

Government of Andhra Pradesh

Part I, Part II & Part IV SCHEDULE OF RATES AS PER A.P. REVISED STANDARD DATA FOR THE YEAR 2013-14

(Effective from 1st June, 2013)

BOARD OF CHIEF ENGINEERS

Office of the Engineer-in-Chief (I.W.) I&CAD Dept., Errum Manzil, Hyderabad

Procs. No. ENC/IW/P&M/EE3/DEE10/5/AE/13305/Vol-36, Dt. 10.07.2013

- Sub: Schedule of Rates as per Revised Standard Data for the year 2013-14 Irrigation & CAD works (part-1), Road & Bridge Works (Part-2) and Drinking water supply schemes (part-4) approved- Printing & Communication of SoRs Reg.
- Ref: 1. G.O.Ms.No.49, I & CAD (PW: Reforms) Dept., dt:.2-3-2009.
 - 2. E-in-C (PR) Lr. No. T2/DEE-5/Draft proposal rates/2013 Dt. 09-05-2013.
 - 3. E-in-C (PH) Lr. No. 146/T1/SoR/2013-14/2013 Dt. 20-05-2013.
 - 4. Industrial Consumer Index points obtained from Commissioner, labour department.
 - 5. Minutes of B.O.CE's meeting for Schedule of Rates held on dt.27-5-2013.
 - 6. T.O. Letter No. ENC/IW/P&M/EE-III/DEE-5/10/AE/13305/Vol-36/dt. 08.07.2013 communicating the approved items to be incorporated in the Minutes

-o0o-

The Government have approved Revised Standard Data vide ref 1st cited. The Schedule of Rates as per A.P. Revised Standard Data for the year 2013-14 is approved based on the following.

The Engineer-in-Chief, Panchayat Raj Department has furnished draft rates for Road & Bridge Works items vide ref 2nd cited.

The Engineer-in-Chief, Public health Department has furnished draft rates for Public Health Work Items and Public Health materials vide ref 3rd cited.

The <u>ENC(R&B)</u> <u>Department has not furnished the SoR as per A.P.Revised</u> <u>Standard Data.</u>

The CE(Buildings), R&B Department has yet to furnish the Part-III of Common SoR i.e., Buildings

For Irrigation & CAD Work Items, the regional Superintending Engineers of Irrigation Circles of Hyderabad, Chittoor & Dowlaiswaram in charge of Telangana, Rayalaseema and Andhra regions respectively have submitted the draft basic rates of materials. The Superintending Engineer, Mechanical Circle, Hyderabad has furnished draft rates of mechanical and workshop items. Accordingly, the draft rates for Irrigation & Command Area Development are prepared.

The BoCE has recommended to delete the Seiniorage Charges from the material rates and to add the Seigniorage Charges to the Unit rate of work Item

while preparing the estimate. Accordingly, Seiniorage Charges are deducted from the material rates in Part-I of the SoR 2013-14.

The minimum wages are calculated from the index points obtained from the

Commissioner, labour department vide reference 4^{th} cited for finalizing the rates for SoR 2013-

14.

Based on the proposals, the draft Schedule of Rates for the year 2013-14 were reviewed

and finalized in the annual Board of Chief Engineers meeting held on 27-5-2012.

The Procedure for the adoption of Irrigation work items, lead & lift charges (Common to

all departments) is incorporated in the Annexure-A of SoR.

The approved basic rates are applicable to the datas as per A.P.Revised Standard Data

approved by the Government vide G.O. 1st cited. The Government approval is necessary to adopt

any other data (i.e) MORT&H Data for adopting the Road & Bridge Works (Part-2).

The Lead & Lift Charges are common to all Engineering Departments. The detailed

calculations are incorporated in the Lead & Lift chapter in the I&CAD works (Part-I) of A.P.

Revised Standard Data

One hard copy & compact disc containing Schedule of Rates is here with communicated.

No other items other than the items communicated by this Office shall be introduced in the SoR.

The Heads of Department and Officers mentioned below are authorized to print the

Schedule of Rates for the year 2013-14. The unauthorized printing & selling of the SoR is strictly

prohibited. The Schedule of Rates for 2013-14 will be in force until the new SoR comes in to

force.

Any discrepancies found (or) corrections required in SoR 2013-14 may be brought to

the notice of undersigned for issuing corrections.

The revised rates will come into force from 1st June of 2013.

The receipt of the proceedings may be acknowledged.

Encl: SoR 2013-14 containing Part-I(Irrigation & Works), Part-II (Road & Bridge Works) and

Part-IV (Public Health Items)

Sd/- L. Narayan Reddy, dt. 10.07.2013

Engineer-in-Chief(I.W.) Chairman, BoCE (S.R.)

- **I)** Copy Communicated to the following Heads of Departments along with Enclosures for information.
- 1) Engineer-in-Chief (Admn & NH)., Roads & Buildings Department.
- 2) Engineer-in-Chief (P.H.), Public Health Department.
- 3) Engineer-in-Chief (P.R.), Panchayath Raj Department.
- 4) Engineer-in-Chief (RWS) R W S, Department.
- 5) Chief Engineer (Buildings), R&B Department.
- 6) Copy of C.D containing Schedule of Rates 2013-14 & Standard data, part-1 (Irrigation & CAD works) to all Engineers-in-Chief, Chief Engineers of Irrigation & CAD Department for favour of information.
- **II)** Copy to the Superintending Engineer, Irrigation Circle, Irrigation & CAD Department, Red Hill, Hyderabad for necessary action.

Sd/- L. Narayan Reddy, dt. 10.07.2013 Engineer-in-Chief(I.W.) Chairman, BoCE (S.R.)

Important - Read the Following

ANNEXURE- A

- 1) The SPIU(Irrigation), Centre for Good Governance (CGG), Hyderabad has developed soft ware package linking the basic input data of Irrigation with approved data of Irrigation work items.
- 2) The lead and lift charges are common to all Engineering Departments. The detailed calculations are incorporated in the Lead &Lift charges chapter in the I&CAD works (Part-1) of A.P. Revised standard data.

The Leads for Steel and Cement shall be from the nearest market place to the Project area

- **3)** Further, the CGG has also developed estimate preparation package to use in the preparation of estimates duly making provision for incorporation of applicable lead & lift for different materials, Area allowances for labour, Dewatering charges and VAT as additional.
- **4)** For Gates & Hoist works, the excise duty on the fabrication of work (other than materials) shall be added as per the Government Orders issued from time to time while preparing the estimate.
- 5) The estimate sanctioning authority shall physically verify each and every Irrigation work item data incorporated in the estimate with basic input data before sanction of the estimate. Any lapses or arithmetic errors arising in the sanction of data's / estimate due to adoption of the software package lies entirely on the concerned estimate sanctioning authority only.
- 6) Any discrepancies / corrections required for improper basic input data appearing in the approved data's of Irrigation work items in the software package and hard copy of SoR & Standard data's (part-1) may be brought to the notice of undersigned for issuing corrections.

Sd/- L. Narayan Reddy, dt. 10.07.2013 Engineer-in-Chief(I.W.) Chairman, BoCE (S.R.)

INDEX

PART-I

SI. No.	Description	Page No.		
		From	То	
1	Part-I (Irrigation & CAD Works)			
	Preamble	1	4	
	Labour Rates	5	9	
	Basic input data for Irrigation work items & materials not covered in basic input data	10	35	
	Conveyance Charges of Materials	36	40	
	Hire Charges of Machinery	41	44	



PREAMBLE

I.O AREA ALLOWANCES:

A) **CORPORATIONS & MUNICIPALITIES:**

- a) (i) 25% extra over the rates on labour component of works is allowed in all Municipal Corporation Limits of Andhra Pradesh except Greater Hyderabad, Greater Visakhapatnam and Vijayawada municipal corporations (up to a belt of 12 Kms. from Municipal Corporation limits) and other corporations as notified by the Government from time to time.
 - (ii) 40% extra over the rates on labour component of works for Greater Hyderabad, Greater Visakhapatnam and Vijayawada Municipal Corporation (up to a belt of 12 Kms. from Municipal Corporation limits).
- b) Allow 20% extra over basic rates on labour component of works in all District Headquarters and the remaining Municipal limits (up to a belt of 12 Kms from Municipal limits).
- c) For works at Tirumala Hills in Chittoor District, 40% extra over the basic rates of labour component is allowed.
- d) For works at Horsely hills in Chittoor District, 30% extra over the basic rates of labour component is allowed.
- e) For works located inside Tirumala Temple, 20% extra over the basic rate of labour component specified for Tirumala Hills is allowed.
- f) For Works located inside T.T.D Temples of Sri Padmavathi Ammavari Temple, Tiruchanoor, Sri Govindaraja Swamy Temple at Tirupathi, Sri Kapleswara Swamy Temple, Kapilatheerthm, Tirupathi and Sri Kalyana Venkateswara Swamy Temple, Srinivasa Mangapuram, 20% extra over the basic rates of labour component for Tirupathi Municipal Corporation is allowed.

B) JAIL COMPOUNDS:

20% extra is allowed over labour rates for the work in the Jail compounds. Only equivalent number of Man Mazdoor shall be provided in the Jail premises and no women Mazdoor are allowed inside.

C) INDUSTRIAL AREA:

a. 20% over basic rates on labour component works allowed for works situated within 10Kms belt of Industrial area of, Jeedimetla, Lingampally, Ibrahimpatnam, Tandur in Ranga Reddy District, Ibrahimpatnam, Vuyyuru, Jaggaiahpeta in Krishna District, Macherla, Gurajala, Challapalli in Guntur District Garividi in Vijayanagaram District, Kothur in Mahabubnagar District, Patancheru, Ramachandrapur in Medak District, Bibinagar in Nalgonda District, Ramagundam and Godavarikhani in Karimnagar District, Renigunta in Chittoor District and Yerraguntla & Mangampet in Kadapa District, Manchiryal, Mandamarri, Bellampalli in Adilabad District, Sarpaka, Kothagudem, Paloncha, Manguguru, Singareni Collieries in Khammam District, Kamalapur, Bhoopalpally of Warangal District, Wadepally of Nalgonda District, Nagapally(Centenary Colony, Begumpet "X" roads),Takkelapally of Karimnagar District, Hindupur, Tadipatri, Anantapur, Guntakal, Rayalcheruvu, Yadiki of Anantapur District and

Adoni, Dhone, Cement Nagar, Nandyal, Kurnool, Yemmiganur & Bethamcherla of Kurnool District, Anakapally of Vishakhapatnam District.

D) AGENCY / TRIBAL AREAS:

- a) 25% extra is allowed for the works located within the interior Agency / Tribal limits, i.e. for the works located within & upto16 KMs from any all weather route inside Agency / Tribal.
- b) 40% extra is allowed for the works located within the interior Agency / Tribal limits, i.e. for the works located beyond 16 KMs from any all weather route inside Agency / Tribal.
- **NOTE:** 1. No extra percentage is permissible in respect of Forest produce such as Bamboo, Rellu grass and for all materials obtained from outside the Agency / Tribal.
 - 2. The extra percentage under Agency / Tribal areas allowance may be allowed on the labour component and on the labour charges in the rates for conveyance of materials.
 - 3. The extra percentage on cost of materials in Agency / Tribal areas can be allowed on the labour component only, if they are manufactured in the Agency / Tribal areas itself except Forest produce.

E) GHAT ROADS:

For Ghat Roads steeper than 1 in 20, the length of the road may be taken as 1.5 times the existing length of the road for the purpose of leads only for conveyance of materials based on the certificate for the Ghat Road given by the Superintending Engineer concerned.

Foot Note: Under compelling circumstances, the concerned Chief Engineer can adopt the equivalent length of road as 2 ½ times of actual length.

Note below area allowances:

If more than one area allowance (such as those) for (1)
Municipalities (2) Agency / Tribal areas (3) Industrial areas are
applicable for a particular situation, only the maximum out of
the allowable percentages is to be allowed.

- 2.0 <u>EXCAVATION OF TRIAL TRENCHES, TRIAL PITS AND EXCAVATION IN RESTRICTED PLACES</u>: -
 - I) EXCAVATION OF TRIAL TRENCHES, TRIAL PITS AND EXCAVATION IN RESTRICTED PLACES: -

A. TRIAL TRENCHES:

1) Trial trenches of not more than 2 metres in width...25% extra

B. TRIAL PITS:

1) Up to 2 Metres depth	•••	25% extra
2) 2 Metres to 4 Metres depth	•••	50% extra
3) 4 Metres to 6 Metres depth	•••	75% extra
4) 6 Metres to 8 Metres depth	•••	100% extra
5) 8 Metres to 9 Metres depth	•••	150% extra
6) More than 9 Metres depth	•••	200% extra

II) EXCAVATION IN RESTRICTED PLACES:-

I)	Foundation of Buildings		75% extra
II)	For pipe lines where the depth is less than 1.5 times the width		75% extra
III)	For pipe lines where the depth is 1.5 times or more than the width		120% extra
IV)	Silt removal in restricted areas such U. T's., Culverts and Syphons.	•••	120% extra
V)	Excavation of field channels	•••	75% extra
VI)	For narrow trenches not more than 2 meters in width and depth not less than twice the width and for excavation of road boundary drains, model sections of canals.		75% extra
VII)	High berm cutting of not more than 150 mm average thickness and sectioning for roads		50% extra

Note: 1) The extra percentage is allowed over Common item for all earth works (COM-MWRK-Manual Works) for corresponding soil and Standard data items. It includes the charges for all lifts and initial lead but does not include dewatering charges if any in respect of all the items under (A) and (B) above.

2) The above extra percentages in respect of excavation in hard rock for restricted places are to be allowed for (2/3) rd of the cost and shall not to be allowed in respect of items involving blasting component which may be taken as 1/3 of the cost.

3.0 SEIGNIORAGE CHARGES:

Note:

The rates of the materials indicated in the SOR are exclusive of Seigniorage Charges. Appropriate Seigniorage Charges for relevant materials are to be added to the Unit rate of work item in the estimates as fixed by the Government in G.O.Ms.No.198 (Industries and Commerce Dept.) dt:13.08.2009. In case of revision, the revised rates as fixed by Mines and Geology Department have to be adopted.

LABOUR RATES

LABOUR RATES

Sl No.	CATEGORY OF WORKER	S. Rate for 2013-14
1	2	3
I.	SKILLED CATEGORY:	
1	Bar bender	370
2	Black smith / Tin smith / Rivetor	350
3	Blaster	400
4	Carpenter Cl- I	350
5	Electrician (Licensed)	400
6	Fitter Cl- I	350
7	Floor Polisher / Tile Layer	350
8	Foreman	400
9	Gauge reader	335
10	Maistry / Work Inspector with Non-technical Qualification SSLC/SSC/HSC	335
11	Mason Cl- I / Brick layer Cl- I	350
12	Mechanic Cl- I	350
13	Operator Air compressor / DG set	350
14	Operator Batching plant	400
15	Operator Bus/Ambulance/ Lorry/ Tanker	400
16	Operator Concrete / Asphalt mixer	350
17	Operator Concrete / Asphalt paver	350
18	Operator Concrete pump / Placer/ ice plant	350
19	Operator Core drilling machine	400
20	Operator Crane/ Tower crane/ Cable way	400
21	Operator Drilling jumbo / Loco / Winch	350
22	Operator Grouting/ Guniting/ Shotcreting	350
23	Operator Jackhammer/Pneumatic tamper	350
24	Operator Pump / Ventilation fan	350
25	Operator Lathe/Drilling/Shearing machine	400
26	Operator Bending / Planing machine	350
27	Operator Road roller	350

Sl No.	CATEGORY OF WORKER	S. Rate for 2013-14
1	2	3
28	Operator Shovel / Scraper / Dozer	400
29	Operator Spillway / Sluice gate	350
30	Operator Crusher / Conveyor / Mucker	350
31	Operator Tipper / Dumper / Transit mixer	400
32	Operator Concrete vibrator	350
33	Operator Vibratory plain / pad foot roller	350
34	Operator Wagon drill / Drifter	400
35	Painter Cl- I	400
36	Plumber / Pipe fitter	400
37	Sarang / Khalasi	350
38	Spun pipe moulder	350
39	Stone chiseller CI- I / Stone cutter Cl- l	350
40	Struct. steel Fabricator / Marker / Erector	400
41	Welder / Gas Cutter	350
42	Welder (X-ray quality)	400
II.	SEMI SKILLED CATEGORY:	
1	Asphalt Sprayer / Boiler attendant	320
2	Bhisti	320
3	Boatman with boat	335
4	Carpenter Cl- II / Erector shuttering	320
5	Cartman with double bullock cart	365
6	Cartman with single bullock cart	345
7	Chavali / Navagani	320
8	Crowbarman / Jumper man	320
9	Fitter Cl- II	320
10	Gang man / Head / Survey mazdoor	320
11	Gardener / Trained mali	320
12	Air compressor / DG set	320
13	Helper Batching plant	320
14	Helper Blasting	320

Sl No.	CATEGORY OF WORKER	S. Rate for 2013-14
1	2	3
15	Helper Bus/ Ambulance/ Lorry/ Tanker	320
16	Helper Bending/Shearing/Planing machine	320
17	Helper Carpenter	320
18	Helper Concrete / Asphalt mixer	320
19	Helper Concrete / Asphalt paver	320
20	Helper Core drilling machine	320
21	Helper Crane/ Tower crane/ Cable way	320
22	Helper Drilling jumbo / Loco / Winch	320
23	Helper Fitter / Fabrication/Electrician	320
24	Helper Grouting/ Guniting/ Shotcreting	320
25	Helper Jack hammer / Pneumatic tamper	320
26	Helper Laboratory / Instrumentation	320
27	Helper Road roller	320
28	Helper Shovel / Scraper / Dozer	320
29	Helper Crusher / Conveyor / Mucker	320
30	Helper Tipper / Dumper/ Transit mixer	320
31	Helper Vibrator	320
32	Helper Vibratory plain/ pad foot roller	320
33	Helper Wagon drill/ Drifter	320
34	Lineman Electric / Telephone	320
35	Mason Cl- ll / Brick layer Cl-II	320
36	Mechanic Cl- II	320
37	Painter Cl- II	320
38	Patkari / Neeraganti / Sowdy	320
39	Stone Chiseller Cl- II	320
40	Stone breaker / Hammer man	320
41	Valve man / Canal sluice operator	320
III.	UN-SKILLED CATEGORY:	
1	Cement / Asphalt handling mazdoor	280
2	Civic worker	280
3	Man mazdoor	280

Sl No.	CATEGORY OF WORKER	S. Rate for 2013-14
1	2	3
4	Woman mazdoor	280
5	Watchman	280
IV.	OTHER CATEGORY:	
1	Care-taker / conductor / Lift Attender	335
2	Cook / Mess man	335
3	Dhobi	335
4	Diploma Engineer / Surveyor	500
5	Diver with headgear	400
6	Graduate / Laboratory Assistant	400
7	Graduate Engineer/ Geologist	670
8	Horticulture Assistant / Photographer	335
9	ITI certificate holder / Tracer / Printer	400
10	Literate mazdoor	315
11	Stenographer / Computer Operator	440
12	Telephone / Wireless Operator	390
13	Typist / Job Typist	390
14	CAD operator with Diploma in Engineering/General degree with CAD certificate	550
15	Jeep Driver	400
16	Data Processing Operator	550

Note: - 1)The wage should not be less than the minimum wages of schedule of employment, subject to out turn. 2) 25% extra over the corresponding labour rates in respect of the work to be done during night time subject to issue of certificate accordingly by the concerned estimate sanctioning authority for providing in the data and by concerned Executive Engineer in charge of the work for payment. The night time allowance is applicable only to the works done under Greater Hyderabad Municipal Corporation, Greater Visakhapatnam Municipal Corporation and Vijayawada Municipal Corporation limits only.

BASIC INPUT DATA FOR IRRIGATION WORK ITEMS

STATEMENT OF RATES FOR MATERIALS FOR THE YEAR : 2013-14 GENERAL GUIDE LINES FOR REVISING RATES OF MATERIALS:

- 1 Average of the prevailing market rates, ignoring freak rates, is the criteria for Fixing market rates for materials.
- 2 The rates for materials is inclusive of all taxes, duties and other local levies.
- 3 The rates for materials are **exclusive of** Seigniorage charges wherever applicable.
- 4 The rates for materials, except those for which lead charges are admissible as per the Statement of lead charges is for all leads.
- 5. The rates provided for useful rubble / stone chips from excavation shall be at dump yard.

Sl No.	DESCRIPTION OF MATERIAL	UNIT	S. Rate for 2013-14
1	2	3	4
1	Acetylene gas	cum	320
2	Asphalt 80/100 Grade	Kg	40
3	Binding wire	Kg	70
4	Burnt stone slab 10 cm thick	sqm	280
5	Cement 43 Gr (including loading charges) Note: As per Monthly rate fixed by Sub- Committee.	tonne	4100 (Rate for 5/2013)
6	Chequered plate	Kg	60
7	Coarse aggregate 10-4.75 mm(excluding Seigniorage charges)	cum	830
8	Coarse aggregate 20-10 mm(excluding Seigniorage charges)	cum	1150
9	Coarse aggregate 40-20 mm(excluding Seigniorage charges)	cum	1090
10	Coarse aggregate 80-40 mm(excluding Seigniorage charges)	cum	605
	The aggregate rates mentioned above (from Sl.No.7 to Sl.No.10) are exclusive of Seigniorage charges but including blasting charges of Rs.70/cum and 25% machine crushing charges. However, if the metal is obtained from hand broken, the blasting and crushing charges shall be deducted. The aggregate shall be HB Stone of Granite, Dolamite, Dolerite and Trap. (Quartzite and Basalt with aggregate impact of less than 20)		
11	Coir brush	Each	42

Sl No.	DESCRIPTION OF MATERIAL	UNIT	S. Rate for 2013-14
1	2	3	4
12	Copper sheet 16 SWG	kg	665
13	Coursed rubble stone 30 x 30 x 45 cm(excluding Seigniorage charges)	Each	18
14	Coursed rubble stone 30 x 30 x 60 cm(excluding Seigniorage charges)	Each	21
15	Curing Compound	Ltr	125
16	D – cord	Rm	16
17	Delay - noiseless trunk	Each	21
18	Detonating fuse coil	Rm	11
19	Detonating shock tube / Cord relays	Rm	65
20	Detonator delay type	Each	23
21	Detonator electric	Each	13
22	Detonator ordinary	Each	9
23	Empty cement bag	Each	4.5
24	Explosive ANFO	kg	40
25	Explosive ANFO high strength booster	kg	75
26	Explosive small dia (Kelvex-220 or equivalent)	kg	70
27	(a)Fine aggregate/ sand(un- screened) for Concrete & Filtering items) (excluding Seigniorage charges)	cum	385
	(b)Fineaggregate/Sand(unscreened)for filling(excluding Seigniorage charges)		285
28	Fine aggregate /Sand (Screened) for Mortar ,Plastering items and Sand blasting items(excluding Seigniorage charges)	cum	505
29	Geo-textile (filter fabric) 160 gsm	sqm	107
30	Geo-textile (filter fabric) 200 gsm	sqm	128
31	Geo-textile (filter fabric) 250 gsm	sqm	150
32	G I Pipe 100 mm dia B Class	Rm	735
33	G I Pipe 15 mm dia A class	Rm	105
34	G I pipe 25 mm dia A class	Rm	160
35	G I pipe 40 mm dia B class	Rm	290
36	G I pipe 50 mm dia A class	Rm	320

Sl No.	DESCRIPTION OF MATERIAL	UNIT	S. Rate for 2013-14
1	2	3	4
37	G I Pipe 80 mm dia B Class	Rm	490
38	G.I Bolts / Nuts and Washers	kg	106
39	G.I sheet (plain)	tonne	66000
40	Hariyala turfing sods	sqm	28
41	Hectometer stone one line dressed	Each	230
42	Hemp yarn	kg	72
43	Honne wood planks	cum	54000
44	Hume pipe with collar 150 mm dia	Rm	320
45	Hume pipe with collar 300 mm dia	Rm	630
46	J- Bolts 30 cm long	Each	33
47	Jungle wood planks	cum	21000
48	Khandki stone 15 to 20 cm height	Each	11
49	Khandki stone 20 to 25 cm height	Each	13
50	Khandki stone 25 to 30 cm height	Each	16
51	Kilometer stone one line dressed	Each	430
52	LDPE sheet (Geo membrane) 500 micron thick	sqm	85
53	LDPE sheet (Geo membrane) 750 micron thick	sqm	125
54	LDPE sheet (Geo membrane) 1000 micron thick	sqm	175
55	M S Bolts / Nuts / Washers	kg	85
56	Murum(including loading charges but excluding Seigniorage charges)	cum	103
57	Oxalic acid	Ltr	74
58	Oxygen gas	cum	50
59	PVC sealing strip	Rm	44
60	PVC water stopper 310 mm wide	Rm	485
61	PVC pipe of 100 mm dia	Rm	175
62	Reinforcement steel (including loading charges) (HYSD/TMT) Note: As per Monthly rate fixed by Sub-Committee	tonne	43,000 (Rate for 5/2013)
63	Resin bond Cement capsule	Each	65

Sl No.	DESCRIPTION OF MATERIAL	UNIT	S. Rate for 2013-14
1	2	3	4
64	Rough stone 20 x 20 x 75 cm (Including Loading charges but excluding Seigniorage Charges)	Each	22
65	Shahabad stone slab (including loading charges but excluding Seigniorage charges)	sqm	218
66	Stone chips (at dump yard/Spoil)(including loading charges but excluding Seigniorage charges)	cum	165
67	Stone chips (at quarry)(including loading charges but excluding Seigniorage charges)	cum	330
68	Structural steel angle / channel / beam / bars (including loading charges) Note: As per Monthly rate fixed by Sub-Committee	tonne	44,000 (Rate for 5/2013)
69	Structural steel plate / flats (including loading charges) Note: As per Monthly rate fixed by Sub-Committee	tonne	41800 (Rate for 5/2013
70	Super Plasticizer (Conplast RP-264 or equivalent)	kg	75
71	Synthetic Enamel paint 1st quality	Ltr	238
72	Synthetic adhesive (Resin + Hardener)	Kg	338
73	Tar felt joint filler board 12 mm thick	sqm	420
74	Tar felt joint filler board 20 mm thick	sqm	630
75	Through stones 20 x 20 x 30 to 45 cm (including loading charges but excluding Seigniorage charges)	Each	22
76	Through stones 25 x 25 x 45 to 60 cm long (including loading charges but excluding Seigniorage charges)	Each	38
77	Through stones 30 x 30 x 65 to 75 cm long (including loading charges but excluding Seigniorage charges)	Each	57
78	Un-coursed rubble stones (at dump yard /Spoil) (including loading charges but excluding Seigniorage charges)	cum	150
79	Un-coursed rubble stones (at quarry)(including loading charges but excluding Seigniorage charges)	cum	280
80	Water proofing compound	kg	72
81	Welding electrodes 4 mm dia	Each	13
82	Wire brush	Each	40

Part I-Basic Input data for Irrigation items – Common SoR 2013-14

Sl No.	DESCRIPTION OF MATERIAL	UNIT	S. Rate for 2013-14
1	2	3	4
83	Wire mesh 20 gauge	sqm	212
84	Zinc chromate red oxide primer paint	Ltr	170
85	inorganic zinc silicate	Ltr	650
86	solvent less coal tar epoxy paint	Ltr	256
87	Zinc phosphate primer	Ltr	210
88	Allkyd based iron oxide paint	Ltr	185
	a) Cost of hdpe (80mm dia)	Rm	620
89	b) light black MS casing pipe 80mm dia (4mm thick)	Rm	670
90	welded steel wire fabric 100X100X5 mm size	Kg	150
91	Protective Mastic	Ltr	469
92	Solventless coal tar epoxy (brown)	Ltr	363

ADDITIONAL MATERIALS FOR GATES & HOISTS FOR THE YEAR: 2013-14

GUIDE LINES:

- a. For cast steel / Alloy steel / Forged steel / Bronze, aluminum alloy components the rates shall be inclusive of cost of basic metal for these components, casting / forging charges, machining charges and applicable excise duty on finished alloy component.
- b. For other materials the rates shall be prevailing market rates.

Sl No.	DESCRIPTION OF MATERIAL	UNIT	S. Rate for 2013-14
1	2	3	4
1	Alloy steel (IS: 1570-carbon steel) shafts	Kg	195
2	Alloy steel (IS: 1570-stainless steel) pins	Kg	420
3	Bolt / Nut / Washer (hot dipped galvanized)	Kg	130
4	Bolt / Nut / Washer (stainless steel)	Kg	340
5	Bronze/Aluminum alloy(IS:305)bearings/bushes	Kg	860
6	Cast iron blocks	Kg	80
7	Cast steel drums / gears	Kg	210
8	Cast steel pinions	Kg	200
9	Cast steel wheels / pulleys / hubs / rollers / retainers	Kg	180
10	Chemical for de-greasing/ derusting/phosphate coating	Ltr	135
11	Coal tar epoxy paint	Ltr	200
12	Forged steel hooks / shackles	Kg	260
13	MS pipe 200 / 300 mm dia	Kg	175
14	MS pipe 32 mm dia	Rm	185
15	MS pipe 25 mm dia	Rm	150
16	Rubber bottom seal (IS: 11855)	Rm	845
17	Rubber side seal (music note type Teflon claded) (IS: 11855)	Rm	2050
18	Rubber side seal (music note type uncladed) (IS: 11855)	Rm	1650
19	Rubber side seal Z-type (IS: 11855)	Rm	2650

Sl No.	DESCRIPTION OF MATERIAL	UNIT	S. Rate for 2013-14
1	2	3	4
20	Rubber corner seal (Teflon claded) (IS: 11855)	Rm	4100
21	Rubber corner seal (un claded) (IS: 11855)	Rm	3400
22	Stainless steel plates / flats	Kg	275
23	Welding electrode 4 mm dia x 450 mm (radiographic low hydrogen)	Each	18
24	Welding electrode 4 mm dia x 450 mm (stainless steel)	Each	26
25	Wire rope 6x37 constn (IS : 2266)	Kg	250
26	Zinc	Kg	165
27	Zinc rich (zinc content : 90 %) epoxy primer	Ltr	650

MATERIALS FOR POWER SUPPLY WORKS FOR THE YEAR: 2013-14

Sl No.	Description of Material	Unit	S. Rate for 2013-14
1	Electric pole with fixtures	Each	
2	Flood light 500 W	Each	For
3	Flood light set	Each	establishing Electrical Sub-
4	Flouscent tube light 40 W	Each	Stations at the
5	Flouscent tube light set	Each	Project Sites wherever necessary, the rates approved by APTRANSCO may be
6	HT / LT Circuit breaker with accessories	Set	
7	HT / LT Line conductor	1000 m	
8	PVC Armoured cable 10 sqmm and below	Rm	
9	PVC Armoured cable 16 sqmm	Rm	followed.
10	PVC Armoured cable 25 sqmm	Rm	
11	PVC Armoured cable 70 sqmm	Rm	

<u>DETAILS OF CAPITAL COST OF MACHINERY / EQUIPMENT</u> <u>FOR THE YEAR: 2013-14</u> <u>GUIDE LINES FOR FIXING CAPITAL COST OF MACHINERY / EQUIPMENT:</u>

1 The Capital cost of machinery / equipment shall be for new machinery / equipment and shall be inclusive of all taxes, duties, other levies.

- 2 The cost of transport vehicles / equipment shall be exclusive of cost of tyres and tubes.
- 3 The cost of drill rods / drill bits / air hose / water hose / road tax / insurance charges and other consumable accessories shall not be included in the capital cost.

4 In cases, where the current capital cost of machinery / equipment could not be collected through enquiries, the capital cost considered for previous year may be updated on the basis of average percentage increase / decrease in the index for machinery published in the R.B.I Bulletin.

Sl No:	DESCRIPTION OF MACHINERY / EQUIPMENT	UNIT	S. Rate for 2013-14
1	2	3	4
1	Agitator car / Transit mixer 2 cum (excluding tyres)	Each	21,50,000
	tyres and tubes 6 sets		86,000
2	Air compressor 5 cmm electric	Each	7,10,000
3	Air compressor 7 cmm diesel	Each	9,50,000
4	Air compressor 7 cmm electric	Each	8,65,000
5	Air compressor 8.5 cmm diesel	Each	10,85,000
6	Air compressor 8.5 cmm electric	Each	11,20,000
7	Air compressor 15 cmm electric	Each	13,70,000
8	Angle Dozer 90 hp	Each	54,75,000
9	Batching plant 0.5 cum with accessories	Each	12,00,000
10	Batching plant 2 x 1.00 cum with accessories	Each	42,45,000
11	Batching plant 2 x 1.50 cum with accessories	Each	54,25,000
12	Bending machine	Each	5,30,000
13	Clamp shell and hoisting ropes	Each	30,000
14	Concrete bucket 1.5 cum	Each	56,000
15	Concrete hand mixer 45/30 ltr	Each	15,500
16	Concrete mixer 300/200 ltr(diesel)	Each	1,50,000
17	Concrete mixer 300/200 ltr (electric)	Each	1,45,000
18	Concrete mixer 600/400 ltr(diesel)	Each	2,60,000
19	Concrete mixer 600/400 ltr (electric)	Each	2,55,000

Sl No:	DESCRIPTION OF MACHINERY / EQUIPMENT	UNIT	S. Rate for 2013-14
1	2	3	4
20	Concrete paver 100 Sqm / hr	Each	23,61,000
21	Concete placer pump / hour	Hour	120.80
22	Convey mucker (excluding tyres)	Each	38,55,000
	tyres and tubes 6 sets		86,000
23	Core drilling machine	Each	11,00,000
24	Diesel generating set 30 KVA	Each	4,95,000
25	Diesel generating set 50 KVA	Each	6,40,000
26	Diesel Loco 45 hp	Each	21,20,000
27	Dewatering pump 5 hp diesel	Each	40,000
28	Dewatering pump 5 hp electric	Each	24,500
29	Dewatering pump 10 hp diesel	Each	60,000
30	Dewatering pump 10 hp electric	Each	55,000
31	Dewatering pump 20 hp diesel	Each	1,90,000
32	Dewatering pump 20 hp electric	Each	1,00,000
33	Drifter	Each	10,58,000
34	Drilling jumbo (excluding tyres)	Each	13,02,000
	tyres and tubes 6 sets		86,000
35	Dumper 4.5 cum (excluding tyres)	Each	14,50,000
	tyres and tubes 6 sets		86,000
36	Geophysical Ele.resistivity meter	Each	4,75,000
37	Grouting pump	Each	1,02,000
38	Guniting / sand blasting equipment	Each	2,80,000
39	Ice plant with accessories 30 t / day	Each	22,80,000
40	Jack hammer	Each	65,000
41	Needle vibrator 40 mm petrol	Each	20,000
42	Needle vibrator 40 mm electric	Each	21,000
43	Needle vibrator 60 mm petrol	Each	21,500
44	Needle vibrator 60 mm electric	Each	25,500
45	Planing machine 4 m stroke	Each	7,80,000

Sl No:	DESCRIPTION OF MACHINERY / EQUIPMENT	UNIT	S. Rate for 2013-14
1	2	3	4
46	Plate shearing machine up to 12 mm	Each	4,25,000
47	Pneumatic placer 0.5 cum	Each	5,80,000
48	Pneumatic tamper	Each	85,000
49	Pug cutting machine	Each	16,000
50	Pusher leg	Each	52,000
51	Road roller diesel 10 t	Each	8,50,000
52	Shovel 0.50 cum 75 hp	Each	37,50,000
53	Shovel 0.85 cum 110 hp	Each	63,80,000
54	Stationery derrick crane 5 t	Each	6,53,000
55	Tipper 5 cum (excluding tyres)	Each	16,25,000
	tyres and tubes 6 sets		86,000
56	Tipping tub 1.5 cum	Each	2,40,000
57	Tower crane 5 tonne	Each	74,75,000
58	Transformer 250 KVA	Each	4,25,000
59	Truck 10 t (excluding tyres)	Each	14,75,000
	tyres and tubes 6 sets		86,000
60	Truck mounted derrick crane 5 t (excluding tyres)	Each	19,60,000
	tyres and tubes 6 sets		86,000
61	Upright drilling machine	Each	56,000
62	Ventilation fan 20 hp	Each	2,60,000
63	Vibratory pad foot roller 8 t	Each	29,50,000
64	Wagon drill	Each	6,50,000
65	Water tanker 8000 ltr (excluding tyres)	Each	14,22,000
	tyres and tubes 6 sets		86,000
66	Welding set	Each	48,000
67	Winch 35 hp electric	Each	3,75,000
68	Hydraulic Truck Crane 30T	Each	1,44,84,250
	tyres and tubes 6 sets		1,85,220
69	Hydraulic Truck Crane 16T	Each	1,03,90,875

Part I-Basic Input data for Irrigation items – Common SoR 2013-14

Sl No:	DESCRIPTION OF MACHINERY / EQUIPMENT	UNIT	S. Rate for 2013-14
1	2	3	4
	tyres and tubes 6 sets		1,85,220
70	Heavy Duty Airless Spray Painting Equipment	Each	4,87,770

ACCESSORIES TO MACHINERY / EQUIPMENT FOR THE YEAR: 2013-14

Sl No.	DESCRIPTION OF MATERIAL	UNIT	S Rate for 2013-14
1	2	3	4
1	Casing shoe bit	Each	10,000
2	Diamond core bit BX size	Each	10,000
3	Diamond core bit NX size	Each	12,000
4	Double tube core barrel	Each	12,800
5	Extension drill rod with coupling sleeve	Rm	2000
6	Jack hammer drill rod 1.5 m	Each	3800
7	Jack hammer drill rod 2.5 m	Each	5900
8	Nozzle for Guniting / sand blasting gun	Each	700
9	Paving Cylinder	Each	27,000
10	Rails 30R (30 kg / m)	tonne	50,000
11	Reamer shell	Each	5000
12	T.C. Cross bit 50 mm dia	Each	5000
13	T.C. Cross bit 75 mm dia	Each	10,000
14	T.C. Cross bit 100 mm dia	Each	12,000
15	Tyres and Tubes for truck	Set	18,000
16	Wire rope 16 mm dia	Rm	265
17	Excavation of drain with Excavator	cum	35

AGGREGATE CRUSHING & PROCESSING PLANT

Sl No.	DESCRIPTION OF MATERIAL	UNIT	S Rate for 2013-14
1	2	3	4
1	Jaw crusher 900 x 500 mm (120 tph) with 50 hp motor	Each	19,25,000
2	Jaw crusher $500 \times 300 \text{ mm}$ (60 tph) with 30 hp motor	Each	10,95,000
3	Jaw crusher 400 x 225 mm (10 tph) with 25 hp motor	Each	5,60,000
4	Jaw plates 900 x 500 mm (serreted)	Set	1,40,000
5	Jaw plates 500 x 300 mm (serreted)	Set	63,000
6	Jaw plates 400 x 225 mm (serreted)	Set	45,000
7	Nylon Conveyor belt 3 ply 600 mm width	Rm	2,000
8	Nylon Conveyor belt 3 ply 1000 mm width	Rm	3,000

OTHER COSTS ON MATERIAL / MACHINERY / EQUIPMENT FOR THE YEAR: 2013-14

- The rate provided for 'SUNDRIES' (Lump sum provision for unquantified inputs in the data rates) shall be updated on the basis of general percentage increase / decrease in the market rates or on the basis of R.B.I 'All Commodity' index.
- 2 The rate for structural steel fabrication shall include cost of all materials (except structural steel), machinery, labour and one coat of primer painting.
- 3 Demand charges and electric power charges shall be as per prevailing APCPDCL tariff.
- 4 Rate of interest on capital cost shall be as approved by Govt or other competent authority.

