 50 mm X 6mm M.S. flat iron clamps, bolts and nuts including drilling holes for insulator pins, bolts and nuts etc (as per drawing) and painting with primer and finish paint as required.	Set	4331
13.9	Erection of double pole 3 wire cross arm for 11KV/ 22KV/ 33 KV over head lines as required.	Each	504
13.10	Supplying and erection of 11 KV pin insulator complete with large steel head G.I. pin, nuts, washers etc. as required.	Set	385
13.11	Supplying and erection of 11 KV disc insulator for 11 KV over head lines with galvanised insulator fittings, ball and socket type and complete with galvanised strain clamps, bolts, nuts, washers etc. as required.	Set	1193
13.12	Erection of disc/ pin insulator for 11 KV over head lines as required.	Set	66
13.13	Supplying and erection of three piece nonlinear resistor type lightning arrestor suitable for 3 wire, 11 KV overhead lines with rated voltage 9 KV (rms) with a nominal discharge current rating of 5 KA and complete with galvanised clamping arrangement, G.I. bolts, nuts, washers etc. as required.	Set	6069
33 KV OVER HEAD LINE			
13.14	Supplying and erection of galvanised stay set for 33 KV over head lines complete with 19/ 20 mm dia X 1.8 metres long stay rod, anchor plate of size 45 cm X 45 cm X 7.5 mm thick, thimble, stay clamps, turn buckle (20 mm X 600 mm), 7/ 4.00 mm dia G.I. stay wire and 33 KV strain insulator etc in cement concrete 1:3:6 (1 cement : 3 coarse sand : 6 graded stone aggregate 40 mm nominal size) foundation including excavation and refilling etc. as required.	Set	3531
13.15	Supplying of channel iron 75 mm X 40 mm X 6 mm (7.14 kg per metre) pole top bracket/ cross arm for single 33 KV over head line conductor complete with 50 mm X 6mm flat iron clamps, bolts and nuts including drilling holes for insulator pins, bolts, nuts, washers etc and painting with primer and finish paint as required.	Each	338
13.16	Supplying of channel iron 75 mm X 40 mm X 6 mm (7.14 kg per metre) cross arm for two 33 KV over head line conductors complete with 50 mm X 50 mm X 6 mm angle iron bracket welded to the channel iron and complete with 50 mm X 6mm M.S. flat iron clamps, bolts and nuts including drilling holes for insulator pins, bolts, nuts, washers etc and painting with primer and finish paint as required.	Each	1855
13.17	Supplying of channel iron 75 mm X 40 mm X 6 mm (7.14 kg per metre) "V" shape cross arm for two 33 KV over head line conductors complete with 50 mm X 6mm M.S. flat iron clamps, bolts and nuts including drilling holes for insulator pins, bolts and nuts etc and painting with primer and finish paint as required.	Each	1353

Item Code	Description	Unit	Rate ₹
13.18	Supplying of channel iron 100 mm X 50 mm X 6 mm (9.56 kg per metre), pole top bracket/ cross arm for single 33 KV over head line conductor complete with 50 mm X 6 mm M.S. flat iron clamps, bolts and nuts including drilling holes for insulator pins, bolts and nuts etc and painting with primer and finish paint as required.	Each	417
13.19	Supplying of channel iron 100 mm X 50 mm X 6 mm (9.56 kg per metre) cross arm for two wire 33 KV over head line conductors complete with 50 mm X 50 mm X 6 mm angle iron bracket welded to the channel iron and complete with 50 mm X 6mm M.S. flat iron clamps, bolts and nuts including drilling holes for insulator pins/ fittings, bolts, nuts, washers etc and painting with primer and finish paint as required .	Each	2301
13.20	Supplying of channel iron 100 mm X 50 mm X 6 mm (9.56 kg per metre) V shape cross arm for two 33 KV over head line conductors complete with 50 mm X 6mm M.S. flat iron clamps, bolts and nuts including drilling holes for insulator pins, bolts, nuts, washers etc and painting with primer and finish paint as required .	Each	1696
13.21	Supplying of two lengths of channel iron 100 mm X 50 mm X 6 mm (9.56 kg per metre) double pole cross arm for three wire 33 KV over head line conductors complete with through bolts and nuts for clamping to the poles, 50 mm X 6 mm M.S. flats welded on one side to the channel iron and with bolts and nuts on the other side for tying the cross arms together, including drilling holes for insulator pins/ fittings, bolts, nuts, washers etc and painting with primer and finish paint as required .	Set	4211
13.22	Supplying and erection of a set of cross bracing frame work for 33 KV over head line double pole structure having four members fabricated out of 65 mm X 65 mm X 6 mm angle iron to form a rectangle of minimum size 2400 mm width X 2800 mm height complete with 50 mm X 6mm M.S. flat iron clamps, bolts and nuts including drilling holes for insulator pins, bolts, nuts, washers etc and painting with primer and finish paint as required .	Set	6470
13.23	Supplying and erection of 33 KV pin insulator complete with large steel head G.I. pin, nuts, washers etc. as required.	Set	1107
13.24	Supplying and erection of a set of three 11 KV disc insulator for 33 KV over head lines with galvanised insulator fittings, ball and socket type and complete with galvanised strain clamps, bolts, nuts, washers etc. as required.	Set	3495
13.25	Supplying and erection of single piece nonlinear resistor type lightning arrester suitable for 3 wire, 33 KV overhead lines with rated voltage 30 KV (rms) with a nominal discharge current rating of 10 KA (station class) and complete with galvanised clamping arrangement, G.I. bolts, nuts, washers etc. as required.	Set	43783



CHAPTER 14 - MISC.CIVIL ITEMS

Item Code	Description	Unit	Rate ₹
14.1	Excavation for foundation in soft soil including dressing of sides and ramming of bottoms, lift upto 1.5 m including getting out the excavated soil and disposal of surplus excavated soil as directed, within a lead of 50 metres.	cum	155
14.2	Excavation for cable trenches of depth upto 1.2 m in soft soil including getting out the excavated soil and disposal of surplus excavated soil as directed within a lead of 50 metres.	cum	157
14.3	Filling available excavated earth (excluding rock) in trenches, sides of foundations etc. in layers not exceeding 20cm in depth, consolidating each deposited layer by ramming and watering, lead up to 50 metres.	cum	100
14.4	Excavation for cable trenches in soft soil, depth upto 1.2 m including dressing of sides lift upto 1.5 m, including getting out the excavated soil, refilling with sand and or good soil after laying of cable/ pipe etc in layers of 20 cm, ramming, watering and disposal of surplus excavated soil as directed, within a lead of 50 metres.	cum	257
14.5	Deduct for not consolidation by ramming and watering while re-filling with sand and or good soil in cable/ pipe laying.	cum	57
14.6	Excavation of the cable trenches in hard rock not exceeding 1.5 metres in width, and lift upto 1.5 metres, including getting out the excavated soil and disposal of excavated soil as directed within a lead of 50 metres.	cum	477
14.7	Providing and laying in position cement concrete 1:2:4 (1 cement : 2 coarse sand : 4 graded stone aggregate 20 mm nominal size) in foundation of pump, DG set etc including form work etc as required.	cum	4683
14.8	Providing and laying in position cement concrete 1:3:6 (1 cement : 2 coarse sand : 6 graded stone aggregate 20 mm nominal size) in foundation of pump, DG set etc including form work etc as required.	cum	4185
14.9	Providing and laying in position cement concrete 1:3:6 (1 cement : 2 coarse sand : 6 graded stone aggregate 40 mm nominal size) in foundation of pump, DG set etc including form work etc as required.	cum	4047
14.10	Providing and laying in position reinforced cement concrete 1:2:4 (1 cement : 2 coarse sand : 4 graded stone aggregate 20 mm nominal size) in foundation of pump, DG set etc including form work etc as required (excluding reinforcement).	cum	4909

Item Code	Description	Unit	Rate ₹
14.11	Providing brick work (in width 225 mm or more) with F.P.S. bricks of class designation 7.5 in cement mortar 1:4 (1 cement : 4 coarse sand) at all levels.	cum	3727
14.12	Providing 15mm thick cement plaster of mix 1:4 (1 cement : 4 fine sand) at all levels.	sqm	162
14.13	Providing, laying and fixing following dia G.I. pipe (medium class) in ground complete with G.I. fittings including trenching (75 cm deep) and re-filling etc as required		
14.13.1	50 mm dia	metre	388
14.13.2	80 mm dia	metre	615
14.13.3	100 mm dia	metre	846
14.13.4	150 mm dia	metre	1317
14.14	Providing, laying and fixing following dia RCC pipe NP2 class (light duty) in ground complete with RCC collars, jointing with cement mortar 1:2 (1 cement : 2 fine sand) including trenching (75 cm deep) and refilling etc as required.		
14.14.1	100 mm dia	metre	313
14.14.2	150 mm dia	metre	357
14.14.3	250 mm dia	metre	424
14.14.4	300 mm dia	metre	529

□□□□□

CHAPTER 15 - LIGHTING CONTROLS

Item Code	Description	Unit	Rate ₹
15.1	Supplying, installation, testing and commissioning of Passive Infrared(PIR) technology based occupancy sensor having high performance, non regulating programmable type, suitable for connected load upto 10Amp , for mounting height up to 2.8 mtr and for 5 m diameter coverage area along with necessary fixing arrangements i/c programming at site etc. complete as required.	Each	3157
15.2	Supplying, installation, testing and commissioning of Passive Infrared(PIR) technology based occupancy sensor with day light dimming (lighting level shall be regulated as per availability of natural day light in an area along with occupancy detection.) having high performance, regulating programmable type, suitable for connected load upto 10Amp , for mounting height up to 2.8 mtr and for 5 m diameter coverage area along with necessary fixing arrangements i/c programming at site etc. complete as required.	Each	4431
15.3	Supplying, installation, testing and commissioning of Microwave technology based occupancy sensor having high performance, non regulating programmable type, suitable for connected load upto 10Amp , for mounting height up to 2.6 mtr and for 5m X 20m coverage area along with necessary fixing arrangements i/c programming at site etc. complete as required.	Each	6064
15.4	Supplying, installation, testing and commissioning of Astronomical time switch of following configuration to be mounted in feeder pillars / Lighting DBs for automatic switching On & OFF of street lights at sun set & sun rise or twilight (Auto ON, Auto OFF, Auto modes) with manual override facility with 12/24 hour display format with suitable battery and indication for relay status i/c programming at site complete as required.		
15.4.1	1 output per phase and suitable for single phase supply	Each	2530
15.4.2	2 output per phase and suitable for single phase supply	Each	5293
15.4.3	3 output (1 output per phase) and suitable for three phase supply	Each	6218



CHAPTER 16 - HVAC (ONLY PLUMBING , DUCTING & AHU)

Item Code	Description	Unit	Rate ₹
PLUMBING			
INSULATED CHILLED WATER PIPING (resin bonded fiber glass glass insulation)			
16.1	Supplying, laying/ fixing, testing and commissioning of following nominal sizes of chilled water piping inside the building (with necessary clamps, vibration isolators and fittings but excluding valves, strainers, gauges etc.) duly insulated with 80 kg/cum density resin bonded fiber glass pipe section insulation covered with a layer of 120 gm/sqm polythene sheet (vapour barrier) and finally applying 0.63mm aluminium sheet cladding complete with type3 , grade 1 roofing feltstrip(as per IS:1322 as amended up to date) at joints and repairing of damage to building etc. as per specifications and as required.		
	Note : The Pipes of sizes 150mm & below shall be M.S. 'C' class as per IS : 1239 and pipes size above 150mm shall be welded black steel pipe heavy class as per IS: 3589, from minimum 6.35mm thick M.S. Sheet for pipes upto 350 mm dia. and from minimum 7mm thick MS sheet for pipes of 400 mm dia and above.		
16.1.1	400mm dia.(65 mm thick insulation)	mtr	9310.00
16.1.2	350 mm dia.(65 mm thick insulation)	mtr	6429.00
16.1.3	300 mm dia.(65 mm thick insulation)	mtr	5811.00
16.1.4	250mm dia.(50 mm thick insulation)	mtr	4596.00
16.1.5	200mm dia.(50 mm thick insulation)	mtr	3837.00
16.1.6	150mm dia. (50mm thick insulation)	mtr	2793.00
16.1.7	125mm dia.(40mm thick insulation)	mtr	2272.00
16.1.8	100mm dia. (40mm thick insulation)	mtr	1976.00
16.1.9	80mm dia. (25mm thick insulation)	mtr	1377.00
16.1.10	65mm dia.(25mm thick insulation)	mtr	1187.00
16.1.11	50mm dia.(25mm thick insulation)	mtr	964.00
16.1.12	40mm dia. (25mm thick insulation)	mtr	817.00
16.1.13	32 mm dia(25mm thick insulation)	mtr	704.00
16.1.14	25 mm dia(25mm thick insulation)	mtr	628.00

Item Code	Description	Unit	Rate ₹
INSULATED CHILLED WATER PIPING (Nitrile rubber insulation)			
16.2	Supplying, laying/ fixing, testing and commissioning of following nominal sizes of chilled water piping inside the building (with necessary clamps, vibration isolators and fittings but excluding valves, strainers, gauges etc.) duly insulated with following thick cross link closed cell preformed sections of polyethylene insulation applied by adhesive confirming to standard specifications and finally applying 0.63mm aluminium sheet cladding complete with type3 , grade 1 roofing feltstrip(as per IS:1322 as amended up to date) at joints and repairing of damage to building etc. as per specifications and as required complete in all respect. Note : The Pipes of sizes 150mm & below shall be M.S. 'C' class as per IS : 1239 and pipes size above 150mm shall be welded black steel pipe heavy class as per IS: 3589, from minimum 6.35mm thick M.S. Sheet for pipes upto 350 mm dia. and from minimum 7mm thick MS sheet for pipes of 400 mm dia and above.		
16.2.1	400mm dia.(32 mm thick insulation)	metre	8797.00
16.2.2	350mm dia.(32 mm thick insulation)	metre	5967.00
16.2.3	300mm dia. (32 mm thick insulation)	metre	5403.00
16.2.4	250mm dia.(32 mm thick insulation)	metre	4658.00
16.2.5	200mm dia.(32 mm thick insulation)	metre	3729.00
16.2.6	150mm dia. (32 mm thick insulation)	metre	2662.00
16.2.7	125mm dia.(32 mm thick insulation)	metre	2444.00
16.2.8	100mm dia. (32 mm thick insulation)	metre	1905.00
16.2.9	80mm dia.(32 mm thick insulation)	metre	1479.00
16.2.10	65mm dia(32 mm thick insulation)	metre	1270.00
16.2.11	50mm dia(32 mm thick insulation)	metre	1023.00
16.2.12	40mm dia. (32 mm thick insulation)	metre	860.00
16.2.13	32 mm dia(19 mm thick insulation)	metre	647.00
16.2.14	25 mm dia(19 mm thick insulation)	metre	569.00
INSULATED CHILLED WATER PIPING (expanded polystyrene insulation)			
16.3	Supplying, laying/ fixing, testing and commissioning of following nominal sizes of chilled water piping plumbing inside the building (with necessary clamps, vibration isolators and fittings but excluding valves, strainers, gauges etc.) duly insulated with fire retardant quality expanded polystyrene moulded pipe section of density 20 kg/cu.m after a thick coat of cold setting adhesive (CPRX compound) wrapping with 500g polythene faced hessain and finally applying		

