Tender Document "KNMT - 2022-2023"

PRICE BID

ParangipettaiTownPanchayat

NAME OF THE WORK : Construction of Modern LPG Crematorium at

Burial Ground survey No: 209-3 in Parangipettai

Town Panchayat

OFFICER INVITING BIDS : Executive officer,

Parangipettai Town Panchayat

Price BidDate :19.07.2022

InvitationforBidNo.[File No. 132/2022/A1

To:									
Executive officer, Parangipettai Town Panchayat,									
We, the undersigned, declare that:									
$(a) \ We have examined and have no reservation sto the Bid Documents.$									
(b) WeoffertoexecuteinconformitywiththeBidDocumentsfortheworkof"Constructionof Mode									
LPG Crematorium at Burial Ground survey No: 209-3 in Parangipettai Town									
Panchayatthe "KNMT - 2022-2023".									
(c) ThetotalpriceofourBid,excludinganydiscountsofferedinitem(d)belowis									
(i) Infigures:-Rs/- (ii) In Words:-Rupees									
(d) Thediscountsofferedare									
(i) Infigures:-Rs/- (ii) In Words:-Rupees									
(e) Thenetpriceofourbid, after discount offered in (d) above is									
(i) Infigures:-Rs/- (ii) InWords:-Rupeesonly									
(f) OurBidshallbevalidforaperiodof 90days fromthedatefixedforthebid submissiondeadlineinaccordancewiththeBiddingDocuments,anditshallremainbindinguponus andmaybeacceptedatanytimebeforetheexpirationof thatperiod.									

 $If our Bid is accepted, \\ remit Security Depositin accordance with the Bid Documents within the stipulated time.$

(g)

to

Schedule 'A'

Schedule Of Rates And Approximate Quantities

- 1) The quantities given here are those upon which the item rate tender cost of the work is based, but they are subject to alternations, omissions, deductions or addition as provided for in the conditions of this contract and do not necessarily show the actual quantities of work to be done. The unit rates quoted below are those governing payment for extras or deductions or omissions according to the condition of the contract, as set forth in the Standard Specifications for roads and bridges with the MORTH specifications and other condition of specifications of the contract.
- 2) It is to be expressly understood that the measured work is to be taken net (Not withstanding any custom or practice to the contrary) according to the actual quantities. When in places and finished according to the drawings, or as may be ordered from time to time by the Engineer in charge and the cost calculated by measurement or weight at the respective prices, without any additional charge for any necessary or contingent works concerned therewith. The rates quoted are for the finished works in situ and complete in every respect.
- 3) The description given in Schedule A are to indicate the item of work only and need not be construed as full specification. The quoted rate shall be for carrying out the item as per standards and specifications described in the relevant MORTH specification. The contractor shall take no advantage of any apparent error or omission in the Schedule A description.
- 4) The Tenderers should quote their rates for the quantity and units specified under metric units under Schedule 'A'.
- 5) The contractor should sign all the pages of schedule 'A' enclosed in the tender document without any omission. Otherwise the tender will be liable for rejection as per the rules.

Executive officer, Parangipettai Town Panchayat

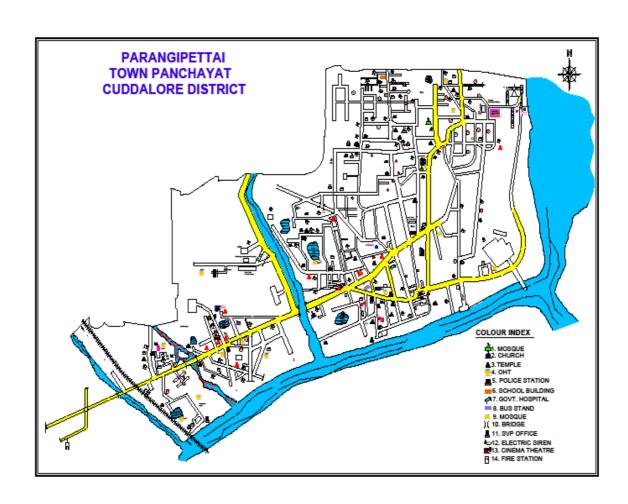
SCHEDULE 'A' (...Continued)