Sl No.	DESCRIPTION OF MATERIAL	UNIT	S Rate for 2013-14
1	2	3	4
1	Air hose 25 mm dia	Rm	167
2	Air hose 50 mm dia	Rm	298
3	Demand charges (HT-I : General-11 KVA category) on power supply	KVA / month	350
4	Diesel	Ltr	54
5	Electric power (HT-VIII Category) including tax (1.5 times of the Tariff of HT-I(A): General-11 KVA category)	Kwhr	8.50
6	Excise duty on Gates / Hoist supplies	%	0%
7	Insurance charges on machinery	% / annum	1%
8	Interest on capital cost	% / annum	12.5%

Part I-Basic Input data for Irrigation items – Common SoR 2013-14

Sl No.	DESCRIPTION OF MATERIAL	UNIT	S Rate for 2013-14
1	2	3	4
9	Lubricants	Ltr	275
10	Petrol	Ltr	69
11	Rivets	Kg	99
12	Road tax on transport vehicles	Rs./annum	18,132
13	Shalimastic sealing compound	Kg	91
14	Shutter oil	Ltr	78
15	Structural steel fabrication	Kg	24
16	Sundries (Lump sum for un quantified inputs)	LS	41
17	Water hose (pressure) 20 mm dia	Rm	219
18	Steel wedges	LS	16
19	Elbows / Nipple / Plugs etc.,	LS	17
20	Soldering materials	LS	17
21	Steam circulation arrangement	LS	17
22	Fuel charges (gas for heating)	LS	17
23	Vulcanizing materials	LS	17
24	Other accessories / controls / junctions	LS	deleted
25	Miscellaneous fittings / switches etc	LS	deleted
26	Anchors / supports for cables / lights	LS	deleted
27	Civil works for foundations / pedestals / duct etc	LS	deleted
28	Gas cutting set (2 No's 15 m hose and nozzle unit)	Each	14,203
29	Grease	Kg	254
30	Welding holder set (cable / holder / gloves / mask etc)	Each	7331
31	Use rate of ropes	LS	150

MATERIALS FOR GATES AND HOISTS FOR THE YEAR: 2013-14

Sl No.	DESCRIPTION OF MATERIAL	UNIT	S Rate for 2013-14
1	Worm reducers	Each	2,24,400
2	Electric motor 20 hp(Double Shaft)	Each	1,21,000
3	Electric motor 17.5 hp(Double Shaft)	Each	85,800
4	Electric motor 12.5 hp(Double Shaft)	Each	72,600
5	Electric motor 5 hp(Double Shaft)	Each	33,000
6	Electric motor 3 hp (Double Shaft)	Each	23,100
7	Electric motor 2 hp (Double Shaft)	Each	121,00
8	Floating shaft 300 mm dia	Kg	180
9	Manual operating system	Each	28,820
10	Gate position indicator	Each	1,95,800
11	Ele-magnetic brake	Each	35,200
12	Electric cable / switch / control panel etc	LS	50,380
13	Wire rope sockets	Each	4,620

Materials other than covered under irrigation For the year 2013-14 GENERAL GUIDE LINES FOR REVISING RATES OF MATERIALS:

- 1 Average of the prevailing market rates, ignoring freak rates, is the criteria for Fixing market rates for materials.
- 2 The rates for materials is inclusive of all taxes, duties and other local levies.
- 3 The rates for materials are **exclusive of** Seigniorage charges wherever applicable.
- 4 The rates for materials, except those for which lead charges are admissible as per the Statement of lead charges is for all leads.

Sl. No.	Description	Unit	S. Rate for 2013-14
1	2	3	4
M-002	Quarried stone 150 - 200 mm size for Hand Broken (Excluding Seigniorage charges)	Cum	140
M-003	Boulder with minimum size of 300 mm for Pitching (Excluding Seigniorage charges)	Cum	156
M-004	Coarse sand for filling (Excluding Seigniorage charges)	Cum	Rate as per item no.27(b) of material of I&CAD
M-005	Coarse sand for mortar(Excluding Seigniorage charges)	Cum	Rate as per item no.27(a) of material of I&CAD
M-006	Fine Sand (Excluding Seigniorage charges)	Cum	Rate as per item no.28 of material of I&CAD
M-007	Murum (Excluding Seigniorage charges)	Cum	Rate as per item no.56 of Material rates of I&CAD.
M-008	Gravel/Quarry spall(Excluding Seinorage Charges)	Cum	98
M-009	Granular Material or hard murum for GSB works	Cum	Deleted
M-010	Granular Material or hard murum for GSB works(Excluding Seigniorage charges)	Cum	89
M-011	Fly ash conforming to IS: 3812 (Part II & I)	Cum	70
	For item No.M-012 to M-055 the note shall be as follows 1) The rates mentioned are exclusive of Seigniorage charges but inclusive of blasting charges of Rs.70/cum and 25% machine crushing charges. However, if the metal is obtained by hand broken, machine crushing charges shall be deducted. 2) If the material is obtained by hand broken from surface boulders/canal spoil, the blasting and crushing charges shall be deducted. 3) The material shall be HB Stone of Granite, Dolamite, Dolerite and Trap.(Quartzite and Basalt with aggregate impact of less than 20)		

Part I - Materials not covered under Irrigation basic data—Common SoR 2013-14

Sl. No.	Description	Unit	S. Rate for 2013-14
1	2	3	4
M-012	Filter media/Filter Material as per Table 300-3 (MoRT&H Specification) (excluding Seiniorage Charges)	Cum	335
M-013	Close graded Granular sub-base Material 53 mm to 9.5 mm (excluding Seinorage Charges)	Cum	648
M-014	Close graded Granular sub-base Material 37.5 mm to 9.5 mm (excluding Seinorage Charges)	Cum	665
M-015	Close graded Granular sub-base Material 26.5 mm to 9.5 mm (excluding Seinorage Charges)	Cum	690
M-016	Close graded Granular sub-base Material 9.5 mm to 4.75 mm (excluding Seinorage Charges)	Cum	575
M-017	Close graded Granular sub-base Material 9.5 mm to 2.36 mm (excluding Seinorage Charges)	Cum	565
M-018	Close graded Granular sub-base Material 4.75mm to 2.36 mm (excluding Seinorage Charges)	Cum	495
M-019	Close graded Granular sub-base Material 4.75mm to 75 micron mm((excluding Seinorage Charges)	cum	475
M-020	Close graded Granular sub-base Material 2.36 mm (excluding Seinorage Charges)	Cum	475
M-021	Stone crusher dust finer than 3mm with not more than 10% passing 0.075 sieve. (excluding Seinorage Charges)	Cum	340
M-022	Coarse graded Granular sub-base Material 2.36 mm & below (excluding Seinorage Charges)	Cum	425
M-023	Coarse graded Granular sub-base Material 4.75mm to 75 micron mm (excluding Seinorage Charges)	cum	460
M-024	Coarse graded Granular sub-base Material 4.75 mm to 2.36 mm (excluding Seinorage Charges)	Cum	460
M-025	Coarse graded Granular sub-base Material 9.5 mm to 4.75 mm (excluding Seinorage Charges)	Cum	545
M-026	Coarse graded Granular sub-base Material 26.5 mm to 4.75 mm (excluding Seinorage Charges)	Cum	601
M-027	Coarse graded Granular sub-base Material 26.5 mm to 9.5 mm (excluding Seinorage Charges)	Cum	602
M-028	Coarse graded Granular sub-base Material 37.5 mm to 9.5 mm (excluding Seinorage Charges)	Cum	665
M-029	Coarse graded Granular sub-base Material 53 mm to 26 .5mm (excluding Seinorage Charges)	Cum	825
M-030	Aggregates below 5.6 mm(excluding Seiniorage Charges)	Cum	530
M-031	Aggregates 22.4 mm to 2.36 mm (excluding Seiniorage Charges)	Cum	870
M-032	Aggregates 22.4 mm to 5.6 mm (excluding Seiniorage Charges)	Cum	990
M-033	Aggregates 45 mm to 2.8 mm (excluding Seiniorage Charges)	Cum	635

Part I - Materials not covered under Irrigation basic data—Common SoR 2013-14

Sl. No.	Description	Unit	S. Rate for 2013-14
1	2	3	4
M-034	Aggregates 45 mm to 22.4 mm (excluding Seiniorage Charges)	Cum	Rate as per item no.9 of Material rates of I&CAD.
M-035	Aggregates 53 mm to 2.8 mm (excluding Seiniorage Charges)	Cum	870
M-036	Aggregates 53 mm to 22.4 mm (excluding Seiniorage Charges)	Cum	830
M-037	Aggregates 63 mm to 2.8 mm (excluding Seiniorage Charges)	Cum	680
M-038	Aggregates 63 mm to 45 mm (excluding Seiniorage Charges)	Cum	630
M-039	Aggregates 90 mm to 45 mm (excluding Seiniorage Charges)	Cum	Rate as per item no.10 of Material rates of I&CAD.
M-040	Aggregates 10 mm to 5 mm (excluding Seiniorage Charges)	Cum	Rate as per item no.7 of Material rates of I&CAD.
M-041	Aggregates 11.2 mm to 0.09 mm (excluding Seiniorage Charges)	Cum	670
M-042	Aggregates 13.2 mm to 0.09 mm(excluding Seiniorage Charges)	Cum	760
M-043	Aggregates 13.2 mm to 5.6 mm (excluding Seiniorage Charges)	Cum	875
M-044	Aggregates 13.2 mm to 10 mm(excluding Seiniorage Charges)	Cum	980
M-045	Aggregates 20 mm to 10 mm (excluding Seiniorage Charges)	Cum	Rate as per item no.8 of Material rates of I&CAD.
M-046	Aggregates 25 mm to 10 mm (excluding Seiniorage Charges)	Cum	1075
M-047	Aggregates 19 mm to 6 mm (excluding Seiniorage Charges)	Cum	990
M-048	Aggregates 37.5 mm to 19 mm(excluding Seiniorage Charges)	Cum	1050
M-049	Aggregates 37.5 mm to 25 mm(excluding Seiniorage Charges)	Cum	1090
M-050	Aggregates 6 mm nominal size(excluding Seiniorage Charges)	Cum	700
M-051	Aggregates 10 mm nominal size(excluding Seiniorage Charges)	Cum	890
M-052	Aggregates 13.2/12.5 mm nominal size(excluding Seiniorage Charges)	Cum	1045
M-053	Aggregates 20 mm nominal size(excluding Seiniorage Charges)	Cum	1300
M-054	Aggregates 25 mm nominal size(excluding Seiniorage Charges)	Cum	1250

Part I - Materials not covered under Irrigation basic data—Common SoR 2013-14

Sl. No.	Description	Unit	S. Rate for 2013-14
1	2	3	4
M-055	Aggregates 40 mm nominal size(excluding Seiniorage Charges)	Cum	805
M-056	AC pipe 100 mm dia	Metre	Rate as per PH item
M-057	Acrylic polymer bonding coat	Litre	460
M-058	Aluminum Paint	Litre	320
M-059	Aluminum alloy plate 2mm Thick	Sqm	370
M-060	Aluminum alloy/Galvanized steel	Tone	68,865
M-061	Aluminum sheeting fixed with encapsulated lens type reflective sheeting including 2% towards lettering, cost of angle iron, cost of drilling holes, nuts, bolts etc. and signs as applicable	Sqm	940
M-062	Aluminum studs 100 x 100 mm fitted with lens reflectors	No's	As per local market rate
M-063	Barbed wire	Kg	80
M-064	Bearing (Cost of parts)	No's	570
M-065	Bearing (Cast steel rocker bearing assembly of 250 tonne)	No's	785
M-066	Bearing (Elastomeric bearing assembly consisting of 7 internal layers of elastomer bonded to 6 nos. internal reinforcing steel laminates by the process of vulcanization,)	Cm ³	
M-067	Bearing (Forged steel roller bearing of 250 tonne)	No's	As per Market Competitive rates.
M-068	Bearing (Pot type bearing assembly consisting of a metal piston supported by a disc, PTFE pads providing sliding surfaces against stainless steel mating together with cast steel assemblies/fabricated structural steel assemblies duly painted with all components	No's	
M-069	Bearing (PTFE sliding plate bearing assembly of 80 tonnes)	No's	
M-070	Bearing (Supply of sliding plate bearing of 80 tonne)	No's	
M-071	Bentonite	Kg	7.5
M-072	Binding wire	Kg	Rate as per item no.3 of Material rates of I&CAD.
M-073	Bitumen (Cationic Emulsion)	Tone	As per rates fixed by R&B Dept based on refinery rates
M-074	Bitumen (60-70 grade)(Excluding taxes)	Tone	
M-075	Bitumen (80-100 grade) (Excluding taxes)	Tone	

Part I - Materials not covered under Irrigation basic data— Common SoR 2013-14

Sl. No.	Description	Unit	S. Rate for 2013-14
1	2	3	4
M-076	Bitumen (Cutback)	Tone	
M-077	Bitumen (emulsion)(Excluding taxes)	Tone	
M-078	Bitumen (modified graded)	Tone	
M-079	Brick	Each	As per Building SSR
M-080	C.I. shoes for the pile	Kg	54
M-081	Cement	Tone	Rate as per item no.5 of Material rates of I&CAD.
M-082	Cold twisted bars (HYSD/TMT Bars)	Tone	Rate as per item no.62 of Material rates of I&CAD
M-083	Collar for joints 300 mm dia	No's	160
M-084	Compressible Fibre Board(20mm thick)	Sqm	525
M-085	Connectors/ Staples	Each	80
M-086	Copper Plate(12m long x 250mmwide)	Kg	520
M-087	Corrosion resistant Structural steel	Tone	57,500
M-088	Corrugated sheet, 3 mm thick, "Tie" beam section railing	Kg	200
M-089	Credit for excavated rock found suitable for use	Cum	188
M-090	Curing compound	Liter	131
M-091	Delineators from ISI certified firm as per the standard drawing given in IRC - 79	Each	As per local competitive quotations
M-092	Earth Cost or compensation for earth taken from private land(Excluding Seigniorage Charges)	Cum	40
M-093	Elastomeric slab seal expansion joint assembly manufactured by using chloroprene, elastomer for elastomeric slab unit conforming to clause 915.1 of IRC: 83 (part II),	Metre	As per local competitive quotations
M-094	Electric Detonators @ 1 detonator for 1/2 gelatin stick of 125 gms each	100 no's	1205
M-095	Epoxy compound with accessories for preparing epoxy mortar	Kg	350
M-096	Epoxy mortar	Kg	115
M-097	Epoxy primer	Kg	595
M-098	Epoxy resin-hardner mix for prime coat	Kg	615
M-099	Flag of red color cloth 600 x 600 mm	Each	25

Part I - Materials not covered under Irrigation basic data—Common SoR 2013-14

Sl. No.	Description	Unit	S. Rate for 2013-14
1	2	3	4
M-100	Flowering Plants	Each	40
M-101	Galvanized MS flat clamp	No's	195
M-102	Galvanized steel wire crates of mesh size 100 mm x 100 mm woven with 4mm dia. GI wire in rolls of required size.	Sqm	175
M-103	Galvanized structural steel plate 200 mm wide, 6 mm thick, 24 m long	Kg	905
M-104	Gelatin 80%	Kg	73
M-105	Geo grids	Sqm	As per local competitive quotations
M-106	(a)Geo membrane 500 micron thick	Sqm	80
	(b) Geo membrane 750 micron thick	Sqm	120
	(c) Geo membrane 1000 micron thick	Sqm	165
M-107	Geo nets	Sqm	As per local competitive quotations
M-108	(a)Geo textile 160 gsm	Sqm	110
	(b) Geo textile 200 gsm	Sqm	125
	(c) Geo textile 250 gsm	Sqm	150
M-109	Geo textile filter fabric	Sqm	As per local competitive quotations
M-110	GI bolt 10 mm Dia	No's	22
M-111	Grouting pump with agitator	Hour	Rate covered in hire charges of machinery of Irrigation items
M-112	Grass (Doob)	Kg	6
M-113	Grass (Fine)	Kg	8
M-114	HDPE pipes 75mm dia	Metre	Rate as per PH
M-115	HDPE pipes 90mm dia	Metre	items
M-116	Hedge plants Helical pines 600mm diameter	Each	Data as mas 11
M-117	Helical pipes 600mm diameter	Metre	Rate as per local competitive
M-118	Hot applied thermoplastic compound	Litre	quotations
M-119	HTS strand	Tone	

Part I - Materials not covered under Irrigation basic data—Common SoR 2013-14

Sl. No.	Description	Unit	S. Rate for 2013-14
1	2	3	4
M-120	Joint Sealant Compound	Kg	
M-121	Jute netting, open weave, 2.5 cm square opening for seeding and Mulching	Sqm	90
M-122	LDO for steam curing	Litre	65
M-123	M.S. Clamps	Kg	Deleted
M-124	M.S. Clamps	Kg	Rate as per local competitive quotations
M-125	M.S. shoes @ 35 Kg per pile of 15 m	Kg	Rate as per local competitive quotations
M-126	Mild Steel bars	Tone	45,500
M-127	Modular strip/box seal expansion joint including anchorage catering to a horizontal movement beyond 70 mm and up to 140mm assembly comprising of edge beams, central beam,2 modules chloroprene seal, anchorage elements, support and control system, all steel sections protected against corrosion and installed by the manufacturer or his authorized representative	Metre	Rate as per local competitive quotations
M-128	Modular strip/box seal expansion joint catering to a horizontal movement beyond 140mm and up to 210mm box/box seal joint assembly containing 3 modules/cells and comprising of edge beams, two central beams, chloroprene seal, anchorage elements, support and control system, all steel sections protected against corrosion and installed by the manufacturer or his authorized representative	Metre	Rate as per local competitive quotations
M-129	Nipples 12mm	No's	19
M-130	Nuts and bolts	Kg	94
M-131	Paint	Litre	243
M-132	Pavement Marking Paint	Litre	
M-133	Paving Fabric	Sqm	Rate as per local
M-134	Perforated geo synthetic pipe 150 mm dia	Metre	competitive quotations
M-135	Perforated pipe of cement concrete, internal dia 100 mm	Metre	
M-136	Pesticide	Kg	Rate as per local competitive

Part I - Materials not covered under Irrigation basic data—Common SoR 2013-14

Sl. No.	Description	Unit	S. Rate for 2013-14
1	2	3	4
			quotations
M-137	R.C.C Pipes 200 mm dia, 2.5 m long for drainage	Metre	Rate as per PH item
M-138	Plastic sheath, 1.25 mm thick for dowel bars	Sqm	
M-139	Plastic tubes 50 cm dia, 1.2 m high	No's	Rate as per local
M-140	Polymer braids	Metre	competitive
M-141	Pre moulded Joint filler 25 mm thick for expansion		quotations
M-142	Pre-coated stone chips of 13.2 mm nominal size	Cum	
M-143	Preformed continuous chloroprene elastomer or closed cell foam sealing element with high tear strength, vulcanized in a single operation for the full length of a joint to ensure water tightness.	Metre	Rate as per local competitive quotations
M-144	Pre-moulded asphalt filler board	Sqm	
M-145	Pre-packed cement based polymer concrete of strength 45 Mpa at 28 days	Kg	Rate as per local competitive quotations
M-146	Primer	Kg	As per building SSR
M-147	Quick setting compound	Kg	As per local market rate
M-148	Random Rubble Stone(Including Loading Charges but excluding Seignorage Charges)	Cum	245
M-149	RCC Pipe NP 4 heavy duty non pressure pipe 1000 mm dia	Metre	
M-150	RCC Pipe NP 4 heavy duty non pressure pipe 1200 mm dia	Metre	Rate as per PH items
M-151	RCC Pipe NP 4 heavy duty non pressure pipe 300 mm dia	Metre	
M-152	Reflectorising glass beads	Kg	
M-153	Reinforcement strips 60 mm wide 5 mm thick as per clause 3102. (Copper Strips)	Metre	Rate as per local
M-154	Reinforcement strips 60 mm wide 5 mm thick as per clause 3102. (Galvanized carbon steel strips)	Metre	competitive quotations
M-155	Reinforcement strips 60 mm wide 5 mm thick as per clause 3102. (Glass reinforced polymer/ fiber reinforced polymer/polymeric strips)	Metre	

Part I - Materials not covered under Irrigation basic data—Common SoR 2013-14

Sl. No.	Description	Unit	S. Rate for 2013-14
1	2	3	4
M-156	Reinforcement strips 60 mm wide 5 mm thick as per clause 3102. (Stainless steel strips)	Metre	
M-157	Reinforcement strips 60 mm wide 5 mm thick as per clause 3102. (Aluminum strips)	Metre	
M-158	Rivets	Each	6
M-159	Sand bags (Cost of sand and Empty cement bag)	No's	16
M-160	Sapling 2 m high 25 mm dia	Each	Rate as per local competitive quotations
M-161	Scrap tyres of size 900 x 20	No's	80
M-162	Seeds(Grass)	Kg	18
M-163	Cost of Selected earth (Excluding Seignorage Charges)	Cum	40
M-164	Separation Membrane of impermeable plastic sheeting 125 micron thick	Sqm	Rate as per local competitive
M-165	Sheathing duct	Metre	quotations
M-166	Shrubs	Each	15
M-167	Sludge / Farm yard manure @ 0.18 cum per 100 sqm at site of work for turfing	Cum	Rate as per local competitive quotations
M-168	Sodium vapour lamp	Each	As per building SSR
M-169	Square Rubble Coursed Stone(Including Loading Charges but excluding Seigniorage charges)	Cum	2150
M-170	Steel circular hollow pole of standard specification for street lighting to mount light at 5 m height above deck level	Each	Rate to be obtained from Electricity/
M-171	Steel circular hollow pole of standard specification for street lighting to mount light at 9 m height above road level	Each	Municipal Departments
M-172	Steel drum 300 mm dia 1.2 m high/empty bitumen drum	No's	As per local
M-173	Steel helmet and cushion block on top of pile head during driving.	Kg	competitive market rate
M-174	Steel pipe 25 mm external dia as per IS:1239	Metre	280
M-175	Steel pipe 50 mm external dia as per IS:1239	Metre	545
M-176	Steel wire rope 20 mm	Kg	180
M-177	Steel wire rope 40 mm	Kg	205
M-178	Strip seal expansion join	Metre	Rate as per local competitive quotations

Part I - Materials not covered under Irrigation basic data—Common SoR 2013-14

Sl. No.	Description	Unit	S. Rate for 2013-14
1	2	3	4
M-179	Structural Steel(HYSD/TMT bars)	Tone	Rate as per item no.62 of Material rates of I&CAD
M-180	Super plasticizer admixture IS marked as per 9103-1999	Kg	65
M-181	Synthetic Geo grids as per clause 3102.8 and approved design and specifications.	Sqm	Rate as per local competitive quotations
M-182	Through and bond stone (a) 20X20x30 to 45 cm long	Each	Rate as per item No. 75 of Material rates of I & CAD
	Through and bond stone (b) 25X25x45 to 60 cm long	Each	Rate as per item No. 76 of Material rates of I & CAD
	Through and bond stone (c) 30X30x65 to 75 cm long	Each	Rate as per item No. 77 of Material rates of I & CAD
M-183	Tie rods 20mm diameter	No's	52
M-184	Tiles size 300 x 300 mm and 25 mm thick	Each	As per Building
M-185	Timber	Cum	SSR
M-186	Traffic cones with 150 mm reflective sleeve	No's	Rate as per local
M-187	Tube anchorage set complete with bearing plate, permanent wedges etc	No's	competitive quotations
M-188	Un slaked lime	Tonne	2540
M-189	Water	KiloLitre	100
M-190	Water based cement paint	Litre	As per building SSR
M-191	Welded steel wire fabric	Kg	150
M-192	Wire mesh 50mm x 50mm size of 3mm wire	Kg	245
M-193	Wooden ballies 2" Dia for bracing	Each	As per Building
M-194	Wooden ballies 8" Dia and 9 m long	Each	SSR
M-195	Wooden packing	Cum	1265
M-196	Wooden staff for fastening of flag 25 mm dia, one m long	Each	75

Part I - Materials not covered under Irrigation basic data— Common SoR 2013-14

Sl. No.	Description	Unit	S. Rate for 2013-14
1	2	3	4
Item 8.3	Printing new letter and figures of any shade (ii) English Roman	per cm height per letter	1.60
Item 8.8	Painting Two Coats on New Concrete Surfaces	Sqm	As per Building SSR
Item 8.9	Painting angle iron post Two Coats	Sqm	As per Building SSR
	Miscellaneous Items		
1	Benching old embankment slopes 0.45 X 0.45 M	RM	4.20
2	Laying Sand Bags in the stipulated places including cost of empty cement bag, sand, thread, stiching charges and labour charges with 14% overhead charges and contractors profits.	per bag	25.60
3	Rough stone for revetment 225mm thick (including Loading charges but excluding Seigniorage charges)	Cum	140
4	Eradication of Weed growth from Drains, Canals by spraying Chemicals	Sqm	1.75
5	Thinner	Ltr	140

Conveyance Charges of Material

CONVEYANCE CHARGES OF MATERIALS AS PER SoR 2013-14

(COMMON TO ALL DEPARTMENTS).

LEAD, LIFT, LOADING AND UNLOADING CHARGES FOR MATERIALS FOR THE YEAR: 2013-14

- 1. For total lead up to 150 m (including initial lead) lead charges by head load only shall be adopted irrespective of mode of conveyance.
- 2. For total lead exceeding 150 m conveyance by mechanical means only shall be adopted irrespective of mode of conveyance.
- 3. The rates for loading at quarry including idle hire charges of trucks and hire charges per for each kilometer and up to 5 km are cumulative and inclusive of total charges for Preceding lead.
- 4. Unless otherwise specified lead charges for Earth / Sand / Gravel / Aggregates and Stones are for loose volume and not for compacted or in-situ volume.
- 5. The rates for lift charges, lead charges, hire charges are cumulative and inclusive of rates for preceding lift, lead and hire charges.
- 6. Lift charges are not payable where conveyance of materials is by mechanical means to final placing point.
- 7. Loading and unloading charges are not payable for conveyance by head load.
- 8. Loading charges are not payable for conveyance by mechanical means for disposal of excavated materials beyond initial lead of 50 m wherever specified.
- 9. Loading and unloading charges are not payable for conveyance by mechanical means for disposal of excavated materials beyond initial lead of 1 km wherever specified.
- 10. The rates for unloading of materials except earth, sand, gravel, coarse aggregate, rubble, size stone and cut stone are inclusive of stacking.
- 11. Hire charges are per 1KM for tippers and trucks for transport of materials from work site to dump yard and other places are cumulative& includes previous km up to 5 kms
- 12. For detailed calculations, refer to the Lead & Lift charges (Common to all Departments) chapter of Irrigation & CAD works (Part-1), A.P. Revised Standard data. The lead & lift charges are inclusive of 14% Contractors profit and Overhead charges.

A. (LEAD) CONVEYANCE CHARGES FOR MATERIALS BY HEAD LOAD FOR THE YEAR: 2013-14

Sl No.	Total distance (Total lead includes initial lead)	Earth / Sand /Gravel / Murrum/ Lime/ Surki/ Size stone / Cut stone Rubble / Coarse aggregate Rs/Cum	Cement / Reinforce- ment steel Str steel Rs / tonne	PCC slab/ Shahbad slab / CC block/ BS slab/ Late-rite / Wood Rs / cum
1	2	3	4	5
	Total lead up to 50 m			
1	(covered by item rate)	initial lead	initial lead	initial lead
2	Total lead up to 100 m	45.60	26.60	58.00
3	Total lead up to 150 m	91.20	53.20	116.10

Notes: 1. No loading or unloading charges are admissible for conveyance by head load.

- 2. For total lead exceeding 150 m conveyance charges by mechanical means only shall be adopted irrespective of mode of conveyance.
- 3.The lead & lift charges are inclusive of 14% Contractor Profit and Over Head charges $\,$

B.(LEAD) CONVEYANCE CHARGES FOR MACHINERY PER KILOMETER FOR TRANSPORTING MATERIALS BY TIPPERS AND TRUCKS EXCLUDING LOADING, UNLOADING AND IDLE HIRE CHARGES OF MACHINERY FOR THE YEAR: 2013-14

(No loading and unloading charges allowed for machinery loading and unloading)

SI No.	Distance	(Lead) charges for trucks and tippers for Earth / Sand /Gravel / Murrum/ Lime/ Surki/ per cu.meter	(Lead) charges for trucks and tippers for Rubble/Size stones/ Cut Stones/ Coarse aggregate per cu.meter	(Lead) charges for trucks and tippers for Cement/ Steel/ RCC poles/ AC & GI sheets/ Packed materials/tonne	(Lead) charges for trucks and tippers per cu.meter for PCC slabs/ Shahabad slabs/ CC & Laterite blocks/ Wood/ cum	(Lead) charges for trucks and tippers per cu.meter water/ 1000 litres	(Lead) charges for trucks per 1000 nos. of bricks
							0
1	2	3	4	5	6	7	8
1	Lead up to 1 km	30.00	4 28.90	5 18.00	6 42.40	7 17.80	48.10
			_			<u> </u>	
1 2 3	Lead up to 1 km Lead up to 2 km Lead up to 3 km	30.00	28.90	18.00	42.40	17.80	48.10
1 2 3 4	Lead up to 1 km Lead up to 2 km Lead up to 3 km Lead up to 4 km	30.00 42.00	28.90 40.40	18.00 25.30	42.40 59.40	17.80 24.90	48.10 67.30
1 2 3	Lead up to 1 km Lead up to 2 km Lead up to 3 km	30.00 42.00 56.00	28.90 40.40 56.00	18.00 25.30 35.00	42.40 59.40 82.40	17.80 24.90 33.20	48.10 67.30 89.80
1 2 3 4	Lead up to 1 km Lead up to 2 km Lead up to 3 km Lead up to 4 km	30.00 42.00 56.00 68.00	28.90 40.40 56.00 68.00	18.00 25.30 35.00 42.50	42.40 59.40 82.40 100.00	17.80 24.90 33.20 40.30	48.10 67.30 89.80 109.00

Note: The lead & lift charges are inclusive of 14% Contractor Profit and Over Head charges

C. LOADING AND UNLOADING CHARGES BY MANUAL MEANS (idle hire charges of trucks are not added)

SI No.	Description of item	Earth / Sand /Gravel Murrum/ / Surki/ Rs / cum	Rubble/ size stone/ cut stone/ Coarse aggregate, Lime in Rs/cum	cement in Rs/tonne	steel in Rs./tonne	brick work Rs/1000 No
1	2	3	4	5	6	7
1	Loading	15.20	30.30	50.10	60.00	41.70
2	Unloading	7.60	15.15	50.10	60.00	41.70

Note: The lead & lift charges are inclusive of 14% Contractor Profit and Over Head charges

D. LOADING AND UNLOADING CHARGES BY MANUAL MEANS (including idle hire charges of trucks)

Sl No.	Description of item	Earth / Sand /Gravel Murrum// Surki/ Rs / cum	Rubble/ size stone/ cut stone/ Coarse aggregate, Lime in Rs/cum	cement in Rs/tonne	steel in Rs./tonne	brick work Rs/1000 No
1	2	3	4	5	6	7
1	Loading	102.60	117.80	146.30	156.20	200.50
2	Unloading	36.60	58.90	146.30	156.20	200.50

Note: The lead & lift charges are inclusive of 14% Contractor Profit and Over Head charges.

E.LOADING AND UNLOADING CHARGES BY MECHANICAL MEANS (including idle hire charges of trucks)

		Earth /	Rubble/ size
		Sand	stone/ cut
		/Gravel	stone/
Sl No.	Description of item	Murrum//	Coarse
		Surki/	aggregate,
			Lime in
		Rs / cum	Rs/cum
1	2	3	4
1	Loading	50.50	101.10
2	Unloading	15.20	15.20

Note: The lead & lift charges are inclusive of 14% Contractor Profit and Over Head charges

F. LIFT CHARGES FOR MATERIALS BY HEAD LOAD

SI No.	Total lift (Total lift includes initial lift)	Earth / Sand /Gravel Murrum/ Lime/ Surki/ Size stone / Cut stone Rubble / Coarse aggregate Rs / cum	Cement / Reinforce- ment steel Str steel Rs / tonne	PCC slab/ Shahbad slab / CC block/ BS slab / Laterite / Wood Rs / cum
1	2	3	4	5
1	Total lift up to 3 m (covered by item rate) For Every 1.00 Lift	Initial lift	Initial lift	Initial lift
2	beyond initial lift of 3 meters	5.30	3.80	7.10

Note: The lead & lift charges are inclusive of 14% Contractor Profit and Over Head charges

HIRE CHARGES

HIRE CHARGES OF PLANT & MACHINERY FOR THE YEAR: 2013-14

Sl. No	Description of machinery		Hire charge in Rs	Fuel charge in Rs	Crew Charge in Rs.	Total in Rs
1	2	3	4	5	6	7
1	Agitator car / Transit mixer 2 cum	Hour	777.70	816.80	224.60	1819.10
2	Air compressor 5 cmm (electric)	Hour	111.90	256.80	130.70	499.40
3	Air compressor 7 cmm (diesel)	Hour	247.70	668.30	167.20	1083.20
4	Air compressor 7 cmm (electric)	Hour	136.40	342.40	130.70	609.50
5	Air compressor 8.5 cmm (diesel)	Hour	282.90	835.30	167.20	1285.40
6	Air compressor 8.5 cmm (electric)	Hour	176.60	428.00	130.70	735.30
7	Air compressor 15 cmm (electric)	Hour	146.00	951.20	139.40	1236.60
8	Angle Dozer 90 hp	Hour	1753.10	571.40	187.20	2511.70
9	Batching plant 0.5 cum (6 Cum/hr)	Hour	120.30	114.10	269.50	503.90
10	Batching plant 2 x 1.00 cum (15 Cum/hr)	Hour	425.60	342.40	269.50	1037.50
11	Batching plant 2 x 1.50 cum (50 Cum/hr)	Hour	543.90	418.50	269.50	1231.90
12	Bending machine 3000 x 12 mm	Hour	44.70	114.10	104.50	263.30
13	Clamp shell and hoisting ropes	Hour	5.40	0.00	0.00	5.40
14	Concrete bucket 1.5 cum	Hour	16.20	0.00	0.00	16.20
15	Concrete hand mixer 45 / 30 ltr	Hour	5.60	0.00	0.00	5.60
16	Concrete mixer 300 / 200 (diesel)	Hour	54.60	74.30	174.20	303.10
17	Concrete mixer 300 / 200 ltr (electric)	Hour	52.80	38.00	174.20	265.00
18	Concrete mixer 600 / 400 (diesel)	Hour	94.70	148.50	174.20	417.40
19	Concrete mixer 600 / 400 ltr (electric)	Hour	92.90	76.10	174.20	343.20
20	Concrete paver 100 sqm / hr	Hour	371.60	0.00	334.50	706.10
21	Concete placer pump / hour	Hour	102.00	2.00	16.80	120.80
22	Convey mucker	Hour	845.60	264.80	139.40	1249.80
23	Core drilling machine	Hour	328.30	222.80	224.60	775.70
24	Diesel generating set 30 KVA	Hour	67.90	594.00	104.50	766.40
25	Diesel generating set 50 KVA	Hour	87.80	891.00	104.50	1083.30
26	Diesel Loco 45 hp	Hour	392.50	501.20	130.70	1024.40
27	Dewatering pump 5 hp (diesel)	Hour	10.40	74.30	87.40	172.10
28	Dewatering pump 5 hp (electric)	Hour	3.10	38.00	65.50	106.60

Machinery Hire Charges – Common SoR 2013-14

Sl. No	Description of machinery		Hire charge in Rs	Fuel charge in Rs	Crew Charge in Rs.	Total in Rs
1	2		4	5	6	7
29	Dewatering pump 10 hp (diesel)	Hour	15.60	148.50	87.40	251.50
30	Dewatering pump 10 hp (electric	Hour	7.00	76.10	65.50	148.60
31	Dewatering pump 20 hp (diesel)	Hour	49.50	297.00	87.40	433.90
32	Dewatering pump 20 hp (electric	Hour	12.70	152.20	65.50	230.40
33	Drifter	Hour	333.60	0.00	280.80	614.40
34	Drilling jumbo	Hour	376.80	40.10	139.40	556.30
35	Dumper 4.5 cum	Hour	591.60	374.20	179.70	1145.50
36	Geophysical Electric resistivity meter	Hour	101.20	0.00	0.00	101.20
37	Grouting pump	Hour	25.70	38.00	209.00	272.70
38	Guniting / sand blast equipment	Hour	112.20	0.00	174.20	286.40
39	Ice plant & accessories 30 t / day	Hour	179.10	1084.30	104.50	1367.90
40	Jack hammer	Hour	20.50	0.00	261.30	281.80
41	Needle vibrator 40 mm (petrol)	Hour	7.80	19.00	125.40	152.20
42	Needle vibrator 40 mm (electric)	Hour	8.10	7.60	125.40	141.10
43	Needle vibrator 60 mm (petrol)	Hour	8.30	28.50	125.40	162.20
44	Needle vibrator 60 mm (electric)	Hour	9.90	11.40	125.40	146.70
45	Planing machine 4 m stroke	Hour	122.80	114.10	167.20	404.10
46	Plate shearing machine up to 12 mm	Hour	43.60	152.20	112.30	308.10
47	Pneumatic placer 0.5 cum	Hour	174.40	0.00	68.30	242.70
48	Pneumatic tamper	Hour	21.40	0.00	209.00	230.40
49	Pug cutting machine	Hour	6.60	3.80	0.00	10.40
50	Pusher leg	Hour	13.10	0.00	0.00	13.10
51	Road roller diesel 10 t	Hour	202.90	668.30	167.20	1038.40
52	Shovel 0.50 cum 75 hp	Hour	1028.90	445.50	187.20	1661.60
53	Shovel 0.85 cum 110 hp	Hour	1750.50	816.80	187.20	2754.50
54	Stationery derrick crane	Hour	89.50	0.00	0.00	89.50
55	Tipper 5 cum	Hour	456.20	280.70	140.40	877.30
56	Tipping tub 1.5 cum	Hour	65.60	0.00	0.00	65.60
57	Tower crane 5 tonne	Hour	906.30	197.80	149.80	1253.90
58	Transformer 250 KVA	Hour	5324.30	0.00	0.00	5324.30
59	Truck 10 t	Hour	422.80	280.70	140.40	843.90
60	Truck mounted derrick crane 5 t	Hour	530.90	280.70	140.40	952.00
61	Upright drilling machine/grinder	Hour	23.10	38.00	156.00	217.10

Machinery Hire Charges – Common SoR 2013-14

Sl. No	Description of machinery	Unit	Hire charge in Rs	Fuel charge in Rs	Crew Charge in Rs.	Total in Rs
1	2	3	4	5	6	7
62	Ventilation fan 20 hp	Hour	11.90	152.20	22.60	186.70
63	Vibratory pad foot roller 8 t	Hour	1367.10	965.30	209.00	2541.40
64	Wagon drill	Hour	194.00	0.00	224.60	418.60
65	Water tanker 8000 ltr	Hour	411.00	280.70	140.40	832.10
66	Welding set	Hour	16.50	91.30	0.00	107.80
67	Winch 35 hp (electric)	Hour	132.50	186.40	209.00	527.90
68	Tractor with 2 T roller	Hour				345.00
69	Hydraulic Truck Crane 30T	Hour	3193.20	118.80	419.30	3731.30
70	Hydraulic Truck Crane 16T	Hour	2347.90	75.00	419.30	2842.20
71	Heavy Duty Airless Spray Painting Equipment	Hour	123.00			123.00



INDEX PART-II ROAD & BRIDGE WORKS

SI.	Description	Page No.		
No.	Description	From	То	
1	Preamble	1	7	
2	Labour Rates	8	13	
3	Materials & Work Items Rates	14	25	
4	Hire Charges of Plant & Machinery for Road & Bridge Works	26	30	

PREAMBLE

PREAMBLE

I.O AREA ALLOWANCES:

A) **CORPORATIONS & MUNICIPALITIES:**

- a) (i)25% extra over the rates on labour component of works is allowed in all Municipal Corporation Limits of Andhra Pradesh except Greater Hyderabad, Greater Visakhapatnam and Vijayawada municipal corporation (Upto a belt of 12 kms from Municipal corporation limits) and other corporations as notified by the Government from time to time.
 - (ii)40% extra over the rates on labour component of works for Greater Hyderabad , Greater Visakhapatnam and Vijayawada Municipal Corporation limits (Upto a belt of 12 kms from Municipal corporation limits)
- b) Allow 20% extra over basic rates on labour component of works in all District Headquarters and the remaining Municipal limits (up to a belt of 12 Kms. from Municipal limits).
- c) For works at Tirumala Hills in Chittoor District, 40% extra over the basic rates of labour component is allowed.
- d) For works at Horsely hills in Chittoor District, 30% extra over the basic rates of labour component is allowed.
- e) For works located inside Tirumala Temple, 20% extra over the basic rate of labour component specified for Tirumala Hills is allowed.
- f) For Works located inside T.T.D Temples of Sri Padmavathi Ammavari Temple, Tiruchanoor, Sri Govindaraja Swamy Temple at Tirupathi, Sri Kapleswara Swamy Temple, Kapilatheerthm, Tirupathi and Sri Kalyana Venkateswara Swamy Temple, Srinivasa Mangapuram, 20% extra over the basic rates of labour component for Tirupathi Municipal Corporation is allowed.