Item Code	Description	Unit	Rate ₹
	0.63mm aluminium sheet cladding complete with type3 , grade 1 roofing feltstrip(as per IS:1322 as amended up to date) at joints repairing of damage to building etc. as per specifications and as required complete in all respect. Note : The Pipes of sizes 150mm & below shall be M.S. 'C' class as per IS : 1239 and pipes size above 150mm shall be welded black steel pipe heavy class as per IS: 3589, from minimum 6.35mm thick M.S. Sheet for pipes upto 350 mm dia. and from minimum 7mm thick MS sheet for pipes of 400 mm dia and above.		
16.3.1	400mm dia.(75 mm insulation)	metre	8704.00
16.3.2	350 mm dia.(75 mm insulation)	metre	5912.00
16.3.3	300 mm dia.(75 mm insulation)	metre	5393.00
16.3.4	250mm dia.(75 mm insulation)	metre	4509.00
16.3.5	200mm dia.(75 mm insulation)	metre	3779.00
16.3.6	150mm dia. (75mm insulation)	metre	2757.00
16.3.7	125mm dia.(50mm insulation)	metre	2185.00
16.3.8	100mm dia. (50mm insulation)	metre	1859.00
16.3.9	80mm dia. (50mm insulation)	metre	1428.00
16.3.10	65mm dia.(50mm insulation)	metre	1237.00
16.3.11	50mm dia.(50mm insulation)	metre	1012.00
16.3.12	40mm dia. (50mm insulation)	metre	863.00
16.3.13	32 mm dia(50mm insulation)	metre	750.00
16.3.14	25 mm dia(50mm insulation)	metre	650.00
	INSULATION ON EXISTING PIPE		
16.4	Supplying, laying/ fixing, testing and commissioning of following thickness resin bonded fiber glass pipe section insulation having density 80 kg/cum duly covered with a layer of 120 gm/sqm polythene sheet (vapour barrier) on existing pipe and finally applying 0.63mm aluminium sheet cladding complete with type3 , grade 1 roofing feltstrip(as per IS:1322 as amended up to date) at joints etc. as per specifications and as required.		
16.4.1	65mm	per sqm	1869.00
16.4.2	50mm	per sqm	1537.00
16.4.3	40mm	per sqm	1328.00
16.4.4	25mm	per sqm	1033.00
16.5	Supplying, laying/ fixing, testing and commissioning of following thickness cross link closed cell preformed sections of polyethylene insulation Nitrile rubber applied by adhesive confirming to standard specifications and finally applying 0.63mm aluminium sheet cladding complete with type3 ,		

Item Code	Description	Unit	Rate ₹
	grade 1 roofing feltstrip(as per IS:1322 as amended up to date) at joints etc. as per specifications and as required complete in all respect.		
16.5.1	32mm	sqm	1504.00
16.5.2	19mm	sqm	1073.00
16.6	Supplying, laying/ fixing, testing and commissioning of following thickness insulation with fire retardant quality expanded polystyrene moulded pipe section of density 20 kg/cu.m after a thick coat of cold setting adhesive (CPRX compound) wrapping with 500g polythene faced hessain and finally applying 0.63mm aluminium sheet cladding complete with type3 , grade 1 roofing feltstrip(as per IS:1322 as amended up to date) at joints repairing etc. as per specifications and as required complete in all respect..		
16.6.1	75mm	sqm	1426.00
16.6.2	50mm	sqm	1113.00
	INSULATED VALVES		
16.7	Supplying, fixing, testing and commissioning of following valves, strainers, gauges in the chilled water plumbing duly insulated to the same specifications as the connected piping and adequately supported as per specifications.		
16.7.1	BUTTERFLY VALVE (MANUAL) with C I body SS Disc, Nitrile Rubber Seal & O- Ring PN 16 pressure rating for chilled water/hot water circulation as specified		
16.7.1.1	200 mm dia	Each	10871.00
16.7.1.2	150mm dia.	Each	5977.00
16.7.1.3	125mm dia.	Each	5447.00
16.7.1.4	100mm dia.	Each	4563.00
16.7.1.5	80mm dia.	Each	3514.00
16.7.1.6	65mm dia.	Each	3151.00
16.7.1.7	50mm dia.	Each	2753.00
16.7.1.8	40mm dia.	Each	2581.00
16.7.2	BALANCING VALVE WITH BUILT IN MEASURING FACILITY with C I body flanged construction with EPDM coated disc with long pitch with protected out pipe insulation & PN 16 pressure rating for chilled / hot water circulation as specified.		
16.7.2.1	200 mm dia	Each	49271.00
16.7.2.2	150mm dia.	Each	26942.00
16.7.2.3	125mm dia.	Each	18608.00
16.7.2.4	100mm dia.	Each	13626.00
16.7.2.5	80mm dia.	Each	7497.00
16.7.2.6	65 mm dia	Each	6209.00

Item Code	Description	Unit	Rate ₹
16.7.2.7	50mm dia.	Each	4865.00
16.7.2.8	40 mm dia	Each	3072.00
16.7.3	NON - RETURN VALVE with duel plate of C I body SS plates vulcanized NBR seal flanged end & PN 16 pressure rating for chilled / hot water circulation including insulation as specified.		
16.7.3.1	200 mm dia	Each	8470.00
16.7.3.2	150mm dia.	Each	7217.00
16.7.3.3	125mm dia.	Each	5583.00
16.7.3.4	100 mm dia	Each	4458.00
16.7.3.5	80mm dia.	Each	3086.00
16.7.3.6	65 mm dia	Each	2555.00
16.7.4	Y - STRAINER of Ductile CI Body flanged ends with stainless steel strainer for chilled / hot water circulation including insulation as specified.		
16.7.4.1	200mm dia	Each	18225.00
16.7.4.2	150mm dia.	Each	14884.00
16.7.4.3	125mm dia.	Each	9880.00
16.7.4.4	100 mm dia	Each	8075.00
16.7.4.5	80 mm dia	Each	6117.00
16.7.4.6	65mm dia.	Each	5096.00
16.7.4.7	50mm dia.	Each	4373.00
16.7.4.8	40mm dia.	Each	3872.00
16.8	Providing and fixing in position the industrial type pressure gauge complete as required	Each	947.00
16.9	Providing & fixing in position the mercury in glass industrial type thermometer complete as required	Each	673.00
16.10	CONDENSER WATER PIPE		
16.10.1	Supplying, fixing, testing and commissioning of condenser water pipes of following sizes of MS 'C' class along with necessary clamps, vibration isolators and fittings such as bends,tees etc.but excluding valves, strainers, gauges etc. adequately supported on rigid supports duly painted/buried in ground excavation and refilling etc. as per specification and as required complete in all respect.		
	Note:-The Pipes size 150mm & below shall be M.S. 'C' class as per IS : 1239 and pipes size above 150mm shall be welded black steel pipe heavy class as per IS: 3589, from minimum 6.35mm thick M.S. Sheet for pipes upto 350 mm dia. And from minimum 7mm thick MS sheet for pipes of 400 mm dia and above.		

Item Code	Description	Unit	Rate ₹
16.10.1.1	300 mm dia.	metre	3876.00
16.10.1.2	250 mm dia	metre	3234.00
16.10.1.3	200 mm dia.	metre	2667.00
16.10.1.4	150 mm dia.	metre	1813.00
16.10.1.5	125 mm dia.	metre	1560.00
16.10.1.6	100 mm dia.	metre	1305.00
VALVES WITHOUT INSULATION			
16.11	Supplying, fixing, testing and commissioning of following size valves, gauges and strainers for condenser water circulation as per specifications.		
16.11.1	BUTTERFLY VALVE (MANUAL) with C I body SS disc nitrile sheet & O-ring & PN 16 pressure rating as specified.		
16.11.1.1	200 mm dia.	Each	10148.00
16.11.1.2	150 mm dia.	Each	5303.00
16.11.1.3	125 mm dia.	Each	4864.00
16.11.1.4	100 mm dia.	Each	4007.00
16.11.1.5	80 mm dia.	Each	3159.00
16.11.1.6	65 mm dia.	Each	2824.00
16.11.1.7	50 mm dia.	Each	2435.00
16.11.1.8	40 mm dia.	Each	2307.00
16.11.2	NON - RETURN VALVE with dual plate of C I body SS plates vulcanized NBR seal flanged end & PN 16 pressure rating as specified.		
16.11.2.1	200 mm dia.	Each	7748.00
16.11.2.2	150 mm dia.	Each	6557.00
16.11.2.3	125 mm dia.	Each	5000.00
16.11.2.4	100 mm dia.	Each	3902.00
16.11.2.5	80 mm dia.	Each	2730.00
16.11.2.6	65 mm dia.	Each	2229.00
DUCTING, GRILLS,DIFFUSER AND INSULATION			
16.12.1	Supply, installation, balancing and commissioning of factory fabricated GSS sheet metal rectangular/round ducting complete with neoprene rubber gaskets, elbows, splitter dampers, vanes, hangers, supports etc. as per approved drawings and specifications of following sheet thickness complete as required.		
16.12.1.1	Thickness 0.63 mm sheet	Sqm	637.00
16.12.1.2	Thickness 0.80 mm sheet	Sqm	750.00
16.12.1.3	Thickness 1.00 mm sheet	Sqm	933.00
16.12.1.4	Thickness 1.25 mm sheet	Sqm	1069.00

Item Code	Description	Unit	Rate ₹
16.12.2	Supply, installation, balancing and commissioning of site fabricated GSS sheet metal rectangular/round ducting complete with neoprene rubber gaskets, elbows, splitter dampers, vanes, hangers, supports etc. as per approved drawings and specifications of following sheet thickness complete as required.		
16.12.2.1	Thickness 0.63 mm sheet	Sqm	584.00
16.12.2.2	Thickness 0.80 mm sheet	Sqm	662.00
16.12.2.3	Thickness 1.00 mm sheet	Sqm	883.00
16.12.2.4	Thickness 1.25 mm sheet	Sqm	1024.00
16.13	Supply, installation, testing and commissioning of GI volume control duct damper complete with neoprene rubber gaskets, nuts, bolts, screws linkages, flanges etc, as per specifications.	Sqm	4673.00
16.14	Supply, installation, testing and commissioning of Motorized (ON-OFF Type) duct mounted GI volume control damper with enthalpy sensor and necessary control wire (minimum 1.5 sqmm) for integration within AHU room		
16.14.1	Damper	Sqm	5355.00
16.14.2	Actuator	Each	5230.00
16.15	Supplying & fixing of powder coated extruded aluminium Supply Air Grills with aluminium volume control dampers as per specifications.	Sqm	6326.00
16.16	Supplying & fixing of powder coated extruded aluminium Return Air Grills with louvers but without volume control dampers complete as required.	Sqm	3742.00
16.17	Supplying, fixing testing commissioning of supply air diffusers of powder coated aluminium with aluminium volume control dampers with anti smudge ring & removable core.	Sqm	8440.00
16.18	Supplying, fixing testing commissioning of Return air diffusers of powder coated aluminium without volume control dampers with anti smudge ring & removable core.	Sqm	5621.00
16.19	Supply, installation, testing & commissioning of thermal insulated flexible duct of following sizes duly supported at regular interval as per site requirement etc. complete as required as per specifications.		
16.19.1	200 mm dia.	Metre	372.00
16.20	Supplying, Fixing, testing and commissioning of fire dampers in supply air duct/main branch and return air path as and where required of required sizes i/c control wiring, the damper shall be motorized and spring return so as to close the damper in the event of power failure automatically and open the same in case of power being restored. The spring return		

Item Code	Description	Unit	Rate ₹
	action shall be inbuilt mechanism and not externally mounted. The damper shall also be closed in the event of fire signal complete as required and as per specifications.		
16.20.1	Fire damper	Sqm	6864.00
16.20.2	Actuator	Each	6517.00
16.21	Supply and fixing of acoustic lining of supply air duct and plenum with 25 mm thick resin bonded glass wool having density of 32 kg/m ³ , with 25 mm X 25 mm GI section of 1.25 mm thick, at 600 mm centre to centre covered with Reinforced Plastic tissue paper and 0.5 mm thick perforated aluminum sheet fixed to inside surface of ducts with cadmium plated nuts, bolts, stick pins, CPRX compound etc. complete as required and as per specifications.	Sqm	503.00
16.22	Supplying, fixing acoustic lining on wall and ceiling of AHU rooms with 50mm thick, density 32 kg/cu.m resin bonded glass fiber insulation friction fixed in 610mm x 610 mm frame work made of 25X50X50X50X25 mm made out of 0.6mm thick GI sheet U shaped channel and covered with reinforced fiber glass tissue and finished with 0.80 mm perforated aluminium sheet etc. complete as required and as per specifications.	Sqm	732.00
16.23	Supplying and fixing of following thickness duly laminated aluminum foil of mat finish closed cell Nitrile rubber (class "O") insulation on existing duct after applying two coats of cold setting adhesive (CPRX compound). The joints shall sealed with 50 mm wide and 3 mm thick self adhesive nitrile rubber tape insulation complete as per specifications and as required.		
16.23.1	19mm	Sqm	742.00
16.23.2	25mm	Sqm	972.00
16.24	Supplying and fixing 50 mm thick aluminium foil faced resin bonded fibre glass insulation (on duct) of density 24 kg/ cu.m after applying two coats of cold setting adhesive (CPRX compound) sealing all joints with self adhesive aluminium tape & covering with 0.63mmx19mm GI wire mesh netting butting all joints and laced with GI wire complete as per specifications and as required. (for indoor applications).	Sqm	514.00
16.25	Supplying and fixing 50mm thick aluminium foil faced resin bonded fibre glass insulation (on duct) of density 24 kg/ cu.m after applying two coats of cold setting adhesive (CPRX compound) sealing all joints with self adhesive aluminium tape & covering with 0.63mmx19mm GI wire mesh netting & butting all joints and laced with GI wire complete and finally covered with one layer of tar felt stuck with hot bitumen as per specifications and as required. (for outdoor applications)	Sqm	458.00