LEAD STATEMENT

S.No	Details of Materials	Location of Quarry	Lead in Kilometer
1	IRC & ISS HBG Metal	KottaiQuarry	77 km
2	Gravel	Vanathirayapuram	38 km
3	Bitumen	-	-
4	M.Sand	KottaiQuarry	77KM
5	Stone Dust	KottaiQuarry	77km
6	Cement, Steel	Local	-
7	Centering Materials	Local	-

SCHEDULE 'B'

SI. No.	Drawing No.	Description	Date on which drawing was approved
1	2	3	4
1		TOPO SKETCH	
2		CROSS SECTION	
3		TOWN MAP	



SECTION X Bill of Quantities COVER 'B ' ANNEXURE ' C' SCHEDULE OF QUANTITY AND RATES

Tender Schedule For The Work Of : Construction of Modern LPG Crematorium at Burial Ground survey No: 209-3 in Parangipettai Town Panchayat.

				SSR B		Rate		_
SL. No	Qty	Description of Items	Per	MDS S No	In figures	In Words	Unit Per	Amount in Rupees
1	2	3		4	5	6	7	8
1	259.57	Earth work excavation for foundation in Hard stiff clay, stiff black cotton, hard red earth, shalesmurram, gravel, stoney earth and earth mixed with small size boulders SS 20B and Sand, silt or other loose soil, wet sand, silt not under water, light black cotton soil, sandy loam ordinary soil and to full depth as may be directed except in hardrock requiring blasting inclusive of shoring shuttering and baling out water wherever necessary refilling the sides of foundation with excavated soil other than sand in layers of 15cm thick well rammed and completed, cleaning and levelling the site etc., complete - Footings - First Depth Upto 2.00M	m3				1 M3 (One Cubic Meter)	
2	31.43	Earth work excavation for foundation in Hard stiff clay, stiff black cotton, hard red earth, shalesmurram, gravel, stoney earth and earth mixed with small size boulders SS 20B and Sand, silt or other loose soil, wet sand, silt not under water, light black cotton soil, sandy loam ordinary soil and to full depth as may be directed except in hardrock requiring blasting inclusive of shoring shuttering and baling out water wherever necessary refilling the sides of foundation with excavated soil other than sand in layers of 15cm thick well rammed and completed, cleaning and levelling the site etc.,	m3				1 M3 (One Cubic Meter)	

		complete - Plinth Beam			
3	34.34	Supplying and filling in foundation and basement with filling m.sand in layers of not more than 15cm.thick well rammed watered and compacted etc., complete complying with standard specification.	m3		1 M3 (One Cubic Meter)
4	61.50	Plain Cement concrete 1:4:8 (one cement, four sand, eight aggregate) using 40mm gauge hand broken granite stone jelly for foundation including dewatering if found necessary and laid in layers of not more than 15 cm thick and compacted, etc., complete complying with standard specfication.	m3		1 M3 (One Cubic Meter)
5	334.71	Supplying and erecting steel centering including necessary supports for plane surfaces for Reinforced Cement Concrete works such as column footings, column pedestals, plinth beams, grade beams, staircase steps, etc. which require only nominal strutting using mild steel sheets of size 90cm x 60cm and 10 BG stiffened with welded mild steel angles of size 25mm x 25mm x 3 mm for boarding, laid over silver oak joists of size 10cm x 6.5cm spaced at about 75cm centre to centre or at suitable intervals etc. complete in all floors complying with standard specification- Plinth Beam	m2		1 M2 (One Square Meter)
6	282.16	Centering for soffits of RCC slabs of plane surface like lintels, beams ,etc.,including strutting 3m high using mild steel sheets of size 90cm X 60cm X and B.G 10 stiffened with M.S angles of size 25mm X 25mm X 3mm laid over silver Oak (C.W) joists of size 10cm X 6.5cm (spaced at about 90cm c/c)and supported dycasurina props of 10cm to 13cm dia (spaced of 75cm C/C) complying with standard specification and directed - For plane surfaces such as rectangular or square RCC columns, sunshades, top and bottom slab of RCC boxing, etc.	m2		1 M2 (One Square Meter)