B) JAIL COMPOUNDS:

20% extra is allowed over labour rates for the work in the Jail compounds. Only equivalent number of Man Mazdoor shall be provided in the Jail premises and no women Mazdoor are allowed inside.

C) INDUSTRIAL AREA:

a. 20% over basic rates on labour component works allowed for works situated within 10 Kms belt of Industrial area of, Jeedimetla, Lingampally, Ibrahimpatnam, Tandur in Ranga Reddy District, Ibrahimpatnam, Vuyyuru, Jaggaiahpeta in Krishna District, Macherla, Gurajala, Challapalli in Guntur District Garividi in Vijayanagaram District. Kothur in Mahabubnagar District. Patancheru. Ramachandrapur in Medak District, Bibinagar in Nalgonda District, Ramagundam and Godavarikhani in Karimnagar District, Renigunta in Chittoor District and Yerraguntla & Mangampet in Kadapa District, Manchiryal, Mandamarri, Bellampalli in Adilabad District, Sarpaka, Kothagudem, Paloncha, Manguguru, Singareni Collieries in Khammam District, Kamalapur, Bhoopalpally of Warangal District, Wadepally of Nalgonda District, Nagapally(Centenary Colony, Begumpet "X" roads) Takkalapally of Karimnagar District, Hindupur, Tadipatri, Anantapur, Guntakal, Rayalcheruvu, Yadiki of Anantapur District and Adoni, Dhone, Cement Nagar, Nandyal, Kurnool, Yemmiganur & Bethamcherla of Kurnool District ,Anakapally of Vishakhapatnam District.

D) AGENCY / TRIBAL AREAS:

a) 25% extra allowed for the works located with in the interior Agency / Tribal limits, i.e. for the works located with in & upto16 KMs from any all weather route inside Agency / Tribal. b) 40% extra allowed for the works located with in the interior Agency / Tribal limits, i.e. for the works located beyond 16 KMs from any all weather route inside Agency / Tribal.

NOTE: 1. No extra percentage is permissible in respect of Forest produce such as Bamboo, Rellu grass and for all materials obtained from outside the Agency / Tribal.

2. The extra percentage under Agency / Tribal areas allowance may be allowed on the labour component and on the labour charges in the rates for conveyance of materials.

3. The extra percentage on cost of materials in Agency / Tribal areas can be allowed on the labour component only, if they are manufactured in the Agency / Tribal areas itself except Forest produce.

E) GHAT ROADS:

For Ghat Roads steeper than 1 in 20, the length of the road may be taken as 1.5 times the existing length of the road for the purpose of leads only for conveyance of materials based on the certificate for the Ghat Road given by the Superintending Engineer concerned.

Foot Note: Under compelling circumstances, the concerned Chief Engineer can adopt the equivalent length of road as 2 $\frac{1}{2}$ times of actual length.

Note below area allowances:

If more than one area allowance (such as those) for (1) Municipalities (2) Agency / Tribal areas (3) Industrial areas are applicable for a particular situation, only the maximum out of the allowable percentages is to be allowed.

2.0 WATER LEADS:

The following labour is allowed for conveyance of water for every ½ Kilometer lead or part there of over the initial lead of ½ kilometer.

a) Cement concrete : 1.5 Women Mazdoor / Cum.
b) Masonry : 1.0 Woman Mazdoor / Cum.
c) Plastering : 0.5 Woman Mazdoor / 10 Sq.m

Note:- For Water leads of over 2 KMs, specific approval of Chief Engineer concerned is necessary.

3.0 EXCAVATION OF TRIAL TRENCHES, TRIAL PITS AND EXCAVATION IN RESTRICTED PLACES: -

I) <u>EXCAVATION OF TRIAL TRENCHES, TRIAL PITS AND</u> EXCAVATION IN RESTRICTED PLACES: -

A. TRIAL TRENCHES:

1) Trial trenches of not more than 2 metres in width25% extra

B. TRIAL PITS:

1) Up to 2 Metres depth ... 25% extra
2) 2 Metres to 4 Metres depth ... 50% extra
3) 4 Metres to 6 Metres depth ... 75% extra
4) 6 Metres to 8 Metres depth ... 100% extra
5) 8 Metres to 9 Metres depth ... 150% extra
6) More than 9 Metres depth ... 200% extra

II) <u>EXCAVATION IN RESTRICTED PLACES</u>:-

I). Foundation of Buildings 75% extra II) For pipe lines where the depth is less ... 75% extra than 1.5 times the width

III) For pipe lines where the depth is ... 120% extra 1.5 times or more than the width

IV) Silt removal in restricted areas such ... 120% extra U. T's., Culverts and Syphons.

V) Excavation of field channels ... 75% extra

VI) For narrow trenches not more than 2 meters in width and depth not less than twice the width and for excavation ... of road boundary drains, model sections of canals.

75% extra

VII) High berm cutting of not more than ... 150 mm average thickness and sectioning for roads

50% extra

- **Note:** 1) The extra percentage is allowed over rate for corresponding soil. It includes the charges for all lifts and initial lead but does not include dewatering charges if any in respect of all the items under (A) and (B) above.
 - 2) The above extra percentages in respect of excavation in hard rock for restricted places are to be allowed for (2/3) rd of the cost and shall not to be allowed in respect of items involving blasting component which may be taken as 1/3 of the cost.

4.0 <u>Proportion of First class and 2nd class workmen under Skilled Labour:</u>

30% of the skilled labour provided in the data may be taken as 1^{st} Class and the remaining 70% as 2^{nd} Class.

5.0 Revetment and apron works:

- I) The size of stone for the volume range (0.015 to 0.030 Cum) shall not be less than (0.30 X 0.30 X 0.15 to 0.30 X 0.225 X 0.225m)
- II) The size of stone for the volume range (0.011 to 0.015 Cum) shall not be less than (0.30 X 0.225 X 0.15 to 0.225 X 0.225 X 0. 225 m)
- III) The rate of labour component as per the standard data book is to be adopted for revetment work only. However for apron work Rs. 3.00 per cum. should be deducted.

IV) For the labour for the **"Rock Toe"** shall be taken as 2/3rd of the labour charges of revetment as Chief Engineer, Circular No. P3/ OT2/ T3/ 65167/78, Dt: 19.03.1980.

6.0 Deep cuts:

Deep cuts are defined as reaches of canal where excavation in all soils is for a depth of excavation 6m and more. The following increase over normal rates is permitted in deep cuts on a graded basis.

I) Up to 6 m excavation: The S. S. R. of corresponding classification of earth work excavation is applicable.

II) Beyond 6 m and up to 9 m excavation - 9% extra

III) Beyond 9 m and up to 12 m excavation - 12% extra

IV) Beyond 12 m and up to 16 m excavation - 15% extra

V) Beyond 16 m and up to 30 m excavation - 20% extra

VI) Beyond 30 m excavation - 40% extra

NOTE: 1) The extra percentage is only on basic rate. 2) The above percentage are not applicable for "**LEADS & LIFTS**". 3) The above extra percentages are to be allowed only on items excluding the blasting component which may be taken as 1/3 of the rate.

7.0 The conveyance of bitumen for bulk and packed may be admitted as follows:

Packed --- Rs. 1.75per Km/ MT

Bulk --- Rs. 1.50 per Km/ MT (round the trip)

8.0 SEIGNIORAGE CHARGES:

Seigniorage charges for materials as fixed by the Government in G.O.Ms.No.198 (industries and commerce department), dated 13.08.2009 may be added in the data of rates in the estimate. The Provision towards Contractor's Profit and Overhead charges **should not be operated** on the Seigniorage Charges while adding Seigniorage Charges to the data in the estimate. In case of revision, the revised rates as fixed by Mines and Geology Department have to be adopted.

9.0 EARTH WORK EXCAVATION BY MACHINERY:

For items of Earth work excavation by machinery, the rates shall be adopted as per Road & Bridge works (Part-2) of A.P. Revised Standard data.

LABOUR RATES

SI.	S.S. Item No.	Description	Unit (per)	SoRate for 2013- 14	Remarks
1	2	3	4	5	6
		(A) SKILLED WORKMEN			
		First Class			
1	а	Mason and stone Cutter	Day	350	As per I& CAD (S.No.39)
2	b	Brick Layer	Day	350	As per I& CAD (S.No.11)
3	С	Carpenter	Day	350	As per I& CAD (S.No.4)
4	d	Painter	Day	400	As per I& CAD (S.No.35)
5	е	Plumber	Day	400	As per I& CAD (S.No.36)
6	f	Welder	Day	350	As per I& CAD (S.No.41)
7	g	Fitter	Day	350	As per I& CAD (S.No.6)
8	h	Electrician(Licensed)	Day	400	As per I& CAD (S.No.5)
9	I	Cook	Day	335	As per I& CAD (S.No.2)
10	2	Mechanic	Day	350	As per I& CAD (S.No.12)
11	3	Rigger	Day	350	
12	4	Rigger Syrang	Day	350	
13	5	Well Sinker	Day	350	
14	6	Blaster	Day	400	As per I& CAD (S.No.3)
15	3	Barbender	Day	370	As per I& CAD (S.No.1)
16	7	Tipper and Heavy Vehicle Driver above 12 T	Day	400	As per I& CAD (S.No.15)
17		Tanker and Medium Vehicle Driver (7.5 T to 12 T)	Day	350	
18		Tanker and Light Vehicle Driver up to 7.5 T	Day	280	
19		Wagon Drill Operator upto 7.5 T	Day	350	
20	8	Lorry and Heavy Vehicle Driver above 12 T	Day	385	

Road Roller Driver up to 7.5 T	21		Road Roller Driver (7.5 T to 12 T)	Day	350	As per I& CAD (S.No.27)
24 Tractor Driver (7.5 T to 12 T) Day 350 25 Tractor Driver upto 7.5 T Day 280 26 10 Pan Mixer Day 350 27 Concrete mixer Day 350 As per I& CAD (S.No.16) 28 Vibrator Day 350 As per I& CAD (S.No.23) 29 Compressor Day 350 As per I& CAD (S.No.23) 30 Jack Hammer Day 350 As per I& CAD (S.No.34) 31 Driller Day 350 As per I& CAD (S.No.34) 32 Boring Maisthry Day 350 As per I& CAD (S.No.34) 33 11 Pump Operator Day 350 As per I& CAD (S.No.24) 34 12 Turner Grade-I Day 350 As per I& CAD (S.No.24) 35 13 Wireless Operator Day 390 As per I& CAD (S.No.12) Other category 36 14 Assistant Wireless Operator Day 400 As per I& CAD (S.No.12) Other category	22		Road Roller Driver up to 7.5 T	Day	280	
25	23	9	Tractor Driver above 12 T	Day	385	
Departor Day 350 Sept 1& CAD (S.No.32)	24		Tractor Driver (7.5 T to 12 T)	Day	350	
26 10 Pan Mixer Day 350 As per i& CAD (S.No.16) 27 Concrete mixer Day 350 As per i& CAD (S.No.32) 28 Vibrator Day 350 As per i& CAD (S.No.32) 29 Compressor Day 350 As per i& CAD (S.No.23) 30 Jack Hammer Day 350 As per i& CAD (S.No.23) 31 Driller Day 350 As per i& CAD (S.No.23) 32 Boring Maisthry Day 350 As per i& CAD (S.No.24) 33 11 Pump Operator Day 350 As per i& CAD (S.No.24) 34 12 Turner Grade-I Day 350 As per i& CAD (S.No.24) 35 13 Wireless Operator Day 390 As per i& CAD (S.No.12) Other category 36 14 Assistant Wireless Operator Day 400 As per i& CAD (S.No.15) Other category 38 16 Work Inspector with LCE, LME, L.E.E Day 500 As per i& CAD (S.No.39) Other category <t< td=""><td>25</td><td></td><td>Tractor Driver upto 7.5 T</td><td>Day</td><td>280</td><td></td></t<>	25		Tractor Driver upto 7.5 T	Day	280	
Concrete mixer			<u>Operator</u>			
Vibrator Day Solvent State Cade (S.No.16) Day Solvent State Cade (S.No.16) As per I& Cade (S.No.32) Day Jack Hammer Jack Laper I& CAD (S.No.34) Day Jack Hammer Jack Laper I& CAD (S.No.16) As per I& CAD (S.No.16) As per I& CAD (S.No.15) Other category As per I& CAD (S.No.15) Day Jack Hammer Jack Hammer Jack Hammer Day Jack Hammer Jack Laper I& CAD (S.No.15) Day Jack Hammer	26	10	Pan Mixer	Day	350	
29 Compressor 30 Jack Hammer Day Day Day Day Day Day Day Da	27		Concrete mixer	Day	350	
Jack Hammer Jack Hammer Day Jack Hammer Jack Day Jack Hammer Day Jack Hammer Day Jack Hammer Jack Der I& CAD (S.No.34) As per I& CAD (S.No.24) As per I& CAD (S.No.15) Other category Jack Der I& CAD (S.No.4) Other Category Jack Der I& CAD (S.No.4) Other Category Jack Der I& CAD (S.No.4) Other Category Jack Der I& CAD (S.No.7) Other Category Jack Der I& CAD (S.No.10)	28		Vibrator	Day	350	
31 Driller Day 400 As per 1& CAD (S.No.34) 32 Boring Maisthry Day 350 33 11 Pump Operator Day 350 As per 1& CAD (S.No.24) 34 12 Turner Grade-I Day 350 35 13 Wireless Operator Day 390 As per 1& CAD (S.No.12) Other category 36 14 Assistant Wireless Operator Day 320 37 15 Jeep Driver Day 400 As per 1& CAD (S.No.15) Other category 38 16 Work inspector with I.T.I qualification Day 400 As per 1& CAD (S.No.9) Other category 39 17 Work Inspector with LCE, LME, L.E.E Day Cyloner Category 40 18 Work Inspector with B.E (Civil, Mechanical and Electrical qualification) 41 19 Work Inspector with Non-technical qualification SSLC / SSC / HSC 42 20 Mason Spl. Grade for Mossaic and Polished Day 350	29		Compressor	Day	350	
Boring Maisthry Bory Boring Maisthry Bory Bory Boring Maisthry Bory Bor	30		Jack Hammer	Day	350	
33 11 Pump Operator Day 350 As per I& CAD (S.No.24) 34 12 Turner Grade-I Day 350 35 13 Wireless Operator Day 390 As per I& CAD (S.No.12) Other category 36 14 Assistant Wireless Operator Day 320 37 15 Jeep Driver Day 400 As per I& CAD (S.No.15) Other category 38 16 Work inspector with I.T.I qualification Day 400 As per I& CAD (S.No.9) Other category 39 17 Work Inspector with LCE, LME, L.E.E Day (S.No.4) Other category 40 18 Work Inspector with B.E (Civil, Mechanical and Electrical qualification) Day 320 As per I& CAD (S.No.9) Other category As per I& CAD (S.No.9) Other category As per I& CAD (S.No.7) Other category 41 19 Work Inspector with Non-technical qualification SSLC / SSC / HSC 42 20 Mason Spl. Grade for Mossaic and Polished Day 350	31		Driller	Day	400	•
34 12 Turner Grade-I 35 13 Wireless Operator 36 14 Assistant Wireless Operator 37 15 Jeep Driver 38 16 Work inspector with I.T.I qualification 39 17 Work Inspector with LCE, LME, L.E.E Day Cs.No.4) Other category 40 18 Work Inspector with B.E (Civil, Mechanical and Electrical qualification) 41 19 Work Inspector with Non-technical qualification SSLC / SSC / HSC 42 20 Mason Spl. Grade for Mossaic and Polished Day 350 As per I& CAD (S.No.2) Other category As per I& CAD (S.No.7) Other category As per I& CAD (S.No.10)	32		Boring Maisthry	Day	350	
35	33	11	Pump Operator	Day	350	
36 14 Assistant Wireless Operator Day 320 37 15 Jeep Driver Day 400 As per 18 CAD (S.No.15) Other category 38 16 Work inspector with I.T.I qualification Day 400 As per 18 CAD (S.No.9) Other category 39 17 Work Inspector with LCE, LME, L.E.E Day 500 As per 18 CAD (S.No.9) Other category 40 18 Work Inspector with B.E (Civil, Mechanical and Electrical qualification) Day 670 As per 18 CAD (S.No.7) Other category 41 19 Work Inspector with Non-technical qualification SSLC / SSC / HSC Day 350	34	12	Turner Grade-I	Day	350	
37	35	13	Wireless Operator	Day	390	(S.No.12)
38 16 Work inspector with I.T.I qualification Day 400 As per I& CAD (S.No.9) Other category 39 17 Work Inspector with LCE, LME, L.E.E Day Cyalification Cualification Day Horizontal Day As per I& CAD (S.No.4) Other category 40 18 Work Inspector with B.E (Civil, Mechanical and Electrical qualification) Day Horizontal Day As per I& CAD (S.No.7) Other category 41 19 Work Inspector with Non-technical Day As per I& CAD (S.No.7) Other category 42 20 Mason Spl. Grade for Mossaic and Polished Day 350	36	14	Assistant Wireless Operator	Day	320	
39 17 Work Inspector with LCE, LME, L.E.E Day Cualification Work Inspector with B.E (Civil, Mechanical and Electrical qualification) 40 18 Work Inspector with B.E (Civil, Mechanical and Electrical qualification) 41 19 Work Inspector with Non-technical qualification SSLC / SSC / HSC 42 20 Mason Spl. Grade for Mossaic and Polished Day 350	37	15	Jeep Driver	Day	400	(S.No.15)
Qualification Work Inspector with B.E (Civil, Mechanical and Electrical qualification) Work Inspector with B.E (Civil, Mechanical and Electrical qualification) Day 670 As per I& CAD (S.No.7) Other category Work Inspector with Non-technical qualification SSLC / SSC / HSC Work Inspector with Non-technical and Polished Day 350	38	16	Work inspector with I.T.I qualification	Day	400	(S.No.9) Other
and Electrical qualification) 41 19 Work Inspector with Non-technical qualification SSLC / SSC / HSC 42 20 Mason Spl. Grade for Mossaic and Polished Day 350	39	17		Day	500	(S.No.4) Other
qualification SSLC / SSC / HSC 42 20 Mason Spl. Grade for Mossaic and Polished Day 350	40	18	•	Day	670	(S.No.7) Other
	41	19		Day	335	
	42	20		Day	350	

43	21a(i)	Typist / Job Typist	Day	390	As per I& CAD (S.No.13) Other category
	a(ii)	Computer Operator	Day	440	As per I& CAD (S.No.11) Other category
	b	"CAD Operator with Diploma in Engineering/General Degree with CAD certificate".	Day	550	As per I& CAD (S.No.14) Other category
		(B) SEMI-SKILLED WORKMEN			
		SECOND CLASS			
44	1	Mason	Day	320	As per I& CAD (S.No.35)
45	b	Brick Layer and Stone Cutter	Day	320	As per I& CAD (S.No.35)
46	С	Carpenter	Day	320	As per I& CAD (S.No.4)
47	d	Painter	Day	320	As per I& CAD (S.No.37)
48	е	Plumber	Day	320	
49	f	Blacksmith	Day	320	
50	g	Welder	Day	320	
51	h	Fitter	Day	320	
52	I	Electrician	Day	320	
53	2	Caulker	Day	320	
54	4	Tinker	Day	320	
55	5	Sawyer	Day	320	
56	6	Brick-Moulder	Day	320	
57	7	Pot-tile turner	Day	320	
58	8	Pan -tile turner	Day	320	
59	9	Brick and Lime Kiln man /Glazzer	Day	320	
60	10	Telephone Operator	Day	390	As per I& CAD (S.No.12) Other category
61	11	Hand Driller	Day	320	
62	12	Quarry man	Day	320	
63	13	Hammer man	Day	320	As per I& CAD (S.No.40)
64	14	Thatcher	Day	320	
65	15	Fireman	Day	320	

66	16	Cleaner/Helper	Day	320			
67	17	Stone Packer	Day	320			
68	18	Jawali	Day	320			
69	19	Ex-Service man / Goorkha watchman	Day	320			
70	20	Ratton worker	Day	320			
71	21	Mate	Day	320			
72	1	Head mazdoor(Mukaddar)	Day	320	As per I& CAD (S.No.10) semi skilled		
		(C) UNSKILLED WORKMEN					
73	2	Man mazdoor	Day	280	As per I& CAD (S.No.3)		
74	3	Watch man	Day	280	As per I& CAD (S.No.5)		
75	5	Woman Mazdoor	Day	280	As per I& CAD (S.No.4)		
76	6(b)	Helpers/Cleaners/Sweepers/Scavangers/C houkidaars/Security Guards/Office Boys	Day	280			
77	cleanin	Whenever unskilled workmen are engage g of Sewers & Septic Tanks, they may be of the above wages.					
		(D) OTHER CONVEYANCE ITEMS					
78	1	Single bullock with driver and cart	Day	345	As per I& CAD (S.No.6) semi skilled		
79	2	Bullock pair with driver	Day	350			
80	3	Bullock pair with driver and cart	Day	365	As per I& CAD (S.No.5) semi skilled		
81	4	Bullock pair with driver and cart with Pneumatic tyres	Day	384			
82	6	Nava with crew	Day	335	As per I& CAD (S.No.3) semi skilled		
83	7	Punt thundal	Day	251			
84	8	Punt lascar	Day	251			
		Note: -					
	1) The wage should not be less than the minimum wages of schedule of employment, subject to out turn.						

2) 25% extra over the corresponding labour rates in respect of the work to be done during night time subject to issue of certificate accordingly by the concerned estimate sanctioning authority for providing in the data and by concerned Executive Engineer in charge of the work for payment. The night time allowance is applicable only to the works done under Greater Hyderabad Municipal Corporation, Greater	
Visakhapatnam municipal corporation, Greater Vijayawada municipal corporation limits only.	

MATERIAL & WORK ITEM RATES

RATES OF MATERIALS & WORK ITEMS

RATES OF MATERI ALS & WORK ITEMS SI.No.	S.S. Item No.	Description	Unit (per)	SoRate for 2013- 14	Remarks
1	2	3	4	5	
		(A) STONE AND ROAD MATERIALS			
		ROUGH STONE QUARRIED INCLUDING WEDGING, BREAKING, BURNING, SPLITING			
1	22.a	For R.R Masonary Work (other than Granite, Dolomite and Trap)	1 cum	160	
2	b.I	For SS Revetment work 225 mm	1 cum	140	As per I& CAD (S.no.3 of Miscellaneous items Material other than covered under irrigation
3	b.ii	For SS Revetment work 300 mm	1 cum	156	As per I& CAD (M003 of Material) other than covered under irrigation
4	b.iii	For SS Revetment work450 mm	1 cum	136	
5	С	Jeddy Stone above 450 mm to 600 mm	1 cum	188	
6	d I.	Laterite for revetment 225 mm	1 cum	118	
7	d II.	Laterite for revetment 300 mm	1 cum	138	
8	d.iii	Granite for SS revetment 225 mm	1 cum	154	
9	d.iv	Granite for SS revetment 300 mm	1 cum	156	
		Note: - Only when other granite is not available			
10	E	Laterite for masonry	1 cum	136	
11	F	Cyclopean stones above 0.2 cum	1 cum	254	
12	G	For R.R.Masonry works (granite, dolamite and trap variety)	1 cum	245	As per I& CAD (M148 of Material) other than covered under irrigation

13		NOTE:- For items 22(a) to 22© and 22(g) add extra Rs /cum, wherever quarrying is done by blasting	1 cum	76	
		COURSED RUBBLE STONE QUARRYING WEDGING, BREAKING, BURNING AND SPLITTING FOR SS FIRST SORT WORKS			
14	23.a	Granite, Dolamite and trap	1 cum	262	
15	В	For other varieties	1 cum	188	
16	27	Granite stone slabs for culverts, lintels and copings (3 faces dressed coarsed rubble masonry)	1 cum	1728	
17		NOTE: - For items 23(a), 23(b) and 27 add extra Rs. Per Cum, wherever quarrying is done by blasting	1 cum	74	
18	28	Bond stones (600 x 200 x 200 mm)	each	30	
19	В	Chainage stones and Centre line stones (750x150x150xmm)	each	37	
20	31	Demarcation Stones (900 x 150 x 150 mm)	each	70	
21	32.a	Guard Stones (1200 x 200 x 200 mm)	each	102	
22	В	Guide Stones (800 x 150 x150 mm)	each	70	
23	С	Carving letters and figures in stone up to 100 mm size	each	8	
24	D	Carving letters and figures in stone above 100 mm size	each	9	
		HARD BROKEN STONE OF GRANITE, TRAP AND DOLERITE FREE FROM DUST OBTAINED BY QUARRYING, WEDGING, BREAKING, BURNING AND SPLITTING.			
25	33.a	- do - 6mm size (SS 5)	1 cum	504	As per I& CAD (M050 of Material) other than covered under irrigation
26	b	- do - 10mm size (SS 5)	1 cum	656	As per I& CAD (M051 of Material) other than covered under irrigation

27	С	- do - 12mm size (SS 5)	1 cum	780	As per I& CAD (M052 of Material) other than covered under irrigation
28	d	- do - 20mm size (SS 5)	1 cum	984	As per I& CAD (M053 of Material) other than covered under irrigation
29	е	- do - 25mm size (SS 5)	1 cum	944	As per I& CAD (M054 of Material) other than covered under irrigation
30	f	- do - 40mm size (SS 5)	1 cum	588	As per I& CAD (M055 of Material) other than covered under irrigation
31	g	- do - 50mm size (SS 5)	1 cum	456	
32	h	- do - 60mm size (SS 5)	1 cum	419	
33	I	- do - 65mm size (SS 5)	1 cum	379	
34	j	- do - 75mm size (SS 5)	1 cum	304	
35	k	- do - 75 to 100mm size (SS 5)	1 cum	248	
36		NOTE:- (1) Add extra Rs. /- per cum for items 33 (a) to 33 (k) if the metal is obtained by blasting		70	
37		(2) Add 25% extra per cum if the metal is obtained by machine crushing excluding cost of blasting.		25%	
38		(3) Deduct Rs. /- per cum if the metal or rubble is obtained from surface stone and boulders.		9.9	
39		(4) Add Rs. /- per cum for selection of stones and boulders from excavated spoil dumps for items 33 a to 33 k, when this addition of Rs. /- per Cum is allowed, deduction of Rs. /- per		17	
		Cum mentioned under Note (3) above should invariably be made.		9.9	
		SOFT BROKEN STONE SCREENED AND FREE FROM DUST			
40	33.I	- do - 40 mm size (SS 5)	1 Cum	123	
41	33.m	- do - 50 mm size (SS 5)	1 Cum	111	
42	33.n	- do - 60 mm size (SS 5)	1 Cum	87	

43	33.0	- do - 65 mm size (SS 5)	1 Cum	78	
44	33.p	- do - 75 mm size (SS 5)	1 Cum	73	
		HARD BROKEN STONE OF GRANITE TRAP DOLERITE AND DOLAMITE FREE FROM DUST OBTAINED BY QUARRYING WEDGING, BREAKING, BURNING AND SPLITTING (QUARTZITE AND BASALT WITH AGGREGATE IMPACT OF LESS THAN 20)			
45	33a	-do- 2.36 to 5 mm size (IRC&MORTH)	1 cum	308.00	
46	b	-do- 5 to 7mm size (IRC&MORTH)	1 cum	504.00	
47	С	-do- 9.5 to 11.2mm size (IRC&MORTH)	1 cum	656.00	
48	d	-do- 12mm to 14 mm size (IRC and MORTH)	1 cum	780.00	
49	е	-do- 19 mm to 22 mm size (IRC and MORTH)	1 cum	984.00	
50	f	-do- 25 mm to 27 mm size (IRC and MORTH)	1 cum	944.00	
51	g	-do- 40 mm to 45 mm size (IRC and MORTH)	1 cum	588.00	
52	h	-do- 50 mm to 55 mm size (IRC and MORTH)	1 cum	456.00	
53	i	-do- 60 mm to 63 mm size (IRC and MORTH)	1 cum	419.00	
54	j	-do- 65 mm size (IRC and MORTH)	1 cum	379.00	
55	k	-do- 75 mm size (IRC and MORTH)	1 cum	304.00	
56	1	NOTE: - Add extra Rs. /- per cum for items 33 (a) to 33 (j) if the metal is obtained by blasting	1 cum	70.00	As proposed by I& CAD
57	2	Add 25% extra per cum if the metal is obtained by machine crushing excluding cost of blasting.	1 cum	25%	As proposed by I& CAD
58	3	Deduct Rs. /- per cum if the metal or rubble is obtained from surface stones and boulders	1 cum	9.90	
59	4	Add Rs. /- per cum for selection of stones and boulders from excavated soil dumps for items 33 (a) to 33 (k), when this	1 cum	17.00	

		addition of Rs. /- per cum		9.90	
		allowed deduction of Rs. /- per cum mentioned under note (3) above should invariably be made			
		HARD BROKEN STONE OTHER THAN GRANITE SUCH AS QUARTZ, QUARTZ-NAPA AND BASALT SCREENED AND FREE FROM DUST			
60	33.q	- do - 10 mm size (SS 5)	1 Cum	386.00	
61		-do- 9.5 mm to 11.2 mm size (IRC and MORTH)	1 Cum	386.00	
62	r	- do - 12 mm size (SS 5)	1 Cum	362.00	
63		-do- 12mm to 14 mm size (IRC and MORTH)	1 Cum	362.00	
64	S	- do - 20 mm size (SS 5)	1 Cum	293.00	
65		-do- 19 mm to 22 mm size (IRC and MORTH)	1 Cum	293.00	
66	Т	- do - 25 mm size (SS 5)	1 Cum	287.00	
67	U	- do - 40 mm size (SS 5)	1 Cum	170.00	
68		-do- 40 mm to 45 mm size (IRC and MORTH)	1 Cum	170.00	
69	V	- do - 50 mm size (SS 5)	1 Cum	150.00	
70		-do- 50 mm to 55 mm size (IRC and MORTH)	1 Cum	150.00	
71	33.w	- do - 65 mm size (SS 5)	1 Cum	142.00	
72		-do- 60 mm to 65 mm size (IRC and MORTH)	1 Cum	142.00	
73	Х	- do - 75 mm size (SS 5)	1 Cum	117.00	
74		- do - 75 mm size (IRC &MORTH)	1 Cum	117.00	
75	Υ	- do - 75 to 100 mm size (SS 5)	1 Cum	92.00	
76		- do - 75 to 100 mm (IRC& MORTH)	1 Cum	92.00	
		OTHER ITEMS			
77	33.z1	Laterite 40 to 75 mm (ring)	1 Cum	101.00	
78	z2	kankar, hard broken kankar 40 to 75 mm (ring)	1 Cum	75.00	
79	z3	Soling stone of 150 mm size of granite, trap and Dolamite varieties.	1 Cum	95.00	

80		NOTE:- (1) Add extra for items to 33(z3) Rs /- Per cum, wherever quarrying is done by blasting. (2) Wherever controlled blasting is resorted to the Chief Engineer concerned shall approve the observed data in support of SS item No. 22 a to 22 c, 22g, 23	1 Cum	70.00	As proposed by I& CAD
81	z4	Soling stone of 150 mm size other than granite variety	1 Cum	66.00	
82	z5	Soling Stone laterite, Kankar 150mm, surface stone	1 Cum	41.00	
83	z6	Field picked metal unbroken 20 mm size	1 Cum	55.00	
84	z7	- do - 25 mm size	1 Cum	42.00	
85	z8	- do - 40 mm size	1 Cum	48.00	
86	z9	- do - 50 mm size	1 Cum	42.00	
87	z10	- do - 60 mm size	1 Cum	36.00	
88	z11	- do - 80 mm size	1 Cum	32.00	
89	selecti excava TO 33 per Cu /- per toward	- Add Rs. /- Per Cum for on of stone and boulders from ated spoil dumps for items 33 (Q) Z, when this addition of Rs. /- um is allowed, deduction of Rs. Cum should invariably be made ds the metal or rubble if it is ed from surface stone and ers.		17.00	
90	34	Gravel.	1 Cum	98	As per I& CAD (M008 of Material) other than covered under irrigation
91	35 a	Quarry rubbish	1 Cum	81.00	
92	В	HBG Stone Chips 2.36mm and below	1 Cum	330.00	As per I& CAD (S.No.67 of Material)
93	36.a	Sand for mortar, plastering, ceiling coat including washing screening etc.,	1 Cum	505.00	As per I& CAD (S.No.28 of Material)
94	b.	Sand for concrete	1 Cum	385.00	As per I& CAD (S.No.27.a of Material
95	С	Sand for filling and blindage	1 Cum	285.00	As per I& CAD (S.No.27 b of Material)

96	37	Clay for puddle and masonry Items 38 (a) to 39 (h) As per local prevailing rates based on competitive quotations. (C) LIME AND CEMENT	1 Cum	35.00	
97	40 to 41(c)			As per Local prevailing rates based on competiti ve rates	
98	42	Cement excluding cost of empty cement bags	1 MT	monthly rates will be communic ated by Govt	
rates app above ma	licable t ny be all and fixe	tes are inclusive of sales tax. 2) As o the District. 3) Least of the (1) a owed 4) The price of cement will be ed on monthly basis and rates will be parately.	nd (2)		
99	С	Grinding lime mortar or Surkhi mortar	1 Cum	94.00	
100	D	Shell lime slaked and screened	1 Cum	940.00	
101	Е	White cement	1 Kg.	30.00	
102		(D) MORTARS			
103	43 to 45	Items 43 to 45			
		(E) METAL AND IRON WORKS			
104		Mild steel rods 6mm dia.	1 MT	The monthly	
105		Mild steel flats	1 MT	rates will	
106		Mild Steel, Structural Steel, I.e., Angles, Channels and I sections.	1 MT	be communi cated by	
107		High Yield Strength Deformed Bars/TMT bars	1 MT	Govt.	
108		Mild steel plates	1 MT		
	2)As p Least o The pr	(1) The rates are inclusive of sales er the rates applicable to the District of the (1) and (2) above may allow ices of steel will be reviewed and fix by basis and rates will be communicately.	ct. 3) ed 4) ked on		

		III RATES OF WORKS		Γ	
		(A) CLEARING SITE			
109	1.a	Clearing heavy Jungle	1 Sqm	2.90	
110	В	Clearing light Jungle	1 Sqm	qm 2.60	
111	С	Clearing Scrub Jungle	1 Sqm	2.60	
112	D	Clearing Juliflora (Prosafis) jungle including up-rooting and removing of Juliflora stumps.	1 Sqm	3.70	
113	2.a.I	Cutting and removing Palmyrah trees including stacking of girth 30 to 100 cm.	Each	19.00	
114	li	- do - 100 to 200 cm.	Each	44.00	
115	2.b.I	Uprooting and removing Palmyrah stumps including stacking of girth 30 to 100 cm.	Each	46.00	
116	li	- do - 100 to 200 cm.	Each	48.00	
117	2.c.I	Cutting and removing date trees including stacking of girth 30 to 100 cm	Each	24.00	
118	li	- do - 100 to 200 cm	Each	35.00	
119	d.I	Uprooting and removing stumps of date trees including stacking of girth 30 to 100 cm.	Each	24.00	
120	li	- do - 100 to 200 cm	Each	30.00	
121	e I	Cutting and removing other kind of trees including stacking of girth 30 to 100 cm	Each	30.00	
122	li	- do - 100 to 200 cm	Each	46.00	
123	iii	- do - above 200 cm	Each	75.00	
124	f.I	Uprooting and removing stumps of other kind of trees including stacking of girth 30 to 100 cm.	Each	24.00	
125	li	- do - 100 to 200 cm	Each	33.00	
126	iii	- do - above 200 cm	Each	41.00	
127	3.a	Uprooting and clearing prickly pear jungle	1 Sqm	2.30	
128	В	- do - under 2.5 meters height including burning and burrying as directed.	1 Sqm	3.00	
129	С	- do - over 2.5 meters height including burning and burrying with an initital lead of conveyance	1 Sqm	3.50	

130	4.a	Removing of natchu, goobi, thooti etc., from drains, channels including clearance if not more than 1 metre depth of water with an initial lead of 10 metresand lift of 2 metres.	1 Sqm	1.90	
131	b.I	Clearing alchi, tilla	1 Sq.m	3.80	
132	b.ii	Removal of Jammu	1 Sq.m	3.30	
133	c.I	Removal of imponea, cornea	1 Sq.m	3.60	
134	c.ii	Removal of water hyacinth upto 30 cm thick.	1 Sqm	3.70	
135	c.iii	- do - more than 30 cm thick	1 Sq.m	5.00	
136	D	Removal of natchu, goobi, thooti etc., for every extra lead or lift over the initial lead or lift.	1 Sqm	1.40	
		(B) DISMANTLING			
	5	DISMANTLING, CLEARING AWAY MATERIALS USEFUL FOR REUSE.			
137	n.(i)	Dry rough stone revetment for aprons and stacking within 40 metres	1 cum	62.50	
	7	Drilling holes in hard granite or sheet rock			
	a)	Manually (Hand)			
138	I)	20 mm dia meter	1 RM	124.00	
139	ii)	25 mm dia meter	1 RM	131.00	
140	iii)	36 mm dia meter	1 RM	151.00	
141	b)	Pneumatic Compressor			
142	I)	20 mm dia meter	1 RM	140.00	
143	ii)	25 mm dia meter	1 RM	152.00	
144	iii)	36 mm dia meter	1 RM	165.00	
	8	Grouting the holes with neat cement slurry excluding cost of steel			
145	I)	20 mm dia meter	1 RM	88.00	
146	ii)	25 mm dia meter	1 RM	111.00	
147	iii)	36 mm dia meter	1 RM	138.00	
		White Washing and Painting works			