Item Code	Description	Unit	Rate ₹
AIR HANDLING UNITS			
16.26	Supply, Installation, Testing and commissioning of factory built floor mounted chilled water double skin type horizontal/ vertical air handling units made of 25mm thick panels consisting of pre plasticized G.I. casing of thickness 0.8mm outside layer and 0.8 mm inside layer with polyurethane foam (PUF) insulation factory injected between them by injection moulding machine, complete with blower section with blower suitable for static pressure as required, minimum 2 bend GSS/PVC eliminators, cooling coil section with aluminium finned copper tubes (tubes thickness not less than 0.5mm) cooling coil of 6 row deep, filter section with 50mm thick metal viscous/ washable synthetic type air prefilters, belt drive package with TEFC drive motor suitable for 415 ± 10% volts, 50Hz, 3 Phase AC supply, drain connections, stainless steel (18G) drain pan with PUF insulation, 150 mm dia. dial type pressure gauges (2 nos.) and industrial type thermometers (2 nos.) at the inlet and outlet of coil, auto purge valve wherever required, necessary vibration isolation arrangement etc. complete as per specification and of following capacities.		
16.26.1	2500 CFM	Set	64051.00
16.26.2	3000 CFM	Set	73561.00
16.26.3	4000 CFM	Set	90519.00
16.26.4	5000 CFM	Set	109540.00
16.26.5	6000 CFM	Set	125581.00
16.26.6	7000 CFM	Set	137039.00
16.26.7	8000 CFM	Set	147123.00
16.26.8	9000 CFM	Set	182643.00
16.26.9	10000 CFM	Set	190549.00
16.26.10	11000 CFM	Set	203955.00
16.26.11	12000 CFM	Set	255173.00
16.27	Supply, Installation, Testing and commissioning of factory built floor mounted chilled water double skin type horizontal/ vertical air handling units made of 25mm thick panels consisting of pre plasticized G.I. casing of thickness 0.8mm outside layer and 0.8 mm inside layer with polyurethane foam (PUF) insulation factory injected between them by injection moulding machine, complete with blower section with blower suitable for static pressure as required, minimum 2 bend GSS/PVC eliminators, cooling coil section with aluminium finned copper tubes (tubes thickness not less than 0.5mm) cooling coil of 4 row deep, filter section with 50mm thick metal viscous/ washable synthetic type air		

Item Code	Description	Unit	Rate ₹
	prefilters, belt drive package with TEFC drive motor suitable for 415 ± 10% volts, 50Hz, 3 Phase AC supply, drain connections, stainless steel (18G) drain pan with PUF insulation, 150 mm dia. dial type pressure gauges (2 nos.) and industrial type thermometers (2 nos.) at the inlet and outlet of coil, auto purge valve wherever required, necessary vibration isolation arrangement etc. complete as per specification and of following capacities.		
16.27.1	2500 CFM	Set	61020.00
16.27.2	3000 CFM	Set	64277.00
16.27.3	4000 CFM	Set	76029.00
16.27.4	5000 CFM	Set	92626.00
16.27.5	6000 CFM	Set	95304.00
16.27.6	7000 CFM	Set	124242.00
16.27.7	8000 CFM	Set	130735.00
16.27.8	9000 CFM	Set	158092.00
16.27.9	10000 CFM	Set	174775.00
16.27.10	11000 CFM	Set	188677.00
16.27.11	12000 CFM	Set	203573.00



APPENDIX-I**BASIC RATE OF LABOUR & HIRE CHARGES**

Code No.	Description	Unit	Rate ₹
1001	Wireman	day	361.00
1002	Cable jointer	day	361.00
1003	Lineman	day	361.00
1004	Fitter, Grade 1	day	361.00
1005	Fitter, Grade 2	day	328.00
1006	Painter	day	328.00
1007	Khallas	day	297.00
1008	Carpenter, Grade 1	day	361.00
1009	Blacksmith, Grade 2	day	328.00
1010	Mason, Grade 2	day	328.00
1011	Stone Chiseler	day	328.00
1012	Beldar/ coolie	day	297.00
1013	Bhisti	day	297.00
1014	Excavator	day	297.00
1015	Stone Breaker	day	328.00
1016	Mate	day	297.00
1081	Hire charges for 5 ton truck	day	2100.00
1082	Hire charges for compressor and spray gun	day	300.00
1083	Drilling of 46 Nos 12 mm dia holes on G.I. pipe	L.S.	270.00
1084	Drilling holes	each	5.50
1085	Solder jointing	each	11.00
1086	Welding charges	mm	0.45

BASIC RATE OF MATERIAL

Code No.	Description	Unit	Rate ₹
1101	1.5 sq. mm ISI marked, FRLS PVC insulated, single core copper conductor cable	metre	10.95
1102	2.5 sq. mm ISI marked, FRLS PVC insulated, single core copper conductor cable	metre	17.63
1103	4.0 sq. mm ISI marked, FRLS PVC insulated, single core copper conductor cable	metre	25.88
1104	6.0 sq. mm ISI marked, FRLS PVC insulated, single core copper conductor cable	metre	35.84
1105	10 sq. mm ISI marked, FRLS PVC insulated, single core copper conductor cable	metre	62.93
1106	16 sq. mm ISI marked, FRLS PVC insulated, single core copper conductor cable	metre	90.72
1108	16/0.20 mm (0.5 sqmm) twin core FRLS PVC sheathed, flat flexible copper cable	metre	11.47
1109	16/0.20 mm (0.5 sqmm) twin circular, FRLS PVC sheathed, workshop flexible copper cable	metre	11.47
1110	32/0.20 mm (1.0 sqmm) twin circular, FRLS PVC sheathed, workshop flexible copper cable	metre	18.14
1111	1 pair, 0.5 mm dia annealed copper conductor, FRLS PVC insulated, unarmoured, telephone cable	metre	3.78
1112	2 pair, 0.5 mm dia annealed copper conductor, FRLS PVC insulated, unarmoured, telephone cable	metre	7.56
1113	4 pair, 0.5 mm dia annealed copper conductor, FRLS PVC insulated, unarmoured, telephone cable	metre	14.43
1114	Co-axial TV cable RG-6 grade, 0.7 mm solid copper conductor PE insulated, shielded with fine tinned copper braid protected with PVC sheath	metre	12.73
CONDUIT (STEEL & PVC) AND ACCESSORIES			
1201	20 mm dia. ISI marked, steel conduit	metre	59.93
1202	25 mm dia. ISI marked, steel conduit	metre	75.51
1203	32 mm dia. ISI marked, steel conduit	metre	113.26
1204	40 mm dia. ISI marked, steel conduit	metre	184.05
1205	50 mm dia. ISI marked, steel conduit	metre	259.55
1206	20 mm inspection/ solid bends	each	8.19

Code No.	Description	Unit	Rate ₹
1207	25 mm inspection/ solid bends	each	14.33
1208	32 mm inspection/ solid bends	each	28.66
1209	40 mm inspection/ solid bends	each	49.14
1210	50 mm inspection/ solid bends	each	98.05
1211	20 mm sockets	each	3.75
1212	25 mm sockets	each	4.77
1213	32 mm sockets	each	8.53
1214	40 mm sockets	each	20.47
1215	50 mm sockets	each	30.71
1216	20 mm junction box, one way	each	33.84
1217	20 mm junction box, two way	each	33.84
1218	20 mm iron staples/ saddles/ screws	each	1.50
1219	25 mm iron staples/ saddles/ screws	each	2.09
1220	32 mm iron staples/ saddles/ screws	each	3.18
1221	40 mm iron staples/ saddles/ screws	each	4.10
1222	50 mm iron staples/ saddles/ screws	each	5.44
1224	20 mm dia. ISI marked, PVC conduit	metre	14.66
1225	25 mm dia. ISI marked, PVC conduit	metre	19.78
1226	32 mm dia. ISI marked, PVC conduit	metre	31.98
1227	40 mm dia. ISI marked, PVC conduit	metre	48.95
1228	50 mm dia. ISI marked, PVC conduit	metre	72.83
1229	20 mm PVC bends	each	5.12
1230	25 mm PVC bends	each	6.97
1231	32 mm PVC bends	each	11.95
1232	40 mm PVC bends	each	10.15
1233	50 mm PVC bends	each	30.91
1234	20 mm PVC couplers	each	3.15
1235	25 mm PVC couplers	each	4.77
1236	32 mm PVC couplers	each	7.75
1237	40 mm PVC couplers	each	9.49
1238	50 mm PVC couplers	each	11.84
1239	20 mm PVC junction box, one way	each	14.07
1240	20 mm PVC junction box, two way	each	14.07
1241	75 mm X 75 mm X 50 mm PVC box	each	18.00
METAL BOXES			
1300	Modular GI box for 2 module	each	31.89
1301	Modular GI box for 3 module	each	35.50
1302	Modular GI box for 4 module	each	49.61
1303	Modular GI box for 6 module	each	71.50

Code No.	Description	Unit	Rate ₹
1304	Modular GI box for 8 module	each	74.42
1305	Modular GI box for 12 module	each	113.91
1306	75 mm X 75 mm X 60 mm deep metal box	each	19.25
1307	100 mm X 100 mm X 60 mm deep metal box	each	29.25
1308	150 mm X 75 mm X 60 mm deep metal box	each	31.00
1309	150 mm X 150 mm X 60 mm deep metal box	each	44.46
1310	180 mm X 100 mm X 60 mm deep metal box	each	37.44
1311	200 mm X 125 mm X 60 mm deep metal box	each	46.80
1312	200 mm X 150 mm X 60 mm deep metal box	each	58.50
1313	200 mm X 250 mm X 60 mm deep metal box	each	76.05
1314	200 mm X 300 mm X 60 mm deep metal box	each	105.30
1315	250 mm X 300 mm X 60 mm deep metal box	each	117.00
1316	200 mm X 150 mm X 75 mm deep metal box	each	64.35
1317	200 mm X 250 mm X 75 mm deep metal box	each	87.75
1318	200 mm X 150 mm X 100 mm deep metal box	each	77.22
1319	200 mm X 250 mm X 100 mm deep metal box	each	99.45
1320	200 mm X 300 mm X 100 mm deep metal box	each	117.00
1321	250 mm X 300 mm X 100 mm deep metal box	each	146.25
WIRING SWITCHES AND ACCESSORIES			
1322	3 mm thick phenolic laminated sheet	sqcm	0.09
1401	Ceiling rose, 3 pin, 5 amps ISI marked	each	16.03
1402	S.P. 5/6 amps, one way modular switch, ISI marked	each	46.50
1403	S.P. 5/6 amps, two way modular switch, ISI marked	each	65.70
1404	S.P. 15/16 amps, one way modular switch, ISI marked	each	78.30
1405	3 pin 5/6 amps modular socket outlet, ISI marked	each	73.50
1406	6 pin 15/16 amps modular socket outlet, ISI marked	each	120.60
1407	Modular bell push, ISI marked	each	71.10
1408	Stepped type Modular Fan regulator (2 module)	each	285.75
1409	Telephone Socket outlet modular type	each	59.10
1410	T.V. Socket outlet modular type	each	61.00
1411	Modular blanking plate	each	13.05
1420	Modular base & cover plate for 1 module	each	36.90
1421	Modular base & cover plate for 2 module	each	36.85
1422	Modular base & cover plate for 3 module	each	44.50
1423	Modular base & cover plate for 4 module	each	52.20
1424	Modular base & cover plate for 6 module	each	68.00
1425	Modular base & cover plate for 8 module	each	90.50
1426	Modular base & cover plate for 12 module	each	131.40
1431	S.P. 5/6 amps, one way switch, piano type ISI marked	each	13.89

Code No.	Description	Unit	Rate ₹
1432	S.P. 5/6 amps, two way switch, piano type ISI marked	each	19.01
1433	S.P. 15/16 amps, one way switch, piano type ISI marked	each	35.00
1434	3 pin 5/6 amps socket outlet, piano type ISI marked	each	19.50
1435	6 pin 15/16 & 5/6 amps socket outlet, piano type ISI marked	each	45.00
1436	Bell push, piano type	each	15.00
1437	Telephone Socket outlet piano type	each	27.00
1438	T.V. Socket outlet piano type	each	16.00
1441	Brass pendant holder	each	28.00
1442	Brass batten/ angle holder	each	28.00
1443	Brass bracket holder 16 mm	each	31.56
1444	Call bell/ buzzer, single phase	each	38.00
1445	PIR Occupancy sensor	each	2587.50
1446	PIR Occupancy sensor With Day light dimming	each	3684.37
1447	Microwave occupancy Sensor	each	5090.62
1448	Astronomical time switch suitable for 1 output per phase and suitable for single phase supply	each	2047.50
1449	Astronomical time switch suitable for 2 output per phase and suitable for single phase supply	each	4426.50
1450	Astronomical time switch suitable for 3 output (1 output per phase) and suitable for three phase supply	each	5222.75
1451	UTP 4 Pair CAT 6 LAN Cable	per m	19.78
RISING MAINS BUS TRUNKING AND OVER HEAD BUS-BAR			
1501	200 amps. TPN, rising mains in metal enclosure with aluminium busbar including fixing clamp	metre	4012.99
1502	300 amps. TPN, rising mains in metal enclosure with aluminium busbar including fixing clamp	metre	4195.40
1503	400 amps. TPN, rising mains in metal enclosure with aluminium busbar including fixing clamp	metre	5198.64
1504	600 amps. TPN, rising mains in metal enclosure with aluminium busbar including fixing clamp	metre	5837.07
1505	800 amps. TPN, rising mains in metal enclosure with aluminium busbar including fixing clamp	metre	7068.33
1511	16 amps. TPN, 2 way, distribution tap off box with ISI marked HRC fuses for rising mains	each	7166.05
1512	16 amps. TPN, 4 way, distribution tap off box with ISI marked HRC fuses for rising mains	each	13463.49
1513	16 amps. TPN, 6 way, distribution tap off box with ISI marked HRC fuses for rising mains	each	19109.48
1514	16 amps. TPN, 8 way, distribution tap off box with ISI marked HRC fuses for rising mains	each	26492.68