7 46	65.10	Supplying and erecting centering for sides and soffits including necessary supports and strutting upto 3.29 M height for plane surfaces as detailed below in all floors with all cross bracings using Mild Steel sheets of size 90 x 60 cm and 10 BG stiffened with welded Mild Steel angle of size 25mm x 25mm x 3 mm for boarding laid over silver oak joists of size 10cm x 6.50 cm spaced at abote 90 cm centre to centre and supported by casurina props of 10cm to 13 cm dia spaced at not more than 75 cm centre to centre etc. complete complying with the standard specificaiton For plane surfaces such as RCC floor slab, roof slab, beams, lintels, bed blocks, landing slab, waist slab, portico slabs and beams, etc.	m2		1 M2 (One Square Meter)	
8 7	74.02	Providing and laying in position Standardised Concrete Mix M-20Grade in accordance with IS 456 - 2000 using 20mm and down graded hard broken granite stone jelly for all RCC items of works with minimum cement contenet of 325Kg/ cum and maximum water cement ratio of 0.55 including admixture (Plasticiser / super plasticiser) in recommended proportions as per IS 9103 to accelerate, related setting of concrete, improve workability without imparing strength and durability with about (5.0cum), 7730Kg of 20mm machine crushed stone jelly and with about (3.3 cum), 5156kg of 10 - 12mm machine crushed stone jelly and with about (4.79cum) 7670 kg of sand, but excluding cost of reinforcement grill and fabricating charges centering and shuttering but including laying, vibrating with mechanical vibrators, finishing, curing, etc and providing fixtures like fan clamps in the RCC floor / roof slabs wherever necessary without claiming extra cost etc., complete complying with standard specification and as directed by the departmental officers - The Coarse and Fine aggregates to be used should comply with the requirements of IS standards. (No separate payment will be made by the Department for the excess usage of materials) - Upto Basement	m2		1 M2 (One Square Meter)	

9	52.85	Providing and laying in position Standardised Concrete Mix M-20Grade in accordance with IS 456 - 2000 using 20mm and down graded hard broken granite stone jelly for all RCC items of works with minimum cement contenet of 325Kg/ cum and maximum water cement ratio of 0.55 including admixture (Plasticiser / super plasticiser) in recommended proportions as per IS 9103 to accelerate, related setting of concrete, improve workability without imparing strength and durability with about (5.0cum), 7730Kg of 20mm machine crushed stone jelly and with about (3.3 cum), 5156kg of 10 - 12mm machine crushed stone jelly and with about (4.79cum) 7670 kg of sand, but excluding cost of reinforcement grill and fabricating charges centering and shuttering but including laying, vibrating with mechanical vibrators, finishing, curing, etc and providing fixtures like fan clamps in the RCC floor / roof slabs wherever necessary without claiming extra cost etc., complete complying with standard specification and as directed by the departmental officers - The Coarse and Fine aggregates to be used should comply with the requirements of IS standards. (No separate payment will be made by the Department for the excess usage of materials) - Ground Floor	m2	1 M2 (One Square Meter)	
10	12.76	Supply and fabrication of steel required for all RCC items of works involved in the schedule, cost of steel at site fabrication, labour charges for cleaning the rods straightening, cutting, bending, tying grills, including overlapping to the required length whenever necessary and placing the reinforcement in position as as per design given and specified in the drawings, including cost of binding wire, provision of spacer bars, cover blocks and all other incidental charges etc complete as per standard specification	Mt	1 MT (One Metric Tone)	
11	157.79	Supplying and filling of well gravel by lorry in basement filling including conveyance loading and unloading charges and all other incidential charges filling laying watering and consolidation etc., complete as directed by the Dept., Officers with standard specification.	m3	1 M3 (One Cubic Meter)	