148	АІ	White washing and colour banding for guard and guide stones including cost of materials	each	8.60	
149	ВΙ	Screening sand and gravel	1 cum	9.30	
150	B 2	Screening chips and metal	1 cum	16.00	
151	C 1	Removing and refixing Hectometre or Demarcation stones	each	11.50	
		(S) ROAD WORK ITEMS			
		PICKING OLD METALLED SURFACE TO DEPTH OF 40 TO 100 mm SPREADING OLD METAL AND NEW METAL SECTIONING INCLUDING EDGEBUNDS AND SUBGRADE ROLLING, SPREADING METAL INCLUDING BLINDAGE OFGRAVEL WATERING WITH AN INITIAL LEAD OF 2 HECTOMETERS AND HAND ROLLER (1.5 TO 2 TONNES) ROLLING ETC., INCLUDING BARRICADING, DIVERSION OF TRAFFIC AND WETTING THE NEW CONSOLIDATION FOR A FORTNIGHT COMPLETE			
	1 (1)	(For a compact thickness) HARD METAL			
150	1 (I)		10 0000	70.00	
152	A	40 mm thickness	10 sqm	74.00	
153	В	50 mm thickness	10 sqm	80.30	
154 155	C D	75 mm thickness 100 mm thickness	10 sqm 10 sqm	87.00	
156	1 (ii)	(For compact thickness of soft metal)	TO SQIII	07.00	
157	Α	50 mm thickness	10 sqm	53.80	
158	В	75 mm thickness	10 sqm	63.90	
159	С	100 mm thickness	10 sqm	70.10	
	5	Picking old metalled surface to a depth of 40 to 100 mm and spreading metal including watering with an initial lead of 2 Hectometers and rolling with power rollers watering and spreading gravel for blindage			

		and power roller rolling including hire charges of power roller(8 to 10 T) barricading and diversion of traffic and wetting the new consolidation for a fortnight (for compacted thickness of) HARD METAL			
160	5 (a)	40 mm thick ness	10 sqm	185.00	
161	(b)	50 mm thick ness	10 sqm	210.00	
162	(c)	75 mm thick ness	•	231.30	
			10 sqm	248.80	
163	(d)	100 mm thick ness	10 sqm	445.40	
164	(e)	150 mm thick excluding hire charges	10 sqm	445.40	
165		Gelatin(For MORTH data, for works of state & national high ways only)	Per Kg	73.00	As per I& CAD (M104 of Material) other than covered under irrigation
166		Electric Detonators(For MORTH data, for works of state & national high ways only)	each	13.00	As per I& CAD (M094 of Material) other than covered under irrigation
167		Hot applied thermoplastic compound(For MORTH data, for works of state & national high ways only)	Per Litre	Rate as per local competit ive quotatio ns	As per I& CAD (M118 of Material) other than covered under irrigation
168		Reflectionising glass beads of 2 mm thick(For MORTH data, for works of state & national high ways only)	Per Kg	80.30	
169		Road marking paint confirming to IS 164(For MORTH data, for works of state & national high ways only)	Per Kg	196.60	
170	n	Labour charges for laying filters with coarse aggregate.	1 cum	55.30	
171	0	Labour charges for laying filter with sand.	1 cum	30.70	
		New Items.			
172		Fly Ash	1 cum		
173		Binding wire	1 Kg.	70.00	As per I& CAD (M072 of Material) other than covered under irrigation

HIRE CHARGES OF PLANT AND MACHINERY FOR ROAD & BRIDGE WORKS

HIRE CHARGES OF PLANT& MACHNIERY FOR ROAD & BRIDGE WORKS FOR THE YEAR 2013-14

		DGE WURKS FU	T	SoRate	
				for	
				2013-14	
	Descr	iption			Remarks
SI.					
No.	Machine	Activity	Unit	(Rupees)	
1	2	3	4	5	
1	Dozer(D 80)	Spreading	Per Hour	2511.70	As per I& CAD (S.No.8)
		Cutting			
		Cleaning			
2	Dozer(D 50)	Spreading	Per	1570.00	
		Cutting	Hour		
		Cleaning	1		
3	Mortor Grader	Clearing	Per	3216.00	
		Spreading	Hour		
		GSB	1		
		WMM	1		
4	Hydraulic	Soil Ordinary	Per	2754.50	As per I& CAD (S.No.53)
	Excavator	Soil Marshy	Hour		(3.110.55)
		Soil unsuitable	1		
5	Front end loader	Soil loading	Per	1646.00	
		Aggregate	Hour Per		
		loading	Hour		
6	Tipper- 5.5 Cum	Transportation of soil, GSB,WMM, Hot mix etc	Per Hour	877.30	As per I& CAD (S.No.55)
7	Vibratory roller 8 tone	Earth/Soil, GSB,	Per Hour	2541.40	As per I& CAD (S.No.63)
		WMM	1		
8	Smooth wheeled roller 8 tone	Soil compaction ,BM compaction	Per Hour	1038.40	As per I& CAD (S.No.51)
9	Water tanker 8 Kilolitre	Water transport	Per Hour	832.10	As per I& CAD (S.No.65)
10	Water tanker 6 Kilolitre	Water transport	Per Hour	624.00	
11	Tractor	Pulling	Per Hour	415.00	

12	Tractor with	Scarifying	Per	422.00	
	rotavator/Grader	Scarrying	Hour		
13	Tractor with ripper attachment	Scarifying	Per Hour	422.00	
14	Air Compressor 5 cmm (electric)	General purpose	Per Hour	499.40	As per I& CAD (S.No.2)
15	Wet mix plant 60 TPH	Wet mix	Per Hour	1646.00	
16	Mechanical broom Hydraulic	Surface cleaning	Per Hour	357.00	
17	Bitumen Pressure Distributor	Applying bitumen tack coat	Per Hour	1498.00	
18	Emulsion Pressure Distributor	Applying emulsion tack coat	Per Hour	860.00	
19	Hot mix Plant – 120 TPH capacity	DBM/BM/SDC	Per Hour	28175.00	
		/Premix			
20	Hot mix Plant – 100 TPH capacity	DBM/BM/SDC	Per Hour	24171.00	
		/Premix			
21	Hot mix Plant – 60 TPH capacity	DBM/BM/SDC	Per Hour	21668.00	
		/Premix			
22	Hot mix Plant – 40 to 60 TPH capacity	DBM/BM/SDC	Per Hour	19120.00	
		/Premix			
23	Paver Finisher Hydrostatic with sensor control 100 TPH	DBM/BM/SDC	Per Hour	11441.00	
		/Premix			
24	Paver finisher Mechanical 100	Paving of WMM, paving of DLC	Per Hour	2249.00	
25	Hydraulic Chip Spreader	Surface dressing	Per Hour	2567.00	
26	Tandem Road roller	Rolling of Asphaltic surface	Per Hour	1646.00	
27	Pneumatic Road roller	Rolling of Asphaltic surface	Per Hour	1283.00	
28	Pot-Hole repair machine	Repair of pot- holes	Per Hour	845.00	

29	Bitumen boiler oil	Bitumen	Per	209.00	
	fired	Spraying	Hour		
30	GSB Plant 50 Cum	Producing GSB	Per Hour	1143.00	
31	Mastic Cooker	Mastic wearing coat	Per Hour	65.00	
32	Batching and Mixing Plant (a) 50 Cum capacity	Concrete mixing	Per Hour	1231.90	
	(b) 15 Cum capacity	Concrete mixing	Per Hour	1037.20	As per I& CAD (S.No.10)
33	Transit mixer	Transportation of concrete mix	Per Hour	1819.10	As per I& CAD (S.No.1)
34	Concrete pump of 45 and 30 cum	Pumping of Concrete	Per Hour	803.00	
35	Cranes (Non Hydraulic)				
	(a) 80 tones	Lifting purpose	Per	1171.00	
	(b) 35 tonnes		Hour	791.00	
	(c) 3 tonnes			352.00	1
	(d)Crane with grab bucket 0.75 cum	Well foundation	Per Hour	2160.00	
	(e)Crane with grab bucket 1 cum	Well foundation	Per Hour	3532.00	
36	Concrete bucket 1.50 cum	For pouring concrete	Per Hour	16.20	As per I& CAD (S.No.14)
37	Kerb casting machine	Kerb making	Per Hour	311.00	
38	Concrete mixer/ Mix all				
	(a)0.28 cum	Concrete mixing	Per Hour	417.40	As per I& CAD (S.No.18)
	(b) 1.0 cum			649.00	
39	Piling rig with bantonite pump	0.75 m dia to 1.20 m dia boring attachment	Per Hour	5475.00	
40	Concrete paver finisher with 40 HP motor	Paving of concrete surface	Per Hour	2900.00	

41	Integrated stone crusher	Crushing of spalls 100 TPH	Per Hour	8712.00		
		Crushing of spalls 200 TPH	Per Hour	18369.00		
42	Pre stressing jack with pump and access	Stressing of steel wires/ stands	Per Hour	141.00		
43	Generator					
	250 KVA	Generation of electric energy	per hour	1850.00		
	125 KVA		per hour	1320.00		
	100 KVA		per hour	1126.00		
	30 KVA		per hour	766.40	As per I& CAD (S.No.24)	
44	Pneumatic sinking of Plants	Pneumatic sinking of wells	Per K.m.	56.00		
45	Truck 5.5 cum per 10 tones	Material transport	Per Hour	843.90	As per I& CAD (S.No.59)	
46	Road marking machine	Road marking	Per Hour	111.00		
47	Mobile slurry seal equipment	Mixing and laying slurry seal	Per Hour	1126.00		
48	Plate compacter	For compacting in medians	Per Hour	48.00		
49	Drilling equipment	For drilling	Per Hour	775.70	As per I& CAD (S.No.23)	
	Note: The above hire charges of machinery & plant includes crew, oils, conveyance of machinery to site and all other incidental charges.					



	PUBLIC HEALTH ITEMS		
Sl.	Description	Unit	SoR for
No.			2013-2014
1	2	3	4
1	RATES OF LABOUR (SKILLED WORKMEN)		
	1. Caulkar	Per Day	
	2. Plumber 1st Class	Per Day	
	3. Plumber 2nd Class	Per Day	
	4. Sewer Cleaner	Per Day	- As per
	5. Well Sinker	Per Day	Labour rates
	6. Pipe line Fitter 1st Class	Per Day	of SoR
	7. Pipe line Fitter 2nd Class	Per Day	4
	8. Pump Operator	Per Day	4
	9. Bore Mechanic	Per Day	_
	10. Light Vehicle Driver	Per Day	
	Note: The rate at relevant item in common SoR is applicable for		
2	occasional employment.		
	RATES FOR EARTH WORK:		To follow
a.	Earth work excavation in all types soils for pipe lines, for drainage and water supply, where the depth is more than 1.5 times the width.		the relvent
	water suppry, where the depth is more than 1.5 times the width.		items of
b.	Earth work excavation in all types soils for pipe lines, for drainage and		Irrigation
	water supply, where the depth is less than 1.5 times the width.		work items
c.	Earth work excavation in all types soils for open trenches, for valve		as per
	pits, inspection chambers, etc.		AP.Standard
3 9	Excavation of pipe line trenches for drainage and water supply in rock		
] J. a.	requiring blasting with initial lead and lift including cost of blasting		
	materials where the depth is more than 1.5 times the width, in places		
	where there is no habitation.		
1.			
b.	Excavation of pipe line trenches for drainage and water supply in rock		
	requiring blasting with initial lead and lift including cost of blasting		
	materials where the depth is less than 1.5 times the width, in places where there is no habitation.		
	where there is no nabitation.		
c.	Cutting rock for pipe line trenches by hammers, nuckles and chisels		
	including stacking where the depth is 1.5 times or more than the width.		
d.	Cutting rock for pipe line trenches by hammers, nuckles and chisels		
	including stacking where the depth is less than 1.5 times the width.		
e.	Cutting rock for works other than pipe lines trenches by hammers,		
	nuckles and chisels including stacking.		
f.	For contolled blasting at restricted places		
	NOTE:- Rock should be measured in solids. In case it is not possible,		
	stacks should be made in which case 40% for voids to be deducted		
	from the stack measurements.		

Sl.	Description	Unit	SoR for
No.			2013-2014
1	2	3	4
4	Loading or unloading materials such as C.I. Pipes, PVC Pipes, AC		
	Pressure Pipes, DI Pipes, SW Pipes, PVC Pipes, A.C/Specials less than		
	300 mm dia upto 4 m in length including stacking.		
	C.I. Pipes/D.I. Pipes and fittings	Per Tonne	To follow as
-	A.C. Pipes & Specials	Per Tonne	per
	Stoneware pipes & Specials	Per Tonne	AP.Standard
	P.V.C. Pipes and fittings	Per Tonne	data
	Loading or unloading materials such as C.I. Pipes, DI pipes, SW pipes, AC pressure pipes & fittings/ specials from 300 mm to 600 mm dia		
	upto 4 m in length including stacking.		
	C.I. Pipes/D.I. Pipes and fittings	Per Tonne	To follow as
b.	A.C. Pipes & Specials	Per Tonne	per
c. S	Stoneware pipes & Specials	Per Tonne	AP.Standard data
6	Loading or unloading materials such as C.I. Pipes, DI pipes, PVC		data
]	pipes, AC pipes less than 300 mm dia, above 4 m in length including		
	stacking.		
a. (C.I. Pipes/D.I. Pipes and fittings	Per Tonne	To follow as
b.	A.C. Pipes & Specials	Per Tonne	per
c.	P.V.C. Pipes and fittings	Per Tonne	AP.Standard data
7	Loading or unloading materials such as C.I. Pipes, DI pipes, AC pipes		To follow as
f	from 300 mm to 600 mm above 4 m in length including stacking.		per
			AP.Standard data
a. (C.I. Pipes/D.I. Pipes and fittings	Per Tonne	L
	A.C. Pipes & Specials	Per Tonne	
	Note:- For loading and unloading the above materials at Railway		
	Stations, the rates may be adopted based on the competitive quotations		
	or the hammalae charges if prevailing.		
	Lowering C.I. / D.I. Pipes (all classes) and specials (fittings) with s/s		To follow as
	ends carefully into trenches and laying them true to alignment and		per AP.Standard
	gradient including all sundries but excluding cost and conveyance of		data
	pipes from source of supply (Ref to specifications. BIS No.3114/1994)		
	Diameter of Pipe/Fittings in mm:	D. M.A.	
	80mm to 1000mm dia	Per Metre	
	Lowering C.I. / D.I. Pipes (all classes) and specials (fittings) with flanged ends carefully into trench and laying them true to alignment		
	and gradient including all sundries but excluding cost and conveyance of pipes from source of supply. (Reference to specifications. BIS		
	No.3114/1994)		
	Diameter of Pipe/Fittings in mm :		
	80mm to 750mm dia	To follo	u as per
	ovinni to /Svinni uia		dard data
!	800mm dia	Per Metre	438.00
	900mm dia	Per Metre	569.00
_	1000mm dia	Per Metre	740.00
	V-V	Per Metre	, 10.00

Sl.	Description	Unit	SoR for
No.			2013-2014
1	2	3	4
	1200mm dia	Per Metre	1084.00
9. a.	Jointing CI /DI pipes & fittings with s/s ends including cost of pig lead,		
	Spun yarn and sundries such as cost of fuel for melting lead, filling		
	with water with lead up to 500m and testing to required pressure		
	complete. (Reference to specifications. BIS No.3114/94/12288:1997)		
	Diameter of Pipe/Fittings in mm :		
	80mm to 800mm	To follow	w as per
		AP.Stano	lard data
	900mm dia	Each Joint	12593.00
	1000mm dia	Each Joint	14068.00
	1100mm dia	Each Joint	15543.00
	1200mm dia	Each Joint	17018.00
9. b.	Jointing C.I., D.I. pipes and fittings with rubber gasket (push-on-joint),		
	excluding the cost of the gasket but including all sundries filling with		
	water, with a water lead up to 500m and testing to required pressure,		To follow as
	etc. complete (Reference to specifications IS 3114/1994/12888/1997)		per
			AP.Standard
	Diameter of Pipe/Fittings in mm:		data
	80mm to 1000mm dia	Each Joint	
10	Jointing CI pipes, fittings and valves with flanged ends including cost		
	of jointing materials such as bolts, rubber insertion, white lead		
	including filling with water, with lead up to 500 meters and testing to		To follow as
	required pressure complete. (Reference to specifications. BIS		per
	No.3114/1994.)		AP.Standard data
	Diameter of pipe/Fittings/ valve in mm :		data
	80mm to 750mm dia	Each Joint	
	800mm dia	Each Joint	5280.00
	900mm dia	Each Joint	6210.00
	1000mm dia	Each Joint	7151.00
	1100mm dia	Each Joint	8116.00
	1200mm dia	Each Joint	9115.00
11a	Lowering the RCC plain ended pipes carefully into the trench laying		
	them true to alignment and gradient, jointing RCC pipes with cement		
	joints including curing, the cost of jointing materials i.e., Cement		
	Mortar (1:1.5), hemp yarn etc., and testing including filling with		
	water with a water lead upto 500 metres excluding cost of rubber rings		
	as per BIS No.783/85.		
	per every 25 mm dia.	Per Metre	16.00
11b	Lowering the RCC S/S pipes carefully into the ready made trenches		
	laying them true to alignment and gradient, jointing with rubber rings		To follow as
	and testing including filling with water with a water lead upto 500		per
	meters including cost of rubber rings as per BIS No. 783/1985		AP.Standard
	per every 25 mm dia.	Per Metre	data
	80mm to 600mm		

Sl.	Description	Unit	SoR for
No.	•		2013-2014
1	2	3	4
	700mm dia		265.00
	800mm dia		318.00
	900mm dia		382.00
	1000mm dia		457.00
12	Lowering and Jointing G.I. pipes and specials / fittings including		
	excavation of trench of 0.5m width and 0.50 m depth in all soils		To follow as
	except rock requiring blasting and refilling trenches after laying and		per
	jointing pipes and also including cost of jointing materials but		AP.Standard
	excluding the cost of pipes. Reference to specifications. BIS No.783/85		data
a	G.I. Pipes :Dia in mm		1
	15mm to 150mm	Per Metre	1
b	Laying, jointing of PVC/HDPE pipes as per BIS No.7634 part-III/75		
	for PVC and BIS No.7634 part-II/75 for HDPE pipes including trench		
	excavtion and refiling.		
	Dia in mm		
	50mm dia	Per Metre	25.00
	40mm dia	Per Metre	25.00
	32mm dia	Per Metre	25.00
	25mm dia	Per Metre	23.00
	20mm dia	Per Metre	22.00
	Note:(i) The above rates are applicable for the works in District only.		
	(ii) If the depth of excavation is more than 0.5 m separate rates to be		
	worked out.		
13	Lowering and laying in ready made trench true to alignment and		To follow as
	gradient, jointing, and testing of Stone ware pipes including cost of		per AP.
	jointing material such as cement mortar (1:1) proportion and hemp		Standard
	yarn but excluding cost and conveyance of pipe. (Reference to		data
	specifications BIS No. 6530/72)		
	Dia of Pipes in mm . 100mm to 450mm	Per Metre	
14	Lowering, laying, jointing and testing to hydralic test pressure	r er metre	To follow as
14	including cost of water with minimum water lead of 500m for UPVC		per AP.
	pressure pipes in ready made trenches true to alignment and gradient		Standard
	including all sundries but excluding cost & conveyance of pipes from		data
	source of supply and jointing materials as per BIS No. 7634 - Part III -		uata
	1975		
	Dia of Pipes in mm .		
	63mm to 315mm	Per Metre	
15	Laying and jointing of HDPE pipes by butt fusion welding as per		
	IS:7634 – part-II/1975 as amended from time to time to the alignment		
	and gradient and testing the pipeline to the required pressure.		
	Outer Dia of pipes in MM		
	63mm dia OD	Per Metre	32.00

Sl.	Description	Unit	SoR for
No.			2013-2014
1	2	3	4
	75mm dia OD	Per Metre	35.00
	90mm dia OD	Per Metre	40.00
	110mm dia OD	Per Metre	45.00
	125mm dia OD	Per Metre	55.00
	140mm dia OD	Per Metre	58.00
	160mm dia OD	Per Metre	63.00
	180mm dia OD	Per Metre	69.00
	200mm dia OD	Per Metre	75.00
	225mm dia OD	Per Metre	83.00
	250mm dia OD	Per Metre	88.00
	280mm dia OD	Per Metre	97.00
	315mm dia OD	Per Metre	166.00
	355mm dia OD	Per Metre	185.00
	400mm dia OD	Per Metre	206.00
	450mm dia OD	Per Metre	229.00
16	Lowering, keeping in position and fixing C.I. sluice valves (with cap /		To follow as
	with hand wheel & Reflex valves) excluding cost of bolts, nuts, rubber		per AP.
	insertion, sluice valve and tail pieces		Standard
	Dia of Valve in mm.		data
	80mm to 450mm	Each	
17	Labour charges for fixing Air valves including boring the mains and		
	threading the bore fixing nipple etc., complete.		To follow as
	Dia of Air valve in mm.		per
	25mm dia	Each	AP.Standard
	40mm dia	Each	data
			12600
	50mm dia	Each	136.00
	65mm dia	Each	145.00
	80mm dia	Each	158.00
	100mm dia	Each	186.00
	125mm dia	Each	290.00
	150mm dia	Each	318.00
18	Labour charges for fixing Kinetic Air Valves with isolating Sluice		
	valves, Double Air valves/ Air Cushion valve excluding cost of jointing		
	materials such as bolts, nuts and rubber insertions etc., complete.		
	Dia of Air valve in mm.		
	25mm dia	Each	129.00
	40mm dia	Each	146.00
	50mm dia (Double Air valves)	Each	155.00
	65mm dia (Double Air valves)	Each	166.00
	80mm dia (Double Air valves)	Each	182.00
	100mm dia (Double Air valves)	Each	212.00
	125mm dia (Double Air valves)	Each	331.00
	150mm dia (Double Air valves)		
	150mm dia (Double Air vaives)	Each	362.00

Sl. No.	Description	Unit	SoR for 2013-2014
1	2	3	4
19	Uprooting C.I./ DI Pipes by melting the lead, loosening the joints,		To follow as
	scraping the pipes, hoisting and keeping within a lead of 10 m but		per AP.
	excluding earth work excavation and refilling.		Standard
	80mm to 600mm	Per Metre	data
20	Uprooting of RCC pipes including breaking the collars, loosening the	101 1/10110	To follow as
	joint, seperating the pipes, hoisting and keeping within a lead of 10 m	Per Metre	per AP.
	but excluding earthwork excavation and refilling.		Standard
	100mm to 300mm		data
21	Removing old G.I.pipes and specials / fittings and cleaning, scraping		
	the pipes, hoisting and keeping with in 50m lead but excluding earth		To follow as
	work excavation of trenches and refilling.		per
	Dia of Pipes in mm		AP.Standard
	15mm to 50mm	Per Metre	data
22	Cutting C.I./ DI Pipes without water in mains. Dia of pipes in mm.		
	Dia of Pipes in mm		To follow as
	80mm to 600mm	Each cut	per
		Lucii cut	AP.Standard
			data
	680mm dia	Each cut	384.00
	700mm dia	Each cut	395.00
	750mm dia	Each cut	424.00
	800mm dia	Each cut	452.00
	900mm dia	Each cut	508.00
	1000mm dia	Each cut	564.00
	1100mm dia	Each cut	622.00
	1200mm dia	Each cut	678.00
23	Cutting A.C. Pipes without water in mains.Dia of pipes in mm.	Each cut	
	Dia of Pipes in mm		
	80mm dia	Each cut	25.00
	100mm dia	Each cut	25.00
	125mm dia	Each cut	25.00
	150mm dia	Each cut	25.00
	200mm dia	Each cut	26.00
	250mm dia	Each cut	43.00
	300mm dia	Each cut	43.00
	350mm dia	Each cut	53.00
	400mm dia	Each cut	58.00
	450mm dia	Each cut	73.00
	500mm dia	Each cut	81.00
	600mm dia	Each cut	89.00
24	Drilling and tapping CI/ DI / GI Main and fixing brass screw down		To follow as
	ferrule and plug.		per AP.
	10 mm to 20mm	Each Tapping	Standard
	25 mm to 40mm	Each Tapping	data
25	Cutting road surface including stacking of excavated materials for		
L	pipe line trench work.		

Sl. No.	Description	Unit	SoR for 2013-2014
1	2	3	4
1	a) Cutting open B.T. road surface (as well as asphalt concrete upto 75 mm thick) including water bound macadam	_	518.00
	b) Cutting open C.C. road surface	1 Cum	1440.00
	c) Cutting open water bound macadam road including soiling	1 Cum	177.00
26	Bailing out water.(For PH item)		
	a) Bailing out water from the pipe line trenches with oil engine driven pumpsets, including hire charges, fuel charges and wages for Driver and Helper.		44.00
	b) Bailing out water from the pipe line trenches with Electric Driven pumpset including hire charges, current charges and wages for Driver and Helper.		32.00
	NOTE:- The rate is payable on the total H.P. hours ignoring fractions less than 0.5 HP hour and rounding off 0.5 HP hour or more to the next higher integer.		
27	Shoring and strutting of trenches for water and sewer main.		
	a) Single Staging from (0 to 2.5 Mts.)	1 Sqm of Shoring area	To follow as per AP. Standard
	b) Double staging from (2.5 m to 4.5 Mts.)	1 Sqm of Shoring area	data
28	Barricading, hoarding, lighting and watching etc., for water supply and sewerage works for trenches.	1 RMT	To follow as per AP. Standard data
29	Excavation of trenches for infiltration galleries, syphon lines and connecting mains in all soils under water including all leads, lifts, shoring, strutting, bailing out water and removal of shoring and strutting materials, after completion of pipe line work.		
	a) 0 to 1 m deep under water.	10 Cum	9645.00
	b) 1 to 2 m deep under water.	10 Cum	13815.00
	c) 2 to 5 m deep under water.	10 Cum	20737.00
	d) Beyond 5 m deep under water for every additional 1 m depth over item 'c'	10 Cum	3962.00
	NOTE:- The above rates do not include rock requiring blasting or chiselling		
30	Laying and jointing <u>perforated</u> <u>RCC</u> <u>pipes</u> inclusive of bailing out water and jointing with cement fillets and all other incidental charges for infiltration gallery inclusive of bailing out water by pumping to keep the trench reasonably dry to facilitate the work excluding cost of perforated pipes and collars.	Per Metre	30.00
	per every 25 mm dia.		
31	Centring and scaffolding charges for RCC members including all		

Sl.	Description	Unit	SoR for
No.			2013-2014
1	2	3	4
a)	for R C C Elevated Service Reservoir of staging up to 15 metre below L W L.		
	1) Slabs for thickness (150 mm to 300 mm)		2577.00
	2) Slabs for thickness above (300 mm)	One Sqm of	5152.00
	3) Side walls curved surfaces.	Centering	1947.00
	4) Side wall straight surfaces.	area	1733.00
	5) Dome.		2110.00
	6) Roof Slab.		1299.00
	7) Column braces and beams		869.00
	8) Circular braces, ring beams & circular column.		953.00
	Note:- For RCC ELSR of staging above 15 m, the % increse in these		
	rates shall be as follows.		
	15-18 m 9%		
	18-21m 15%		
	21-24 m 21%		
	24 m -27m27%		
	above27m 30%		
b)	For Ground level works :-		
<u> </u>	1) Slabs	1 Sqm	To follow as
	2) Beams & Lintels	1 Cum	per
	<i>'</i>		AP.Standard
	3) Sun shades	1 Sqm	data
	4) RCC vertical walls of plane surface	1 Sqm of	As per
		centering	Building SoR
		area	SOK
	5) RCC vertical walls of circular faces	1 Sqm of	30% extra
		centering	over the
		area	ratesof Plane
			surfaces
	NOTE: Scaffolding for every extra height of 1 m or part thereof but		
	not less than 0.5 m.The above centering charges are applicable for		
	water retaining structures only.		
32	Lift or delift of materials :		
	a) Lifting of cement concrete for RCC elevated reservoir. For every	4.6	To adopt as
	1m height or part thereof over the initial lift of 3 m	1 Cum	per Building
	h) Daliffing the metaviele such as stones compared at a few compared		SoR
	b) Delifting the materials such as stones, concrete etc., for concrete		50% of the lift rates
	below ground level for construction of masonry ground level reservoirs, construction of masonry ground level reservoirs,		mi rates
	inspection wells, test wells and sump wells etc., for every 1 m depth or	ı Lum	
	part thereof beyond the initial depth of 3 meters from ground level.		
	• •		To follow
33	Labour charges for fixing ventilating shafts complete with all	Each	To follow as per AP.Standard
	accessories.	Latii	data
34	Labour charges for fixing water closets including fixing of foot rests	T	
	(for all sizes).	Each	

Sl. No.	Description	Unit	SoR for 2013-2014
1	2	3	4
35	Labour charges for fixing of flushing cistern including fixing of flush pipes, lead pipe, jointing etc., complete	Each	Relevent
36	Labour charges for fixing wash hand basin including fixing of inlet and waste pipe connections etc., complete	Each	Building SoR items
37	Fixing urinal with inlet and waste pipe connections etc., complete.	Each	
38	Refilling the trench for pipe line with excavated earth including watering and tamping etc., complete	10 Cum	
39(a)	Extra allowance for isolated scattered works viz., valve pits / chambers, public fountains, meter pits and manholes, delivery cistern etc., complete.	Each	50% extra over the cost of chamber.
	Repairs to the existing mains, interconnections, replacement of valves/specials etc., including the cutting ,jointing, bailing out of water, drying, earth work execavation etc., complete.		150% extra over the cost of work
40	Removal of wet silt and sludge from sullage drains with aid of baskets and vessels.	10 Cum	1450.00
41	Well sinking in sandy and other loose soils under water either by manual labour, divers, or dredgers, weighting the top of staining to assist sinking etc., including dewatering and other incidental charges such as hire charges for mechanical equipment etc		
	Upto 2 m below GL/m	Per metre	
	From 2 to 4 m below GL/m	Per metre	To adopt as
	From 4 to 6 m below GL/m	Per metre	per
	From 6 to 8 m below GL/m	Per metre	AP.Standard data
	From 8 to 10 m below GL/m	Per metre	uata
	Note:-Below 10 m for every metre depth or part thereof add Rs.250/-per m. For higher dia, observed data is to be prepared and got approved.		
42	Sinking in Hard strata other than rock but in soils like limestone, gravel, clay under water including, pumping dewatering, hire charges for mechanical equipment etc., complete.		Observed Data
43	Rates for OHSRs/ELSRs including fixtures with a staging of 15 m, without Seismic analysis.		
a	500 Kilo litres	Per litre	15.63
b	1000 Kilo litres	Per litre	12.92
С	1500 Kilo litres	Per litre	11.65
d	2000 Kilo litres	Per litre	10.90
e	2500 Kilo litres 1) For intermediate ranges proportional rates may be adopted. All VRCC shall be in M30 grade design mix.	Per litre	10.22
	2) The above rates are applicable for ELSRs / OHSRs with Raft foundtion footings and rate of Rs.4,100/- per tonne for cement and Rs.43,000/- per tonne for steel.		

3 4 3) For every metre of staging less than 15 m, the rate shall be reduced by Rs.0.05 paise per litre per every metre of difference in staging 4) For every metre of staging above 15 m, the rate shall be increased by Rs.0.10 paise per litre per every metre of additional in staging 5) The above rates shall be increased / decreased due to increase / decrease in the cost of cement by Basic Rate x (Rc-4100) x 0.00007 Rc = Rate of cement (Rs per Mt) at the time of preparation of estimate 6) The above rates shall be increased / decreased due to increase / decrease in the cost of steel by Basic Rate x (Rs-43000) x 0.00002 Rs = Rate of steel (Rs per Mt) at the time of preparation of estimate. 7) Rate inclisive of three coates of epoxy paint to inner surface of the reservoir including roof dome. 8) The above rates be adopted for estimate purposes for construction of ELSR for a finished work including 2 coats of wheather proof emulsion painting for external surfaces, lettering, all required fixtures, pipes, bends, valves etc., for pipe connections including cost of pipes, bends and valves as per departmental designs and drawings. 9) The above rates are applicable for wind pressure upto 350 kg / sqm. For every 100 kg/sqm decrease in wind pressure, the rate is to be decreased by 5% 10) For tribal/Agency / Rural area, the above rates shall be increased by 10% 11) If the ELSR is to be designed for seismic forces a) The above rates are applied upto Zone-II carth quake. b) for Zone-III earth quake the above rates are to be increased by 33 1/3%. 12) Fixtures include. a) A balony of 1.0 m width at floor slab level/middle ring beam level/ top ring beam level with S.S pipe hand railing upto 1.0mts height. b) D.I. Manhole frame and cover OF 0.60 x 0.6 m size : 2 Nos. c) D.I swan neck ventilators shall be provided in top dome and slab for mosquito proof. d) RCC Finial - 1 No. e) RCC precast ladders 0.60 m wide - 2 Nos.	Sl. No.	Description	Unit	SoR for 2013-2014
reduced by Rs.0.05 paise per litre per every metre of difference in staging 4) For every metre of staging above 15 m, the rate shall be increased by Rs.0.10 paise per litre per every metre of additional in staging 5) The above rates shall be increased / decreased due to increase / decrease in the cost of cement by Basic Rate x (Rc-4100) x 0.00007 Rc = Rate of cement (Rs per Mt) at the time of preparation of estimate 6) The above rates shall be increased / decreased due to increase / decrease in the cost of steel by Basic Rate x (Rs-43000) x 0.00002 Rs = Rate of steel (Rs per Mt) at the time of preparation of estimate. 7) Rate inclisive of three coates of epoxy paint to inner surface of the reservoir including roof dome. 8) The above rates be adopted for estimate purposes for construction of ELSR for a finished work including 2 coats of wheather proof emulsion painting for external surfaces, lettering, all required fixtures, pipes, bends, valves etc., for pipe connections including cost of pipes, bends and valves as per departmental designs and drawings. 9) The above rates are applicable for wind pressure upto 350 kg / sqm. For every 100 kg/sqm decrease in wind pressure, the rate is to be decreased by 5% 10) For tribal/Agency / Rural area, the above rates shall be increased by 10% 11) If the ELSR is to be designed for seismic forces a) The above rates are applied upto Zone-II earth quake. b) for Zone-III earth quake the above rates are to be increased by 33 1/3%. 12) Fixtures include. a) A balcony of 1.0 m width at floor slab level/middle ring beam level/ top ring beam level with S.S pipe hand railing upto 1.0mts height. b) D.I. Manhole frame and cover OF 0.60 x 0.6 m size : 2 Nos. c) D.I swan neck ventilators shall be provided in top dome and slab for mosquito proof. d) RCC Finial - 1 No.	1	2	3	4
by Rs.0.10 paise per litre per every metre of additional in staging 5)The above rates shall be increased / decreased due to increase / decrease in the cost of cement by Basic Rate x (Rc-4100) x 0.00007 Rc = Rate of cement (Rs per Mt) at the time of preparation of estimate 6)The above rates shall be increased / decreased due to increase / decrease in the cost of steel by Basic Rate x (RS-43000) x 0.00002 Rs = Rate of steel (Rs per Mt) at the time of preparation of estimate. 7) Rate inclisive of three coates of epoxy paint to inner surface of the reservoir including roof dome. 8) The above rates be adopted for estimate purposes for construction of ELSR for a finished work including 2 coats of wheather proof emulsion painting for external surfaces, lettering, all required fixtures, pipes, bends, valves etc., for pipe connections including cost of pipes, bends and valves as per departmental designs and drawings. 9) The above rates are applicable for wind pressure upto 350 kg / sqm. For every 100 kg/sqm decrease in wind pressure, the rate is to be decreased by 5% 10) For tribal/Agency / Rural area, the above rates shall be increased by 10% 11) If the ELSR is to be designed for seismic forces a) The above rates are applied upto Zone-II earth quake. b) for Zone-III earth quake the above rates are to be increased by 33 1/3%. 12) Fixtures include. a) A balcony of 1.0 m width at floor slab level/middle ring beam level/ top ring beam level with S.S pipe hand railing upto 1.0mts height. b) D.I. Manhole frame and cover OF 0.60 x 0.6 m size: 2 Nos. c) D.I swan neck ventilators shall be provided in top dome and slab for mosquito proof. d) RCC Finial - 1 No.		reduced by Rs.0.05 paise per litre per every metre of difference in		
decrease in the cost of cement by Basic Rate x (Rc-4100) x 0.00007 Rc = Rate of cement (Rs per Mt) at the time of preparation of estimate 6)The above rates shall be increased / decreased due to increase / decrease in the cost of steel by Basic Rate x (RS-43000) x 0.00002 Rs = Rate of steel (Rs per Mt) at the time of preparation of estimate. 7) Rate inclisive of three coates of epoxy paint to inner surface of the reservoir including roof dome. 8) The above rates be adopted for estimate purposes for construction of ELSR for a finished work including 2 coats of wheather proof emulsion painting for external surfaces, lettering, all required fixtures, pipes, bends, valves etc., for pipe connections including cost of pipes,bends and valves as per departmental designs and drawings. 9) The above rates are applicable for wind pressure upto 350 kg / sqm. For every 100 kg/sqm decrease in wind pressure, the rate is to be decreased by 5% 10) For tribal/Agency / Rural area, the above rates shall be increased by 10% 11) If the ELSR is to be designed for seismic forces a) The above rates are applied upto Zone-II earth quake, b) for Zone-III earth quake the above rates are to be increased by 33 1/3%. 12) Fixtures include. a) A balcony of 1.0 m width at floor slab level/middle ring beam level/top ring beam level with S.S pipe hand railing upto 1.0mts height. b) D.I. Manhole frame and cover OF 0.60 x 0.6 m size: 2 Nos. c) D.I swan neck ventilators shall be provided in top dome and slab for mosquito proof. d) RCC Finial - 1 No.		,		
decrease in the cost of steel by Basic Rate x (RS-43000) x 0.00002 Rs = Rate of steel (Rs per Mt) at the time of preparation of estimate. 7) Rate inclisive of three coates of epoxy paint to inner surface of the reservoir including roof dome. 8) The above rates be adopted for estimate purposes for construction of ELSR for a finished work including 2 coats of wheather proof emulsion painting for external surfaces, lettering, all required fixtures, pipes, bends, valves etc., for pipe connections including cost of pipes,bends and valves as per departmental designs and drawings. 9) The above rates are applicable for wind pressure upto 350 kg / sqm. For every 100 kg/sqm decrease in wind pressure, the rate is to be decreased by 5% 10) For tribal/Agency / Rural area, the above rates shall be increased by 10% 11) If the ELSR is to be designed for seismic forces a) The above rates are applied upto Zone-II earth quake. b) for Zone-III earth quake the above rates are to be increased by 33 1/3%. 12) Fixtures include. a) A balcony of 1.0 m width at floor slab level/middle ring beam level/top ring beam level with S.S pipe hand railing upto 1.0mts height. b) D.I. Manhole frame and cover OF 0.60 x 0.6 m size: 2 Nos. c) D.I swan neck ventilators shall be provided in top dome and slab for mosquito proof. d) RCC Finial - 1 No.		decrease in the cost of cement by Basic Rate x (Rc-4100) x 0.00007		
reservoir including roof dome. 8) The above rates be adopted for estimate purposes for construction of ELSR for a finished work including 2 coats of wheather proof emulsion painting for external surfaces, lettering, all required fixtures, pipes, bends, valves etc., for pipe connections including cost of pipes,bends and valves as per departmental designs and drawings. 9) The above rates are applicable for wind pressure upto 350 kg / sqm. For every 100 kg/sqm decrease in wind pressure, the rate is to be decreased by 5% 10) For tribal/Agency / Rural area, the above rates shall be increased by 10% 11) If the ELSR is to be designed for seismic forces a) The above rates are applied upto Zone-II earth quake. b) for Zone-III earth quake the above rates are to be increased by 33 1/3%. 12) Fixtures include. a) A balcony of 1.0 m width at floor slab level/middle ring beam level/ top ring beam level with S.S pipe hand railing upto 1.0mts height. b) D.I. Manhole frame and cover OF 0.60 x 0.6 m size: 2 Nos. c) D.I swan neck ventilators shall be provided in top dome and slab for mosquito proof. d) RCC Finial - 1 No.		decrease in the cost of steel by Basic Rate x (RS-43000) x 0.00002		
of ELSR for a finished work including 2 coats of wheather proof emulsion painting for external surfaces, lettering, all required fixtures, pipes, bends, valves etc., for pipe connections including cost of pipes, bends and valves as per departmental designs and drawings. 9) The above rates are applicable for wind pressure upto 350 kg / sqm. For every 100 kg/sqm decrease in wind pressure, the rate is to be decreased by 5% 10) For tribal/Agency / Rural area, the above rates shall be increased by 10% 11) If the ELSR is to be designed for seismic forces a) The above rates are applied upto Zone-II earth quake. b) for Zone-III earth quake the above rates are to be increased by 33 1/3%. 12) Fixtures include. a) A balcony of 1.0 m width at floor slab level/middle ring beam level/ top ring beam level with S.S pipe hand railing upto 1.0mts height. b) D.I. Manhole frame and cover OF 0.60 x 0.6 m size: 2 Nos. c) D.I swan neck ventilators shall be provided in top dome and slab for mosquito proof. d) RCC Finial - 1 No.				
For every 100 kg/sqm decrease in wind pressure, the rate is to be decreased by 5% 10) For tribal/Agency / Rural area, the above rates shall be increased by 10% 11) If the ELSR is to be designed for seismic forces a) The above rates are applied upto Zone-II earth quake. b) for Zone-III earth quake the above rates are to be increased by 33 1/3%. 12) Fixtures include. a) A balcony of 1.0 m width at floor slab level/middle ring beam level/top ring beam level with S.S pipe hand railing upto 1.0mts height. b) D.I. Manhole frame and cover OF 0.60 x 0.6 m size: 2 Nos. c) D.I swan neck ventilators shall be provided in top dome and slab for mosquito proof. d) RCC Finial - 1 No.		of ELSR for a finished work including 2 coats of wheather proof emulsion painting for external surfaces, lettering, all required fixtures, pipes, bends, valves etc., for pipe connections including cost of		
are applied upto Zone-II earth quake. b) for Zone-III earth quake the above rates are to be increased by 33 1/3%. 12) Fixtures include. a) A balcony of 1.0 m width at floor slab level/middle ring beam level/top ring beam level with S.S pipe hand railing upto 1.0mts height. b) D.I. Manhole frame and cover OF 0.60 x 0.6 m size: 2 Nos. c) D.I swan neck ventilators shall be provided in top dome and slab for mosquito proof. d) RCC Finial - 1 No.		For every 100 kg/sqm decrease in wind pressure, the rate is to be decreased by 5% 10) For tribal/Agency / Rural area, the above rates shall be increased		
a) A balcony of 1.0 m width at floor slab level/middle ring beam level/ top ring beam level with S.S pipe hand railing upto 1.0mts height. b) D.I. Manhole frame and cover OF 0.60 x 0.6 m size : 2 Nos. c) D.I swan neck ventilators shall be provided in top dome and slab for mosquito proof. d) RCC Finial - 1 No.		are applied upto Zone-II earth quake. b) for Zone-III earth quake the		
top ring beam level with S.S pipe hand railing upto 1.0mts height. b) D.I. Manhole frame and cover OF 0.60 x 0.6 m size : 2 Nos. c) D.I swan neck ventilators shall be provided in top dome and slab for mosquito proof. d) RCC Finial - 1 No.				
c) D.I swan neck ventilators shall be provided in top dome and slab for mosquito proof. d) RCC Finial - 1 No.		,		
mosquito proof. d) RCC Finial - 1 No.		b) D.I. Manhole frame and cover OF 0.60 x 0.6 m size : 2 Nos.		
		<u> </u>		
e) RCC precast ladders 0.60 m wide - 2 Nos.				
, - · · · · · · · · · · · · · · · · · ·		e) RCC precast ladders 0.60 m wide - 2 Nos.		