Code No.	Description	Unit	Rate ₹
1515	32 amps. TPN, 2 way, distribution tap off box with ISI marked HRC fuses for rising mains	each	7383.21
1516	32 amps. TPN, 4 way, distribution tap off box with ISI marked HRC fuses for rising mains	each	15200.72
1517	32 amps. TPN, 6 way, distribution tap off box with ISI marked HRC fuses for rising mains	each	19978.09
1518	32 amps. TPN, 8 way, distribution tap off box with ISI marked HRC fuses for rising mains	each	27795.60
1519	63 amps. TPN, 2 way, distribution tap off box with ISI marked HRC fuses for rising mains	each	8425.54
1520	63 amps. TPN, 4 way, distribution tap off box with ISI marked HRC fuses for rising mains	each	15200.72
1521	63 amps. TPN, 6 way, distribution tap off box with ISI marked HRC fuses for rising mains	each	21281.01
1522	63 amps. TPN, 8 way, distribution tap off box with ISI marked HRC fuses for rising mains	each	29532.83
1526	200 amps. TPN, adaptor box with cable end box, with TPN disconnecter FSU, ISI marked HRC fuses and brass compression gland for rising mains	each	11986.85
1527	300 amps. TPN, adaptor box with cable end box, with TPN disconnecter FSU, ISI marked HRC fuses and brass compression gland for rising mains	each	13029.19
1528	400 amps. TPN, adaptor box with cable end box, with TPN disconnecter FSU, ISI marked HRC fuses and brass compression gland for rising mains	each	14332.11
1529	600 amps. TPN, adaptor box with cable end box, with TPN disconnecter FSU, ISI marked HRC fuses and brass compression gland for rising mains	each	15461.3
1530	800 amps. TPN, adaptor box with cable end box, with TPN disconnecter FSU, ISI marked HRC fuses and brass compression gland for rising mains	each	17198.53
1531	800 amps. TPN, bus trunking with aluminium busbars	metre	6731.75
1532	1000 amps. TPN, bus trunking with aluminium busbars	metre	7991.24
1533	1250 amps. TPN, bus trunking with aluminium busbars	metre	10249.63
1534	1400 amps. TPN, bus trunking with aluminium busbars	metre	12855.47
1535	1600 amps. TPN, bus trunking with aluminium busbars	metre	12855.47
1536	200 amps. TPN, overhead busbars with aluminium busbars	metre	3821.90
1537	400 amps. TPN, overhead busbars with aluminium busbars	metre	4951.09
1538	32 amps. TPN, plug-in-box with TPN disconnecter FSU and ISI marked HRC fuses for overhead busbars	each	4318.25

Code No.	Description	Unit	Rate ₹
1539	63 amps. TPN, plug-in-box with TPN disconnecter FSU and ISI marked HRC fuses for overhead busbars	each	4839.41
1540	100 amps. TPN, plug-in-box with TPN disconnecter FSU and ISI marked HRC fuses for overhead busbars	each	5583.94
1541	16 amps. TPN, one way, tap off box with TPN disconnecter FSU and ISI marked HRC fuses for rising mains	each	4777.37
1542	32 amps. TPN, one way, tap off box with TPN disconnecter FSU and ISI marked HRC fuses for rising mains	each	5037.95
1543	63 amps. TPN, one way, tap off box with TPN disconnecter FSU and ISI marked HRC fuses for rising mains	each	5645.98
1544	100 amps. TPN, one way, tap off box with TPN disconnecter FSU and ISI marked HRC fuses for rising mains	each	6514.59
1545	200 amps. TPN, one way, tap off box with TPN disconnecter FSU and ISI marked HRC fuses for rising mains	each	10249.63
1546	315 amps. TPN, one way, tap off box with TPN disconnecter FSU and ISI marked HRC fuses for rising mains	No	10857.66
1547	400 amps. TPN, one way, tap off box with TPN disconnecter FSU and ISI marked HRC fuses for rising mains	No	11291.96
1551	200 amps. TPN, compact type rising mains with aluminium busbar including all accessories	metre	4197.65
1552	315 amps. TPN, compact type rising mains with aluminium busbar including all accessories	metre	4545.28
1553	400 amps. TPN, compact type rising mains with aluminium busbar including all accessories	metre	5051.53
1554	500 amps. TPN, compact type rising mains with aluminium busbar including all accessories	metre	5815.12
1555	630 amps. TPN, compact type rising mains with aluminium busbar including all accessories	metre	6955.03
1556	800 amps. TPN, compact type rising mains with aluminium busbar including all accessories	metre	9652.50
1557	1000 amps. TPN, compact type rising mains with aluminium busbar including all accessories	metre	11264.90
1558	1250 amps. TPN, compact type rising mains with aluminium busbar including all accessories	metre	13366.68
1559	200 amps. TPN, compact type bus trunking with aluminium busbar including elbows and other all accessories	metre	4617.84
1560	315 amps. TPN, compact type bus trunking with aluminium busbar including elbows and other all accessories	metre	5253.18
1561	400 amps. TPN, compact type bus trunking with aluminium busbar including elbows and other all accessories	metre	5556.93

Code No.	Description	Unit	Rate ₹
1562	500 amps. TPN, compact type bus trunking with aluminium busbar including elbows and other all accessories	metre	6396.46
1563	630 amps. TPN, compact type bus trunking with aluminium busbar including elbows and other all accessories	metre	7650.28
1564	800 amps. TPN, compact type bus trunking with aluminium busbar including elbows and other all accessories	metre	10456.88
1565	1000 amps. TPN, compact type bus trunking with aluminium busbar including elbows and other all accessories	metre	12211.88
1566	1250 amps. TPN, compact type bus trunking with aluminium busbar including elbows and other all accessories	metre	14703.18
1567	200 amps. TPN, End Feed Unit for compact rising mains including all accessories	each	3206.25
1568	315 amps. TPN, End Feed Unit for compact rising mains including all accessories	each	3341.25
1569	400 amps. TPN, End Feed Unit for compact rising mains including all accessories	each	4252.50
1570	500 amps. TPN, End Feed Unit for compact rising mains including all accessories	each	4455.00
1571	630 amps. TPN, End Feed Unit for compact rising mains including all accessories	each	5433.75
1572	800 amps. TPN, End Feed Unit for compact rising mains including all accessories	each	6817.50
1573	1000 amps. TPN, End Feed Unit for compact rising mains including all accessories	each	7222.50
1574	1250 amps. TPN, End Feed Unit for compact rising mains including all accessories	each	7627.50
1575	125 amps. TPN, TAP OFF Box for compact rising mains including all accessories	each	3712.50
1576	200 amps. TPN, TAP OFF Box for compact rising mains including all accessories	each	4725.00
1577	315 amps. TPN, TAP OFF Box for compact rising mains including all accessories	each	6075.00
1578	400 amps. TPN, TAP OFF Box for compact rising mains including all accessories	each	6075.00
1579	500 amps. TPN, TAP OFF Box for compact rising mains including all accessories	each	8775.00
1580	630 amps. TPN, TAP OFF Box for compact rising mains including all accessories	each	8775.00

Code No.	Description	Unit	Rate ₹
Sandwich Bus Trunking with Aluminium bus bar			
1581	400 amps 25KA SC for 1 sec	per m	7511.91
1582	500 amps 30KA SC for 1 sec	per m	8198.72
1583	630 amps 50KA SC for 1 sec	per m	8875.41
1584	800 amps 50KA SC for 1 sec	per m	10823.63
1585	1000 amps 50KA SC for 1 sec	per m	12214.97
1586	1250 amps 50KA SC for 1 sec	per m	13955.63
1587	1600 amps 50KA SC for 1 sec	per m	17630.16
1588	2000 amps 50KA SC for 1 sec	per m	20754.56
1589	2500 amps 50KA SC for 1 sec	per m	28136.53
1590	3200 amps 50KA SC for 1 sec	per m	31574.81
1591	4000 amps 50KA SC for 1 sec	per m	40497.47
SWITCH DISCONNECTOR SFU AND MCCB			
1601	32 amps. TPN, switch disconnecter fuse unit (Panel mounted type) with ISI marked HRC fuses	each	1227.50
1602	63 amps. TPN, switch disconnecter fuse unit (Panel mounted type) with ISI marked HRC fuses	each	1682.85
1603	100 amps. TPN, switch disconnecter fuse unit (Panel mounted type) with ISI marked HRC fuses	each	3508.59
1604	125 amps. TPN, switch disconnecter fuse unit (Panel mounted type) with ISI marked HRC fuses	each	4681.95
1605	160 amps. TPN, switch disconnecter fuse unit (Panel mounted type) with ISI marked HRC fuses	each	5221.12
1606	200 amps. TPN switch fuse unit with ISI marked HRC fuses	each	5494.12
1607	315 amps. TPN switch fuse unit with ISI marked HRC fuses	each	9261.52
1608	400 amps. TPN switch fuse unit with ISI marked HRC fuses	each	10803.97
1610	3 pole MCCB, 100A, 16KA	each	2517.48
1611	3 pole MCCB, 125A, 16KA	each	3538.08
1612	3 pole MCCB, 150A, 16KA	each	4354.56
1613	3 pole MCCB, 200A, 16KA	each	6327.72
1614	3 pole MCCB, 200A, 25KA	each	6667.92
1615	3 pole MCCB, 250A, 25KA	each	8777.16
1616	3 pole MCCB, 250A, 35KA	each	12587.40
1617	3 pole MCCB, 315A, 35KA	each	15309.00
1618	3 pole MCCB, 400A, 35KA	each	15309.00
1619	3 pole MCCB, 500A, 35KA	each	17622.36
1620	3 pole MCCB, 630A, 50KA	each	18234.72
1621	3 pole MCCB, 800A, 50KA	each	23473.80
1622	4 pole MCCB, 100A, 30KA	each	3907.50

Code No.	Description	Unit	Rate ₹
1623	4 pole MCCB, 125A, 36KA	each	5595.00
1624	4 pole MCCB, 200A, 36KA	each	9360.00
1625	4 pole MCCB,250A, 36KA	each	10927.50
1626	4 pole MCCB,250A, 50KA	each	18397.50
1627	4 pole MCCB,400A, 50KA	each	22290.00
1628	4 pole MCCB,630A, 50KA	each	27592.50
MCB'S, ISOLATORS, RCCB'S AND MCB DB'S			
1706	6 amps. to 32 amps. ratings , SP MCB, "C" curve, 10 KA breaking capacity	each	99.75
1707	6 amps. to 32 amps. ratings , SPN MCB, "C" curve, 10 KA breaking capacity	each	317.52
1708	6 amps. to 32 amps. ratings , DP MCB, "C" curve, 10 KA breaking capacity	each	328.86
1709	6 amps. to 32 amps. ratings , TP MCB, "C" curve, 10 KA breaking capacity	each	498.96
1710	6 amps. to 32 amps. ratings , TPN MCB, "C" curve, 10 KA breaking capacity	each	649.22
1711	Single pole, blanking plate	each	4.53
1712	40 amps., 2 pole isolator	each	204.12
1713	63 amps., 2 pole isolator	each	257.99
1714	40 amps., 4 pole isolator	each	467.78
1715	63 amps., 4 pole isolator	each	476.28
1716	100 amps., 4 pole isolator	each	612.36
1717	25 amps. rating, 2 pole RCCB, 100mA/ 300mA	each	1196.37
1718	40 amps. rating, 2 pole RCCB, 100mA/ 300mA	each	1267.25
1719	63 amps. rating, 2 pole RCCB, 100mA/ 300mA	each	1666.98
1720	25 amps. rating, 4 pole RCCB, 100mA/ 300mA	each	1513.89
1721	40 amps. rating, 4 pole RCCB, 100mA/ 300mA	each	1536.57
1722	63 amps. rating, 4 pole RCCB, 100mA/ 300mA	each	1780.38
1723	16/25 amps. rating, 2 pole RCBO 100mA/ 300mA sensitivity	each	1494.05
1724	32 amps. rating, 2 pole RCBO 100mA/ 300mA sensitivity	each	1494.05
1725	40 amps. rating, 2 pole RCBO 100mA/ 300mA sensitivity	each	1788.89
1726	16/25 amps. rating, 4 pole RCBO 100mA/ 300mA sensitivity	each	1879.61
1727	32 amps. rating, 4 pole RCBO 100mA/ 300mA sensitivity	each	1879.61
1728	40 amps. rating, 4 pole RCBO 100mA/ 300mA sensitivity	each	2024.19
1730	20 amps. SPN, industrial type socket outlet, with plug top and metal chained cover in sheet steel enclosure	each	393.75
1731	20 amps. TPN, industrial type socket outlet, with plug top and metal chained cover in sheet steel enclosure	each	986.58

Code No.	Description	Unit	Rate ₹
1732	30 amps. TPN, industrial type socket outlet, with plug top and metal chained cover in sheet steel enclosure	each	1233.23
1734	2+2 way, SPN, single door, MCB DB	each	306.07
1735	2+4 way, SPN, single door, MCB DB	each	343.61
1736	2+6 way, SPN, single door, MCB DB	each	381.15
1737	2+10 way, SPN, single door, MCB DB	each	516.86
1738	2+2 way, SPN, double door, MCB DB	each	519.75
1739	2+4 way, SPN, double door, MCB DB	each	594.82
1740	2+6 way, SPN, double door, MCB DB	each	669.90
1741	2+10 way, SPN, double door, MCB DB	each	869.14
1742	Sheet steel DP MCB enclosure	each	147.26
1743	Sheet steel TP MCB enclosure	each	167.47
1751	4 way (4+12), TPN, MCB DB, single door, horizontal type	each	999.07
1752	6 way (4+18), TPN, MCB DB, single door, horizontal type	each	1192.54
1753	8 way (4+24), TPN, MCB DB, single door, horizontal type	each	1331.14
1754	4 way (4+12), TPN, MCB DB, double door, horizontal type	each	1400.44
1755	6 way (4+18), TPN, MCB DB, double door, horizontal type	each	1772.92
1756	8 way (4+24), TPN, MCB DB, double door, horizontal type	each	2229.15
1757	4 way (4+12), TPN, vertical type, MCB DB, single door	each	2382.19
1758	8 way (4+24), TPN, vertical type, MCB DB, single door	each	3366.82
1759	12 way (4+36), TPN, vertical type, MCB DB, single door	each	4342.80
1760	4 way (4+12), TPN, vertical type, MCB DB, double door	each	3488.10
1761	8 way (4+24), TPN, vertical type, MCB DB, double door	each	4440.97
1762	12 way (4+36), TPN, vertical type, MCB DB, double door	each	5691.26
1763	4 way, TPN, vertical type, single door, MCB DB with provision to mount MCCB as incomer	each	4351.46
1764	8 way, TPN, vertical type, single door, MCB DB with provision to mount MCCB as incomer	each	5593.37
1765	12 way, TPN, vertical type, single door, MCB DB with provision to mount MCCB as incomer	each	7635.99
1771	2 + 4 way, SPN, prewired MCB DB with extended loose wire box, single door	each	1455.30
1772	2 + 8 way, SPN, prewired MCB DB with extended loose wire box, single door	each	1767.15
1773	2 + 12 way, SPN, prewired MCB DB with extended loose wire box, single door	each	2096.32
1774	2 + 4 way, SPN, prewired MCB DB with extended loose wire box, double door	each	1866.76
1775	2 + 8 way, SPN, prewired MCB DB with extended loose wire box, double door	each	2265.24