12	35.00	Damp proof course with Cement Mortar 1:4 (One Cement and Four sand) 12mm thick mixed with best approved quality water proofing compound conforming to Indian Standard specification as specified by the departmental officers at 2% by weight of cement used and finishing, curing etc. complete complying with standard specification.	m2		1 M2 (One Square Meter)
13	25.00	Brick work in CM 1:5 (one cement & Five sand) using II class ground moulded bricks of size 9"X4 ^{3/8} "X 2 ^{3/4} " standard specification including finishing, curing, etc., complete complying with standard specification (Masonry projections wherever necessary for obtaining required elevation shall be done without extra cost)- Upto Basement	m3		1 M3 (One Cubic Meter)
14	115.15	Brick work in CM 1:5 (one cement & Five sand) using II class ground moulded bricks of size 9"X4 ^{3/8"} X 2 ^{3/4"} standard specification including finishing, curing, etc., complete complying with standard specification (Masonry projections wherever necessary for obtaining required elevation shall be done without extra cost) - Ground Floor	m3		1 M3 (One Cubic Meter)
15	13.00	Brick work in CM 1:5 (one cement & Five sand) using II class ground moulded bricks of size 9"X4 ^{3/8"} X 2 ^{3/4"} standard specification including finishing, curing, etc., complete complying with standard specification (Masonry projections wherever necessary for obtaining required elevation shall be done without extra cost) - First Floor	m3		1 M3 (One Cubic Meter)
16	99.84	Brick Partition walls in CM 1:3 (one cement & three sand) using II class ground moulded bricks of size 9"X4 ^{3/8"} X2 ^{3/4"} using hoop iron reinforcement 2 Nos of 6mm diaM.S.rod at every three alternate layers and the cost shall inclusive of iron reinforcement, Brick work etc, complete as per standard specification - Ground Floor	m2		1 M2 (One Square Meter)
17	8.00	Brick Partition walls in CM 1:3 (one cement & three sand) using II class ground moulded bricks of size 9"X4 ^{3/8"} X2 ^{3/4"} using hoop iron reinforcement 2 Nos of 6mm diaM.S.rod at every three alternate layers and the cost shall inclusive of iron reinforcement, Brick work etc,	m2		1 M2 (One Square Meter)

		complete as per standard specification - First Floor				
18	5.80	Plain Cement Concrete 1:1.5:3 (one cement, one and half fine aggregates and three coarse aggregates) using 20mm size ISS HBG metal including cost and conveyance of all materials to site and including for the mixing, laying and labour charges and all incidential charges etc., complete as per standard specification	m3		1 M3 (One Cubic Meter)	
19	540.00	Supply and fixing of M.S Grills with Doors and Windows with one coat of Red oxide with Primer including all costs such as welding, grinding and fabrication charges, cost and conveyance of all materials to site etc, complete as per standard specification.	kg		1 Kg (One Kilo Gram)	
20	490.41	Special ceiling plastering in all floors and finishing the exposed surface of RCC items of work such as slab, beam, sunshade, facia, canopy slab, staircase waist slab, landing slab etc., with cement mortar 1:3 (One cement and three sand) 10mm thick including hacking the surfaces and providing cement mortar nosing, beading for sunshade, staircase, step, landing slab etc., including neat finishing and curing etc., complete complying with standard specification and as directed by the departmental officers.	m3		1 M2 (One Square Meter)	
21	33.00	Special ceiling plastering in all floors and finishing the exposed surface of RCC items of work such as slab, beam, sunshade, facia, canopy slab, staircase waist slab, landing slab etc., with cement mortar 1:3 (One cement and three sand) 20mm thick including hacking the surfaces and providing cement mortar nosing, beading for sunshade, staircase, step, landing slab etc., including neat finishing and curing etc., complete complying with standard specification and as directed by the departmental officers.	m3		1 M3 (One Cubic Meter)	