Sl. No.	Description	Unit	SoR for 2013-2014
1	2	3	4
	f) RCC dog legged stair case with 1.0mts staircase flight width and 1.20mts landing width with S.S railing of 1.mts height - 1 No.		
	g) Latest Water level indicator-Digital water level indicators of reputed make - 1 No.		
	h) Lightening arrestor with all its accessories complete including earthing - 1 No.		
	i) Construction of R.C.C valve chambers		
	j) For 500KL to 1000KL two rows columns shall be provided .		
	k) Above 1000KL three rows columns shall be provided .		
	l) Minimum staging for all ELSR/OHSR shall be 12.0mts.		
	m) The increase in staging shall be at 1.0mt interval.		
	n) The railing provided to the gallery and staircase shall be with stainless steel of grade 304 for a height of 1.20mts		
	o). The staircase shall be enclosed with brick/CRS wall on three side and collapsible gate on front side upto 1st brace level from ground level to prevent unauthorized entry.		
	p). The above rates are inclusive of all inlet, out let, scour conenction and valves. All the vertical connections are with D.I and all valves near inlet, out let and for scour of ELSRs shall be D.I valves.		
	q)Vertical connections: All the inlet, out let, over flow and scour pipes and fittings shall be of D.I. The minimum size of scour pipe is 200mm dia. All the valves shall be of DI of PN 20 and valve chambers shall be constructed with VRCC M20 grade with 150mm thick side walls,, 150mm thick top slab, 150mm thick base slab over base course of		
	100mm thick (1:4:8)prop . The rates of inlet, outlet, scour and over flow pipes , D.I valves of PN20 and Valve chambers are included in the litre rate of ELSRs		

Sl. No.	Description	Unit	SoR for 2013-2014
1	r)Compound wall: Construction of compound wall including M.S.Gate is included in the litre rate of ELSRs. Length of compound wall shall be minimum of 150mts. The compound wall shall be constructed including earth work excavation for the minimum width of 0.60mts and depth of 0.60mts for wall portion and for column footings of 0.75x0.75 mts x 1.50mts size. VRCC footings 0.75*0.75*0.30mts in VRCC M20 grade shall be constructed over a C.C (1:4:8)prop bed of 150mm thick. The columns shall be of 230*230 mm size with VRCC M20 grade at 3.60m c/c spacing having depth of 0.75mts below ground level and height of 2.40mts, plinth beam of size 230X230 mm shall be constructed in	3	4
	VRCC M20 grade at basement level. 450*450mm size columns in M20 grade shall be constructed for gate. The size of CRS masonry in C.M(1:6)prop below ground level shall be of 0.45X0.45mts and size of basement above G.L is 0.45X0.30mts and size of brick work above plinth beam is 230mm with 2nd class bricks in CM(1:6)Prop upto 1.80mts . Plastering shall be done with 16mm thick in two coats i.e., base coat 12mm thick in CM(1:6)prop and 4mm thick 2nd coat CM(1:4) prop on both sides of brick work and CRS masonry upto and including 150mm below ground level. Plain CC M20 grade 75mm thick coping shall be provided over top of compound wall to prevent entry of rain water .		
	Over the compound wall, fencing shall be provided upto 0.60mts height with barbed wire fencing. Snowcem paint in two coats shall be provided for both sides of wall. The M.S ornamental gate as per the approved drawings shall be provided with minimum of 3.60mts width and 2.40mts height with enamel paint. Yard lighting shall be arranged on four corners of compound wall. If the length of the wall is increased/decreased		
	Note:-For every 10.0mts increase/decrease in length of compound wall the increase/decrease in litre rates in 500KL to 2500KL capacity ELSRs shall be as follows.: 500 KL : 0.86% 1000 KL : 0.47% 1500 KL : 0.34% 2000 KL : 0.26% 2500 KL : 0.22 %		

Sl. No.	Description	Unit	SoR for 2013-2014
1	2	3	4
	s)watchmen quarter shall be constructed for a minimum plinth area of 40 sqm with the following specification. Construction of RCC framed structure with RCC grade not less than M20 design mix at the places specified by the department at the time of execution with verandah, hall, bed room, kitchen and bath &W/C with floor area of 40.00sqmts excluding balconies and staircases.		
	MS hollow door frame with cold rolled processed steel sheet 1.25mm thick bright CRCA conforming to IS 4351/76, Flush door shutters with solid bond wood bond board doors shall be provided. N.C.L. Windows centre fixed both sides openable shutter window 1.35 X 1.35mts outer frame section 48 x50mm shutter frame section with a size of 48 X20 mm mullion section of size 48 X 50mm fixed beading section of 12 X 12 mm shall be provided. Flooring with polished Kadapa stone shall be provided. Walls should be provided with snowcem paint in two coats over primary coat. Electrical and water supply arrangement shall be provided as directed by dept officer. Syntex tank with necessary out let and inlet connection, pipes shall provided. septic tank for 5 users shall be provided.		
45	Rates for OHSRs/ELSRs including fixtures with a staging of 10 m without Seismic analysis.		
a	Upto 10,000 Litres capacity	Per litre	50.07
b	15,000 Litres capacity	Per litre	34.43
С	20,000 Litres capacity	Per litre	33.83
d	40,000 Litres capacity	Per litre	29.95
e	60,000 Litres capacity	Per litre	22.72
f	1,00,000 Litres capacity	Per litre	20.98
g	2,00,000 Litres capacity	Per litre	18.36
h	3,00,000 Litres capacity	Per litre	17.23
i	4,00,000 Litres capacity	Per litre	15.20
j	4,50,000 Litres capacity	Per litre	13.17
	NOTE: -1) For intermediate ranges proportional rates may be adopted. All VRCC shall be in M30 grade design mix. 2) The above rates are applicable for Elevated Level Services Reservoirs / OHSRs with RAFT FOUNDATION and a rate of Rs.4,100/- per tonne for cement and Rs.43,000/- per tonne for steel.		
	3) For every metre of staging less than 10 m, the rate shall be reduced by Rs.0.05 paise per litre per every metre of difference in staging		

Sl. No.	Description	Unit	SoR for 2013-2014
1	2	3	4
	4) For every metre of staging above 10 m, the rate shall be increase by Rs.0.10 paise per litre per every metre of additional in staging		
	5) The above rates shall be increased / decreased due to increase / decrease in the cost of cement by Basic Rate x (Rc-4100) x 0.00007 Rc = Rate of cement (Rs per Mt) at the time of preparation of estimate		
	6)The above rates shall be increased / decreased due to increase / decrease in the cost of steel by Basic Rate x (RS-43000) x 0.00002 Rs = Rate of steel (Rs per Mt) at the time of preparation of estimate.		
	7) Rate inclisive of three coates of epoxy paint to inner surface of the reservoir including roof dome.		
	8) The above rates be adopted for estimate purposes for construction of ELSR for a finished work including 2 coats of wheather proof emulsion painting for external surfaces, lettering, all required fixtures, pipes, bends, valves etc., for pipe connections but excluding cost of pipes, bends and valves as per departmental designs and drawings.		
	9) The above rates are applicable for wind pressures upto 350 kg / sq m .For decrease in wind presure the rate has to be decreased by 5% per every 100kg/sqm. If the ELSR / OHSR is to be designed for seismic forces also, cost shall be arrived by working out detailed quantities based on the designs.		
	10) For Tribal/Agency/ Rural area, the above rates shall be increased by 10%		
	11) If the ELSR is to be designed for seismic forces also, cost shall be arrived by working out detailed quanitites based on the design & difference to be paid extra.		
	12) If the ELSR is to be designed for seismic forces a) The above rates are applied upto Zone-II earth quake. b) for Zone-III earth quake the above rates are to be increased by 33.33 %.		
	13) Fixtures include : a) RCC or Aluminium ladder inside 0.60 m wide.		
	b) spiral staircase on the outside shall be provided upto 200KL. Above 200KL capacity dog legged staircase shall be provided with staircase flight width of 1.0mts and landing width of 1.20mts with S.S railing upto 1.0 height.		
	c) Lightening arrestor, including conductor and earthing etc.		
	d) RCC ventilators with copper or stainless steel fly proof mesh.		

Sl. No.	Description	Unit	SoR for 2013-2014
1	2	3	4
	e) D.I Manholes frame and cover 0.60x0.60 m as per IS specifications (light duty) - 2 Nos.		
	f) Water level indicator of good quality with ebonite/ copper float approved pattern - 1 No.		
	g) The ladder shall be with M.S ladder and Verticals with HDPE of 10kg/Sqcm shall be provided for single column OHSRs only.		
	h) Minimum staging for all ELSR/OHSR shall be 10.0mts.		
	i) The increase in staging shall be at 1.0mt interval.		
	j)The railing provided to the gallery and stair case shall be with stainless steel of grade 304 for a height of 1.20mts.		
	k). The dog legged staircase shall be enclosed with brick/CRS wall on three sides and front side with M.S collapsible gate upto 1st brace level from ground level to prevent unauthorized entry.		
	l). D.I swan neck ventilators shall be provided in top dome and slab.		
	m). The above rates are exclusive of all inlet, out let conenction and valves. All valves near inlet, out let and for scour of ELSRs shall be D.I valves.		
45	Construction of Rapid Gravity Filtration Plant including civil, mechanical and electrical fully automation including trial running etc., complete.		
	1) 2.0 Mld	Per litre	3.09
	2) 5.0 Mld	Per litre	2.82
	3) 10.0 Mld	Per litre	2.55
	4) 20.0 Mld	Per litre	2.29
	5) 30.00 mld and above	Per litre	2.01
	NOTE:-		
	a) For intermediate ranges proportional rates may be adopted		
	b) The above rates are applicable with cement @ rate of Rs.4,100/-MT and steel of Rs. 43,000/MT.		
	c)The above rates shall be increased / decreased due to increase / decrease in the cost of cement by Basic Rate x (Rc-4100) x 0.00007		
	Rc = Rate of cement (Rs per Mt) at the time of preparation of estimate		
	d)The above rates shall be increased / decreased due to increase / decrease in the cost of steel by		
	Basic Rate x (RS-43000) x 0.00002 Rs = Rate of steel (Rs per Mt) at the time of preparation of estimate.		

1			2013-2014
	2	3	4
	e) For Rural areas an extra allowance of 10% shall be given on basic rate		
	The components of the filtration plant are as follows:		
	A) Civil Works		
	(All works of VRCC Shall be in M30 design mix)		
	1). Stilling Chamber and Areation cascade		
	2). Ventury flume channel with measuring device		
	3) Flash Mixer chamber		
	4) .Clariflucculator / tube settler & flocculation tanks		
	5). Filter house, chemical house, Alum store, laboratory office room		
	chlorination plant room, toilet etc. (All items shall be under RCC roof		
	only). Separate Isolated chemical house & chlorinator room has to be		
	provided.		
	6). Wash water tank of suitable capacity		
	7) .All the doors and windows are of aluminimum make		
	8) .All pipes and valves in filter beds are of D.I. make & connection		
	from Flash mixer to Tube settler / Flocculation tank, sludge disposal		
	pipes are of D.I. make. The size of sludge disposal pipe shall be		
	minimum of 450 mm dia with C.I pipe.		
	9) The bottom level of the clear water control chamber must be above		
	G.L so as to dispose the leakage water by gravity.		
	10) . Clariflucculator bridge including sludge srcapping arrangement		
	shall be with stainless steel of Grade 304 for chemical resistance and durability		
	11) Railing for all the components shall be provided with Stainless		
	steel of grade 304 for a height of 0.90mts.		
	12).Path ways in filter beds: Middle pathway: Minimum of 1.50mts,		
	Side pathway: Minimum of 1.20mts.		
	•		
	13). Flooring in filter house shall be with 12mm thick Non-skid tiles.		
	14).Back wash water tank shall be constrcuted at a minimum height of		
	1.50mts above roof slab.		
	15). Filtration plant building ground floor level shall be minimum of		
	1.20mts above height from the neary by road crust level.		
	16). The minimum size of entrance hall shall be 12'x13', Lab size shall		
	be of 10'x15', Office room size shall be of 10'x15'.		
	17). The water from the treatment plant shall be tested for quantity		1
	and quality simultaneously.		
	18). Sufficient head room shall be provided at alum tank.		

Sl. No.	Description	Unit	SoR for 2013-2014
1	2	3	4
	19). S.S railing of grade 304 shall be provided for staircase.		
	20). Testing of blowers as per I.S norms.		
	21). All cables shall be with copper, Cable drains shall be covered with chequed plate.		
	22).HDPE/MDPE pipes shall be provided for water drainage .		
	23). Alum storage capacity shall be for minimum period of 90 days.		
	24). Digital water flow meters, pressure gauges shall be provided of standard make		
	25). Chemical house and chlorine storage system shall be constructed out side of plant		
	26).Pneumatic tyre wheel shall be provided for the bridge clariflocculator.		
	27). Min LUX levels inside the treatment plant shall be maintained.		
	28). The length of sludge disposal drain shall be minimum of 30mts.		
	29). Yard lighting shall be provided as per norms.		
	30). Chlorimeter vaccum type: Metito/Toshocow-Jesco/ Industrial devices.		
	B Mechanical Equipment		
	1)Alum dosing equipment		
	2)Flash mixer equipment.		
	3)Sludge disposal fittings by gravity		
	4)Filtration plant euqipment instrumentation and piping.		
	5)Clarifloccualation equipment (with stainless steel blades) with rotating bridge arrangeemnt etc.,		
	6)Wash water tank fittings and pumpsets with 100% stand by.		
	7)Air blower with motor 100% stand by and pipe connections.		
	8) Chlorination equipment and pipe connections with chlorinator of 100% standbye, Vaccum feed Gas Chlorination has to provided.		
	9)Spares & Tools for 2 years		
	10)Gaseous Chlorination with cylinders has to provided with protection measures.		
	C) Electrical Equipment		
	1) Necessary power supply wiring to motors and switches bus bar connections as per IE Rules		
	2) Internal wiring and illumination and fittings and fixtures for internal and external lighting exhaust fans, ceiling fans etc.		

Sl. No.	Description	Unit	SoR for 2013-2014
1	2	3	4
	3) Erecting mechanical and electrical equpment, trial run for 90 days		
	23.50 hours per day ttesting the treated water for efficient stardards		
	and maintenance of records and imparting training to staff.		
	4) Supply of 6 - Sets of completion plans and maintenance manual and brochures.		
	5) Provision towards soil investigations.		
	D) Automation for flow measurements		
	1)Automated Lab testing equipment of internationally reputed make		
	and consumables for one year. For filtration plants of capacity 10		
	MLD and more automated online testing equipment shall be installed.		
	2) Automation for flow of Conductivity, Turbidity, Ph value, Residual		
	Chlorine with recording & Storage facility (Computer based) & Alarm by SMS or other methods.		
	3)Off - Site Supervisory and Data Accusation (OSSADA) system for		
	Raw water and clear water measuring, recording, Off-Site Digital Display and data Transmission to Cell Phone(SMS).		
	1) Alam tanks must be bound with corrosion resistant material (HDPE Lining, Bitumen Coating, tiles etc)		
	2) Mechanical equipment for alam mixing and in flocculation tank		
	must be corrosive resistant (due to Alam)		

1. Sorates for R.C.C. Plain ended pipes

Sl. No.	Description						
1	2 MANUFACTURE, SUPPLY AND DELIVERY OF R.C.C. PLAIN ENDED PIPES CONFORMING TO B.I.S. 458/2003, EX-FACTORY, EXCLUDING TRANSPORTATION, TAXES & DUTIES						
	Size Unit SoR For 2013-14						
			NP - 2 Class	NP - 3 Class	NP - 4 Class		
	80 mm dia	Metre	129				
	100 mm dia	Metre	149				
	150 mm dia	Metre	176				
	200 mm dia	Metre	209				
	225 mm dia	Metre	227				
	250 mm dia	Metre	243				
	300 mm dia	Metre	348	791	812		
	350 mm dia	Metre	433	977	996		
	400 mm dia	Metre	499	1079	1103		
	450 mm dia	Metre	611	1235	1247		
	500 mm dia	Metre	671	1343	1544		
	600 mm dia	Metre	993	2019	2397		
	700 mm dia	Metre	1272	2512	3216		
	800 mm dia	Metre	1566	3318	4203		
	900 mm dia	Metre	1972	4171	5236		
	1000 mm dia	Metre	2397	5178	7157		
	1100 mm dia	Metre	2843	6112	8299		
	1200 mm dia	Metre	3387	7201	9705		
	1400 mm dia	Metre	4614	9306	13433		
	1600 mm dia	Metre	5348	12086	16177		
	1800 mm dia	Metre	7010	16031	21704		

Note: All the prices are ex-works. Excise duty, CST/VAT extra as applicable at the time of supply.

The above rates of RCC Plain ended pipes are based on the following raw materials cost.

Cement. Rs.4,100/- per MT (including all taxes and freight).

Steel (M.S. Rods) - Rs.42,500/- per MT. (including all taxes and freight).

The revised cost of RCC pipes due to increase / decrease in the cost of raw materials shall be as per the following formula.

Revised Cost = Cost as per the above table +R1+R2

R1= Variation (increase / decrease) in cost (Rs. per metre)due to change in the cost of M.S. Roads = (S2-S1)/1000 X Ws.

R2= Variation (increase / decrease) in cost (Rs. per metre)due to change in the cost of Cement = (C2-C1)/1000 X Wc.

S1 = Rs. 42,500/-, S2 = Cost of M S Rods (Rs. Per MT including all taxes and freight) at the time of preparation of estimate.

C1 = Rs. 4,100/- C2 = Cost of Cement (Rs. Per MT including all taxes and freight) at the time of preparation of estimate.

Ws=Weight of MS Rods required (Kg.) per metre of pipe as per IS:458/2003.

Wc= Weight of Cement required (Kg.) per metre of pipe.

2. Sorates for R.C.C. Collars

Sl.No.	Description						
1	2						
1	MANUFACTURE, SUPPLY AND DELIVERY OF R.C.C. COLLARS CONFORMING TO B.I.S. 458/2003 (RATE PER EACH COLLAR) SUITABLE FOR R.C.C. PLAIN ENDED PIPES INCLUDING TRANSPORTATION BUT EXCLUDING TAXES & DUTIES						
	Size	Unit	S	oR For 2013-1	14		
			NP - 2 Class	NP - 3 Class	NP - 4 Class		
	80 mm dia	Each	39				
	100 mm dia	Each	40				
	150 mm dia	Each	42				
	200 mm dia	Each	56				
	225 mm dia	Each	60				
	250 mm dia	Each	66				
	300 mm dia	Each	87	124	124		
	350 mm dia	Each	107	153	153		
	400 mm dia	Each	118	175	175		
	450 mm dia	Each	185	233	233		
	500 mm dia	Each	211	277	277		
	600 mm dia	Each	285	364	364		
	700 mm dia	Each	371	491	491		
	800 mm dia	Each	524	623	623		
	900 mm dia	Each	626	726	726		
	1000 mm dia	Each	731	908	908		
	1100 mm dia	Each	896	1150	1150		
	1200 mm dia	Each	1089	1440	1440		
	1400 mm dia	Each	1404	1824	1824		
	1600 mm dia	Each	1792	2339	2339		
	1800 mm dia	Each	1861	3015	3015		

Note: Excise duty, CST/VAT extra as applicable at the time of supply.

The above rates of RCC Collars suitable to plain ended pipes are based on the materials cost.

Cement. Rs.4,100/- per MT (including all taxes and freight).

Steel (M.S. Rods) - Rs.42,500/- per MT. (including all taxes and freight).

The revised cost of RCC collars due to increase / decrease in the cost of raw materials shall be as per the following formula.

Revised Cost = Cost as per the above table +R1+R2

R1= Variation (increase / decrease) in cost (Rs. per each)due to change in the cost of M.S.

Roads = (S2-S1)/1000 X Ws. R2= Variation (increase / decrease) in cost (Rs. per each)due to change in the cost of Cement = (C2-C1)/1000 X Wc.

 $S1=Rs.\ 42,500/$ - , $S2=Cost\ of\ M\ S\ Rods$ (Rs. Per MT including all taxes and freight) at the time of preparation of estimate.

C1 = Rs. 4,100/-, C2 = Cost of Cement (Rs. Per MT including all taxes and freight) at the time of preparation of estimate

Ws=Weight of MS Rods required (Kg.) per each collar.

Wc= Weight of Cement required (Kg.) per each collar.

3. SoRATES FOR R.C.C. S/S PIPES (Non Pressure)

Sl.No.	Description						
1	2						
	MANUFACTURE, SUPPLY AND DELIVERY OF R.C.C. SOCKET AND						
1	SPIGOT PIPES CONFORMING TO B.I.S. 458/2003 AT EX-FACTORY (RATE PER METER OF EFFECTIVE LENGTH) EXCLUDING						
	TRANSPORTATION, TAXES & DUTIES.						
	Size	Unit			2013-14		
			NP - 2 Class	NP - 3 Class	NP - 4 Class		
	80 mm dia	Metre	159				
	100 mm dia	Metre	180				
	150 mm dia	Metre	210				
	200 mm dia	Metre	255				
	225 mm dia	Metre	278				
	250 mm dia	Metre	298				
	300 mm dia	Metre	418	1005	1070		
	350 mm dia	Metre	537	1283	1305		
	400 mm dia	Metre	593	1422	1447		
	450 mm dia	Metre	738	1570	1582		
	500 mm dia	Metre	851	1796	1952		
	600 mm dia	Metre	1197	2519	2594		
	700 mm dia	Metre	1552	3217	3376		
	800 mm dia	Metre	1992	4258	4411		
	900 mm dia	Metre	2517	5354	5545		
	1000 mm dia	Metre	3056	6054	6617		
	1100 mm dia	Metre	3585	7148	7647		
	1200 mm dia	Metre	4065	8436	8951		
	1400 mm dia	Metre	5783	11173	12697		
	1600 mm dia	Metre	7154	14513	15307		
	1800 mm dia	Metre	8048	19245	20544		
			ı				

Note: All the prices are ex-works, Excise duty, CST/VAT extra as applicable at the time of supply. The above rates of RCC S/S Non-Pressure pipes are based on the following raw materials cost.

Cement. Rs.4, 100/- per MT (including all taxes and freight).

Steel (M.S. Rods) - Rs.42, 500/- per MT. (including all taxes and freight).

The revised cost of RCC pipes due to increase / decrease in the cost of raw materials shall be as per the following formula.

Revised Cost = Cost as per the above table +R1+R2

R1= Variation (increase / decrease) in cost (Rs. per metre) due to change in the cost of M.S. Roads = (S2-S1)/1000 X Ws.

R2= Variation (increase / decrease) in cost (Rs. per metre)due to change in the cost of Cement =(C2-C1)/1000 X Wc.

 $S1 = Rs.\ 42,500/$ - , $S2 = Cost\ of\ M\ S\ Rods\ (Rs.\ Per\ MT\ including\ all\ taxes\ and\ freight)$ at the time of preparation of estimate.

C1 = Rs. 4,100/-, C2 = Cost of Cement (Rs. Per MT including all taxes and freight) at the time of preparation of estimate

Ws=Weight of MS Rods required (Kg.) per metre of pipe as per IS:458/2003.

Wc= Weight of Cement required (Kg.) per metre of pipe.

4. SoRATES FOR R.C.C. S/S PIPES (Pressure)

Sl.No.	Description					
1	2					
1	MANUFACTURE, SUPPLY AND DELIVERY OF R.C.C. SOCKET AND SPIGOT PIPES CONFORMING TO B.I.S. 458/2003 EX- FACTORY (RATE PER METER OF EFFECTIVE LENGTH) EXCLUDING TRANSPORTATION, TAXES & DUTIES. Size Unit Sor For 2013-14					
			P1 - Class	P2 - Class	P3 - Class	
	80 mm dia	Metre	208	234	266	
	100 mm dia	Metre	234	280	324	
	150 mm dia	Metre	323	418	516	
	200 mm dia	Metre	375	539	712	
	225 mm dia	Metre	422	613	794	
	250 mm dia	Metre	463	656	836	
	300 mm dia	Metre	625	946	1182	
	350 mm dia	Metre	778	1313	1702	
	400 mm dia	Metre	924	1737	2245	
	450 mm dia	Metre	991	2059	2770	
	500 mm dia	Metre	1314	2244	3155	
	600 mm dia	Metre	1799	3343	4391	
	700 mm dia	Metre	2395	4418	5589	
	800 mm dia	Metre	3000	5272	6774	
	900 mm dia	Metre	3623	6216		
	1000 mm dia	Metre	4565	7151		
	1100 mm dia	Metre	5477			
	1200 mm dia	Metre	6428			

Note: All the prices are ex-works, Excise duty, CST/VAT extra as applicable at the time of supply.

The above rates of RCC S/S Pressure pipes are based on the following raw materials cost.

Cement. Rs.4,100/- per MT (including all taxes and freight).

Steel (M.S. Rods) - Rs.42,500/- per MT. (including all taxes and freight).

The revised cost of RCC pipes due to increase / decrease in the cost of raw materials shall be as per the following formula.

Revised Cost = Cost as per the above table +R1+R2

R1= Variation (increase / decrease) in cost (Rs. per metre) due to change in the cost of M.S. Roads =(S2-S1)/1000 X Ws.

R2= Variation (increase / decrease) in cost (Rs. per metre) due to change in the cost of Cement =(C2-C1)/1000 X Wc.

S1 = Rs. 42,500/-

S2 = Cost of M S Rods (Rs. Per MT including all taxes and freight) at the time of preparation of estimate.

C1 = Rs. 4,100/-, C2 = Cost of Cement (Rs. Per MT including all taxes and freight) at the time of preparation of estimate

Ws=Weight of MS Rods required (Kg) per metre of pipe as per IS: 458 / 2003.

Wc= Weight of Cement required (Kg) per metre of pipe.

5. Sorates for Rubber Rings to Suit R.C.C. S/S PIPES

Sl. No.	5. SORATES FOR RUBBER RINGS TO SUIT R.C.C. S/S PIPES Description							
1	2							
1	MANUFACTURE, SUPPLY AND DELIVERY OF RUBBER RING TO SUIT R.C.C. SOCKET AND SPIGOT PIPES CONFORMING TO B.I.S. 5382/ 1985 (RATE PER EACH RUBBER RING) INCLUDING TRANSPORTATION BUT EXCLUDING TAXES & DUTIES.							
	Size	Unit						
	Size	Omt	NP - 2 Class	R For 2013-1 NP - 3 Class	NP - 4 Class			
			NI - 2 Class	NI - 3 Class	NI - 4 Class			
	80 mm dia	Each	24					
	100 mm dia	Each	29					
	150 mm dia	Each	52					
	200 mm dia	Each	61					
	225 mm dia	Each	67					
	250 mm dia	Each	75					
	300 mm dia	Each	92	118	118			
	350 mm dia	Each	106	141	141			
	400 mm dia	Each	117	160	160			
	450 mm dia	Each	133	182	182			
	500 mm dia	Each	174	208	208			
	600 mm dia	Each	228	303	303			
	700 mm dia	Each	310	362	362			
	800 mm dia	Each	394	439	439			
	900 mm dia	Each	493	594	594			
	1000 mm dia	Each	576	716	716			
	1100 mm dia	Each	693	917	917			
	1200 mm dia	Each	1109	1153	1153			
	1400 mm dia	Each	1220	1268	1268			
	1600 mm dia	Each	1519	1548	1548			
	1800 mm dia	Each	1892	1977	1977			
	MANUFACTU	JRE, SUPP	LY AND DELI	VERY OF RUP	BER RINGS			
2			T AND SPIGOT					
4		•	PER EACH RU					
		ATION BU	T EXCLUDING		l			
	Size	E - 1	P1 - Class 24	P2 - Class	P3 – Class			
	80 mm dia	Each	29	31	31			
	150 mm dia	Each Each	52	52	52			
	200 mm dia	Each	61	61	61			
	225 mm dia	Each	67	68	70			
	250 mm dia	Each	75	77	79			
	300 mm dia	Each	92	97	101			
	350 mm dia	Each	106	122	133			
	400 mm dia	Each	117	160	164			
			117	1 130	101			

Size		P1 - Class	P2 - Class	P3 – Class
450 mm dia	Each	133	184	188
500 mm dia	Each	174	208	217
600 mm dia	Each	228	257	262
700 mm dia	Each	310	340	362
800 mm dia	Each	394	435	435
900 mm dia	Each	493	549	
1000 mm dia	Each	576	663	
1100 mm dia	Each	693		
1200 mm dia	Each	1109		

Note: The duties and taxes as applicable shall be added as per rules at the time of preparation of estimate.

6. Sorates for conveyance of R.C.C. Plain ended pipes

Sl.No.	Description	Rate upto 5 Kms Lead including Loading, unloading and stacking	Rate for every additional 1 KM lead or part thereof.	Rate upto 5 Kms Lead including Loading, unloading and stacking	Rate for every additional 1 KM lead or part thereof.
1	2	3	4	5	6
1	CONVEYANO WEATHER F STACKING			DADING, UNLOA	
	BIIICIII	`_	Class	NP - 3 Class &	
	80 mm dia	3.00	0.12		2 = 3 3 2 2
	100 mm dia	4.00	0.12		
	150 mm dia	5.00	0.24		
	200 mm dia	7.00	0.24		
	225 mm dia	8.00	0.36		
	250 mm dia	9.00	0.36		
	300 mm dia	13.00	0.48	35.00	0.97
	350 mm dia	18.00	1.09	38.00	1.09
	400 mm dia	20.00	1.21	45.00	1.45
	450 mm dia	26.00	1.45	49.00	1.69
	500 mm dia	28.00	1.69	54.00	1.69
	600 mm dia	41.00	2.66	81.00	3.75
	700 mm dia	52.00	3.75	90.00	4.36
	800 mm dia	61.00	3.75	108.00	4.36
	900 mm dia	70.00	3.75	142.00	8.23
	1000 mm dia	104.00	7.74	171.00	8.23
	1100 mm dia	114.00	7.74	185.00	8.95
	1200 mm dia	129.00	8.23	207.00	8.95
	1400 mm dia	155.00	8.23	282.00	9.32
	1600 mm dia	180.00	8.23	338.00	9.32
	1800 mm dia	207.00	8.23	451.00	13.07

7. Sorates for conveyance of R.C.C. S/S PIPES

	/. S0KA11	ES FUR CONVE	CYANCE OF R.O	.C. 8/8 PIPES	
Sl.N o.	Description	Rate upto 5 Kms Lead including Loading, unloading &	Kms Lead every additional 1 KM lead or		Rate for every additional 1 KM lead or
		stacking	part thereof.	unloading and stacking	part thereof.
1	2	3	4	5	6
	CONVEYANCE OI	F R.C.C. SOCKI	ET AND SPIGO	T PIPES ON AI	
1	ROADS INCLUDIN	,		ND STACKING	G (per Metre of
	effective length)		13-14		
	Size		P1 Class	NP – 3 & N	P - 4 Class
	80 mm dia	4.00	0.11		
	100 mm dia	4.00	0.22		
	150 mm dia	6.00	0.22		
	200 mm dia	8.00	0.44		
	225 mm dia	9.00	0.44		
	250 mm dia	10.00	0.99		
	300 mm dia	16.00	1.10	42.00	1.32
	350 mm dia	19.00	1.21	45.00	1.54
	400 mm dia	19.00	1.43	56.00	2.86
	450 mm dia	27.00	1.54	62.00	2.86
	500 mm dia	30.00	1.65	68.00	3.08
	600 mm dia	39.00	2.86	92.00	4.40
	700 mm dia	48.00	3.08	124.00	8.69
	800 mm dia	66.00	4.73	146.00	8.69
	900 mm dia	99.00	8.47	169.00	8.69
	1000 mm dia	113.00	8.47	178.00	8.69
	1100 mm dia	127.00	8.69	191.00	8.69
	1200 mm dia	142.00	8.69	214.00	8.91
	1400 mm dia	176.00	8.69	286.00	8.91
	1600 mm dia	209.00	8.91	338.00	9.57
		259.00		451.00	
	1800 mm dia		8.91		13.09
	90 mm dia	P2 - Class	Λ 11	P3 –	
	80 mm dia 100 mm dia	4.00	0.11	4.00	0.11
	150 mm dia	6.00	0.22	6.00	0.22
	200 mm dia	8.00	0.22	11.00	0.22
	225 mm dia	11.00	0.99	13.00	1.10
	250 mm dia	12.00	1.10	15.00	1.10
		23.00	1.32	26.00	1.43
	300 mm dia				
	350 mm dia	28.00	1.54	36.00	1.65
	400 mm dia	34.00	1.65	48.00	2.86
	450 mm dia	43.00	2.75	60.00	2.86
	500 mm dia	48.00	2.86	73.00	4.29
	600 mm dia	64.00	2.86	105.00	5.50
	700 mm dia	95.00	5.83	154.00	8.69
	800 mm dia	126.00	8.25	196.00	8.69
	900 mm dia	154.00	8.69		
	1000 mm dia	189.00	8.91		

8. Sorates for a.c. Pipes

Sl.No				scription		
	MANUFACTU	RE AS PER			DED FROM	TIME TO TIME
	3					MARKED WITH
1						LING, LOADING
				RE EXCLUSIVE		ANSPORTATION, SE DUTY, VAT
	OCTROI AND			CIMENTAL SI	okes, Exch	SE DOII, VAI
	Size	Unit		SoR For	2013-14	
				Class - 15	Class - 20	Class - 25
	80 mm dia	Rate/Metre		168	184	230
	100 mm dia	Rate/Metre		222	282	347
	125 mm dia	Rate/Metre		290	361	453
	150 mm dia	Rate/Metre		408	508	639
	200 mm dia	Rate/Metre		677	865	1098
	250 mm dia	Rate/Metre		857	1111	1391
	300 mm dia	Rate/Metre		1200	1562	1995
	350 mm dia	Rate/Metre		1465	1903	2398
	400 mm dia	Rate/Metre		1904	2487	3088
	450 mm dia	Rate/Metre		2256	2994	3749
	500 mm dia	Rate/Metre		2788	3662	4598
	600 mm dia	Rate/Metre		3963	5173	6593
	700 mm dia	Rate/Metre		5249	7120	9207
	750 mm dia	Rate/Metre		5982	8219	10535
	800 mm dia	Rate/Metre		6844	9312	11951
	850 mm dia	Rate/Metre		7677	10476	13458
	900 mm dia	Rate/Metre		8559	11704	15053
	1000 mm dia	Rate/Metre		10566	14368	18512
2	O, 0				1 U	ID Joints complete
						cluding filling with Iries but excluding
	_			om source of suppl	U	U
	80 mm dia	Rate/Metre	v	32.00	32.00	32.00
	100 mm dia	Rate/Metre		47.00	47.00	47.00
	125 mm dia	Rate/Metre		52.00	52.00	52.00
	150 mm dia	Rate/Metre		62.00	62.00	62.00
	200 mm dia	Rate/Metre		81.00	81.00	81.00
	250 mm dia	Rate/Metre		97.00	97.00	97.00
	300 mm dia	Rate/Metre		120.00	120.00	120.00
	350 mm dia	Rate/Metre		204.00	204.00	204.00
	400 mm dia	Rate/Metre		305.00	305.00	305.00
	450 mm dia	Rate/Metre		372.00	372.00	372.00
	500 mm dia	Rate/Metre		473.00	473.00	473.00
	600 mm dia	Rate/Metre		508.00	508.00	508.00
	700 mm dia	Rate/Metre		567.00	567.00	567.00
	750 mm dia	Rate/Metre		631.00	631.00	631.00
	800 mm dia	Rate/Metre		664.00	664.00	664.00
	850 mm dia	Rate/Metre		708.00	708.00	708.00

	900 mm dia	Rate/Metre		773.00	773.00	773.00					
	1000 mm dia	Rate/Metre		795.00	795.00	795.00					
	1. The above ra	tes of AC Pip	es are based or	n the Cement cos	t of RS 4,100/	- per MT					
	(Including all ta	ixes and freigl	nt).			_					
	2. The above ra	tes of AC pipe	es are based or	n the Fiber cost of	Rs 68,198/- p	er M.T basic					
	price (Ex- India	Port) (Exclud	ling duties, ta	xes and transporta	tion etc.)						
	•			ment, the price of	AC pipe per l	Rmt shall be					
		increased/decreased as under.									
	$W \times 0.85 \times IC$ Where $W = Weight of pipe in Kg's/Rmt$										
	IC = Increase/Decrease in cost of cement/Kg										
	For any increase/decrease in the rate of fiber, the price of AC pipe per Rmt shall be										
	increased/Decre										
				pe in Kg's/Rmt							
	IF = Increase / I										
Note:				A.C. Pipe manufac		_					
	,	ate shall be co	ommunicated	by the sub-commi	ttee of Board	of Chief					
	engineers.										
	· '	d taxes as app	licable shall b	e added as per rul	es at the time	of preparation of					
	estimate										
		-		of work anywhe		10% on the basic					
	Pradesh on motor able roads for full truck loads including transit cost of										
2	insurance, unloading, and stacking at site of work etc. Complete (AC corresponding										
	1 0	Rubber rings a	ire to be suppl	ied free of transpo	ortation	AC Pressure					
	charges).					pipes.					