Code No.	Description	Unit	Rate ₹
1776	2 + 12 way, SPN, prewired MCB DB with extended loose wire box, double door	each	2772.00
1779	4 way, (4+12) TPN, prewired MCB DB with extended loose wire box, single door	each	5050.24
1780	6 way, (4+18) TPN, prewired MCB DB with extended loose wire box, single door	each	6574.84
1781	8 way, (4+24) TPN, prewired MCB DB with extended loose wire box, single door	each	7553.70
1782	12 way, (4+36) TPN, prewired MCB DB with extended loose wire box, single door	each	9325.18
1783	4 way, (4+12) TPN, prewired MCB DB with extended loose wire box, double door	each	5808.20
1784	6 way, (4+18) TPN, prewired MCB DB with extended loose wire box, double door	each	7562.36
1785	8 way, (4+24) TPN, prewired MCB DB with extended loose wire box, double door	each	8307.34
1786	12 way, (4+36) TPN, prewired MCB DB with extended loose wire box, double door	each	10256.40
1787	4 way (4+4), TPN, vertical type, prewired, MCB DB with extended loose wire box, single door	each	5440.05
1788	6 way (4+6), TPN, vertical type, prewired, MCB DB with extended loose wire box, single door	each	7085.92
1789	8 way (4+8), TPN, vertical type, prewired, MCB DB with extended loose wire box, single door	each	8082.11
1790	12 way (4+12), TPN, vertical type, prewired, MCB DB with extended loose wire box, single door	each	10802.14
1791	4 way (4+4), TPN, vertical type, prewired, MCB DB with extended loose wire box, double door	each	6254.32
1792	6 way (4+6), TPN, vertical type, prewired, MCB DB with extended loose wire box, double door	each	8142.75
1793	8 way (4+8), TPN, vertical type, prewired, MCB DB with extended loose wire box, double door	each	8896.39
1794	12 way (4+12), TPN, vertical type, prewired, MCB DB with extended loose wire box, double door	each	11884.95
BRASS COMPRESSION GLANDS			
2101	Brass compression gland (19 mm) for 2 X 6 sq. mm 1.1 KV grade cable	set	39.69
2102	Brass compression gland (19 mm) for 2 X 10 sq. mm 1.1 KV grade cable	set	39.69

Code No.	Description	Unit	Rate ₹
2103	Brass compression gland for (22 mm) 2 X 16 sq. mm 1.1 KV grade cable	set	45.75
2104	Brass compression gland for (22 mm) 2 X 25 sq. mm 1.1 KV grade cable	set	45.75
2105	Brass compression gland for (25 mm) 2 X 35 sq. mm 1.1 KV grade cable	set	67.25
2106	Brass compression gland for (28 mm) 2 X 50 sq. mm 1.1 KV grade cable	set	104.19
2107	Brass compression gland for (22 mm) 3 X 10 sq. mm 1.1 KV grade cable	set	45.75
2108	Brass compression gland for (25 mm) 3 X 16 sq. mm 1.1 KV grade cable	set	67.25
2109	Brass compression gland for (25 mm) 3 X 25 sq. mm 1.1 KV grade cable	set	67.25
2110	Brass compression gland for (28 mm) 3 X 35 sq. mm 1.1 KV grade cable	set	104.19
2111	Brass compression gland for (32 mm) 3 X 50 sq. mm 1.1 KV grade cable	set	118.52
2112	Brass compression gland for (35 mm) 3 X 70 sq. mm 1.1 KV grade cable	set	147.18
2113	Brass compression gland for (38 mm) 3 X 95 sq. mm 1.1 KV grade cable	set	169.23
2114	Brass compression gland for (45 mm) 3 X 120 sq. mm 1.1 KV grade cable	set	203.96
2115	Brass compression gland for (50 mm) 3 X 150 sq. mm 1.1 KV grade cable	set	258.54
2116	Brass compression gland for (57 mm) 3 X 185 sq. mm 1.1 KV grade cable	set	364.38
2117	Brass compression gland for (62 mm) 3 X 225 sq. mm 1.1 KV grade cable	set	452.02
2118	Brass compression gland for (62 mm) 3 X 240 sq. mm 1.1 KV grade cable	set	452.02
2119	Brass compression gland for (70 mm) 3 X 300 sq. mm 1.1 KV grade cable	set	486.75
2120	Brass compression gland for (28 mm) 3½ X 25 sq. mm 1.1 KV grade cable	set	104.19
2121	Brass compression gland for (32 mm) 3½ X 35 sq. mm 1.1 KV grade cable	set	118.52
2122	Brass compression gland for (35 mm) 3½ X 50 sq. mm 1.1 KV grade cable	set	147.18

Code No.	Description	Unit	Rate ₹
2123	Brass compression gland for (38 mm) 3½ X 70 sq. mm 1.1 KV grade cable	set	169.23
2124	Brass compression gland for (45 mm) 3½ X 95 sq. mm 1.1 KV grade cable	set	203.96
2125	Brass compression gland for (45 mm) 3½ X 120 sq. mm 1.1 KV grade cable	set	203.96
2126	Brass compression gland for (50 mm) 3½ X 150 sq. mm 1.1 KV grade cable	set	258.54
2127	Brass compression gland for (57 mm) 3½ X 185 sq. mm 1.1 KV grade cable	set	364.38
2128	Brass compression gland for (62 mm) 3½ X 225 sq. mm 1.1 KV grade cable	set	452.02
2129	Brass compression gland for (62 mm) 3½ X 240 sq. mm 1.1 KV grade cable	set	452.02
2130	Brass compression gland for (70 mm) 3½ X 300 sq. mm 1.1 KV grade cable	set	486.75
2131	Brass compression gland for (82 mm) 3½ X 400 sq. mm 1.1 KV grade cable	set	620.16
2132	Brass compression gland for (25 mm) 4 X 10 sq. mm 1.1 KV grade cable	set	67.25
2133	Brass compression gland for (28 mm) 4 X 16 sq. mm 1.1 KV grade cable	set	104.19
2134	Brass compression gland for (28 mm) 4 X 25 sq. mm 1.1 KV grade cable	set	104.19
2135	Brass compression gland for (32 mm) 4 X 35 sq. mm 1.1 KV grade cable	set	118.52
2136	Brass compression gland for (35 mm) 4 X 50 sq. mm 1.1 KV grade cable	set	147.18
ALUMINIUM LUGS			
2201	Aluminium lugs for 6 sq. mm cable	each	1.52
2202	Aluminium lugs for 10 sq. mm cable	each	2.03
2203	Aluminium lugs for 16 sq. mm cable	each	2.36
2204	Aluminium lugs for 25 sq. mm cable	each	3.07
2205	Aluminium lugs for 35 sq. mm cable	each	3.74
2206	Aluminium lugs for 50 sq. mm cable	each	6.00
2207	Aluminium lugs for 70 sq. mm cable	each	9.22
2208	Aluminium lugs for 95 sq. mm cable	each	10.35
2209	Aluminium lugs for 120 sq. mm cable	each	13.94
2210	Aluminium lugs for 150 sq. mm cable	each	19.46

Code No.	Description	Unit	Rate ₹
2211	Aluminium lugs for 185 sq. mm cable	each	24.29
2212	Aluminium lugs for 225 sq. mm cable	each	32.14
2213	Aluminium lugs for 240 sq. mm cable	each	37.81
2214	Aluminium lugs for 300 sq. mm cable	each	57.65
2215	Aluminium lugs for 400 sq. mm cable	each	84.32
MV CABLE JOINTING KITS			
2300	Outdoor cable jointing kit with cast resin compound with lugs for 2 X 16 sq. mm 1.1 KV grade cable	set	310.17
2301	Outdoor cable jointing kit with cast resin compound with lugs for 2 X 25 sq. mm 1.1 KV grade cable	set	346.92
2302	Outdoor cable jointing kit with cast resin compound with lugs for 2 X 35 sq. mm 1.1 KV grade cable	set	346.92
2303	Outdoor cable jointing kit with cast resin compound with lugs for 2 X 50 sq. mm 1.1 KV grade cable	set	346.92
2304	Outdoor cable jointing kit with cast resin compound with lugs for 3 X 16 sq. mm 1.1 KV grade cable	set	346.92
2305	Outdoor cable jointing kit with cast resin compound with lugs for 3 X 25 sq. mm 1.1 KV grade cable	set	346.92
2306	Outdoor cable jointing kit with cast resin compound with lugs for 3 X 35 sq. mm 1.1 KV grade cable	set	346.92
2307	Outdoor cable jointing kit with cast resin compound with lugs for 3 X 50 sq. mm 1.1 KV grade cable	set	382.20
2308	Outdoor cable jointing kit with cast resin compound with lugs for 3 X 70 sq. mm 1.1 KV grade cable	set	382.20
2309	Outdoor cable jointing kit with cast resin compound with lugs for 3 X 95 sq. mm 1.1 KV grade cable	set	428.51
2310	Outdoor cable jointing kit with cast resin compound with lugs for 3 X 120 sq. mm 1.1 KV grade cable	set	428.51
2311	Outdoor cable jointing kit with cast resin compound with lugs for 3 X 150 sq. mm 1.1 KV grade cable	set	428.51
2312	Outdoor cable jointing kit with cast resin compound with lugs for 3 X 185 sq. mm 1.1 KV grade cable	set	655.62
2313	Outdoor cable jointing kit with cast resin compound with lugs for 3 X 225 sq. mm 1.1 KV grade cable	set	655.62
2314	Outdoor cable jointing kit with cast resin compound with lugs for 3 X 240 sq. mm 1.1 KV grade cable	set	799.68
2315	Outdoor cable jointing kit with cast resin compound with lugs for 3 X 300 sq. mm 1.1 KV grade cable	set	799.68
2316	Outdoor cable jointing kit with cast resin compound with lugs for 3½ X 25 sq. mm 1.1 KV grade cable	set	346.92

Code No.	Description	Unit	Rate ₹
2217	Outdoor cable jointing kit with cast resin compound with lugs for 3½ X 35 sq. mm 1.1 KV grade cable	set	382.20
2318	Outdoor cable jointing kit with cast resin compound with lugs for 3½ X 50 sq. mm 1.1 KV grade cable	set	382.20
2319	Outdoor cable jointing kit with cast resin compound with lugs for 3½ X 70 sq. mm 1.1 KV grade cable	set	435.86
2320	Outdoor cable jointing kit with cast resin compound with lugs for 3½ X 95 sq. mm 1.1 KV grade cable	set	435.86
2321	Outdoor cable jointing kit with cast resin compound with lugs for 3½ X 120 sq. mm 1.1 KV grade cable	set	435.86
2322	Outdoor cable jointing kit with cast resin compound with lugs for 3½ X 150 sq. mm 1.1 KV grade cable	set	655.62
2323	Outdoor cable jointing kit with cast resin compound with lugs for 3½ X 185 sq. mm 1.1 KV grade cable	set	655.62
2324	Outdoor cable jointing kit with cast resin compound with lugs for 3½ X 225 sq. mm 1.1 KV grade cable	set	799.68
2325	Outdoor cable jointing kit with cast resin compound with lugs for 3½ X 240 sq. mm 1.1 KV grade cable	set	799.68
2326	Outdoor cable jointing kit with cast resin compound with lugs for 3½ X 300 sq. mm 1.1 KV grade cable	set	799.68
2327	Outdoor cable jointing kit with cast resin compound with lugs for 3½ X 400 sq. mm 1.1 KV grade cable	set	965.06
2328	Outdoor cable jointing kit with cast resin compound with lugs for 4 X 16 sq. mm 1.1 KV grade cable	set	346.92
2329	Outdoor cable jointing kit with cast resin compound with lugs for 4 X 25 sq. mm 1.1 KV grade cable	set	346.92
2330	Outdoor cable jointing kit with cast resin compound with lugs for 4 X 35 sq. mm 1.1 KV grade cable	set	382.20
2331	Outdoor cable jointing kit with cast resin compound with lugs for 4 X 50 sq. mm 1.1 KV grade cable	set	382.20
2332	Straight through cable jointing kit with cast resin compound with ferrules for 2 X 16 sq. mm 1.1 KV grade cable	set	821.73
2333	Straight through cable jointing kit with cast resin compound with ferrules for 2 X 25 sq. mm 1.1 KV grade cable	set	821.73
2334	Straight through cable jointing kit with cast resin compound with ferrules for 2 X 35 sq. mm 1.1 KV grade cable	set	821.73
2335	Straight through cable jointing kit with cast resin compound with ferrules for 2 X 50 sq. mm 1.1 KV grade cable	set	962.85
2336	Straight through cable jointing kit with cast resin compound with ferrules for 3 X 16 sq. mm 1.1 KV grade cable	set	821.73