9. SORATES FOR A.C. COUPLINGS

Sl. No.	Description										
1			2								
1	RINGS TO SU INCIDENTAL H	SUPPLY OF IT AC PRES IANDLING, P	MANUFACTURERS S A.C. COUPLINGS EXCL SSURE PIPES INCLUDIN ACKING,TRANSPORTAT CCLUDING EXCISE DUTY	IG COST OF ION AND UN	OF RUBBER MATERIAL, LOADING AT						
	Size Unit SoR For 2013-14										
			Class - 15	Class - 20	Class – 25						
	80 mm dia	Rate/Each	82	87	101						
	100 mm dia	Rate/Each	106	113	137						
	125 mm dia	Rate/Each	133	146	176						
	150 mm dia	Rate/Each	154	193	239						
	200 mm dia	Rate/Each	284	310	395						
	250 mm dia	Rate/Each	332	418	533						
	300 mm dia	Rate/Each	433	561	722						
	350 mm dia	Rate/Each	562	726	927						
	400 mm dia	Rate/Each	865	1131	1449						
	450 mm dia	Rate/Each	1037	1367	1756						
	500 mm dia	Rate/Each	1236	1653	2112						
	600 mm dia	Rate/Each	1513	1897	2427						
	700 mm dia	Rate/Each	2002	2695	3505						
	750 mm dia	Rate/Each	2259	3088	3985						
	800 mm dia	Rate/Each	2562	3474	4496						
	850 mm dia	Rate/Each	2854	3886	5039						
	900 mm dia	Rate/Each	3158	4320	5609						
	1000 mm dia	Rate/Each	3855	5253	6846						

- 1. The above rates of AC Coupling are based on the Cement cost of RS 4,100/- per MT (Including all taxes and freight).
- 2. The above rates of AC Coupling are based on the Fiber cost of Rs 68,198/- per M.T basic price (Ex- Indian Port) (Excluding duties, taxes and transportation etc.)

For any Increase/ Decrease in the rate of cement, the price of AC Coupling per Each shall be increased/decreased as under.

W x 0.85 x IC Where W = Weight of Coupling in Kgs/Each

IC = Increase/Decrease in cost of cement/kg

For any increase/decrease in the rate of fiber, the price of AC Coupling per Each shall be increased/Decreased as under:

W x 0.15 X IF Where: W=: Weight of Coupling in Kgs/Each

IF = Increase /Decrease in cost of fiber/kg

The Fiber rates are to be obtained from A.C. Pipe manufacturer of "Mazza" process.

Note: The duties and taxes as applicable shall be added as per rules at the time of preparation of estimate.

10. Sorates for Rubber Rings to Suit a.c. Couplings

Sl.			D	escription								
No.												
1				2								
				OF RUBBER R								
_				RK EMBOSSED								
1				IG COST OF								
	,		,	ORTATION AN	D UNLOADIN	G AT SITE						
	TRANSIT RIS		I EXCLUDI		2012 14							
	Size	Unit		SoR For								
			Class - 15									
	80 mm dia	Each Set		62.00	62.00	62.00						
	100 mm dia	Each Set		75.00	75.00	75.00						
	125 mm dia	Each Set		98.00	98.00	98.00						
	150 mm dia	Each Set		124.00	124.00	124.00						
	200 mm dia	Each Set		129.00	129.00	129.00						
	250 mm dia	Each Set		149.00	149.00	149.00						
	300 mm dia	Each Set		149.00	149.00	149.00						
	350 mm dia	Each Set		169.00	169.00	169.00						
	400 mm dia	Each Set		207.00	207.00	207.00						
	450 mm dia	Each Set		243.00	243.00	243.00						
	500 mm dia	Each Set		281.00	281.00	281.00						
	600 mm dia	Each Set		318.00	318.00	318.00						
	700 mm dia	Each Set		661.00	661.00	661.00						
	750 mm dia	Each Set	_	686.00	686.00	686.00						
	800 mm dia	Each Set		737.00	737.00	737.00						
	850 mm dia	Each Set		822.00	822.00	822.00						
	900 mm dia	Each Set		864.00	864.00	864.00						
	1000 mm dia	Each Set		957.00	957.00	957.00						

Note: The duties and taxes as applicable shall be added as per rules at the time of preparation of estimate

11. Sorates for pre-stressed (non-cylinder) concrete pipes for the year 2013-14

Sl.No.				Descrip	tion			
1				2				
1	MANUFACTURE, S				NON-CYLIN	DER) CONCRETE	PIPES CONF	ORMING TO
1	IS 784/2001 Ex-factor	y excluding trans	portation, taxe	es & duties.				
	Size	Unit			SoR	For 2013-14.	<u> </u>	
			Rs.	Rs.	Rs.	Rs.	Rs.	Rs.
			6 Kg/cm2	8 Kg/cm2	10 Kg/cm2	12 Kg/cm2	14 Kg/cm2	16 Kg/cm2
	350 MM DIA	Metre	2511	2520	2532	2546	2600	2692
	400 MM DIA	Metre	2693	2714	2747	2784	2837	2882
	450 MM DIA	Metre	2840	2854	2889	2948	3027	3094
	500 MM DIA	Metre	3073	3088	3114	3186	3255	3355
	600 MM DIA	Metre	3529	3556	3595	3713	3837	3960
	700 MM DIA	Metre	4349	4369	4442	4551	4719	4857
	800 MM DIA	Metre	5132	5187	5326	5459	5685	5893
	900 MM DIA	Metre	5951	5999	6141	6407	6666	7134
	1000 MM DIA	Metre	6990	7053	7261	7561	7930	8360
	1100 MM DIA	Metre	7937	8056	8291	8759	9155	9602
	1200 MM DIA	Metre	8786	8942	9424	9873	10517	11326
	1300 MM DIA	Metre	9959	10539	11131	11733	12764	13957
	1400 MM DIA	Metre	11399	12070	12771	13892	14908	15733
	1500 MM DIA	Metre	13305	14097	14889	16176	17258	18194
	1600 MM DIA	Metre	14982	15885	16790	19068	19556	20617
	1700 MM DIA	Metre	15769	16428	17322	19538	21697	22722
	1800 MM DIA	Metre	16982	18111	19151	21109	23441	24583
	1900 MM DIA	Metre	18153	19196	20957	22206	24208	27029
	2000 MM DIA	Metre	19953	21252	22418	24702	28218	30347
2	Cost of laying jointing	g, testing to Hydi	rostatic field te	st pressure	including cost	t of rubber rings, co	st of transport	ation of water
<u> </u>	and emptying pipe lin	e after completion	n of field testin	g etc.				
	350 MM DIA	Metre	176	176	176	176	176	176

								I ublic licalili lici
	400 MM DIA	Metre	190	190	190	190	190	190
	450 MM DIA	Metre	220	220	220	220	220	220
	500 MM DIA	Metre	234	234	234	234	234	234
	600 MM DIA	Metre	287	287	287	287	287	287
	700 MM DIA	Metre	337	337	337	337	337	337
	800 MM DIA	Metre	382	382	382	382	382	382
	900 MM DIA	Metre	418	418	418	418	418	418
	1000 MM IA	Metre	483	483	483	483	483	483
	1100 MM IA	Metre	542	542	542	542	542	542
	1200 MMDIA	Metre	601	601	601	601	601	601
	1300 MM DIA	Metre	681	681	681	681	681	681
	1400 MM DIA	Metre	770	770	770	770	770	770
	1500 MM DIA	Metre	835	835	835	835	835	835
	1600 MM DIA	Metre	936	936	936	936	936	936
	1700 MM DIA	Metre	1019	1019	1019	1019	1019	1019
	1800 MM DIA	Metre	1078	1078	1078	1078	1078	1078
	1900 MM DIA	Metre	1139	1139	1139	1139	1139	1139
	2000 MM DIA	Metre	1198	1198	1198	1198	1198	1198
	CONVEYANCE OF							
3	Factory, un-loading	•	ng for the follo	owing sizes.(1	Minimum dis	stance of 100 KM to	be considered	if the distance
	is less by 100 KM fro	•	1.01	1.01	1.01	1.21	1.01	1.01
	350 MM DIA	PerKM/M	1.21	1.21	1.21	1.21	1.21	1.21
	400 MM DIA	PerKM/M	1.21	1.21	1.21	1.21	1.21	1.21
	450 MM DIA	PerKM/M	1.43	1.43	1.43	1.43	1.43	1.43
	500 MM DIA	PerKM/M	1.54	1.54	1.54	1.54	1.54	1.54
	600 MM DIA	PerKM/M	1.76	1.76	1.76	1.76	1.76	1.76
	700 MM DIA	PerKM/M	2.86	2.86	2.86	2.86	2.86	2.86
	800 MM DIA	PerKM/M	2.86	2.86	2.86	2.86	2.86	2.86
	900 MM DIA	PerKM/M	2.86	2.86	2.86	2.86	2.86	2.86
		•				l	l .	

4.51
4.51
8.69
8.80
8.80
8.80
9.90
9.90
10.12
10.56
10.56
pecial including
11124
12759
14394
16030
19237
22508
25780
29051
+
32061
32061 35333

	1400 MM DIA	Per P	air	49073	49073	49073	49073	49073	49073			
	1500 MM DIA	Per P	air	57579	57579	57579	57579	57579	57579			
	1600 MM DIA	Per P	air	64122	64122	64122	64122	64122	64122			
	1700 MM DIA	Per P	air	71950	71950	71950	71950	71950	71950			
	1800 MM DIA	Per P	air	82229	82229	82229	82229	82229	82229			
	1900 MM DIA	Per P	air	95076	95076	95076	95076	95076	95076			
	2000 MM DIA	Per P	air	114349	114349	114349	114349	114349	114349			
5	VAT etc., complete.	1985 and flange dimensions confirming to IS:1538-1993 excluding cost of MS Specials including cost and conveyance to site, VAT etc., complete.										
	Diameter and thic	Iznacc		Unit	Rate	Diamata	er and thickness	Unit	Rate			
	80 mm DIA x 15 mm	thick	Each I	lange	713) mm DIA x 2	0 mm thick	Each Flange	7206			
	100 mm DIA x 15 mm	n thick	Each Flange		972	600 mm DIA	x 20 mm thick	Each Flange	9071			
	125 mm DIA x 15 mm	n thick	Each Flange		1167	700 mm DIA x 25 mm thick		Each Flange	12830			
	150 mm DIA x 15 mm	n thick	Each Flange		1555	750 mm DIA x 25 mm thick		Each Flange	14126			
	200 mm DIA x 15 mm	n thick	Each I	Flange	1944	800 mm DIA x 25 mm thick		Each Flange	15810			
	250 mm DIA x 15 mm	n thick	Each I	Flange	2527	900 mm DIA x 25 mm thick		Each Flange	18143			
	300 mm DIA x 15 mm	n thick	Each I	Flange	2863	1000 mm DI	A x 25 mm thick	Each Flange	21382			
	350 mm DIA x 18 mm	350 mm DIA x 18 mm thick Each		lange	4173	1050 mm DI	A x 25 mm thick	Each Flange	22653			
				0		1100 mm DIA x 25 mm thick		1100 mm DIA x 25 mm thick Each				
	400 mm DIA x 18 mm	n thick	Each I		5209	1100 mm DI	A x 25 mm thick	Each Flange	24492			

Note: a) The above rate of PSC pipes are based on the HT wire cost of Rs.58,000/-MT (Basic+ CED+ST & freight). and cement price of Rs.4,100/- per MT (including all taxes and freight)

The rates may be revised depending upon the increase/decrease in the cost of HT wire and cement. as per the following method. The cost of HT wire may be obtained from reputed firms like SAIL/TATA/ SS Ltd. etc.,

Revised Cost = Cost as per the above table +R1+R2.

R1= Variation (increase / decrease) in cost (Rs. per metre) due to change in the cost of HT Wire = (H2-H1)/1000 X Wh.

R2= Variation (increase / decrease) in cost (Rs. per metre)due to change in the cost of Cement =(C2-C1)/1000 X Wc.

H1 = Rs. 58,000/- H2 = Cost of HT Wire (Rs. Per MT including all taxes and freight) at the time of preparation of estimate.

C1 = Rs. 4,100/- C2 = Cost of Cement (Rs. Per MT including all taxes and freight) at the time of preparation of estimate

Wh=Weight of HT Wire required (Kg.) per metre of pipe. Wc= Weight of Cement required (Kg.) per metre of pipe.

The rates for MS flanges are considering landed price of MS Plates of Rs.43,000/- per MT. Price variation to be released on actual weight of flange.

Note: The duties and taxes as applicable shall be added as per rules at the time of preparation of estimate

12. Sorates for pre-stressed (cylinder) concrete pipes for the year 2013-14

Sl No.		Description											
1						2							
1	PRE-STRESSE transportation,			•		CONFORMI		/84/2001 @]	Ex-factory C	Cost of pipes	, excluding		
	Size	Unit					SoR For	2013-14					
			4 Kg/cm2	6 Kg/cm2	8 Kg/cm2	10 Kg/cm2	12 Kg/cm2	14 Kg/cm2	16 Kg/cm2	18 Kg/cm2	20 Kg/cm2		
	400 MM DIA	Meter	4784	4784	4784	4784	4808	4859	4944	5026	5089		
	450 MM DIA	Meter	5199	5199	5199	5223	5284	5359	5467	5541	5628		
	500 MM DIA	Meter	5684	5684	5697	5776	5845	5940	6028	6161	6259		
	600 MM DIA	Meter	6750	6799	6888	7008	7117	7228	7398	7555	7714		
	700 MM DIA	Meter	7799	7921	8068	8225	8373	8518	8699	8931	9103		
	800 MM DIA	Meter	9151	9322	9527	9733	9920	10112	10345	10592	10876		
	900 MM DIA	Meter	10819	11038	11292	11549	11805	12036	12346	12653	12959		
	1000 MM DIA	Meter	12547	12838	13145	13462	13776	14038	14401	14776	15161		
	1100 MM DIA	Meter	13945	14293	14661	14992	15343	15662	16060	16481	17402		
	1200 MM DIA	Meter	15806	16212	16623	17032	17452	17827	18293	19215	19874		
	1300 MM DIA	Meter	17576	18045	18523	19001	19491	19923	21025	21613	22351		
	1400 MM DIA	Meter	19274	19808	20365	20924	21481	22583	23266	23965	25516		
	1500 MM DIA	Meter	21112	21707	22302	22888	24121	24797	25821	27342	29145		
	1600 MM DIA	Meter	23819	24482	25158	26419	27186	27954	29866	30714	31539		
	1700 MM DIA	Meter	25630	26397	27210	28655	29525	31151	32617	33535	34406		
	1800 MM DIA	Meter	28071	28876	30450	31427	32380	34172	35735	36838	37941		
	1900 MM DIA	Meter	32916	33834	35591	36633	38489	39971	41409	42634	43792		
	2000 MM DIA	Meter	35078	36819	37999	39213	41332	42615	44597	46006	47255		
2	Cost of laying jo	<u> </u>	•		-	_		lding and fix	ing of Polyp	ropylene Dia	pher cloth,		

	400 MM DIA	Meter	371	371	371	371	371	371	371	371	371
	450 MM DIA	Meter	436	436	436	436	436	436	436	436	436
	500 MM DIA	Meter	475	475	475	475	475	475	475	475	475
	600 MM DIA	Meter	556	556	556	556	556	556	556	556	556
	700 MM DIA	Meter	634	634	634	634	634	634	634	634	634
	800 MM DIA	Meter	727	727	727	727	727	727	727	727	727
	900 MM DIA	Meter	820	820	820	820	820	820	820	820	820
	1000 MM DIA	Meter	898	898	898	898	898	898	898	898	898
	1100 MM DIA	Meter	1018	1018	1018	1018	1018	1018	1018	1018	1018
	1200 MM DIA	Meter	1111	1111	1111	1111	1111	1111	1111	1111	1111
	1300 MM DIA	Meter	1189	1189	1189	1189	1189	1189	1189	1189	1189
	1400 MM DIA	Meter	1309	1309	1309	1309	1309	1309	1309	1309	1309
	1500 MM DIA	Meter	1453	1453	1453	1453	1453	1453	1453	1453	1453
	1600 MM DIA	Meter	1573	1573	1573	1573	1573	1573	1573	1573	1573
	1700 MM DIA	Meter	1771	1771	1771	1771	1771	1771	1771	1771	1771
	1800 MM DIA	Meter	1877	1877	1877	1877	1877	1877	1877	1877	1877
	1900 MM DIA	Meter	2048	2048	2048	2048	2048	2048	2048	2048	2048
	2000 MM DIA	Meter	2180	2180	2180	2180	2180	2180	2180	2180	2180
	CONVEYANCE	OF PRE	-STRES-SED	(CYLINDE	R TYPE) CC	NCRETE I	PIPIES AND	ACCESSO	RIES includin	g loading	at Factory,
3	un-loading at sit	e and stac	king for the fo	ollowing sizes	s. (Minimum o	distance of 1	00 KM to be	considered i	f the distance i	is less by 10	0 KM from
	factory to site)										
	400 MM DIA	Per	0.99	0.99	0.99	0.99	0.99	0.99	0.99	0.99	0.99
		KM/M									
	450 MM DIA	Per	0.99	0.99	0.99	0.99	0.99	0.99	0.99	0.99	0.99
		KM/M	1.42	1.42	1 12	1.42	1 42	1.42	1.40	1 12	1.40
	500 MM DIA	Per KM/M	1.43	1.43	1.43	1.43	1.43	1.43	1.43	1.43	1.43
	600 MM DIA	Per	1.65	1.65	1.65	1.65	1.65	1.65	1.65	1.65	1.65
	600 MM DIA	KM/M									
	700 MM DIA	Per	2.64	2.64	2.64	2.64	2.64	2.64	2.64	2.64	2.64
		KM/M]			

800 MM DIA	Per KM/M	2.64	2.64	2.64	2.64	2.64	2.64	2.64	2.64	2.64
900 MM DIA	Per KM/M	2.64	2.64	2.64	2.64	2.64	2.64	2.64	2.64	2.64
1000 MM DIA	Per KM/M	4.18	4.18	4.18	4.18	4.18	4.18	4.18	4.18	4.18
1100 MM DIA	Per KM/M	4.18	4.18	4.18	4.18	4.18	4.18	4.18	4.18	4.18
1200 MM DIA	Per KM/M	8.14	8.14	8.14	8.14	8.14	8.14	8.14	8.14	8.14
1300 MM DIA	Per KM/M	8.14	8.14	8.14	8.14	8.14	8.14	8.14	8.14	8.14
1400 MM DIA	Per KM/M	8.14	8.14	8.14	8.14	8.14	8.14	8.14	8.14	8.14
1500 MM DIA	Per KM/M	8.14	8.14	8.14	8.14	8.14	8.14	8.14	8.14	8.14
1600 MM DIA	Per KM/M	8.14	8.14	8.14	8.14	8.14	8.14	8.14	8.14	8.14
1700 MM DIA	Per KM/M	9.90	9.90	9.90	9.90	9.90	9.90	9.90	9.90	9.90
1800 MM DIA	Per KM/M	9.90	9.90	9.90	9.90	9.90	9.90	9.90	9.90	9.90
1900 MM DIA	Per KM/M	9.90	9.90	9.90	9.90	9.90	9.90	9.90	9.90	9.90
2000 MM DIA	Per KM/M	10.45	10.45	10.45	10.45	10.45	10.45	10.45	10.45	10.45

Note: The rates of PCCP pipes which were incorporated in the SSR are based on the following raw materials cost.

HT Wire: - Rs.58,000/- (including all taxes & freight)

HR Coil (Hot Rolled): - Rs.48,500/- (including all taxes & freight)

Cement Cost Rs. 4,100/-.per MT (including all duties, taxes & freight)

The rates may be revised depending upon the increase/ decrease in the cost of raw materials (landed price) as per the following method.

Revised Cost = Cost as per the above table +R1+R2+R3.

R1= Variation (increase / decrease) in cost (Rs. per metre) due to change in the cost of HT Wire =(H2-H1)/1000 X Wh.

R2= Variation (increase / decrease) in cost (Rs. per metre)due to change in the cost of HR Coil =(R2-R1)/1000 X Wr.

R3= Variation (increase / decrease) in cost (Rs. per metre) due to change in the cost of Cement = (C2-C1)/1000 X Wc.

H1 = Rs. 58,000/- H2 = Cost of HT Wire (Rs. Per MT including all taxes and freight) at the time of preparation of estimate.

R1 = Rs. 48,500/- R2 = Cost of HR Coil (Rs. Per MT including all taxes and freight) at the time of preparation of estimate . C1 = Rs. 4,100/- C2 = Cost of Cement (Rs. Per MT including all taxes and freight) at the time of preparation of estimate Wh=Weight of HT Wire required (Kg.) per metre of pipe. Wc= Weight of Cement required (Kg.) per metre of pipe. Wr = Weight of HR Coil required (kg) per metre of pipe.

Note: The duties and taxes as applicable shall be added as per rules at the time of preparation of estimate

13. Sorates for bar wrapped steel cylindrical (BWSC) pipes for the year 2013-14

Sl. No		Description										
1						2						
	BAR WRAPPI	ED STEEL C	YLINDRIC	CAL (BWSC)	PIPES CO		TO IS 1515	55 - 2002, Ex	-factory exc	luding trans	portation.	taxes and
1		AR WRAPPED STEEL CYLINDRICAL (BWSC) PIPES CONFORMING TO IS 15155 - 2002, Ex-factory excluding transportation, taxes and ities etc., for Bar wrapped steel cylindrical pipes.										
	Size	Unit	Rs.									
			4 -12	14	16	18	20	22	24	26	28	30
			Kg/cm ²									
	250 MM DIA	Meter	2788	2788	2788	2788	2788	2788	2791	2832	2864	3013
	300 MM DIA	Meter	3139	3139	3139	3139	3139	3187	3276	3400	3470	3650
	350 MM DIA	Meter	3801	3801	3801	3824	3868	3916	4021	4168	4294	4485
	400 MM DIA	Meter	4172	4172	4198	4268	4323	4529	4712	4900	5066	5726
	450 MM DIA	Meter	4602	4619	4701	4767	5009	5220	5476	5688	5923	6422
	500 MM DIA	Meter	5144	5220	5311	5576	5850	6150	6457	6723	7173	7619
	600 MM DIA	Meter	6799	6914	7037	7455	7870	8213	8676	9083	9650	10139
	700 MM DIA	Meter	8202	8447	9034	9605	10186	10765	11513	12033	12621	13419
	800 MM DIA	Meter	9327	10129	10858	11571	12338	13285	14096	15197	15915	16902
	900 MM DIA	Meter	11569	12102	13040	13969	14869	15636	17207	18471	19361	20647
	1000 MM DIA	Meter	13077	14378	15464	16546	17659	19189	21057	22528	23837	25503
	1100 MM DIA	Meter	18832	19182	19438	21342	23474	24966	27739	29186	31177	33854
	1200 MM DIA	Meter	20828	21493	22346	24618	27057	29186	31771	33146	37069	40709
2	Cost of laying	jointing, testi	ng to Hydr	ostatic field	test pressur	e including	cost of site w	velding and	fixing of Pol	ypropylene l	Diaher clot	h, cost of
	transportation	of water and	emptying p	ipe line after	completion	of field testi	ng.					
	250 MM DIA	Meter	253	253	253	253	253	253	253	253	253	253
	300 MM DIA	Meter	297	297	297	297	297	297	297	297	297	297
	350 MM DIA	Meter	352	352	352	352	352	352	352	352	352	352
	400 MM DIA	Meter	394	394	394	394	394	394	394	394	394	394
	450 MM DIA	Meter	394	394	394	394	394	394	394	394	394	394
	500 MM DIA	Meter	493	493	493	493	493	493	493	493	493	493
	600 MM DIA	Meter	605	605	605	605	605	605	605	605	605	605

											Public Health	ı Items
	700 MM DIA	Meter	705	705	705	705	705	705	705	705	705	705
	800 MM DIA	Meter	803	803	803	803	803	803	803	803	803	803
	900 MM DIA	Meter	944	944	944	944	944	944	944	944	944	944
	1000 MM DIA	Meter	1043	1043	1043	1043	1043	1043	1043	1043	1043	1043
	1100 MM DIA	Meter	1225	1225	1225	1225	1225	1225	1225	1225	1225	1225
	1200 MM DIA	Meter	1372	1372	1372	1372	1372	1372	1372	1372	1372	1372
	Conveyance o	f Bar Wrappo	ed steel Cyl	lindrical (BV	VSC) pipes a	and accessor	ies including	g loading at	Factory, un	-loading at		
3	site and stacki	ng for the foll	lowing sizes	s. (Minimun	n distance of	100 KM to	be considere	ed if the dist	ance is less	by 100 KM		
	from factory to	site)										
	250 MM DIA	Per KM/M	0.55	0.55	0.55	0.55	0.55	0.55	0.55	0.55	0.55	0.55
	300 MM DIA	Per KM/M	0.55	0.55	0.55	0.55	0.55	0.55	0.55	0.55	0.55	0.55
	350 MM DIA	Per KM/M	0.77	0.77	0.77	0.77	0.77	0.77	0.77	0.77	0.77	0.77
	400 MM DIA	Per KM/M	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88
	450 MM DIA	Per KM/M	1.21	1.21	1.21	1.21	1.21	1.21	1.21	1.21	1.21	1.21
	500 MM DIA	Per KM/M	1.43	1.43	1.43	1.43	1.43	1.43	1.43	1.43	1.43	1.43
	600 MM DIA	Per KM/M	1.54	1.54	1.54	1.54	1.54	1.54	1.54	1.54	1.54	1.54
	700 MM DIA	Per KM/M	1.76	1.76	1.76	1.76	1.76	1.76	1.76	1.76	1.76	1.76
	800 MM DIA	Per KM/M	2.31	2.31	2.31	2.31	2.31	2.31	2.31	2.31	2.31	2.31
	900 MM DIA	Per KM/M	2.31	2.31	2.31	2.31	2.31	2.31	2.31	2.31	2.31	2.31
	1000 MM DIA	Per KM/M	2.86	2.86	2.86	2.86	2.86	2.86	2.86	2.86	2.86	2.86
	1100 MM DIA	Per KM/M	6.93	6.93	6.93	6.93	6.93	6.93	6.93	6.93	6.93	6.93
	1200 MM DIA	Per KM/M	9.68	9.68	9.68	9.68	9.68	9.68	9.68	9.68	9.68	9.68

Note: The above rates of BWSC pipes are based on the following raw materials' cost.

HR Plates - Rs.48,500/- per MT (Basic +CED+ST & freight)

Wire rods - Rs.46,000/- per MT (Basic +CED+ST & freight)

Cement Cost Rs. 4,100/-.per MT (including all duties, taxes & freight)

The rates may be revised depending upon the increase/ decrease in the cost of raw materials (landed price) as per the following method.

Revised Cost =Cost as per the above table +R1+R2+R3.

R1= Variation (increase / decrease) in cost (Rs. per metre) due to change in the cost of HR Plate = (H2-H1)/1000 X Wh.

R2= Variation (increase / decrease) in cost (Rs. per metre) due to change in the cost of wire rods = $(W2-W1)/1000 \times Ww$.

R3= Variation (increase / decrease) in cost (Rs. per metre) due to change in the cost of Cement = (C2-C1)/1000 X Wc.

H1 = Rs. 48,500/- H2 = Cost of HR Plate (Rs. Per MT including all taxes and freight) at the time of preparation of estimate.

W1 = Rs. 46,000/- W2 = Cost of Wire rods (Rs. Per MT including all taxes and freight) at the time of preparation of estimate . C1 = Rs. 4,100/- C2 = Cost of Cement (Rs. Per MT including all taxes and freight) at the time of preparation of estimate Wh=Weight of HR Plate required (Kg.) per metre of pipe. Wc = Weight of Cement required (Kg.) per metre of pipe. Ww = Weight of wire rods required (kg) per metre of pipe.

Note: The duties and taxes as applicable shall be added as per rules at the time of preparation of estimate.

14. Sorates for M.S.Spiral pipes for the Year 2013-14

	14. SURATES FOR W.S.SPIRAL PIPE			
Sl.No.	Description	Unit	Thicknes s in mm	Rate (Rs.)
1	2	3	4	5
1	Manufacture, Supply and Delivery of			
	Spirally welded M.S Pipes Conforming to			
	IS 3589/2001 including in lining with			
	Cement motor(1:2)15mm thick using 4			
	numbers of 6mm dia M.S.Rings at each			
	end of the pipe and Out coating cement			
	motor(1:3)30mm thick by shorcreting or			
	Guniting duly providing wire mesh of			
	size 50x50x3mm including cost of all			
	materials,Labour charges, transportation			
	to anywhere in AP, but excluding taxes &			
	duties, etc.			
	500 MM DIA	Meter	8.00	8126
	600 MM DIA	Meter	8.00	9689
	700 MM DIA	Meter	8.00	11303
	700 MM DIA	Meter	10.00	14037
	800 MM DIA	Meter	8.00	12971
	800 MM DIA	Meter	10.00	14980
	800 MM DIA	Meter	12.00	17744
	900 MM DIA		8.00	14480
	900 MM DIA	Meter	10.00	16737
	900 MM DIA	Meter	12.00	18999
	1000 MM DIA	Meter	8.00	16254
	1000 MM DIA	Meter	10.00	18752
	1000 MM DIA	Meter	12.00	21169
	1000 MM DIA	Meter	14.00	24461
	1100 MM DIA	Meter	8.00	19173
	1100 MM DIA	Meter	10.00	
	1100 MM DIA		12.00	21921
		Meter		24672
	1100 MM DIA 1100 MM DIA	Meter Meter	14.00 16.00	28520 32383
	1100 ITMIT DATE	1,10,01	10.00	32303
	1200 MM DIA	Meter	8.00	21678
	1200 MM DIA	Meter	10.00	24665
	1200 MM DIA	Meter	12.00	27663
	1200 MM DIA	Meter	14.00	30676
	1200 MM DIA	Meter	16.00	34821
	1200 MM DIA	Meter	18.00	38978

1300 MM DIA	Meter	8.00	23659
1300 MM DIA	Meter	10.00	26891
1300 MM DIA	Meter	12.00	30135
1300 MM DIA	Meter	14.00	33387
1300 MM DIA	Meter	16.00	36654
1300 MM DIA	Meter	18.00	41019
1300 MM DIA	Meter	20.00	45398
	172001	20.00	
1400 MM DIA	Meter	8.00	25169
1400 MM DIA	Meter	10.00	28644
1400 MM DIA	Meter	12.00	32133
1400 MM DIA	Meter	14.00	35635
1400 MM DIA	Meter	16.00	39143
1400 MM DIA	Meter	18.00	43798
1400 MM DIA	Meter	20.00	48465
1400 MM DIA	Meter	22.00	53145
1500 MM DIA	Meter	8.00	26939
1500 MM DIA	Meter	10.00	30665
1500 MM DIA	Meter	12.00	34395
1500 MM DIA	Meter	14.00	38140
1500 MM DIA	Meter	16.00	41895
1500 MM DIA	Meter	18.00	45654
1500 MM DIA	Meter	20.00	50506
1500 MM DIA	Meter	22.00	55372
1500 MM DIA	Meter	24.00	60251
1600 MM DIA	Meter	8.00	28464
1600 MM DIA	Meter	10.00	32415
1600 MM DIA	Meter	12.00	36394
1600 MM DIA	Meter	14.00	40384
1600 MM DIA	Meter	16.00	44382
1600 MM DIA	Meter	18.00	48389
1600 MM DIA	Meter	20.00	53525
1600 MM DIA	Meter	22.00	58676
1600 MM DIA	Meter	24.00	63838
1600 MM DIA	Meter	26.00	69012
1700 MM DIA	Matan	9.00	20220
1700 MM DIA 1700 MM DIA	Meter Meter	8.00	30220 34431
1700 MM DIA	Meter	12.00	38654
1700 MM DIA	Meter	14.00	42888
1700 MM DIA	Meter	16.00	47129
1700 MM DIA	Meter	18.00	51384
1700 MM DIA	Meter	20.00	56835
1700 MM DIA	Meter	22.00	62301
1700 MM DIA	Meter	24.00	67776
1700 MM DIA	Meter	26.00	73267
1700 MM DIA	Meter	28.00	78768

1800 MM DIA	Meter	8.00	31990
1800 MM DIA	Meter	10.00	36447
1800 MM DIA	Meter	12.00	40915
1800 MM DIA	Meter	14.00	45397
1800 MM DIA	Meter	16.00	49879
1800 MM DIA	Meter	18.00	54380
1800 MM DIA	Meter	20.00	58888
1800 MM DIA	Meter	22.00	64539
1800 MM DIA	Meter	24.00	70203
1800 MM DIA	Meter	26.00	75876
1800 MM DIA	Meter	28.00	81565
1800 MM DIA	Meter	30.00	87263
1900 MM DIA	Meter	8.00	32516
1900 MM DIA	Meter	10.00	38202
1900 MM DIA	Meter	12.00	42910
1900 MM DIA	Meter	14.00	47634
1900 MM DIA	Meter	16.00	52368
1900 MM DIA	Meter	18.00	57113
1900 MM DIA	Meter	20.00	61862
1900 MM DIA	Meter	22.00	67794
1900 MM DIA	Meter	24.00	73737
1900 MM DIA	Meter	26.00	79694
1900 MM DIA	Meter	28.00	85661
1900 MM DIA	Meter	30.00	91642
1900 MM DIA	Meter	32.00	97632
2000 MM DIA	Meter	8.00	34015
2000 MM DIA	Meter	10.00	39956
2000 MM DIA	Meter	12.00	44914
2000 MM DIA	Meter	14.00	49880
2000 MM DIA	Meter	16.00	54857
2000 MM DIA	Meter	18.00	59848
2000 MM DIA	Meter	20.00	64840
2000 MM DIA	Meter	22.00	69808
2000 MM DIA	Meter	24.00	75918
2000 MM DIA	Meter	26.00	82038
2000 MM DIA	Meter	28.00	88173
2000 MM DIA	Meter	30.00	94316
2000 MM DIA	Meter	32.00	100473
2000 MM DIA	Meter	34.00	106640
2100 MM DIA	Meter	8.00	35733
2100 MM DIA	Meter	10.00	41971
2100 MM DIA	Meter	12.00	47174
2100 MM DIA	Meter	14.00	52374
2100 MM DIA	Meter	16.00	57607
2100 MM DIA	Meter	18.00	62839
2100 MM DIA	Meter	20.00	68080
2100 MM DIA	Meter	22.00	73334

2100 MM DIA				
2100 MM DIA	79750	24.00	Meter	2100 MM DIA
2100 MM DIA	86177	26.00	Meter	2100 MM DIA
2100 MM DIA	92616	28.00	Meter	2100 MM DIA
2100 MM DIA	99065	30.00	Meter	2100 MM DIA
2200 MM DIA	105528	32.00	Meter	2100 MM DIA
2200 MM DIA	112002	34.00	Meter	2100 MM DIA
2200 MM DIA Meter 10.00 43726	118487	36.00	Meter	2100 MM DIA
2200 MM DIA Meter 10.00 43726				
2200 MM DIA Meter 12.00 49175	37229	8.00	Meter	2200 MM DIA
2200 MM DIA Meter 14.00 54628 2200 MM DIA Meter 16.00 60097 2200 MM DIA Meter 18.00 65570 2200 MM DIA Meter 20.00 71058 2200 MM DIA Meter 22.00 76558 2200 MM DIA Meter 22.00 89956 2200 MM DIA Meter 28.00 96670 2200 MM DIA Meter 28.00 96670 2200 MM DIA Meter 30.00 103398 2200 MM DIA Meter 30.00 103398 2200 MM DIA Meter 34.00 110137 2200 MM DIA Meter 34.00 110137 2200 MM DIA Meter 34.00 110355 2200 MM DIA Meter 38.00 123652 2200 MM DIA Meter 38.00 130428 2200 MM DIA Meter 38.00 130428 2200 MM DIA Meter 10.00 45741 2300 MM DIA Meter 10.00 45741 2300 MM DIA Meter 16.00 62841 2300 MM DIA Meter 16.00 68565 2300 MM DIA Meter 20.00 74298 2300 MM DIA Meter 20.00 94037 2300 MM DIA Meter 23.00 10553 2300 MM DIA Meter 28.00 101053 2300 MM DIA Meter 38.00 122176 2300 MM DIA Meter 38.00 136318 2300 MM DIA Meter 38.00 34341 2400 MM DIA Meter 38.00 34340 2400 MM DIA M	43726	10.00	Meter	2200 MM DIA
2200 MM DIA	49175	12.00	Meter	2200 MM DIA
2200 MM DIA Meter 18.00 65570	54628	14.00	Meter	2200 MM DIA
2200 MM DIA	60097	16.00	Meter	2200 MM DIA
2200 MM DIA	65570	18.00	Meter	2200 MM DIA
2200 MM DIA Meter 26.00 89956 2200 MM DIA Meter 28.00 96670 2200 MM DIA Meter 30.00 103398 2200 MM DIA Meter 32.00 110137 2200 MM DIA Meter 34.00 116889 2200 MM DIA Meter 36.00 123652 2200 MM DIA Meter 38.00 130428 2300 MM DIA Meter 10.00 45741 2300 MM DIA Meter 12.00 51433 2300 MM DIA Meter 16.00 62841 2300 MM DIA Meter 16.00 62841 2300 MM DIA Meter 20.00 74298 2300 MM DIA Meter 20.00 74298 2300 MM DIA Meter 22.00 80037 2300 MM DIA Meter 26.00 94037 2300 MM DIA Meter 28.00 101053 2300 MM DIA Meter 30.00 108084 2300 MM DIA Meter 30.00 108084 2300 MM DIA Meter 32.00 115124 2300 MM DIA Meter 34.00 122176 2300 MM DIA Meter 34.00 122176 2300 MM DIA Meter 34.00 122176 2300 MM DIA Meter 36.00 143404 2400 MM DIA Meter 36.00 143404 2400 MM DIA Meter 36.00 143404 2400 MM DIA Meter 10.00 47494 2400 MM DIA Meter 10.00 47494 2400 MM DIA Meter 16.00 66222 2400 MM DIA Meter 22.00 84956 2400 MM DIA Meter 22.00 84956 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473 2400	71058	20.00	Meter	2200 MM DIA
2200 MM DIA	76558	22.00	Meter	2200 MM DIA
2200 MM DIA	89956	26.00	Meter	2200 MM DIA
2200 MM DIA Meter 32.00 110137	96670	28.00	Meter	2200 MM DIA
2200 MM DIA	103398	30.00	Meter	2200 MM DIA
2200 MM DIA	110137	32.00	Meter	2200 MM DIA
2200 MM DIA	116889	34.00	Meter	2200 MM DIA
2300 MM DIA Meter 10.00 45741	123652	36.00	Meter	2200 MM DIA
2300 MM DIA Meter 12.00 51433 2300 MM DIA Meter 16.00 62841 2300 MM DIA Meter 18.00 68565 2300 MM DIA Meter 20.00 74298 2300 MM DIA Meter 22.00 80037 2300 MM DIA Meter 26.00 94037 2300 MM DIA Meter 28.00 101053 2300 MM DIA Meter 30.00 108084 2300 MM DIA Meter 32.00 115124 2300 MM DIA Meter 34.00 122176 2300 MM DIA Meter 36.00 129241 2300 MM DIA Meter 38.00 136318 2300 MM DIA Meter 38.00 136318 2300 MM DIA Meter 40.00 143404 2400 MM DIA Meter 10.00 47494 2400 MM DIA Meter 16.00 60264 2400 MM DIA Meter 18.00 72186 2400 MM DIA <	130428	38.00	Meter	2200 MM DIA
2300 MM DIA Meter 12.00 51433 2300 MM DIA Meter 16.00 62841 2300 MM DIA Meter 18.00 68565 2300 MM DIA Meter 20.00 74298 2300 MM DIA Meter 22.00 80037 2300 MM DIA Meter 26.00 94037 2300 MM DIA Meter 28.00 101053 2300 MM DIA Meter 30.00 108084 2300 MM DIA Meter 32.00 115124 2300 MM DIA Meter 34.00 122176 2300 MM DIA Meter 36.00 129241 2300 MM DIA Meter 38.00 136318 2300 MM DIA Meter 38.00 136318 2300 MM DIA Meter 40.00 143404 2400 MM DIA Meter 10.00 47494 2400 MM DIA Meter 16.00 60264 2400 MM DIA Meter 18.00 72186 2400 MM DIA <				
2300 MM DIA Meter 16.00 62841 2300 MM DIA Meter 18.00 68565 2300 MM DIA Meter 20.00 74298 2300 MM DIA Meter 22.00 80037 2300 MM DIA Meter 26.00 94037 2300 MM DIA Meter 28.00 101053 2300 MM DIA Meter 30.00 108084 2300 MM DIA Meter 32.00 115124 2300 MM DIA Meter 34.00 122176 2300 MM DIA Meter 36.00 129241 2300 MM DIA Meter 38.00 136318 2300 MM DIA Meter 38.00 136318 2300 MM DIA Meter 40.00 143404 2400 MM DIA Meter 10.00 47494 2400 MM DIA Meter 12.00 53431 2400 MM DIA Meter 16.00 66222 2400 MM DIA Meter 18.00 72186 2400 MM DIA <	45741	10.00	Meter	2300 MM DIA
2300 MM DIA Meter 18.00 68565 2300 MM DIA Meter 20.00 74298 2300 MM DIA Meter 22.00 80037 2300 MM DIA Meter 26.00 94037 2300 MM DIA Meter 28.00 101053 2300 MM DIA Meter 30.00 108084 2300 MM DIA Meter 32.00 115124 2300 MM DIA Meter 34.00 122176 2300 MM DIA Meter 36.00 129241 2300 MM DIA Meter 38.00 136318 2300 MM DIA Meter 40.00 143404 2400 MM DIA Meter 10.00 47494 2400 MM DIA Meter 12.00 53431 2400 MM DIA Meter 16.00 60264 2400 MM DIA Meter 18.00 72186 2400 MM DIA Meter 20.00 78165 2400 MM DIA Meter 20.00 91732 2400 MM DIA <t< td=""><td>51433</td><td>12.00</td><td>Meter</td><td>2300 MM DIA</td></t<>	51433	12.00	Meter	2300 MM DIA
2300 MM DIA Meter 20.00 74298 2300 MM DIA Meter 22.00 80037 2300 MM DIA Meter 26.00 94037 2300 MM DIA Meter 28.00 101053 2300 MM DIA Meter 30.00 108084 2300 MM DIA Meter 32.00 115124 2300 MM DIA Meter 34.00 122176 2300 MM DIA Meter 36.00 129241 2300 MM DIA Meter 38.00 136318 2300 MM DIA Meter 40.00 143404 2400 MM DIA Meter 12.00 53431 2400 MM DIA Meter 16.00 60264 2400 MM DIA Meter 18.00 72186 2400 MM DIA Meter 20.00 78165 2400 MM DIA Meter 20.00 84956 2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA <t< td=""><td>62841</td><td>16.00</td><td>Meter</td><td>2300 MM DIA</td></t<>	62841	16.00	Meter	2300 MM DIA
2300 MM DIA	68565	18.00	Meter	2300 MM DIA
2300 MM DIA Meter 26.00 94037 2300 MM DIA Meter 28.00 101053 2300 MM DIA Meter 30.00 108084 2300 MM DIA Meter 32.00 115124 2300 MM DIA Meter 34.00 122176 2300 MM DIA Meter 36.00 129241 2300 MM DIA Meter 38.00 136318 2300 MM DIA Meter 40.00 143404 2400 MM DIA Meter 10.00 47494 2400 MM DIA Meter 12.00 53431 2400 MM DIA Meter 16.00 60264 2400 MM DIA Meter 18.00 72186 2400 MM DIA Meter 20.00 78165 2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473	74298	20.00	Meter	2300 MM DIA
2300 MM DIA Meter 28.00 101053 2300 MM DIA Meter 30.00 108084 2300 MM DIA Meter 32.00 115124 2300 MM DIA Meter 34.00 122176 2300 MM DIA Meter 36.00 129241 2300 MM DIA Meter 38.00 136318 2300 MM DIA Meter 40.00 143404 2400MM DIA Meter 10.00 47494 2400 MM DIA Meter 12.00 53431 2400 MM DIA Meter 14.00 60264 2400 MM DIA Meter 16.00 66222 2400 MM DIA Meter 18.00 72186 2400 MM DIA Meter 20.00 78165 2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473	80037	22.00	Meter	2300 MM DIA
2300 MM DIA Meter 30.00 108084 2300 MM DIA Meter 32.00 115124 2300 MM DIA Meter 34.00 122176 2300 MM DIA Meter 36.00 129241 2300 MM DIA Meter 38.00 136318 2300 MM DIA Meter 40.00 143404 2400 MM DIA Meter 12.00 53431 2400 MM DIA Meter 14.00 60264 2400 MM DIA Meter 16.00 66222 2400 MM DIA Meter 18.00 72186 2400 MM DIA Meter 20.00 78165 2400 MM DIA Meter 22.00 84956 2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473	94037	26.00	Meter	2300 MM DIA
2300 MM DIA Meter 32.00 115124 2300 MM DIA Meter 34.00 122176 2300 MM DIA Meter 36.00 129241 2300 MM DIA Meter 38.00 136318 2300 MM DIA Meter 40.00 143404 2400 MM DIA Meter 12.00 53431 2400 MM DIA Meter 14.00 60264 2400 MM DIA Meter 16.00 66222 2400 MM DIA Meter 18.00 72186 2400 MM DIA Meter 20.00 78165 2400 MM DIA Meter 22.00 84956 2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473	101053	28.00	Meter	2300 MM DIA
2300 MM DIA Meter 34.00 122176 2300 MM DIA Meter 36.00 129241 2300 MM DIA Meter 38.00 136318 2300 MM DIA Meter 40.00 143404 2400 MM DIA Meter 10.00 47494 2400 MM DIA Meter 12.00 53431 2400 MM DIA Meter 14.00 60264 2400 MM DIA Meter 16.00 66222 2400 MM DIA Meter 18.00 72186 2400 MM DIA Meter 20.00 78165 2400 MM DIA Meter 22.00 84956 2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473	108084	30.00	Meter	2300 MM DIA
2300 MM DIA Meter 36.00 129241 2300 MM DIA Meter 38.00 136318 2300 MM DIA Meter 40.00 143404 2400 MM DIA Meter 10.00 47494 2400 MM DIA Meter 12.00 53431 2400 MM DIA Meter 14.00 60264 2400 MM DIA Meter 16.00 66222 2400 MM DIA Meter 18.00 72186 2400 MM DIA Meter 20.00 78165 2400 MM DIA Meter 22.00 84956 2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473	115124	32.00	Meter	2300 MM DIA
2300 MM DIA Meter 38.00 136318 2300 MM DIA Meter 40.00 143404 2400 MM DIA Meter 10.00 47494 2400 MM DIA Meter 12.00 53431 2400 MM DIA Meter 14.00 60264 2400 MM DIA Meter 16.00 66222 2400 MM DIA Meter 18.00 72186 2400 MM DIA Meter 20.00 78165 2400 MM DIA Meter 22.00 84956 2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473	122176	34.00	Meter	2300 MM DIA
2300 MM DIA Meter 40.00 143404 2400 MM DIA Meter 10.00 47494 2400 MM DIA Meter 12.00 53431 2400 MM DIA Meter 14.00 60264 2400 MM DIA Meter 16.00 66222 2400 MM DIA Meter 18.00 72186 2400 MM DIA Meter 20.00 78165 2400 MM DIA Meter 22.00 84956 2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473	129241	36.00	Meter	2300 MM DIA
2400MM DIA Meter 10.00 47494 2400 MM DIA Meter 12.00 53431 2400 MM DIA Meter 14.00 60264 2400 MM DIA Meter 16.00 66222 2400 MM DIA Meter 18.00 72186 2400 MM DIA Meter 20.00 78165 2400 MM DIA Meter 22.00 84956 2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473	136318	38.00	Meter	2300 MM DIA
2400 MM DIA Meter 12.00 53431 2400 MM DIA Meter 14.00 60264 2400 MM DIA Meter 16.00 66222 2400 MM DIA Meter 18.00 72186 2400 MM DIA Meter 20.00 78165 2400 MM DIA Meter 22.00 84956 2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473	143404	40.00	Meter	2300 MM DIA
2400 MM DIA Meter 12.00 53431 2400 MM DIA Meter 14.00 60264 2400 MM DIA Meter 16.00 66222 2400 MM DIA Meter 18.00 72186 2400 MM DIA Meter 20.00 78165 2400 MM DIA Meter 22.00 84956 2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473				
2400 MM DIA Meter 14.00 60264 2400 MM DIA Meter 16.00 66222 2400 MM DIA Meter 18.00 72186 2400 MM DIA Meter 20.00 78165 2400 MM DIA Meter 22.00 84956 2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473	47494	10.00	Meter	2400MM DIA
2400 MM DIA Meter 16.00 66222 2400 MM DIA Meter 18.00 72186 2400 MM DIA Meter 20.00 78165 2400 MM DIA Meter 22.00 84956 2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473				
2400 MM DIA Meter 18.00 72186 2400 MM DIA Meter 20.00 78165 2400 MM DIA Meter 22.00 84956 2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473	60264		+	
2400 MM DIA Meter 20.00 78165 2400 MM DIA Meter 22.00 84956 2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473				
2400 MM DIA Meter 22.00 84956 2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473			+	
2400 MM DIA Meter 26.00 91732 2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473	78165	20.00	Meter	2400 MM DIA
2400 MM DIA Meter 28.00 98097 2400 MM DIA Meter 30.00 104473	84956	22.00	Meter	
2400 MM DIA Meter 30.00 104473		26.00	Meter	
	98097	28.00	Meter	2400 MM DIA
2400 MM DIA Meter 32.00 110858				
	110858	32.00	Meter	2400 MM DIA

	2400 MM DIA	Meter	34.00	117252
	2400 MM DIA	Meter	36.00	123660
	2400 MM DIA	Meter	38.00	130075
	2400 MM DIA	Meter	40.00	130536
	2400 MM DIA	Meter	42.00	136968
	2500 MM DIA	Meter	10.00	49513
	2500 MM DIA	Meter	14.00	61884
	2500 MM DIA	Meter	16.00	68085
	2500 MM DIA	Meter	18.00	74296
	2500 MM DIA	Meter	20.00	80516
	2500 MM DIA	Meter	22.00	86747
	2500 MM DIA	Meter	28.00	109499
	2500 MM DIA	Meter	30.00	117108
	2500 MM DIA	Meter	34.00	132358
	2500 MM DIA	Meter	36.00	140002
	2500 MM DIA	Meter	38.00	147657
	2500 MM DIA	Meter	40.00	155323
	2500 MM DIA	Meter	42.00	163002
	2500 MM DIA	Meter	44.00	170692
	2500 MM DIA	Meter	46.00	178394
	2600 MM DIA	Meter	12.00	57688
	2600 MM DIA	Meter	14.00	64127
	2600 MM DIA	Meter	16.00	70576
	2600 MM DIA	Meter	18.00	77030
	2600 MM DIA	Meter	20.00	83496
	2600 MM DIA	Meter	22.00	89970
	2600 MM DIA	Meter	32.00	129338
	2600 MM DIA	Meter	34.00	137247
	2600 MM DIA	Meter	36.00	145167
	2600 MM DIA	Meter	38.00	153099
	2600 MM DIA	Meter	40.00	161044
	2600 MM DIA	Meter	42.00	169000
	2600 MM DIA	Meter	44.00	176968
	2600 MM DIA	Meter	46.00	184947
	2600 MM DIA	Meter	48.00	192939
2	Cost of Laying, Jointing, Hydrostatic filed			· ·
	test pressure, including cost of site welding,			
	jointing materials and cost of transportation			
	of water including emptying pipe line after			
	completion of filed testing			
	400 MM DIA	Meter		435
	500 MM DIA	Meter		542
	600 MM DIA	Meter		667
	700 MM DIA	Meter		774
	800 MM DIA	Meter		883
	900 MM DIA	Meter		1038
	1000 MM DIA	Meter		1146
	1100 MM DIA	Meter		1348

1200 MM DIA	Meter	1510
1300 MM DIA	Meter	1735
1400 MM DIA	Meter	1997
1500 MM DIA	Meter	2295
1600 MM DIA	Meter	2639
1700 MM DIA	Meter	3033
1800 MM DIA	Meter	3489
1900 MM DIA	Meter	4013
2000 MM DIA	Meter	4616
2100 MM DIA	Meter	5309
2200 MM DIA	Meter	6104
2300 MM DIA	Meter	7019
2400 MM DIA	Meter	8072
2500 MM DIA	Meter	9283
2600 MM DIA	Meter	10676

The above rates of MS Spiral pipes are based on the following raw materials cost.

MS Plates = Rs 43,000/- Per MT.

The rates may be revised depending upon the increase/decrease in the cost of raw materials (landed price) as per the following method.

Revised Cost = Cost as per the above table " R_1 ".

R1= Variation (Increase/Decrease) in cost (Rs. Per meter) due to change in cost of MS Plates = $(M2-M1)/1000 \times Wm$

 $M_1 = Rs 43,000/-$

M₂= Cost of MS Plates (Rs. Per MT including all taxes and freight)

at the time of preparation of estimate

W_m=Weight of MS Plates required (Kg) per meter of pipe

Note: The duties and taxes as applicable shall be added as per rules at the time of preparation of estimate.

15. S.S. RATES FOR H.D.P.E PIPES FOR THE YEAR 2013-14. (PE - 80 Grade)

Sl.No	Description	4.0 kg/
1	2	sqcm 4
1	Manufacture, supply, & delivery of HDPE pipes conforming to IS 4984 - 1995 including transportation to any where in A.P, excluding excise duty, sale tax and specials etc., complete. (Supply upto 90 mm dia in coil & above 90 mm dia straight length in 6 M.)	7
	Rate per Meter	
	OD 20 mm	-
	OD 25 mm	-
	OD 32 mm	-
	OD 40 mm	37
	OD 50 mm	56
	OD 63 mm	77
	OD 75 mm	105
	OD 90 mm	151
	OD 110 mm	224
	OD 125 mm	290
	OD 140 mm	358
	OD 160 mm	468
	OD 180 mm	590
	OD 200 mm	724
	OD 225 mm	942
	OD 250 mm	1165
	OD 280 mm	1453
	OD 315 mm	1846
	OD 355 mm	2242
	OD 400 mm	2905
	OD 450 mm	3692
	OD 500 mm	4535
	OD 560 mm	5608
	OD 630 mm	7093
	OD 710 mm	9013
	OD 800 mm	11408
	OD 900 mm	14455
	OD 1000 mm	17800

Note: Excise duty, CST / VAT extra as applicable at the time of supply.

The IPCL resin cost adopted for the above rates are

For PE - 80 grade Rs.94,680/- per MT. (Excluding CED&ST)

The variation in cost of HDPE pipes due to increase / decrease in raw material cost shall be allowed as per the following price variation formula.

price variation formula as follows:

 $P2 = P1 + (A2 - A1)/1000 \times M \times 0.95$ (for increase in raw material cost)

 $P2 = P1 - (A1 - A2) / 1000 \times M \times 0.95$ (for decrease in raw material cost)

P2 = Revised pipe price in Rs. Per Meter excluding CED & ST

P1 = Existing pipe price in Rs. Per Meter excluding CED & ST

A2 = Revised price of raw material Rs. Per MT excluding CED & ST

A1 = Existing price of raw material Rs. Per MT excluding CED & ST

M = Weight of pipe in Kgs per Meter as per weight chart.

16(I). SoRATES FOR H.D.P.E PIPES FOR THE YEAR 2013-14. (PE - 100 Grade)

	(0(1): SURATES FOR 11:D.1 .E 1	6.0 kg/	8.0 kg/	10.0 kg/	12.5	16.0
Sl.	Description	sqcm	sqcm	sqcm	kg/	kg/
No	-	-	-	-	sqcm	sqcm
1	2	3	4	5	6	7
Ι	Manufacture, supply, & delivery of HDPE pipes					
	conforming to IS 4984 - 1995					
	including transportation to					
	any where in A.P, excluding					
	excise duty, sale tax and					
	specials etc., complete. (Supply upto 90 mm dia in					
	coil & above 90 mm dia					
	straight length in 6 M.)					
	Rate per Meter					
	OD 25 mm					38
	OD 32 mm			38	50	62
	OD 40 mm		49	58	75	95
	OD 50 mm	60	75	91	117	148
	OD 63 mm	91	116	140	185	230
	OD 75 mm	129	164	197	263	328
	OD 90 mm	183	234	280	374	476
	OD 110 mm	275	349	416	562	693
	OD 125 mm	351	450	540	721	891
	OD 140 mm	441	563	677	907	1124
	OD 160 mm	576	733	881	1182	1459
	OD 180 mm	725	928	1115	1492	1841
	OD 200 mm	896	1146	1375	1847	2274
	OD 225 mm	1158	1480	1781	2330	2873
	OD 250 mm	1425	1829	2199	2878	3547
	OD 280 mm	1786	2290	2751	3616	4456
	OD 315 mm	2264	2900	3484	4559	5636
	OD 355 mm	2841	3632	4370	5799	7170
	OD 400 mm	3742	4779	5736	7508	9255
	OD 450 mm	4647	5959	7166	9492	11646
	OD 500 mm	5747	7347	8838	11724	14019
	OD 560 mm	6663	8524	10189	13096	
	OD 630 mm	8399	10785	12907	15483	
	OD 710 mm	10685	13667	16394		
	OD 800 mm	13560	17352	20879		

OD 900 mm	17178	21966		
OD 1000 mm	21183			

Note:-

Excise duty, CST / VAT extra as applicable at the time of supply.

The IPCL resin cost adopted for the above rates are

For PE - 100 grade Rs.95,680/- per MT. (Excluding CED&ST)

The variation in cost of HDPE pipes due to increase / decrease in raw material cost shall be allowed as per the following price variation formula.

price variation formula as follows:

 $P2 = P1 + (A2 - A1) / 1000 \times M \times 0.95$ (for increase in raw material cost)

 $P2 = P1 - (A1 - A2) / 1000 \times M \times 0.95$ (for decrease in raw material cost)

P2 = Revised pipe price in Rs. Per Meter excluding CED & ST

P1 = Existing pipe price in Rs. Per Meter excluding CED & ST

A2 = Revised price of raw material Rs. Per MT excluding CED & ST

A1 = Existing price of raw material Rs. Per MT excluding CED & ST

M = Weight of pipe in Kgs per Meter as per weight chart.

16(II)HDPE PIPES –(PE –100 Grade) SEWER LINES FOR THE YEAR 2013-14

Sl. No	Description	6.0 kg/ sqcm	8.0 kg/ sqcm	10.0 kg/ sqcm	12.5 kg/ sqcm	16.0 kg/ sqcm
1	2	3	4	5	6	7
I	Manufacture, supply, & delivery of HDPE pipes conforming to IS 14333 - 2000 For using Under Ground Drainage and Sewerage Systems including transportation to any where in A.P, excluding excise duty, sale tax and specials etc., complete. (Supply upto 90 mm dia in coil & above 90 mm dia straight length in 6 M or 12 M.) Rate per Meter					
	Rate per Meter					
	OD 63 mm	99	126	151	179	214
	OD 75 mm	140	179	214	255	304
	OD 90 mm	200	256	305	362	438
	OD 110 mm	288	365	435	522	624
	OD 125 mm	368	471	563	668	806
	OD 140 mm	461	587	707	841	1011
	OD 160 mm	601	766	921	1078	1317
	OD 180 mm	757	972	1164	1384	1666
	OD 200 mm	938	1197	1435	1714	2053
	OD 225 mm	1182	1510	1817	2160	2602
	OD 250 mm	1459	1868	2242	2668	3205
	OD 280 mm	1824	2337	2795	3354	4025
	OD 315 mm	2309	2958	3589	4231	5089
	OD 355 mm	2926	3747	4509	5380	6456
	OD 400 mm	3868	4949	5942	7085	8498
	OD 450 mm	4883	6262	7526	8954	
	OD 500 mm	6035	7720	9282	11065	
	OD 560 mm	7545	9675	11646		
	OD 630 mm	9554	12247	14714		
	OD 710 mm	12389	15870			
	OD 800 mm	15717				
	OD 900 mm	19907				

Note:-

Excise duty, CST / VAT extra as applicable at the time of supply.

The IPCL resin cost adopted for the above rates are

For PE - 100 grade Rs.95,680/- per MT. (Excluding CED&ST)

The variation in cost of HDPE pipes due to increase / decrease in raw material cost shall be allowed as per the following price variation formula.

price variation formula as follows:

 $P2 = P1 + (A2 - A1) / 1000 \times M \times 0.95$ (for increase in raw material cost)

 $P2 = P1 - (A1 - A2) / 1000 \times M \times 0.95$ (for decrease in raw material cost)

P2 = Revised pipe price in Rs. Per Meter excluding CED & ST

P1 = Existing pipe price in Rs. Per Meter excluding CED & ST

A2 = Revised price of raw material Rs. Per MT excluding CED & ST

A1 = Existing price of raw material Rs. Per MT excluding CED & ST

M = Weight of pipe in Kgs per Meter as per weight chart.

17(I). SoRATES FOR H.D.P.E FITTINGS FOR THE YEAR 2013-14.

	Manufacture, supply, & delivery of H 4984 - 1995 including transportation excise duty, sale tax and specials etc., c	DPE fittings conforming to IS to any where in A.P, excluding	
I (a)	PIPE ENDS LONG NECK	Rate per Each	
	OD 50 mm		69
	OD 63 mm		87
	OD 75 mm		104
	OD 90 mm		135
	OD 110 mm		187
	OD 125 mm		336
	OD 140 mm		340
	OD 160 mm		474
	OD 180 mm		672
	OD 200 mm		864
	OD 225 mm		991
	OD 250 mm		1160
	OD 280 mm		1297
	OD 315 mm		1495
	OD 355 mm		3125
	OD 400 mm		4164
	OD 450 mm		6930
	OD 500 mm		7712
(b)	MS FLANGES	Rate per Each	
	OD 50 mm	_	108
	OD 63 mm		137
	OD 75 mm		173
	OD 90 mm		186
	OD 110 mm		196
	OD 125 mm		269
	OD 140 mm		292
	OD 160 mm		383
	OD 180 mm		540
	OD 200 mm		700
	OD 225 mm		875
	OD 250 mm		1033
	OD 280 mm		1172
	OD 315 mm		1379
	OD 355 mm		2335

	OD 400 mm	2896
	OD 450 mm	3781
	OD 500 mm	4329
(c)	END CAPS Rate per Each	
	OD 50 mm	46
	OD 63 mm	56
	OD 75 mm	70
	OD 90 mm	93
	OD 110 mm	106
	OD 125 mm	147
	OD 140 mm	171
	OD 160 mm	263
	OD 180 mm	426
	OD 200 mm	465
	OD 225 mm	485
	OD 250 mm	690
	OD 280 mm	706
	OD 315 mm	965
	OD 355 mm	1490
	OD 400 mm	2602
	OD 450 mm	4185
	OD 500 mm	7712
(d)	REDUCERS Rate per Each	
	OD 50 mm x 63 mm	65
	OD 63 mm x 75 mm	93
	OD 75 mm x 90 mm	152
	OD 90 mm x 110 mm	211
	OD 110 mm x 125 mm	321
	OD 125 mm x 140 mm	444
	OD 140 mm x 160 mm	620
	OD 160 mm x 180 mm	859
	OD 180 mm x 200 mm	1110
	OD 200 mm x 225 mm	1362
	OD 225 mm x 250 mm	1857
	OD 250 mm x 280 mm	2638
	OD 280 mm x 315 mm	3730
	OD 315 mm x 355 mm	4277
	OD 355 mm x 400 mm	6036

	OD 400 mm x 450 mm	6261
	OD 450 mm x 500 mm	8028
(e)	TEES Rate per Each	
	OD 50 mm	89
	OD 63 mm	142
	OD 75 mm	171
	OD 90 mm	301
	OD 110 mm	357
	OD 125 mm	537
	OD 140 mm	741
	OD 160 mm	1275
	OD 180 mm	1730
	OD 200 mm	2382
	OD 225 mm	3381
	OD 250 mm	4629
	OD 280 mm	6482
	OD 315 mm	9240
	OD 355 mm	13175
	OD 400 mm	19297
	OD 450 mm	27411
	OD 500 mm	37646
(f)	BENDS Rate per Each	
	OD 50 mm	56
	OD 63 mm	125
	OD 75 mm	162
	OD 90 mm	278
	OD 110 mm	366
	OD 125 mm	540
	OD 140 mm	711
	OD 160 mm	1061
	OD 180 mm	1523
	OD 200 mm	2063
	OD 225 mm	2926
	OD 250 mm	4011
	OD 280 mm	5783
	OD 315 mm	7998
	OD 355 mm	11087
	OD 400 mm	16723

	OD 450 mm	24586
	OD 500 mm	33332
II	Providing and fixing Electro fusion Ferrule Tapping Saddle confirming to prEN 12201-3, Manufactured from virgin resin of PE-80/PE-100 having blue/black colour using food grade compounded raw material with quality assurance certificate from quality agencies like DVGMK/KIWA/SPGN/WRc etc. for usage in drinking water system and having working pressure of 10 Bar. The cost shall include testing of all materials, labour all taxes (Central, State and Municipal), inspection charges, transportation upto site, transit insurance, loading, unloading, stacking, providing and fixing etc. complete as specified and directed	
	SIZE Rate Each	Rs.
	(Main pipe outer diameter in mm & Tapping size in Inches)	
	63x1/2"	797
	63 x3/4"	797
	63 x1"	797
	63 x1/2"	797
	75 x1/2"	797
	75 x3/4"	797
	75 x1	797
	90 x1/2"	797
	90 x3/4"	797
	90 x1"	797
	90 x 1 1/4"	1034
	90 x 1 1/2"	1034
	90 x2"	1034
	110x1/2"	797
	110 x3/4"	797
	110 x1"	797
	110 x 1 1/4"	1034
	110x1 1/2"	1034
	110x2"	1034
	160 x1/2"	797
	160 x3/4"	797
	160 x1"	797
	160 x 1 1/4"	1130
	160 x 1 1/2"	1130
	160 x 2"	1130
	200 x 1/2"	1126

200 x 3/4"	1126
200 x 1"	1126
200 x 1 1/4"	1628
200 x 2"	1628
250 x 1/2"	1126
250 x3/4"	1126
250 x1"	1126
250 x 1 1/4"	1628
250 x1 1/2"	1628
250 x 2"	1628
315 x 1/2"	1341
315 x3/4"	1341
315x1"	1341
315x1 1/4"	1820
315x1 1/2"	1820
315x2"	1820

18. Sorates for PVC PIPES for the YEAR 2013-14

	TEST PRESSURE					
Sl.	Descri	ption	2.5	4.0	6	10
No.	•		Kgs/cm ²	Kgs/cm ²	Kgs/cm ²	Kgs/cm ²
1	2		3	4	5	6
1	Manufacture, Supply and delivery of Unplasticised PVCs Pipes for potable water supplies conforming to IS: 4985/2000 (third revision) with bell ends (Socket) as per specification in light Grey/Natural Ivory Grey/ Any other Color (except White) inclusive of transportation to the sub-divisional stores anywhere in AP excluding Excise duty and Sales Tax etc.					
	DIA IN MM	Rate/Metre	Rs.	Rs.	Rs.	Rs.
	20					13
	25					19
	32					30
	40				28	47
	50				44	72
	63			48	69	105
	75			70	95	151
	90		63	96	137	213
	110		95	139	198	319
	125		124	181	253	417
	140		151	226	327	516
	160		201	298	422	678
	180		252	381	544	867
	200		320	463	662	1056
	225		413	612	885	1408
	250		497	714	1090	1718
	280		638	935	1376	2175
	315		804	1183	1729	2744
	355			1666	2417	
	400			2100	3076	

Note: The duties and taxes as applicable shall be added as per rules at the time of preparation of estimate.

The resin cost adopted for the above rates is Rs.65,325/- per MT(Basic rate, excluding CED)

The variation in cost of PVC pipes due to increase / decrease in raw material cost shall be allowed subject to the following price variation formula.

The price variation formula to be adopted is as follows:

 $P2 = P1 + (A2 - A1) / 1000 \times M \times 0.95$ (for increase in raw material cost)

 $P2 = P1 - (A1 - A2) / 1000 \times M \times 0.95$ (for decrease in raw material cost)

P2 = Revised pipe price in Rs. Per Metre, P1 = Existing pipe price in Rs. Per Metre

A2 = Revised price of raw material Rs. Per MT, A1 = Existing price of raw material Rs. Per MT M = Weight of pipe in Kgs per Meter as per weight chart.

19. Sorates for non-pressure P.V.C.U PIPES for the Year 2013-14

Code	Description	
No		
1	2	4
	Manufacture, supply, & delivery of Unplasticized Non- Pressure Polyvinyl Chloride(PVC-U) pipes of dark (any shade of Brown) for use in underground drainage &	Proposed Rates 2013-14
	sewerage system conforming to IS 15328/2003) with	2010 11
	solvent cement jointing as per specification inclusive of	
	transportation to the Sub-Divisional stores any where in	
	A.P, excluding Central Excise duty, Cess, & VAT etc.,	
	Rate per Meter	Rs.
	Pipe Series (S25)	
	OD 160 mm	263
	OD 200 mm	401
	OD 250mm	621
	OD 315 mm	980
	Pipe Series (S20)	
	OD 125 mm	204
	OD 160 mm	326
	OD 200 mm	495
	OD 250mm	772
	OD 315 mm	1212
	Pipe Series (S16.5)	
	OD 110 mm	180
	OD 125 mm	242
	OD 160 mm	378
	OD 200 mm	589
	OD 250mm	912
	OD 315 mm	1440

Note: The duties and taxes as applicable shall be added as per rules at the time of preparation of estimate.

The resin cost adopted for the above rates is Rs.65,325/- per MT (Basic rate, excluding CED)

The variation in cost of PVC pipes due to increase / decrease in raw material cost shall be allowed subject to the following price variation formula.

The price variation formula to be adopted is as follows:

 $P2 = P1 + (A2 - A1) / 1000 \times M \times 0.95$ (for increase in raw material cost)

 $P2 = P1 - (A1 - A2) / 1000 \times M \times 0.95$ (for decrease in raw material cost)

P2 = Revised pipe price in Rs. Per Metre

P1 = Existing pipe price in Rs. Per Metre

A2 = Revised price of raw material Rs. Per MT

A1 = Existing price of raw material Rs. Per MT

M = Weight of pipe in Kgs per Meter as per weight chart.

20. Sorates for non-pressure P.V.C.U PIPES for the Year 2013-14

Code	Description	
No		
1	2	4
	Manufacture, supply, & delivery of unplasticized Non-	Proposed
	Pressure Polyvinyl Chloride(PVC-U) pipes of dark (any	Rates
	shade of Brown) for use in underground drainage &	2013-14
	sewerage system conforming to IS 15328/2003) with	
	Elastomeric Seal Ring Joints (Ringtite PVC Pipes)as per	
	specification inclusive of transportation to the Sub- Divisional stores any where in A.P., excluding Central	
	Excise duty, Cess, & VAT etc.,	
	Excise duty, cess, & vai etc.,	
	Rate per Meter	Rs.
	Pipe Series (S25)	
	OD 160 mm	282
	OD 200 mm	427
	OD 250mm	664
	OD 315 mm	1045
	Pipe Series (S20)	
	OD 125 mm	220
	OD 160 mm	346
	OD 200 mm	526
	OD 250mm	821
	OD 315 mm	1288
	Pipe Series (S16.5)	
	OD 110 mm	192
	OD 125 mm	258
	OD 160 mm	404
	OD 200 mm	623
	OD 250mm	968
	OD 315 mm	1528

Note: The duties and taxes as applicable shall be added as per rules at the time of preparation of estimate.

The resin cost adopted for the above rates is Rs.65,325/- per MT (Basic rate, excluding CED) The variation in cost of PVC pipes due to increase / decrease in raw material cost shall be allowed subject to the following price variation formula.

The price variation formula to be adopted is as follows:

 $P2 = P1 + (A2 - A1) / 1000 \times M \times 0.95$ (for increase in raw material cost)

 $P2 = P1 - (A1 - A2) / 1000 \times M \times 0.95$ (for decrease in raw material cost)

P2 = Revised pipe price in Rs. Per Metre

P1 = Existing pipe price in Rs. Per Metre

A2 = Revised price of raw material Rs. Per MT

A1 = Existing price of raw material Rs. Per MT

M = Weight of pipe in Kgs per Meter as per weight chart.

21. Sorates for centrifugally cast (spun)iron pressure pipes

Sl. No.	Description	Unit	S.S. Rates for 2013-14		
1	2	3	4	5	6
I	SOCKET AND SPIGOT CENTRIFUGALLY CAST (SPUN) IRON PRESSURE PIPES FOR WATER, GAS AND SEWAGE CONFORMING TO SPECIFICATION NO: IS 1536/1989 (THIRD REVISION) WITH Amdt. No: 1 & 2 IN STANDARD LENGTHS OF 3.66 M, 4 M, 4.5M, 5 M, 5.5 M & 6 M AND DETAILS GIVEN BELOW, SUITABLE EITHER FOR LEAD JOINTING OR RUBBER GASKET (PUSHON) JOINTING AT PURCHASERS OPTION AT EX-FACTORY EXCLUDING TRANSPORTATION, TAXES & DUTIES.		LA Class (Rs)	A Class (Rs)	B Class (Rs)
	Nominal dia (in MM)		700	0.4.6	000
	80	Rmt	780	846	909
	100 125	Rmt	950	1043 1308	1115 1408
	150	Rmt	1198 1452	1508	1715
	200	Rmt	2120	2300	2490
	250	Rmt	2856	3111	3366
	300	Rmt	3684	4029	4364
	350	Rmt	4710	5110	5542
	400	Rmt	5734	6266	6763
	450	Rmt Rmt	6938	7623	8222
	500	Rmt	8203	8937	9668
	600	Rmt	10850	11845	12829
	700	Rmt	14276	15596	16851
	750		15989	17482	18964
	800	Rmt	17898	19501	21096
	900	Rmt	21810	27149	25784
	1000	Rmt	26202	28621	30936
	Conveyance of Centrifugally Cast (Spun) Iron Pressure Pipes and accessories including loading at Factory, un-loading at site and stacking for the following sizes. (The Minimum distance/lead in Km for destination below 100 Km to be taken as 100 Km)	Rmt	Class		
	SIZE IN MM UNIT		LA	A	В
	80 Per KM/RMT		0.22	0.22	0.22
	100 Per KM/RMT		0.22	0.22	0.22
	125 Per KM/RMT		0.33	0.33	0.33
	150 Per KM/RMT		0.33	0.33	0.33
	200 Per KM/RMT	<u> </u>	0.55	0.55	0.55

250	Per KM/RMT	0.66	0.66	0.66
300	Per KM/RMT	0.88	0.99	0.99
350	Per KM/RMT	1.21	1.21	1.32
400	Per KM/RMT	1.43	1.43	1.54
450	Per KM/RMT	1.65	1.76	1.87
500	Per KM/RMT	1.98	2.09	2.20
600	Per KM/RMT	1.98	2.09	2.20
700	Per KM/RMT	1.98	2.09	2.20
750	Per KM/RMT	3.30	3.52	3.74
800	Per KM/RMT	5.61	5.61	5.61
900	Per KM/RMT	5.61	5.61	5.61
1000	Per KM/RMT	5.61	5.61	5.61

Note: The duties and taxes as applicable shall be added as per rules at the time of preparation of estimate.

Price Variation Formula due to Increase / Decrease in the cost of pig iron.

P2=P1+(R2-R1)/1000*M*1.0

Where M= Weight of pipe in kg per metre.

P2 = Revised rate of pipe in Rs. per Rmt.

P1 = Rate of pipe in Rs. per Rmt. as per above table.

R2 = Price of Pig Iron(Rs per MT excluding CED&ST)) at the time of preparation of estimate.