Code No.	Description	Unit	Rate ₹
2337	Straight through cable jointing kit with cast resin compound with ferrules for 3 X 25 sq. mm 1.1 KV grade cable	set	821.73
2338	Straight through cable jointing kit with cast resin compound with ferrules for 3 X 35 sq. mm 1.1 KV grade cable	set	962.85
2339	Straight through cable jointing kit with cast resin compound with ferrules for 3 X 50 sq. mm 1.1 KV grade cable	set	962.85
2340	Straight through cable jointing kit with cast resin compound with ferrules for 3 X 70 sq. mm 1.1 KV grade cable	set	1148.07
2341	Straight through cable jointing kit with cast resin compound with ferrules for 3 X 95 sq. mm 1.1 KV grade cable	set	1184.82
2342	Straight through cable jointing kit with cast resin compound with ferrules for 3 X 120 sq. mm 1.1 KV grade cable	set	1347.26
2343	Straight through cable jointing kit with cast resin compound with ferrules for 3 X 150 sq. mm 1.1 KV grade cable	set	1347.26
2344	Straight through cable jointing kit with cast resin compound with ferrules for 3 X 185 sq. mm 1.1 KV grade cable	set	1649.34
2345	Straight through cable jointing kit with cast resin compound with ferrules for 3 X 225 sq. mm 1.1 KV grade cable	set	1895.57
2346	Straight through cable jointing kit with cast resin compound with ferrules for 3 X 240 sq. mm 1.1 KV grade cable	set	1929.38
2347	Straight through cable jointing kit with cast resin compound with ferrules for 3 X 300 sq. mm 1.1 KV grade cable	set	2383.61
2348	Straight through cable jointing kit with cast resin compound with ferrules for 3½ X 25 sq. mm 1.1 KV grade cable	set	962.85
2349	Straight through cable jointing kit with cast resin compound with ferrules for 3½ X 35 sq. mm 1.1 KV grade cable	set	962.85
2350	Straight through cable jointing kit with cast resin compound with ferrules for 3½ X 50 sq. mm 1.1 KV grade cable	set	1148.07
2351	Straight through cable jointing kit with cast resin compound with ferrules for 3½ X 70 sq. mm 1.1 KV grade cable	set	1184.82
2352	Straight through cable jointing kit with cast resin compound with ferrules for 3½ X 95 sq. mm 1.1 KV grade cable	set	1347.26
2353	Straight through cable jointing kit with cast resin compound with ferrules for 3½ X 120 sq. mm 1.1 KV grade cable	set	1649.34
2354	Straight through cable jointing kit with cast resin compound with ferrules for 3½ X 150 sq. mm 1.1 KV grade cable	set	1649.34
2355	Straight through cable jointing kit with cast resin compound with ferrules for 3½ X 185 sq. mm 1.1 KV grade cable	set	1895.57
2356	Straight through cable jointing kit with cast resin compound with ferrules for 3½ X 225 sq. mm 1.1 KV grade cable	set	1929.38

Code No.	Description	Unit	Rate ₹
2357	Straight through cable jointing kit with cast resin compound with ferrules for 3½ X 240 sq. mm 1.1 KV grade cable	set	2383.61
2358	Straight through cable jointing kit with cast resin compound with ferrules for 3½ X 300 sq. mm 1.1 KV grade cable	set	2856.95
2349	Straight through cable jointing kit with cast resin compound with ferrules for 3½ X 400 sq. mm 1.1 KV grade cable	set	3529.47
2360	Straight through cable jointing kit with cast resin compound with ferrules for 4 X 16 sq. mm 1.1 KV grade cable	set	821.73
2361	Straight through cable jointing kit with cast resin compound with ferrules for 4 X 25 sq. mm 1.1 KV grade cable	set	962.85
2362	Straight through cable jointing kit with cast resin compound with ferrules for 4 X 35 sq. mm 1.1 KV grade cable	set	962.85
2363	Straight through cable jointing kit with cast resin compound with ferrules for 4 X 50 sq. mm 1.1 KV grade cable	set	1148.07
2364	Straight through cable jointing kit with heat shrinkable kit with ferrules for 2 X 16 sq. mm 1.1 KV grade cable	set	323.40
2365	Straight through cable jointing kit with heat shrinkable kit with ferrules for 2 X 25 sq. mm 1.1 KV grade cable	set	385.88
2366	Straight through cable jointing kit with heat shrinkable kit with ferrules for 2 X 35 sq. mm 1.1 KV grade cable	set	385.88
2367	Straight through cable jointing kit with heat shrinkable kit with ferrules for 2 X 50 sq. mm 1.1 KV grade cable	set	385.88
2368	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3 X 16 sq. mm 1.1 KV grade cable	set	529.20
2369	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3 X 25 sq. mm 1.1 KV grade cable	set	668.85
2370	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3 X 35 sq. mm 1.1 KV grade cable	set	668.85
2371	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3 X 50 sq. mm 1.1 KV grade cable	set	668.85
2372	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3 X 70 sq. mm 1.1 KV grade cable	set	712.95
2373	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3 X 95 sq. mm 1.1 KV grade cable	set	712.95
2374	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3 X 120 sq. mm 1.1 KV grade cable	set	712.95
2375	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3 X 150 sq. mm 1.1 KV grade cable	set	712.95
2376	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3 X 185 sq. mm 1.1 KV grade cable	set	882.00

Code No.	Description	Unit	Rate ₹
2377	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3 X 225 sq. mm 1.1 KV grade cable	set	882.00
2378	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3 X 240 sq. mm 1.1 KV grade cable	set	882.00
2379	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3 X 300 sq. mm 1.1 KV grade cable	set	882.00
2380	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3½ X 25 sq. mm 1.1 KV grade cable	set	823.20
2381	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3½ X 35 sq. mm 1.1 KV grade cable	set	823.20
2382	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3½ X 50 sq. mm 1.1 KV grade cable	set	1212.75
2383	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3½ X 70 sq. mm 1.1 KV grade cable	set	1212.75
2384	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3½ X 95 sq. mm 1.1 KV grade cable	set	1212.75
2385	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3½ X 120 sq. mm 1.1 KV grade cable	set	1617.00
2386	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3½ X 150 sq. mm 1.1 KV grade cable	set	1617.00
2387	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3½ X 185 sq. mm 1.1 KV grade cable	set	1617.00
2388	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3½ X 225 sq. mm 1.1 KV grade cable	set	2131.50
2389	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3½ X 240 sq. mm 1.1 KV grade cable	set	2131.50
2390	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3½ X 300 sq. mm 1.1 KV grade cable	set	2131.50
2391	Straight through cable jointing kit with heat shrinkable kit with ferrules for 3½ X 400 sq. mm 1.1 KV grade cable	set	2873.85
2392	Straight through cable jointing kit with heat shrinkable kit with ferrules for 4 X 16 sq. mm 1.1 KV grade cable	set	676.20
2393	Straight through cable jointing kit with heat shrinkable kit with ferrules for 4 X 25 sq. mm 1.1 KV grade cable	set	823.20
2394	Straight through cable jointing kit with heat shrinkable kit with ferrules for 4 X 35 sq. mm 1.1 KV grade cable	set	823.20
2395	Straight through cable jointing kit with heat shrinkable kit with ferrules for 4 X 50 sq. mm 1.1 KV grade cable	set	1212.75

Code No.	Description	Unit	Rate ₹
11 KV & 33 KV CABLE JOINTING KITS			
2413	Indoor cable jointing kit with cast resin compound with lugs for 11 KV grade XLPE cable for 3 core 70 sq. mm.	set	1688.40
2414	Indoor cable jointing kit with cast resin compound with lugs for 11 KV grade XLPE cable for 3 core 120 sq. mm.	set	1955.10
2415	Indoor cable jointing kit with cast resin compound with lugs for 11 KV grade XLPE cable for 3 core 240 sq. mm.	set	2299.50
2416	Indoor cable jointing kit with cast resin compound with lugs for 11 KV grade XLPE cable for 3 core 300 sq. mm.	set	2299.50
2417	Outdoor cable jointing kit with cast resin compound with lugs for 11 KV grade XLPE cable for 3 core 70 sq. mm.	set	4270.35
2418	Outdoor cable jointing kit with cast resin compound with lugs for 11 KV grade XLPE cable for 3 core 120 sq. mm.	set	5215.35
2419	Outdoor cable jointing kit with cast resin compound with lugs for 11 KV grade XLPE cable for 3 core 240 sq. mm.	set	6370.35
2420	Outdoor cable jointing kit with cast resin compound with lugs for 11 KV grade XLPE cable for 3 core 300 sq. mm.	set	6370.35
2421	Straight through cable jointing kit with cast resin compound with ferrules for 11 KV grade XLPE cable for 3 core 70 sq. mm.	set	2537.85
2422	Straight through cable jointing kit with cast resin compound with ferrules for 11 KV grade XLPE cable for 3 core 120 sq. mm.	set	2537.85
2423	Straight through cable jointing kit with cast resin compound with ferrules for 11 KV grade XLPE cable for 3 core 240 sq. mm.	set	3806.25
2424	Straight through cable jointing kit with cast resin compound with ferrules for 11 KV grade XLPE cable for 3 core 300 sq. mm.	set	4791.15
2437	Indoor heat shrinkable cable jointing kit with lugs for 11 KV grade XLPE cable for 3 core 70 sq. mm.	set	4370.63
2438	Indoor heat shrinkable cable jointing kit with lugs for 11 KV grade XLPE cable for 3 core 120 sq. mm.	set	5118.75
2439	Indoor heat shrinkable cable jointing kit with lugs for 11 KV grade XLPE cable for 3 core 240 sq. mm.	set	5381.25
2440	Indoor heat shrinkable cable jointing kit with lugs for 11 KV grade XLPE cable for 3 core 300 sq. mm.	set	5381.25
2441	Outdoor heat shrinkable cable jointing kit with lugs for 11 KV grade XLPE cable for 3 core 70 sq. mm.	set	6174.00
2442	Outdoor heat shrinkable cable jointing kit with lugs for 11 KV grade XLPE cable for 3 core 120 sq. mm.	set	6615.00
2443	Outdoor heat shrinkable cable jointing kit with lugs for 11 KV grade XLPE cable for 3 core 240 sq. mm.	set	7441.88

Code No.	Description	Unit	Rate ₹
2444	Outdoor heat shrinkable cable jointing kit with lugs for 11 KV grade XLPE cable for 3 core 300 sq. mm.	set	7441.88
2445	Straight through heat shrinkable cable jointing kit with ferrules for 11 KV grade XLPE cable for 3 core 70 sq. mm.	set	10253.25
2446	Straight through heat shrinkable cable jointing kit with ferrules for 11 KV grade XLPE cable for 3 core 120 sq. mm.	set	13062.00
2447	Straight through heat shrinkable cable jointing kit with ferrules for 11 KV grade XLPE cable for 3 core 240 sq. mm.	set	14269.50
2448	Straight through heat shrinkable cable jointing kit with ferrules for 11 KV grade XLPE cable for 3 core 300 sq. mm.	set	14269.50
2528	Indoor heat shrinkable cable jointing kit with lugs for 33 KV grade XLPE cable for 3 core 70 sq. mm.	set	7376.25
2529	Indoor heat shrinkable cable jointing kit with lugs for 33 KV grade XLPE cable for 3 core 120 sq. mm.	set	7762.13
2530	Indoor heat shrinkable cable jointing kit with lugs for 33 KV grade XLPE cable for 3 core 240 sq. mm.	set	11704.88
2531	Outdoor heat shrinkable cable jointing kit with lugs for 33 KV grade XLPE cable for 3 core 70 sq. mm.	set	9961.88
2532	Outdoor heat shrinkable cable jointing kit with lugs for 33 KV grade XLPE cable for 3 core 120 sq. mm.	set	12311.25
2533	Outdoor heat shrinkable cable jointing kit with lugs for 33 KV grade XLPE cable for 3 core 240 sq. mm.	set	15925.88
2534	Straight through heat shrinkable cable jointing kit with ferrules for 33 KV grade XLPE cable for 3 core 70 sq. mm.	set	25659.38
2535	Straight through heat shrinkable cable jointing kit with ferrules for 33 KV grade XLPE cable for 3 core 120 sq. mm.	set	32426.63
2536	Straight through heat shrinkable cable jointing kit with ferrules for 33 KV grade XLPE cable for 3 core 240 sq. mm.	set	45052.88
OVER HEAD LINE ACCESSORIES			
2601	Stay rod (1.8 M long, 19/20 mm dia.) with anchor plate 45 cm X 45 cm X 7.5 mm complete with thimble etc.	set	550.00
2602	Stay wire (7/4.00 mm dia.)	kg	48.00
2603	Stay wire (7/3.15 mm dia.)	kg	48.00
2604	Turn buckle (20 mm X 60 cm)	each	200.00
2605	Strain insulator	each	25.00
2606	Bow tightner	each	200.00
2607	Shackle insulator (75 mm X 90 mm) with G.I. bolts and nuts	set	38.00
2608	Shackle insulator (100 mm X 110 mm) with G.I. bolts and nuts	set	60.00
2609	Pin insulator (100 mm X 65 mm) with G.I. spindle and nuts	set	33.00

Code No.	Description	Unit	Rate ₹
2610	Pin insulator (100 mm X 80 mm) with G.I. spindle and nuts	set	35.00
2611	MV horn gap lightning arrestor with pin insulator (100 mm X 65 mm), spindle and brass metal parts etc.	set	90.00
2615	15 amps aerial fuse complete with porcelain tube as required	each	15.00
2616	30 amps aerial fuse complete with porcelain tube as required	each	25.00
2618	Stay clamp	set	60.00
2619	Brace (50 mm X 50 mm X 6 mm angle iron)	metre	221.73
2620	Angle iron bracket (50 mm X 50 mm X 6 mm) 65 cm long	each	144.00
2623	Eye hook	each	16.00
2624	Guy clamp	each	60.00
2635	D' iron clamp (with coach screws)	each	75.00
2643	Strain insulator 11 KV	each	40.00
2644	Strain insulator 33 KV	each	65.00
2645	11 KV pin insulator with pin washers and nuts	set	266.00
2646	11 KV disc insulator	set	776.00
2647	Galvanised insulator hardware fitting ball and socket type with strain clamps, bolts, nuts and washers	set	155.00
2648	33 KV pin insulator with pin washers and nuts	set	855.00
2649	Galvanised insulator hardware fitting ball and socket type with strain clamps, bolts, nuts and washers for 3 Nos 11 KV disk insulator	set	425.00
2650	3 piece lightning arrestor set for 11 KV O.H. lines complete with G.I. clamps bolts and nuts with washers	set	5062.50
2651	Single piece lightning arrestor set for 33 KV O.H. lines complete with G.I. clamps bolts and nuts with washers	set	37500.00
2665	G.I. strap for shackle insulator	set	50.00
CABLE TRAYS			
2701	MS perforated cable tray painted with powder coating 100 X 50 X 1.6 mm	metre	242.55
2702	MS perforated cable tray painted with powder coating 150 X 50 X 1.6 mm	metre	300.83
2703	MS perforated cable tray painted with powder coating 225 X 50 X 1.6 mm	metre	394.54
2704	MS perforated cable tray painted with powder coating 300 X 50 X 1.6 mm	metre	486.68
2705	MS perforated cable tray painted with powder coating 375 X 50 X 2 mm	metre	622.13
2706	MS perforated cable tray painted with powder coating 450 X 50 X 2 mm	metre	725.29

Code No.	Description	Unit	Rate ₹
2707	MS perforated cable tray painted with powder coating 600 X 50 X 2 mm	metre	922.95
2708	MS perforated cable tray painted with powder coating 300 X 62.5 X 2 mm	metre	553.61
2709	MS perforated cable tray painted with powder coating 375 X 62.5 X 2 mm	metre	654.41
2710	MS perforated cable tray painted with powder coating 450 X 62.5 X 2 mm	metre	756.79
2711	MS perforated cable tray painted with powder coating 600 X 62.5 X 2 mm	metre	952.09
2712	MS perforated cable tray painted with powder coating 750 X 62.5 X 2 mm	metre	1131.64
2713	MS perforated cable tray painted with powder coating 900 X 62.5 X 2 mm	metre	1350.56
2714	MS perforated cable tray painted with powder coating 600 X 75 X 2 mm	metre	985.16
2715	MS perforated cable tray painted with powder coating 750 X 75 X 2 mm	metre	1159.2
2716	MS perforated cable tray painted with powder coating 900 X 75 X 2 mm	metre	1383.64
2717	MS perforated cable tray Connector 100 X 50 X 1.6 mm	each	24.41
2718	MS perforated cable tray Connector 150 X 50 X 1.6 mm	each	31.50
2719	MS perforated cable tray Connector 225 X 50 X 1.6 mm	each	32.29
2720	MS perforated cable tray Connector 300 X 50 X 1.6 mm	each	32.29
2721	MS perforated cable tray Connector 375 X 50 X 2 mm	each	35.44
2722	MS perforated cable tray Connector 450 X 50 X 2 mm	each	41.74
2723	MS perforated cable tray Connector 600 X 50 X 2 mm	each	45.68
2724	MS perforated cable tray Connector 300 X 62.5 X 2 mm	each	35.44
2725	MS perforated cable tray Connector 375 X 62.5 X 2 mm	each	40.95
2726	MS perforated cable tray Connector 450 X 62.5 X 2 mm	each	44.89
2727	MS perforated cable tray Connector 600 X 62.5 X 2 mm	each	49.22
2728	MS perforated cable tray Connector 750 X 62.5 X 2 mm	each	54.73
2729	MS perforated cable tray Connector 900 X 62.5 X 2 mm	each	57.49
2733	MS perforated cable tray Bend 100 X 50 X 1.6 mm	each	488.25
2734	MS perforated cable tray Bend 150 X 50 X 1.6 mm	each	600.08
2735	MS perforated cable tray Bend 225 X 50 X 1.6 mm	each	786.71
2736	MS perforated cable tray Bend 300 X 50 X 1.6 mm	each	978.08
2737	MS perforated cable tray Bend 375 X 50 X 2 mm	each	1242.68
2738	MS perforated cable tray Bend 450 X 50 X 2 mm	each	1449.79

Code No.	Description	Unit	Rate ₹
2739	MS perforated cable tray Bend 600 X 50 X 2 mm	each	1845.11
2740	MS perforated cable tray Bend 300 X 62.5 X 2 mm	each	1111.16
2741	MS perforated cable tray Bend 375 X 62.5 X 2 mm	each	1310.40
2742	MS perforated cable tray Bend 450 X 62.5 X 2 mm	each	1511.21
2743	MS perforated cable tray Bend 600 X 62.5 X 2 mm	each	1906.54
2744	MS perforated cable tray Bend 750 X 62.5 X 2 mm	each	2264.06
2745	MS perforated cable tray Bend 900 X 62.5 X 2 mm	each	2703.49
2746	MS perforated cable tray Bend 600 X 75 X 2 mm	each	1973.48
2747	MS perforated cable tray Bend 750 X 75 X 2 mm	each	2323.13
2748	MS perforated cable tray Bend 900 X 75 X 2 mm	each	2768.85
2749	MS perforated cable tray Reducer 100 X 50 X 1.6 mm	each	366.19
2750	MS perforated cable tray Reducer 150 X 50 X 1.6 mm	each	445.73
2751	MS perforated cable tray Reducer 225 X 50 X 1.6 mm	each	589.84
2752	MS perforated cable tray Reducer 300 X 50 X 1.6 mm	each	732.38
2753	MS perforated cable tray Reducer 375 X 50 X 2 mm	each	931.61
2754	MS perforated cable tray Reducer 450 X 50 X 2 mm	each	1089.11
2755	MS perforated cable tray Reducer 600 X 50 X 2 mm	each	1356.08
2756	MS perforated cable tray Reducer 300 X 62.5 X 2 mm	each	834.75
2757	MS perforated cable tray Reducer 375 X 62.5 X 2 mm	each	982.01
2758	MS perforated cable tray Reducer 450 X 62.5 X 2 mm	each	1130.85
2759	MS perforated cable tray Reducer 600 X 62.5 X 2 mm	each	1430.10
2760	MS perforated cable tray Reducer 750 X 62.5 X 2 mm	each	1698.64
2761	MS perforated cable tray Reducer 900 X 62.5 X 2 mm	each	2027.81
2762	MS perforated cable tray Reducer 600 X 75 X 2 mm	each	1478.93
2763	MS perforated cable tray Reducer 750 X 75 X 2 mm	each	1741.16
2764	MS perforated cable tray Reducer 900 X 75 X 2 mm	each	2076.64
2765	MS perforated cable tray Tee 100 X 50 X 1.6 mm	each	732.38
2766	MS perforated cable tray Tee 150 X 50 X 1.6 mm	each	901.69
2767	MS perforated cable tray Tee 225 X 50 X 1.6 mm	each	1181.25
2768	MS perforated cable tray Tee 300 X 50 X 1.6 mm	each	1466.33
2769	MS perforated cable tray Tee 375 X 50 X 2 mm	each	1864.80
2770	MS perforated cable tray Tee 450 X 50 X 2 mm	each	2175.08
2771	MS perforated cable tray Tee 600 X 50 X 2 mm	each	2764.91
2772	MS perforated cable tray Tee 300 X 62.5 X 2 mm	each	1665.56
2773	MS perforated cable tray Tee 375 X 62.5 X 2 mm	each	1964.03
2774	MS perforated cable tray Tee 450 X 62.5 X 2 mm	each	2268.00
2775	MS perforated cable tray Tee 600 X 62.5 X 2 mm	each	2858.63
2776	MS perforated cable tray Tee 750 X 62.5 X 2 mm	each	3391.76
2777	MS perforated cable tray Tee 900 X 62.5 X 2 mm	each	4054.05
2778	MS perforated cable tray Tee 600 X 75 X 2 mm	each	2957.85

Code No.	Description	Unit	Rate ₹
2779	MS perforated cable tray Tee 750 X 75 X 2 mm	each	3482.33
2780	MS perforated cable tray Tee 900 X 75 X 2 mm	each	4152.49
2781	MS perforated cable tray Cross member 100 X 50 X 1.6 mm	each	977.29
2782	MS perforated cable tray Cross member 150 X 50 X 1.6 mm	each	1186.76
2783	MS perforated cable tray Cross member 225 X 50 X 1.6 mm	each	1575.00
2784	MS perforated cable tray Cross member 300 X 50 X 1.6 mm	each	1953.79
2785	MS perforated cable tray Cross member 375 X 50 X 2 mm	each	2486.14
2786	MS perforated cable tray Cross member 450 X 50 X 2 mm	each	2899.58
2787	MS perforated cable tray Cross member 600 X 50 X 2 mm	each	3688.65
2788	MS perforated cable tray Cross member 300 X 62.5 X 2 mm	each	2222.33
2789	MS perforated cable tray Cross member 375 X 62.5 X 2 mm	each	2619.23
2790	MS perforated cable tray Cross member 450 X 62.5 X 2 mm	each	3024.00
2791	MS perforated cable tray Cross member 600 X 62.5 X 2 mm	each	3813.08
2792	MS perforated cable tray Cross member 750 X 62.5 X 2 mm	each	4525.76
2793	MS perforated cable tray Cross member 900 X 62.5 X 2 mm	each	5402.25
2794	MS perforated cable tray Cross member 600 X 75 X 2 mm	each	3944.54
2795	MS perforated cable tray Cross member 750 X 75 X 2 mm	each	4641.53
2796	MS perforated cable tray Cross member 900 X 75 X 2 mm	each	5536.13
ANGLE/FLAT IRAON AND STEEL SHEET			
2801	MS Suspender 6 mm dia 0.75m long	each	20.00
2802	MS Suspender 8 mm dia 0.75m long	each	25.00
2803	MS Suspender 10 mm dia 0.75m long	each	35.00
2804	25 mm X 25 mm X 3 mm angle iron	kg	47.00
2805	35 mm X 35 mm X 4 mm angle iron	kg	47.00
2806	35 mm X 35 mm X 5 mm angle iron	kg	47.00
2807	50 mm X 50 mm X 6 mm angle iron	kg	47.00
2808	65 mm X 65 mm X 6 mm angle iron	kg	47.00
2809	20/25 mm X 3 mm flat iron	kg	47.00
2810	25 mm X 4 mm flat iron	kg	47.00
2811	25 mm X 6 mm flat iron	kg	47.00
2812	40 mm X 3 mm flat iron	kg	47.00
2813	50 mm X 6 mm flat iron	kg	47.00
2814	50 mm X 8 mm flat iron	kg	47.00
2815	100 mm X 50 mm X 6 mm channel iron (9.56 kg/ mtr)	kg	47.00
2816	75 mm X 40 mm X 6 mm channel iron (7.14 kg/ mtr)	kg	47.00
2817	1.6 mm thick M.S. sheet	kg	53.00
2818	3 mm thick M.S. sheet	kg	53.00
GI AND RCC PIPE			
2819	20 mm dia G.I. Pipe (light class)	metre	94.94

Code No.	Description	Unit	Rate ₹
2820	32 mm dia G.I. Pipe (light class)	metre	165.40
2821	50 mm dia G.I. Pipe (light class)	metre	259.64
2822	80 mm dia G.I. Pipe (light class)	metre	413.03
2823	100 mm dia G.I. Pipe (light class)	metre	589.32
2824	15 mm dia. G.I. pipe (medium class)	metre	82.01
2825	20 mm dia. G.I. pipe (medium class)	metre	103.49
2826	40 mm dia. G.I. pipe (medium class)	metre	225.92
2827	15 mm dia. G.I. pipe (heavy class)	metre	94.02
2828	20 mm dia. G.I. pipe (heavy class)	metre	121.51
2829	Check nut 20mm	each	4.00
2831	32 mm dia. G.I. pipe (medium class)	metre	197.64
2832	50 mm dia. G.I. pipe (medium class)	metre	287.46
2833	80 mm dia. G.I. pipe (medium class)	metre	483.49
2834	100 mm dia. G.I. pipe (medium class)	metre	681.86
2835	150 mm dia. G.I. pipe (medium class)	metre	1087.18
2836	40 mm to 20 mm reducer	each	36.00
2837	Nipple 50 mm dia	each	36.00
2838	40 mm dia. G.I. bend (medium class)	each	120.00
2839	50 mm dia. G.I. bend (medium class)	each	120.00
2841	100 mm dia RCC pipe NP2 class	metre	135.00
2842	150 mm dia RCC pipe NP2 class	metre	154.00
2843	250 mm dia RCC pipe NP2 class	metre	188.00
2844	300 mm dia RCC pipe NP2 class	metre	261.00
2845	100 mm dia RCC collar NP2 class	each	20.00
2846	150 mm dia RCC collar NP2 class	each	25.00
2847	250 mm dia RCC collar NP2 class	each	40.00
2848	300 mm dia RCC collar NP2 class	each	49.00
SCREWS, NUT BOTS AND OTHER ACCESSORIES			
2851	Al. Alloy/ cadmium plated iron screws, 20 mm	each	0.38
2852	Iron screws, 35 mm X 6 mm	each	0.92
2853	Iron screws, 40 mm X 6 mm	each	0.94
2854	Iron screws, 45 mm X 6 mm	each	1.10
2855	Steel fastener 6 mm X 75 mm	each	5.15
2856	Steel fastener 8 mm X 75 mm	each	6.62
2857	PVC fastener 40mm long	each	0.25
2858	PVC clip for fixing cable	each	0.10
2859	Rubber/ PVC bushes	each	0.50
2860	6 mm dia rivet/ stud/ bolts and nuts	each	3.25
2861	25mm X 3mm bolts & nuts	each	1.57

Code No.	Description	Unit	Rate ₹
2862	32mm X 8mm bolts & nuts	each	3.75
2863	38mm X 10mm bolts & nuts	each	6.20
2864	38 mm X 7 mm, bolts and nuts	each	5.00
2865	15 mm long X 6 mm dia G.I. bolts and nuts	each	4.00
2866	10 mm X 25 mm long G.I. bolt with nut etc	each	9.00
2867	16 mm X 50 mm bolts and nuts with washers	set	6.06
2868	16 mm X 40 mm bolts and nuts with washers	set	6.06
2869	16 mm X 125 mm bolts and nuts with washers	set	19.43
2870	16 mm X 150 mm bolts and nuts with washers	set	22.71
2871	10 mm X 25 mm long tinned brass bolt with nut etc.	each	26.25
2881	GI saddles 19mm x 0.55mm for conduit	each	0.78
2882	GI saddles 25mm x 0.90mm for conduit above 25mm	each	1.05
2901	20 mm X 3 mm copper tape (0.533 kg/mtr)	kg	523.70
2902	25 mm X 5 mm copper tape (1.15 kg/mtr)	kg	523.70
2903	32 mm X 6 mm copper tape (1.705 kg/mtr)	kg	523.70
2904	8 SWG copper wire (4.0 mm dia)	kg	517.65
2905	600 mm X 600 mm X 3 mm thick copper plate (10.5 kg)	each	5181.75
2906	Copper saddle	each	27.56
2907	50 mm X 5mm copper strip (2.30 kg/mtr)	kg	523.70
2908	Brass nipple	each	6.00
2909	Lightning finial, 25 mm dia X 300 mm long, copper	each	515.70
2910	Lightning finial, 25 mm dia X 300 mm long, G.I.	each	180.40
2911	20 mm X 3 mm G.I. Tape (0.461 kg/mtr)	kg	55.65
2912	25 mm X 5 mm G.I. strip (1.0 kg/mtr)	kg	58.43
2913	25 mm X 6 mm G.I. strip (1.2 kg/mtr)	kg	58.43
2914	32 mm X 6 mm G.I. Tape (1.475 kg/mtr)	kg	58.43
2915	600 mm X 600 mm X 6 mm thick G.I. plate	each	1245.00
2916	6 SWG G.I. wire	kg	56.00
2917	GI saddle 20mm x 3mm	each	2.050
2918	Funnel	each	16.50
2919	G.I. nuts and through bolts with washer	each	21.00
2920	Washers	each	0.16
2921	G.I. Hooks made of 8 SWG GI wire/ GI clip	each	2.15
2922	CI/MS cover plate hinged to FRLSame with Locking arrangement	each	248.05
2923	Pulley of 50 mm dia	each	68.35
2924	Clamps, bolts, nuts etc.	set	90.40
2925	Flat iron clamps (50 mm X 6 mm) for G.I. pipe	each	27.55
2926	G.I. plate (10 cm X 10 cm X 5 mm)	kg	65.00
2927	Ball and socket	each	13.50
2928	Back plate	each	5.25