R1 = Price of Pig Iron(Rs per MT excluding CED&ST) at the time of preparation of SSR =Rs. 27,500/-

22.S o RATES FOR DUCTILE IRON PRESSURE PIPES FOR THE YEAR2013-14

	S 0 RATES FOR DUCTILE IRON PRESSURE PI	Lord	S.S.			
Sl.	Description	Unit	fo			
No.	Description		2013			
1	2	3	4	5		
	CENTRIFUGALLY CAST (SPUN) DUCTILE IRON PRESSURE PIPES FOR					
	WATER, GAS AND SEWAGE WITH SOCKET SPIGOT ENDS CONFORMING					
	TO I.S.: 8329/2000 IN STANDARD WORKING LE	NGTHS	OF 4, 5 5.5 &	6 METER		
1	FOR CLASSIFICATION K9 & K7 SUITABLE FOR	R PUSH-0	ON-JOINT (F	RUBBER		
	GASKET D JOINTING) WITH CEMENT MORTA					
	WITH OUTSIDE ZINC COATING. RATES ARE 1	EX-FACT	TORY, EXCL	UDING		
	TRANSPORTATION, TAXES & DUTIES.	T	, ,			
	Nominal Dia in mm	Rmt	K7	K9		
	100	Rmt	868	1033		
	150	Rmt	1203	1528		
	200	Rmt	1676	2040		
	250	Rmt	2247	2677		
	300	Rmt	2886	3391		
	350	Rmt	3630	4227		
	400	Rmt	4405	5095		
	450	Rmt	5297	6096		
	500	Rmt	6312	7092		
	600	Rmt	8398	9354		
	700	Rmt	10864	12089		
	750	Rmt	12171	13567		
	800	Rmt	13453	14970		
	900	Rmt	16413	18257		
	1000	Rmt	19457	21645		
	1100	Rmt		23159		
	1200	Rmt		27073		
2	CENTRIFUGALLY CAST (SPUN) DUCTILE IRON WATER, GAS AND SEWAGE WITH PLAIN ENIILS.:8329/2000IN STANDARD WORKING LENGT FOR CLASSIFICATION K9 & K7 WITH CEMENT	DS CONI THS OF 4 T MORTA	FORMING TO , 5, 5.5 & 6 M AR LINING I	O IETER NSIDE		
	THE PIPES WITH OUTSIDE ZINC COATING. RA EXCLUDING TRANSPORTATION, TAXES & DU		E EA-FAUI(JK I ,		
	Nominal Dia in mm	1110.	K7	К9		
	100	Rmt	741	949		
	150	Rmt	1068	1393		
	200	Rmt	1514	1892		
	250	Rmt	1970	2512		
	300	Rmt	2592	3178		
	350	Rmt	3254	3949		
	400	Rmt	3937	4759		
	450	Rmt	4714	5624		
	500	Rmt	5610	6712		
	600	Rmt	7429	8664		
	700	Rmt	9832	10990		

750	Rmt	10996	12314
800	Rmt	12162	13596
900	Rmt	14706	16441
1000	Rmt	17483	19545
1100	Rmt		20810
1200	Rmt		24222
CENTRIFLIGALLY CAST (SPLIN) DIJCTILE IRON PR	FSSURF	PIES WITH F	LANGED

CENTRIFUGALLY CAST (SPUN) DUCTILE IRON PRESSURE PIES WITH FLANGED

(WELDED) ENDS FOR WATER, GAS, SEWAGE CONFORMING TO I.S.: 8329/2000 IN

STANDARD WORKING LENGTHS OF1,2,3, 4, 5 Mts FOR CLASSIFICATION K9 WITH

CEMENT MORTAR LINING INSIDE THE PIPES WITH OUTSIDE ZINC

COATING.RATESAREEX-FACTORY, EXCLUDING TRANSPORTATION, TAXES &

DUTIES.

Nominal Dia in mm		1.0 Mt. Length	2.0 Mt. Length
100	Each	3612	4712
150	Each	5109	6710
200	Each	6763	8948
250	Each	8832	11748
300	Each	11047	14730
350	Each	17290	21863
400	Each	21396	26920
450	Each	25838	32355
500	Each	31302	38953
600	Each	44305	54369
700	Each	52830	65599
800	Each	65134	80931
900	Each	77633	96733
1000	Each	99623	122328
		3.0 Mt.	4.0 Mt.
		Length	Length
100	Each	5810	6377
150	Each	8313	9255
200	Each	11136	12561
250	Each	14664	16597
300	Each	18409	20953
350	Each	26438	29046
400	Each	32445	35177
450	Each	38870	42008
500	Each	46606	50206
600	Each	64431	68731
700	Each	78370	84176
800	Each	96724	103984
900	Each	115834	124815
1000	Each	145034	154668
		5.0 Mt. Length	

	100	Each	7452	
	150	Each	10846	
	200	Each	14747	
	250	Each	19509	
	300	Each	24642	
	350	Each	33618	
	400	Each	40695	
	450	Each	48520	
	500	Each	57845	
	600	Each	78771	
	700	Each	96923	
	800	Each	119749	
	900	Each	148072	
	1000	Each	177330	
	Conveyance of Ductile Iron Pressure Pipes an			WELDED
4	accessories including loading at Factory, un	1-	Tleas	DOUBLE
4	loading at site and stacking for the following	ıg	Class	FLANGED
	sizes			PIPES
	SIZE IN MM UNIT	K7	К9	К9
	100 Per KM/RMT	0.22	0.22	0.33
	150 Per KM/RMT	0.33	0.33	0.44
	200 Per KM/RMT	0.33	0.44	0.66
	250 Per KM/RMT	0.44	0.55	0.88
	300 Per KM/RMT	0.66	0.66	1.10
	350 Per KM/RMT	0.77	0.88	1.32
	400 Per KM/RMT	0.88	0.99	1.54
	450 Per KM/RMT	1.10	1.21	1.87
	500 Per KM/RMT	1.32	1.43	2.20
	600 Per KM/RMT	1.87	1.87	2.86
	700 Per KM/RMT	2.75	2.75	4.18
	750 Per KM/RMT	3.30	3.30	5.06
	800 Per KM/RMT	5.61	5.61	8.36
	900 Per KM/RMT	5.61	5.61	8.36
	1000 Per KM/RMT	5.61	5.61	8.36
	1100 Per KM/RMT	5.61	5.61	-
	1200 Per KM/RMT	6.00	6.00	
_	Supply and Delivery of Polyethyler			
5	(PE)Sleeves for Ductile Iron Pipes used to	to		
	guard the pipe against corrosion. DIA IN MM			
	100 MM DIA		RMT	41.00
	150 MM DIA		RMT	50.00
	200 MM DIA		RMT	64.00
	250 MM DIA		RMT	74.00
	300 MM DIA		RMT	81.00
	JUU IVIIVI DIA		17141 1	01.00

	350 MM DIA	RMT	91.00
	400 MM DIA	RMT	127.00
	450 MM DIA	RMT	127.00
	500 MM DIA	RMT	154.00
	600 MM DIA	RMT	154.00
	700 MM DIA	RMT	200.00
	750 MM DIA	RMT	200.00
	800 MM DIA	RMT	200.00
	900 MM DIA	RMT	227.00
	1000 MM DIA	RMT	227.00
	1100 MM DIA	RMT	227.00
6	Additional price for HAC(high alumina cement		
0	motar lining)		
	DIA IN MM		
	100 MM DIA	RMT	50.00
	150 MM DIA	RMT	66.00
	200 MM DIA	RMT	81.00
	250 MM DIA	RMT	96.00
	300 MM DIA	RMT	104.00
	350 MM DIA	RMT	118.00
	400 MM DIA	RMT	162.00
	450 MM DIA	RMT	162.00
	500 MM DIA	RMT	200.00
	600 MM DIA	RMT	200.00
	700 MM DIA	RMT	256.00
	750 MM DIA	RMT	256.00
	800 MM DIA	RMT	256.00
	900 MM DIA	RMT	293.00
	1000 MM DIA	RMT	293.00
	1100 MM DIA	RMT	293.00

Note: The duties and taxes as applicable shall be added as per rules at the time of preparation of estimate

Price Variation Formula due to Increase / Decrease in the cost of pig iron.

P2=P1+ (R2-R1)/1000*M*0.96, Where

M = Weight of pipe in kg per metre as per I.S.8329-2000.

P2 = Revised rate of pipe in Rs. per Rmt.

P1 = Rate of pipe in Rs. per Rmt. as per above table.

R2 = Price of Pig Iron(Rs per MT excluding CED&ST)) at the time of preparation of estimate.

R1 = Price of Pig Iron(Rs per MT excluding CED&ST) at the time of preparation of SoR = Rs.27,500/-

23. Sorates for ductile iron fittings for the year 2013-14

Sl. No.	Description	Unit	
1	2	3	
	CENTRIFUGALLY CAST (SPUN) DUCTILE IROTO IS:9523/2000 HAVING DIMENTIONS AS MENTIONED HERE UNDER ARE FOR EXTERNALLY WITH INSIDE MORTAR LINING CLASS 13/IS 9523/2000) (Ex-works) Excluding transport	PER TABLE. T FITTINGS, ZING G (WITH FINISHI	THE RATES C COATED ING AS PER
I	DI double socket branch flange Tee		
	Upto 500 x 500 mm dia	Kg	92.00
	Above 500 x 500 mm dia	Kg	103.00
II	DI All Socket Tees		
	Upto 300 x 300 mm dia	Kg	92.00
	Above 300 x 300 mm dia	Kg	103.00
***	DID 11 1 (T) (D)		
III	DI Double socket Tapers (Reducer)	17	02.00
	Upto 500 x 450 mm dia Above 500 x 450 mm dia	Kg	92.00 103.00
	Above 500 x 450 mm dia	Kg	103.00
IV	DI Flanged Socket		
1 4	Upto 500 mm dia	Kg	92.00
	Above 500 mm dia	Kg	103.00
	120010000 111111 010	128	20000
V	DI Flanged Spigot		
	Upto 500 mm dia	Kg	92.00
	Above 500 mm dia	Kg	103.00
VI	DI Double Socket Duck Foot Bend		
	Upto 300mm dia	Kg	92.00
	Above 300mm dia	Kg	103.00
VII	DI Double Flange Duck/Foot bend	17	04.00
	Upto 300 mm dia	Kg	92.00
	Above 300 mm dia	Kg	103.00
VIII	DI All socket Cross.		
V 1111	Upto 300 x 300 mm dia	Kg	92.00
	Above 300 x 300 mm dia	Kg	103.00
			100100
IX	DI All Flange Tee		
	Upto 500 x 500 mm dia	Kg	92.00
	Above 500 x 500 mm dia	Kg	103.00
X	DI All Flange Cross		

	Upto 300 x 300 mm dia	Kg	92.00
	Above 300 x 300 mm dia	Kg	103.00
XI	DI Double Flange Reducer		
	Upto 500 x 450 mm dia	Kg	92.00
	Above 500 x 450 mm dia	Kg	103.00
XII	Blank Flange		
	Upto 500 mm dia	Kg	92.00
	Above 500 mm dia	Kg	103.00
XIII	Mechanical Joints		
	Upto 300 mm dia	Kg	92.00
	Above 300 mm dia	Kg	103.00
XIV	DI Double Socket Bends		
	Upto 500mm dia	Kg	92.00
	Above 500 mm dia	Kg	103.00
XV	DI Double Flanged Bends		
	Upto 500mm dia	Kg	92.00
	Above 500 mm dia	Kg	103.00

24. Sorates for Rubber Gaskets Suitable forc.i/ d.i. s/s pipes

Sl. No.	Description	Unit	S.S Rates For 2013-14
1	2	3	4
1	MANUFACTURE AS PER BIS 12820/89 WITH S.B.R. QUALITY RUBBER CONFIRMING TO BIS: 5382/85, SUPPLY AND DELIVERY OF RUBBER GASKETS SUITABLE FOR C.I./ D.I. S/S PIPES ANYWHERE IN A.P. F.O.R. DESTINATION DEPARTMENTAL STORES INCLUDING COST OF MATERIAL, LOADING, INCIDENTAL HANDLING WITH COMPANYS STANDARD PACKING, TRANSPORTATION, UNLOADING & STACKING BUT EXCLUDING CENTRAL EXCISE DUTY, SALES TAX, OCTROI AND OTHER GOVT. LEVIES ETC., COMPLETE.		
	80mm dia	Each	57
	100mm dia	Each	89
	125mm dia	Each	106
	150mm dia	Each	130
	200mm dia	Each	158
	250mm dia	Each	176
	300mm dia	Each	268
	350mm dia	Each	340
	400mm dia	Each	371
	450mm dia	Each	399
	500mm dia	Each	554
	600mm dia	Each	656
	700mm dia	Each	872
	750mm dia	Each	968
	800mm dia	Each	1161
	900mm dia	Each	1401
	1000mm dia	Each	1533

25.SoRATES FOR CI PIPES AND SPECIALS FOR THE YEAR 2013-14

Sl. No.	Description	Quality or sort	Rate/ Kg including packing, forwarding, transit risk and delivery any where in A.P. for the year 2013-14. Rs.
1	2	3	4
	MANUFACTURE, SUPPLY AND DELIVERY OF CAST IRON PIPES AND FITTINGS (Spls.) CONFORMING TO I.S. No. 7181/1986, 5531/1988, 3950/1979 AND C.I.D. JOINTS CONFIRMING TO IS No.8794/1988 AT SITE OF WORK ANYWHERE IN A.P. INCLUDING, LOADING, UNLOADING, TRANSPORTATION TO SITE OF WORK STACKING AT SITE TRANSIT RISK AND PACKAGE, EXCLUDING TAXES AND DUTIES.	I.S. No. 7181/1986 5531/1988 3950/1979 & 8794/1988	67.20

Foot Note: The rate of CI pipes, CI Specials and CID Joints etc., which are to be incorporated in the SSR are based on the following raw materials cost.

Pig Iron: Rs.27,500/- per M.T.(excluding CED, Tax & Fright)

Coke : Rs.37,000/- per M.T. .(Excluding CED, Tax & Fright)

The rates may be revised depending upon the increase/decrease in the cost of raw materials as per the following method. For every increase/decrease of Rs.1000/- in the cost of raw materials or part there of proportionately.

In respect of Pig Iron: The increase/decrease in cost of CI Specials per Kg is 3.43%.

In respect of coke: The increase/decrease in cost of CI Specials per Kg is 0.67%.

The above price is at site of work, Excise duty, CST/VAT extra as applicable at the time of supply.

26.SoRATES FOR WATER HAMMER CONTROL DEVICES FOR THE YEAR 2013-14 (Rate Each in Rs.)

		TEST PRESSURE					
Sl. No.	Description	10 Kgs/cm ²	15 Kgs/cm ²	20 Kgs/cm ²	25 Kgs/cm ²	Additional charges for Flanged ended valves	
1	2	3	4	5	6	7	
1	Manufacture, Supply and delivery of zero velocity valve/ PSLV with CI body with flanged ends as per AWWA, Ex-factory excluding transportation, Central Excise duty and sale tax etc., complete.						
	DIA IN MM						
	Rate/Each	Rs.	Rs.	Rs.	Rs.		
	150	66929	78125	82741	91017		
	200	69921	80408	86440	95082		
	250 300	78890	90723	97528	107281		
2	Manufacture, Supply and delivery of zero velocity valve/ PSLV with MS Fabricated Body with Plain ends. as per AWWA, Exfactory excluding transportation, Central Excise duty and sale tax etc. Complete	88781	102098	109758	120731		
	DIA IN MM Rate/ Each	Rs.	Rs.	Rs.	Rs.	Rs.	
	350	94560	108743	116899	128588	8193	
	400	104522	120199	129214	142141	9879	
	450	121567	139803	150288	165317	11806	
	500	140501	161574	173693	191063	12771	
	525/550	150914	171560	188951	207846	16505	
	600	168974	194319	208893	229783	23545	
	650	189147	208064	236496	255291	26626	
	700	220473	242640	275651	297698	31806	
	750	244206	268661	305288	329744	35709	
	800	297486	342111	367767	404541	40239	

	900	353581	406618	428896	480827	48673
	1000	428896	428896	428896	595998	61804
	1050	433185	433185	433185	627538	64277
	1100	546433	619611	675544	743100	71564
	1200	657681	723464	824180	887913	80960
	1400	986522	1085193	1236270	1331866	113850
	1500	1149467	1264402	1436801	1551618	116128
	1600	1172455	1289688	1465538	1582648	121441
3	Manufacture, Supply and delivery of Air Cushion valves / Quick Released damped Air Valves (QRDA) as per AWWA, Ex-factory excluding transportation, Central Excise duty and sale tax etc., complete.					
	DIA IN MM Rate/Each	Rs.	Rs.	Rs.	Rs.	
	100	61203	70385	77422	85161	
	150	93009	106960	117655	129421	
	200	99273	114163	125581	138138	
4	Conveyance of valves and accessories including loading at factory and unloading, stacking at site of work.	1				

27. Sorates for Cast Steel valves for the year 2013-14.

Sl.No.	Description	TEST PRESSURES				
1	2	3	4	5	6	
1	Manufacture, Supply and delivery of Cast Carbon Steel rising / Non rising spindle sluice valve design standard as per IS:14846/2000 for Water Supply Scheme with SS Spindle & SS Working parts the grade of Cast Steel for body Bonnet, Dome, Stool Cover, Wedge, Stuffing Box, Gland Thrust Plate, shall be as per IS: 1030 / 1989. (The valve shall be used for High pressure schemes & pumping stations) excluding transportation, Central Excise duty and sale tax etc., complete. ISI Marked	Class-150 Body 425PSI Seat 300 PSI PN-20	Class-300 Body 1100 PSI Seat 750 PSI PN-30 FOR Enclosed Gear Arranger		-	
	Rate/Each			Class 150	Class 300	
	DIA IN MM	Rs.	Rs.	Rs.		
	40	5456	10912			
	50	8990	16367			
	65	11251	20459			
	80	13494	24551			
	100	17997	32734			
	125	23081	41967			
	150	27004	49101			
	200	43613	88656	53379	97532	
	250	61385	139540	71150	148418	
	300	77543	176261	87308	185138	
	350	103400	235015	116716	247121	
	400	210045	477374	223361	489480	
	450	235434	524587	248751	536693	
	500	276982	629504	290298	641610	
	600	316220	717635	329537	729741	
	700	611668		624984		
	750	657831		676474		
	800	761699		780342		
	900	900191		918834		
	1000	1154091		1172733		
	1100	1246418		1265061		

	1200	1407990		1426633	
2	Manufacture, Supply and delivery of Cast Carbon Steel Bolted Cover Non Return Valve as per IS: 5312 / Part1 / 1984. Round body heavy duty material spec. As per IS:1030/1989 with SS Hinge & Seat Rings. excluding transportation, Central Excise duty and sale tax etc., complete				
	DIA IN MM Rate/Each Rs.	PN-20	PN-30		
	40	5424	9863		
	50	8071	14688		
	65	10087	18361		
	80	12105	22033		
	100	16609	29378		
	125	20774	37771		
	150	22841	41547		
	200	34623	75540		
	250	48472	125901		
	300	69245	157376		
	350	92328	209835		
	400	189271	430161		
	450	212353	482620		
	500	249284	566554		
	600	288522	655732		
3	Manufacture, Supply and delivery of Cast Steel Multi Door Type Non return Valve as per IS; 5312/ Part II / 1984 Heavy duty material spec. as per 1030/1989 with SS hinges & Seat Rings excluding transportation, Central Excise duty and sale tax etc., complete.	PN-20			
		Rate/Each			
	DIA IN MM	Rs.			
	500	419669			
	600	524587			
	700	629504			
	750	776389			

	800	1154091			
	900	1384909			
	1000	1510809			
	1100	1783595			
	1200	1804578			
	Manufacture, Supply and delivery of				
	Cast Steel D/F Butter fly Valves				
	conforming to IS; 13095/1991				
4	manually heavy duty Gear				
	operation, excluding transportation,				
	Central Excise duty and sale tax etc., complete.				
	DIA IN MM	PN-	PN-2.5		
	Rate/Each	1.0/1.6	114-2.3		
	300	80099	99850		
	350	107750	135401		
	400	129476	167879		
	450	156907	198602		
	500	178852	228228		
	600	208478	267729		
	700	326981	405983		
	750	405983	504735		
	800	445484	554111		
	900	504735	633113		
	1000	800993	998498		
	1100	998498	1294755		
	1200	1196003	1294755		
	1300	1601985	1788518		
	1400	1689765	1887270		
	1500	1788518	1986023		
	1600	2084775	2381033		
	1800	2578538	2776043		
	2000	3566063	3862320		
	Conveyance of valves and			_	
5	accessories including loading at		asic cost of		
	factory and unloading, stacking at	va	lves		
	site of work.				

28. SoRATES FOR DI D/F VALVES FOR THE YEAR 2013-14.Rate/Each in Rs.

G.	20. SURTIES FOR DID/I VILL VES FOR	TEST PRESSURE							
Sl.	Description	777.40		ESSURE					
No.	r. ·	PN 10	PN 16						
1	2	3	4	5	6				
	Manufacture, supply and delivery of Single Chamber DI Air Valve with Body and cover in								
	Ductile Iron of grade SG 400/12 or equivalent grad								
1	revisions. All internal parts such as float, shell etc.								
	Gaskets and seals of EPDM food grade quality Ep	poxy powde	er coating (E	P-P) inside a	and				
	outside colour blue. Drilled as per IS:1538.	DN 10	PN 16	PN 25					
	DIA IN MM 25 (Screwed End)	PN 10 8190	8190	<u>PN 25</u>					
	32 (Screwed End)	16290	16290						
	40 (Screwed End)	17100	17100						
	50	29421	29421	37856					
	80	39250	39250	39250					
	100	45825	45825	52698					
	150	55787	55787	63756					
	200	61100	61100	71062					
	300	99000	99000	109000					
	Manufacture, Supply and delivery of DI D/F Gate				d soft				
	sealing gate valves (Sluice valves) with body bonne								
	400/12 or equivalent grade as per I.S.3896-part2-19								
2	rubber lined with EPDM food grade quality and								
	vacuum tight and 100% leak proof with face to fac								
	2000/DIN 3202 F 4. All the valves should be with I								
	outside pocket less body passage. Drilled as per IS	:1538.							
	DIA IN MM	PN 10	PN 16	PN 25					
	50	7043	7043	11904					
	80	9020	9020	14676					
	100	11898	11898	16640					
	150	18734	18734	27755					
	200	31131	31131	46814					
	250	43117	43117	69534					
	300	65165	65165	112786					
	350	197300	197300	330048					
	400	206937	206937	335704					
	450 With By-pass & Gear	356020	356020	669213					
	500 With By-pass & Gear	378070	378070	710659					
	600 With By-pass & Gear	486846	486846	915124					
	ovo min by-pass & Geal	100010	100010	/ 1U 1 # T					

Manufacture, Supply and delivery of DI D/F <u>Butterfly Valves</u> with GGG40/SG 400/12 or Equivalent grade as per I.S.3896-part 2-1985 and subsequent revisions, Double eccentrically Disc., with renewable soft seal on the disc and Body seat face of stainless steel / nickel weld overlay, with powder or liquid Epoxy coating with minimum thickness of 250 microns applied on both body and disc inside and outside. Face to face dimensions as per AWWA C 504 or BS 5155 or IS:13095. Drilled as per IS: 1538/ISO

DIA IN MM	<u>PN 10</u>	<u>PN 16</u>	<u>PN 25</u>	<u>PN 40</u>
150	75082	75082	77505	102898
200	81776	84431	99204	125117
250	95280	98050	114844	175325
300	113690	117037	130541	184097
350	130079	141911	165283	200372
400	163837	185620	216115	306338
450	179864	199625	254237	
500	181574	214326	340822	378551
600	237977	336000	395590	414792
700	469808	495722	745049	
800	509329	530792	1087427	
900	666102	666102		
1000	834990	834990	1576839	
1100	960239			
1200	1118792	1118792	1761526	
1400	2404501	2404501		
1600	2867145	2867145		
1800	3516719	3516719		
2000	6007465	6007465		
2200	8672955	8672955		

Manufacture, Supply and delivery of DI D/F Swing Check Valves Slanted/Straight seated with metallic, corrosion proof and wear resistant seat faces resilient seat, Body and Disc of ductile cast iron GGG 40/SG Iron 420/12 or equivalent grade as per IS 3896(part2)-1985 and subsequent revisions. All the inside and outside of the body is to be coated with double coating of epoxy liquid. Drilled as per IS:1538. Specification and Dimensions as per I.S 5312 or equivalent codes.

DIA IN MM	PN 10	PN 16	<u>PN 25</u>	PN 40
100	29751	33056		
150	49958	55509		
200	75761	80268	117720	154085
250	83376	88426	142973	180660
300	104511	110727	174054	220520
350	123004	130385	197987	240723

	400	149422	158358	200473	260693	
	500	189984	201485	254087	334356	
	600	285042	302177	374567	484148	
	700	411426	448683	548435	695472	
	800	514432	560655	691554	876114	
	800	317732	300033	071334	0/0114	
5	Manufacture, supply and delivery of DI (Ductile In 13095-1991. With hand lever below 150 mm, with transportation, CED and taxes etc, completed	Worm gear	for 200 mm			
	DIA IN MM	<u>PN 10</u>	<u>PN 16</u>			
	40	5100	5100			
	50	5100	5100			
	65	5519	5519			
	80	6018	6595			
	100	8461	8771			
	125	10633	10633			
	150	14359	14670			
	200	19482	19482			
	250	25925	25925			
	300	36479	36479			
	350	44268	48022			
6	Manufacture and supply of- Air Release – Vacuum potable water. Construction material Cylindrical F Three cylindrical Floats of High Density Poly Ethy construction bolts of stainless steel, coating internal epoxy (1) Flange connection as per IS 1538, (2) Fermi	Body of Du lene. Bafflo lly and ext	ctile Iron GG e Plate, Orific ernally. Elec	GG-50/SG-50 ce venture a trostatically	00-7, nd all applied	
	DIA IN MM	PN 10	PN 16	PN 25		
	25 mm dia	13467	-	-		
	50 mm dia	-	43400	43400		
	80 mm dia	-	68087	68087		
	100 mm dia	-	75075	75075		
	150 mm dia	-	153962	153962		
	200 mm dia	-	231231	231231		
7	Manufacturer and supply of Metal Seated Gate Valve Non- Rising Stem with by-pass & gear operated, for water and sewage applications dimensions confirming to IS 14846-2000. Material construction Body, Bonnet, Wedge and Distance Piece of ductile iron GGG-50/SG500/7, DIN1693 or equivalent, Body seat, Wedge seat and Stem put of Aluminum Bronz					

per IS 1538			
DIA IN MM	PN 10	PN 16	
DN700	1247445	1247445	
DN800	1577213	1577213	
DN 900	1782891	1782891	
DN 1000	1997580	1997580	
DN 1100	3093809	3093809	
DN 1200	2721881	2721881	

NOTE:-All the prices are ex-go down /ex-factory. Excise duty and CST /Local Tax Extra as applicable at the time of supply. Packaging and Transportation extra at 5% on basic cost. The duties and taxes as applicable may be added as per rules at the time of preparation of estimate. The grade of DI & conformation to specifications shall be certified by a third party Quality Control Agency approved by indenting authority at the cost of supplier.

29. Sorates for SFRC Man-hole frame with covers for the year 2013-14 $\,$

Sl.No.	Description	Unit	SoRates for 2013-14.
1	2	3	4
I	Manufacture as per BIS:12592 (Part 1&2) Supply & Delivery of manhole covers and frames with ISI marking anywhere in A.P., F.O.R. destination including, loading, unloading & stacking at site but excluding central excise duty, sales tax, octroi and other Govt levies etc., as applicable. <u>I.S.I Mark</u>		Rs.
a)	M.D10 with 500mm dia clear opening	Each	1498
b)	H.D20 with 500mm dia clear opening	Each	1931
C)	H.D10with 560mmdia clear opening(New item)	Each	1515
d)	H.D20 with 560mm dia clear opening	Each	2071
e)	H.D35 with 560mm dia clear opening.	Each	2219
f)	24x24 MD 10	Each	1633
g)	24x18 MD 10	Each	1503
h)	24x24 HD 20	Each	1835
i)	24x18 HD 20	Each	1871
j)	Deviders 0.9 mtr.	Each	3842
II	Manufacture as per company's standard specification supply and delivery of encapsulated plastic steps for man holes anywhere in A.P. including cost of materials packing as per company's standards, loading, transportation, unloading and stacking at site of work etc, complete but excluding taxes such as sales tax, C.E.D and others etc., as applicable.	Each	158

30. SoRATES FOR CI and M.S. DISMANTLING JOINTS FOR THE YEAR 2013-14

	SORATES FOR CI and M.S. DISMANTLING JOINTS FOR T	Unit	2013-14.
Sl.No.	Description 2	3	2013-14. 4
1	Manufacture, Supply and delivery of CI Dismantling Joints	3	4
1	with both side flange end suitable for installation in between flange end pipes. These rates are excluding Excise duty, Taxes		Rs.
	and transportation charges etc., complete.		
	Nominal Dia. In MM 50	Each	3988
	80	Each	4365
	100	Each	5728
	125	Each	7365
	150	Each	8080
	200	Each	11458
	250	Each	13640
	300	Each	21825
	Manufacture, Supply and delivery of MS. Dismantling	Lacii	21023
	Joints with both side flange end suitable for installation in		
2	between flange end pipes. Thickness as per IS: 7322. These	Each	
_	rates are excluding Excise duty, Taxes and transportation		
	charges etc., complete		
	Nominal Dia. In MM		
	350		51762
	400		59314
	450		64351
	500		77021
	600		89624
	700		99706
	750		102229
	800		122394
	900		127690
	1000		152953
	1100		165580
	1200		190840
	1300		216097
	1400		241847
	1600		267156
	1800		316368
	2000		393705
•	Conveyance of joints and accessories including loading at		5% on basic
3	factory and unloading, stacking at site of work.		cost
Note:	The duties and taxes as applicable shall be added as per rules at the of estimate.	e time o	f preparation

31. OTHER ITEMS FOR THE YEAR 2013-14

Sl. No.	Description	Unit	S.S. Rates for 2013-14.
1	2	3	4
1	SUPPLY AND DELIVERY OF PIG LEAD 99.99 % PURE INCLUDING TAXES AND CONVEYANCE ETC., COMPLETE.	Per Kg	290
2	SUPPLY AND DELIVERY OF LEAD WOOL BEST QUALITY INCLUDING TAXES AND CONVEYANCE ETC., COMPLETE.	Per Kg	153
3	SUPPLY AND DELIVERY OF SPUN YARN OF BEST QUALITY INCLUDING TAXES AND CONVEYANCE ETC., COMPLETE.	Per Kg	116
4	SUPPLY AND DELIVERY OF RUBBER PACKING INCLUDING TAXES AND CONVEYANCE ETC., COMPLETE.		
	a) 3 mm thick	Per Kg	94
	b) 6 mm thick	Per Kg	94
5	SUPPLY AND DELIVERY OF BOLTS AND NUTS WITH DOUBLE WASHERS INCLUDING TAXES AND CONVEYANCE ETC., COMPLETE. (1/2" TO 1")	Per Kg	112

32. Sorates for Rubber Rings Suitable for SWG PIPES FOR THE YEAR 2013-14

Sl. No.	Description	Unit	S.S Rates For 2013-14
1	2	3	4
1	Manufacture Supply of Rubber Rings made with EPDM Rubber rings(seals according to EN681 AND ASTM425) suitable for SWG pipes confirming to IS No.651/1992 any where in A.P , FOR including cost of materials, loading, unloading , handling with company standard packing , transportation, unloading and stacking but excluding central excise duty and other taxes etc complete		
	100 mm dia	Each	48
	150 mm dia	Each	73
	200 mm dia	Each	109
	230 mm dia	Each	133
	250 mm dia	Each	169
	300 mm dia	Each	194
	350 mm dia	Each	230

33. Sorates for trench less technology with Pipe Jacking Method for the year 2013-14

Sl. No.	Description	Unit	S.S Rates For 2013-14
1	2	3	4
1	Railway crossing/road crossings/canal crossings by trenchless technology tunneling work through specialized pipe jacking method in co-ordination with concerned authorities for as per approved drawings, installing to correct level gradient and alignment by hydraulic pipe jacking technique complete including tunneling excavation drive and receive pits, excavation and all machines transportation charges and other required materials but excluding cost of encasing pipe		
	800 mm dia	Rmt	20000
	900 mm dia	Rmt	21000
	1000 mm dia	Rmt	22000
	1100 mm dia	Rmt	23000
	1200 mm dia	Rmt	24000
	1300 mm dia	Rmt	25000
	1400mm dia	Rmt	27000
	1500 mm dia	Rmt	30000

ANNEXURE

Copy of

GOVERNMENT OF ANDHRA PRADESH ABSTRACT

Mines and Minerals - Amendments to Rule 10 of the Andhra Pradesh Minor Mineral Concession Rules, 1966 - Orders - Issued.

·

INDUSTRIES AND COMMERCE (M.I) DEPARTMENT

G.O.Ms.No.198. Dated:13.08.2009

Read the following:

- 1. G.O.Ms.No.217, Industries & Commerce (M-I) Dept., dated 29-09-2004.
- 2. From the Director of Mines & Geology, File No.25395/MR/ 2007, Dated:29.9.2007.
- 3. G.O.Ms.No.104, Ind. & Com. (M.I) Department, dt.15.5.2009.

ORDER:

The following notification will be published in the Extra-Ordinary issue of the Andhra Pradesh Gazette dated 13.8.2009.

2. This order shall come into force with immediate effect.

NOTIFICATION

In exercise of the powers conferred by sub-section (1) of section 15 of the Mines and Minerals (Development & Regulation) Act,1957 (Central Act 67 of 1957), the Governor of Andhra Pradesh hereby makes the following amendments to the Andhra Pradesh Minor Mineral Concession Rules, 1966 issued in G.O.Ms.No.1172, Industries and Commerce(M-I) Department, dated 04-09-1967 and subsequently amended from time to time.

AMENDMENTS

In the said rules, Under Rule 10 for Schedules I and II the following shall be substituted, namely:

"<u>SCHEDULE</u> -I RATES OF SEIGNIORAGE FEE

Sl.No.	Name of the Minor Mineral	Unit	Rate of Seigniorage Fee (in Rupees)
1	2	3	4
1	Building Stone	M^3/MT	Rs.50/33
			(Rupees Fifty /Thirty Three)
2	Rough Stone/Boulders	M^3/MT	Rs. 50/33
			(Rupees Fifty /Thirty Three)
3	Road Metal & Ballast	M^3/MT	Rs. 50/33
			(Rupees Fifty /Thirty Three)
3(a)	Dimensional Stone	MT	Rs.88/-
	used for Kerbs & Cubes		(Rupees Eighty Eight)
4	Limekankar / Limestone	MT	The rate of Royalty as applicable
			to limestone (other than L.D.

Annexure-Seigniorage Charges – Common SoR 2013-14

			Grade) in respect of Major
			Mineral as per the 2nd Schedule
			of the Mines and Minerals
			(D&R) Act, 1957.
5	Lime Shell	MT	Rs.88/- (Rupees Eighty Eight)
6	Marble	M^3/MT	Rs. 165/66 (Rupees One hundred
			and Sixty Five/Sixty Six)
7	Mosaic Chips	MT	Rs. 44/- (Rupees Forty Four)
8	Muram/Gravel &	M ³ /MT	Rs. 22/14 (Rupees Twenty Two/
	Ordinary earth		Fourteen)
9	Ordinary sand/Sand manufactured from	\mathbf{M}^3	Rs. 40/- (Rupees Forty)
	Boulders useful for Civil construction		
10	Shingle	\mathbf{M}^3	Rs. 17/- (Rupees Seventeen)
11	Chalcedony Pebbles	MT	Rs. 33/- (Rupees Thirty Three)
12	Fullers Earth/Bentonite	MT	Rs. 110/- (Rupees One hundred
			and Ten) and Rs.44/- (Rupees
			Forty Four)
13	Shale/Slate	MT	Rs. 110/- (Rupees Hundred and
			Ten)
14	Rehmati	MT	Rs. 17/-(Rupees Seventeen)
15	Limestone slabs		
a(i)	Colour		Rs. 7/- (Rupees Seven) per Sq.
			Mt. or Rs. 88/-(Rupees Eighty
		-	Eight) per MT whichever is
			higher
(ii)	White		Rs. 5/-(Rupees Five)per Sq. Mt.
		-	or Rs. 55/-(Rupees Fifty Five)
			per MT. whichever is higher
(iii)	Black		Rs. 4/- (Rupees Four) per Sq.
			Mt. or Rs. 44/- (Rupees Forty
		-	Four) per Mt. whichever is
			higher
16	Ordinary clay, Silt and Brick Earth used		Rs. 3850/- (Rupees three
	in the manufacture of Bricks including		thousand eight hundred and fifty
	Mangalore tiles		only) per kiln per annum for
			Bricks and Tiles

17. Granite Useful for Cutting:

(Rates in Cubic Metre)

Item	Super Gang Saw above 300 CMX 180 CM. Size	Mini Gang Saw above 270 Cm X 150 Cm. & less than 300 Cm X 180 Cm Size	Below 270 Cm. X 150 Cm. size	Below 75 Cm. Size
------	---	---	---------------------------------------	----------------------

Annexure-Seigniorage Charges – Common SoR 2013-14

	Black Granite	Rs. 3300/-	Rs. 2625/-	Rs. 2475/-	Rs. 1100/-
	Galaxy Variety	(Rupees	(Rupees Two	(Rupees Two	(Rupees One
(a)		Three	thousand Six	thousand Four	thousand One
(a)		Thousand	hundred and	hundred and	hundred only)
		Three	twenty five	Seventy Five	
		hundred)	only)	only)	
	Black Granite other	Rs. 2475/-	Rs.2000/-	Rs.1,925/-	Rs.825/-
	than Galaxy	(Rupees Two	(Rupees Two	(Rupees One	(Rupees Eight
(b)	Variety	thousand	thousand	thousand Nine	hundred and
(D)		Four hundred	only)	hundred and	Twenty Five
		and Seventy		Twenty Five	only)
		Five only)		only)	
	Colour Granite	Rs. 2475/-	Rs.2000/-	Rs.1925/-	Rs.825/-
	Srikakulam Blue,	(Rupees Two	(Rupees Two	(Rupees One	(Rupees Eight
	Indian aurora of	thousand	thousand	thousand Nine	hundred and
(-)	Nizamabad Dist.,	Four hundred	only)	hundred and	Twenty Five
(c)	Leptinites of Coastal	and Seventy	• .	Twenty Five	only)
	Dists., Black pearl of	Five only)		only)	
	Praksam and Guntur	J ,		3,	
	Dists.				
	Colour Granite of	RS.1,925/-	Rs. 1625/-	Rs.1650/-	Rs.825/-
	other varieties	(Rupees One	(Rupees One	(Rupees One	(Rupees Eight
(4)		thousand	thousand Six	thousand Six	hundred and
(d)		Nine hundred	hundred and	hundred Fifty	Twenty Five
		and Twenty	Twenty five	only)	only)
		Five only)	only)		

SCHEDULE -II RATE OF DEAD RENT (PER HECTARE PER ANNUM)

Sl.	Name of the Minor Mineral	Rate of Dead Rent per
No.		hectare per Annum
01	Black Granite	Rs.55,000/- (Rupees fifty five
		thousand only)
02	Colour Granite	Rs.44,000/- (Rupees
		forty four thousand only)
03	Limestone other than classified as Major Minerals used	Rs.27,500/- (Rupees
	for Lime burning for building construction purposes,	twenty seven thousand
	Marble, Boulders, Building Stone Including Stone used	and five hundred only)
	for Road Metal, Ballast Concrete and other Construction	
	purposes, Shale, Slate and Phyllites, Mosaic Chips,	
	Fuller's Earth/Bentonite & Dimensional Stones used for	
	cubes & kerbs,	
04	Gravel, Morrum, Shingle, Limestone Slabs used for	Rs.16,500/- (Rupees
	Flooring purposes Limekankar, Chalcedeny pebbles used	sixteen thousand and five
	in the building purposes Limeshell for burning used for	hundred only)
	building purposes and Rehmatti.	

Annexure-Seigniorage Charges – Common SoR 2013-14

- **NOTE:-**1) The above rates are liable to be revised and amended from time to time by the State Government by notification in the Andhra Pradesh Gazette.
 - 2) In case of revision, the revised rates as fixed by Mines and Geology Department have to be adopted.