Code No.	Description	Unit	Rate ₹
2929	Check nut 20mm	each	2.70
2931	PVC sleeve	metre	3.80
2932	250 mm X 200 mm H.T. danger notice plate	each	49.5
2933	200 mm X 150 mm M.V. danger notice plate	each	38.55
2934	Earthing thimbles and solder	L.S.	10.75
2935	Cement, paint, sand etc.	L.S.	4.50
2936	Painting with primer and finish paint	L.S.	3.50
2937	Diesel	letre	50.25
2938	Cotton waste, cleaning cloth etc.	kg	36.00
2939	Cleaning materials like soap/ detergent	kg	41.00
2940	Tin solder etc.	L.S.	21.00
2941	Charcoal	kg	9.00
2942	Coke	kg	7.50
2943	Salt	kg	8.00
2944	Paint	letre	151.00
2945	Common burnt clay F.P.S. (non modular) bricks class designation 7.5	each	2.90
2946	Fine sand	cum	640.00
2947	Bricks ballast	cum	500.00
2948	Cement	tonne	5000.00
2949	Stone aggregate (single size) 40mm nominal size	cum	950.00
2950	Stone aggregate (single size) 20mm nominal size	cum	1050.00
2951	Stone aggregate (single size) 10mm nominal size	cum	1050.00
2952	Coarse sand (Zone III)	cum	1120.00
9999	Sundries/bending charges	L.S.	1.00
HVAC Items			
3001	M.S. Pipe - 400 mm dia. (Heavy Class, 7 mm thick MS Sheet)	Per Mtr	4736.00
3002	M.S. Pipe - 350 mm dia. (Heavy Class, 6.35 mm thick MS Sheet)	Per Mtr	2776.00
3003	M.S. Pipe- 300 mm dia. (Heavy Class, 6.35 mm thick MS Sheet)	Per Mtr	2511.00
3004	M.S. Pipe - 250mm dia. (Heavy Class, 6.35 mm thick MS Sheet)	Per Mtr	2092.00
3005	M.S. Pipe - 200mm dia. (Heavy Class, 6.35 mm thick MS Sheet)	Per Mtr	1668.00
3006	M.S. Pipe - 150mm dia. (C-Class)	Per Mtr	1069.00
3007	M.S. Pipe - 125mm dia. (C-Class)	Per Mtr	900.00
3008	M.S. Pipe - 100mm dia. (C-Class)	Per Mtr	730.00
3009	M.S. Pipe - 80mm dia. (C-Class)	Per Mtr	495.00
3010	M.S. Pipe -65mm dia. (C-Class)	Per Mtr	407.00
3011	M.S. Pipe -50 mm dia. (C-Class)	Per Mtr	311.00
3012	M.S. Pipe - 40 mm dia. (C-Class)	Per Mtr	220.00
3013	M.S. Pipe - 32 mm dia (C-Class)	Per Mtr	189.00
3014	M.S. Pipe - 25 mm dia (C-Class)	Per Mtr	147.00

Code No.	Description	Unit	Rate ₹
3015	Resin bonded fiber glass pipe section insulation having density 80 kg/cum - 65 mm thickness	Sqm	1099.00
3016	Resin bonded fiber glass pipe section insulation having density 80 kg/cum - 50 mm thickness	Sqm	813.00
3017	Resin bonded fiber glass pipe section insulation having density 80 kg/cum - 40 mm thickness	Sqm	634.00
3018	Resin bonded fiber glass pipe section insulation having density 80 kg/cum - 25 mm thickness	Sqm	380.00
3019	Nitrile rubber(cross link closed cell preformed sections of polyethylene) insulation -32 mmthick	Sqm	818.00
3020	Nitrile rubber(cross link closed cell preformed sections of polyethylene) insulation -19 mmthick	Sqm	453.00
3021	Expanded polystrene moulded pipe section of density 20 kg/cu.m insulation-75 mm thickness	Sqm	718.00
3022	Expanded polystrene moulded pipe section of density 20 kg/cu.m insulation-50 mm thickness	Sqm	449.00
3023	Pipe aluminium Cladding 0.63mm BUTTERFLY VALVE (MANUAL) with C I body SS Disc, Nitrile Rubber Seal & O- Ring PN 16 pressure rating for chilled water/ hot water circulation as specified	Sqm	300.00
3024	200 mm dia	Each	8330.00
3025	150mm dia.	Each	4117.00
3026	125mm dia.	Each	3736.00
3027	100mm dia.	Each	2991.00
3028	80mm dia.	Each	2418.00
3029	65mm dia.	Each	2127.00
3030	50mm dia.	Each	1854.00
3031	40mm dia. BALANCING VALVE WITH BUILT IN MEASURING FACILITY with C I body flanged construction with EPDM coated disc with long pitch with protected out pipe insulation & PN 16 pressure rating for chilled / hot water circulation as specified.	Each	1808.00
3032	200 mm dia	Each	41723.00
3033	150mm dia.	Each	22361.00
3034	125mm dia.	Each	15180.00
3035	100mm dia.	Each	10871.00
3036	80mm dia.	Each	5881.00
3037	65 mm dia	Each	4786.00
3038	50mm dia.	Each	3690.00
3039	40 mm dia	Each	2236.00

Code No.	Description	Unit	Rate ₹
	NON - RETURN VALVE with dual plate of C I body SS plates vulcanized NBR seal flanged end & PN 16 pressure rating for chilled / hot water circulation including insulation as specified.		
3040	200 mm dia	Each	6244.00
3041	150mm dia.	Each	5208.00
3042	125mm dia.	Each	3854.00
3043	100 mm dia	Each	2899.00
3044	80mm dia.	Each	2045.00
3045	65 mm dia	Each	1608.00
	Y - STRAINER of Ductile CI Body flanged ends with stainless steel strainer for chilled / hot water circulation including insulation as specified.		
3046	200mm dia	Each	14725.00
3047	150mm dia.	Each	11876.00
3048	125mm dia.	Each	7590.00
3049	100 mm dia	Each	6045.00
3050	80 mm dia	Each	4681.00
3051	65mm dia.	Each	3817.00
3052	50mm dia.	Each	3263.00
3053	40mm dia.	Each	2931.00
3054	Industrial type pressure gauges with gun metal / brass valves	Each	717.00
3055	Industrial type thermometers.	Each	525.00
	Factory fabricated GSS sheet metal rectangular/round ducting of following sheet thickness		
3056	Thickness 0.63 mm sheet	sqmtr	376.00
3057	Thickness 0.80 mm sheet	sqmtr	457.00
3058	Thickness 1.00 mm sheet	sqmtr	548.00
3059	Thickness 1.25 mm sheet	sqmtr	645.00
	At site Fabricated GSS sheet metal rectangular/round ducting of following sheet thickness		
3060	Thickness 0.63 mm sheet	sqmtr	310.00
3061	Thickness 0.80 mm sheet	sqmtr	378.00
3062	Thickness 1.00 mm sheet	sqmtr	488.00
3063	Thickness 1.25 mm sheet	sqmtr	610.00
3064	GI volume control duct damper	sqmtr	3697.00
	Motorized (ON-OFF Type) duct mounted GI volume control damper with enthalpy sensor and necessary control wire (minimum 1.5 sqmm) for integration within AHU room		
3065	Actuator	sqmtr	3589.00

Code No.	Description	Unit	Rate ₹
3066	powder coated extruded aluminium Supply Air Grills with aluminium volume control dampers	sqmtr	5258.00
3067	powder coated extruded aluminium Return Air Grills with louvers but without volume control dampers	sqmtr	3033.00
3068	supply air diffusers of powder coated aluminium with aluminium volume control dampers with anti smudge ring & removable core.	sqmtr	7079.00
3069	Return air diffusers of powder coated aluminium without volume control dampers with anti smudge ring & removable core.	sqmtr	4652.00
3070	Thermal insulated flexible duct- 200 mm dia	sqmtr	274.00
	Fire dampers in supply air duct/main branch and return air path with inbuilt mechanism of spring return action		
3071	Fire damper	sqmtr	5584.00
3072	Actuator	sqmtr	5212.00
3073	25 mm thick, density 32 kg / cu.m resin bonded fiber glass wool insulation	sqmtr	119.00
3074	50mm thick, density 32 kg/cu.m resin bonded fiber glass insulation	sqmtr	253.00
3075	Duly laminated aluminum foil of mat finish closed cell Nitrile rubber (class "O") insulation for use on existing duct		
3076	19mmthickness	Mtr	551.00
3077	25mmthickness	Mtr	731.00
	AIR HANDLING UNITS		
	Factory built floor mounted chilled water double skin type horizontal/vertical air handling units made of 25mm thick panels consisting of pre plasticized G.I. casing of thickness 0.8mm outside layer and 0.8 mm inside layer with polyurethane foam (PUF) insulation factory injected between them by injection moulding machine, complete with blower section with blower suitable for static pressure as required, minimum 2 bend GSS/ PVC eliminators,cooling coil section with aluminium finned copper tubes (tubes thickness not less than 0.5mm) cooling coil of 6 row deep, filter section with 50mm thick metal viscous/ washable synthetic type air prefilters, belt drive package with TEFC drive motor suitable for 415 ± 10% volts, 50Hz, 3 Phase AC supply, drain connections, stainless steel (18G) drain pan with PUF insulation, 150 mm dia. dial type pressure gauges (2 nos.)and industrial type thermometers (2 nos.) at the inlet and outlet of coil, auto purge valve wherever required, necessary vibration isolation arrangement etc. complete as per specification and of following capacities.		
3078	2500CFM	Set	52024.00
3079	3000CFM	Set	59748.00
3080	4000CFM	Set	73522.00
3081	5000CFM	Set	88971.00
3082	6000CFM	Set	102000.00

Code No.	Description	Unit	Rate ₹
3083	7000CFM	Set	111306.00
3084	8000CFM	Set	119496.00
3085	9000CFM	Set	148347.00
3086	10000CFM	Set	154768.00
3087	11000CFM	Set	165657.00
3088	12000CFM	Set	207257.00
	<p>Factory built floor mounted chilled water double skin type horizontal/vertical air handling units made of 25mm thick panels consisting of pre plasticized G.I. casing of thickness 0.8mm outside layer and 0.8 mm inside layer with polyurethane foam (PUF) insulation factory injected between them by injection moulding machine, complete with blower section with blower suitable for static pressure as required, minimum 2 bend GSS/ PVC eliminators, cooling coil section with aluminium finned copper tubes (tubes thickness not less than 0.5mm) cooling coil of 4 row deep, filter section with 50mm thick metal viscous/ washable synthetic type air prefilters, belt drive package with TEFC drive motor suitable for $415 \pm 10\%$ volts, 50Hz, 3 Phase AC supply, drain connections, stainless steel (18G) drain pan with PUF insulation, 150 mm dia. dial type pressure gauges (2 nos.) and industrial type thermometers (2 nos.) at the inlet and outlet of coil, auto purge valve wherever required, necessary vibration isolation arrangement etc. complete as per specification and of following capacities.</p>		
3089	2500CFM	Set	49562.00
3090	3000CFM	Set	52208.00
3091	4000CFM	Set	61753.00
3092	5000CFM	Set	75233.00
3093	6000CFM	Set	77408.00
3094	7000CFM	Set	100912.00
3095	8000CFM	Set	106186.00
3096	9000CFM	Set	128406.00
3097	10000CFM	Set	141956.00
3098	11000CFM	Set	153248.00
3099	12000CFM	Set	165347.00



REFERENCE TO AMENDMENTS

S.No.	Reference under which issued	Item No.	Page No.	Remarks

REFERENCE TO AMENDMENTS

S.No.	Reference under which issued	Item No.	Page No.	Remarks

NOTE

Central Public Works Department (CPWD)
In the service of the nation since 158 Years.

Under the Ministry of Urban Development, Government of India, CPWD provides single window services for all facets of the government built environment in India and abroad.

With its huge resource of skilled and competent engineers, architects and horticulturists, CPWD's strength is its country wide presence, with proven ability to undertake a whole range of complex constructions under difficult terrains. The department has the capacity to undertake a range of work varying from the smallest works in the remotest of places to mega projects in metro cities. These works include the construction and maintenance of government structures such as residential complexes, offices, schools, laboratories, hospitals, sport facilities, stadia, gymnasia, auditoria, storages, highways, flyovers, tunnels, bridges, jetties, airports, runways and border road & fencing, high altitude roads, Intra-campus facilities such as water and electric supply, sewerage and treatment plants are also provided.

CPWD also discharges other functions such as the custody of estates, valuation, rent assessment, technical advice to government, consultancy services, standardization and benchmarking, State Ceremonies (Republic Day, Samadhis, etc.), processing of DPRs for development of urban infrastructure under JNNURM, North –Eastern region and works of other Ministries for centrally funded works. CPWD also assists in organizing public and ceremonial functions, and upkeep of historical and important monuments.

Delhi Schedules of Rates (E&M) 2013

Standardization of rates of some of the items pertaining to Air conditioning works has been attempted here. Thus DSR (E&M) 2013 incorporates schedule of rates for internal & external electrical works and rates for chilled water pipes, ducting, insulation, valves etc. pertaining to low side of Air Conditioning works as well as for four and six row deep Air Handling Units. One of the special features of this DSR is inclusion of Fire retardant low smoke wires in the items of wiring, in view of fire safety of any built environment. DSR (E&M) 2013 also includes rates for occupancy sensors and time switches under the chapter Lighting Control and so reaffirms the CPWD's commitment towards construction of sustainable habitat.



CENTRAL PUBLIC WORKS DEPARTMENT
Ministry of Urban Development,
Government of India
www.cpwd.gov.in