22	1299.97	Plastering with cement mortar 1:5 (One cement and five sand) 12mm thick in all floors including cost and conveyance of all materials to site etc, complete as per standard specifications	m2	1 M2 (One Square Meter)
23	19.96	Weathering Course with Concrete Broken Brick (S.I.No.278) & (P & D) Data 54.Jelly 20mm gauge in pure slaked lime (no sand to be added) over roof slab, the proportion of brick jelly to lime being '32 to 12.5 well beated with wooden beaters for giving required slope and thickness 80mm as directed by the departmental officers.etc., complete.	m3	1 M2 (One Square Meter)
24	245.00	Finishing the top of roof with one course of machine pressed tiles of size 200 mm x 200 mm x 20 mm of approved quality in Cement Mortar 1:3 (One Cement add three sand) 12 mm thick mixed with water proofing compound conforming to ISS at 2% by weight of cement used and the joints pointed neatly to full depth of tiles with the same cement mortar mixed with red oxide and water proofing compound including curing etc., complete	m3	1 M3 (One Cubic Meter)
25	19.41	Supply and fixing of PVC Solid Doors using 19gauge 19mm MS Sq,tubes for styles and frames, 15mm MS Sq.tubes for to, Lock and bottom rails. The Steel Tubes shall be covered with 5mm thick Solid PVC sheets. Shutter using 5mm thick solid PVC sheets for panelling shall rigidly fixed in position including furniture and fittings. The over all size of styles shall be 50mm X 30mm. The over all size of top rail, Lock rail and bottom rail shall be 75mm X 30mm. The over all size of frames shall be 50mm X 45mm with suitable tabate for housing the shutter etc, complete as per standard specification.	m2	1 M2 (One Square Meter)
26	12.00	Supplying and fixing of rolling shutters shall be pull and push type (Mannually operated) made of 18G/3" lathe sections which consist of five main parts such as curtain, lock plate, guide channels rollers and hood cover. These five main parts are made out of special components detailed below: curtain shall be of 18G/3" lath sections cut to required size and filled with heavy	m2	1 M2 (One Square Meter)

		cast iron / MS clips. For 8'0"(2.45m) high rolling shutter lath sections provided shall be not less than 37 numbers. Lock plate shall be 10G MS sheet and attached to the side brackets with 20mm square bar.Side brackets shall be of 10G MS plate and cast iron "U" clamps shall be rivetted to the side brackets. Roller shall be of heavy cast iron pullies fitted with heavy duty "C" class 40mm steel pipe and high tensile high carbon coil springs. 2 springs shall be supplied. Side brackets shall be of 10G MS plate and cast iron "U" clamps shall be rivetted to the side brackets. Hood cover shall be of 0.8mm CRCA sheet reinforced with 25mmx25mmx3mm MS angle or gate channel. The rolling shutter in addition to the above should have pulling hook and shall be coated on exposed area with heavy coat of red oxide primer etc., complete.				
27	2.92	Supplying & fixing door shutters for Solid Core Flush Shutters with Teak ply on both side with teak wood lipping alround 35mm thick, single leaf confirming to IS:12406/1989 with 35x12mm T.W. Lipping on all edges with necessary adhesives and CP screws complying with standard specifications. The rate is inclusive of threee coats of best quality varnish but excluding cost of furniture fittings, such as 300 mm tower bolt 2nos, 200mm towerbolt 1 No. 300mm Aldrop 1 No. Alu handle ornamental type 2 Nos and 1No. Door stopper etc complete.	m2		1 M2 (One Square Meter)	
28	5.40	Supply and fixing of Stainless steel (Salem stainless steel) Door frame (Box section using stainless steel plate of 1.6mm thick) of size 100mm X 60mm with a rebate of 30 / 35mm X 15mm on one side of the frame including supplying and fixing dovetail splayed end stainless steel holdfast etc.complete as per standard specification.	rm		1 Rm (One Running Meter)	
29	27.60	Supplying and fixing UPVC (Un-Plasticized Polyvinyl Chloride) Windows of casement type (open) from the profile the size of outer frame 60mm x 58mm and shutter profile are reinforcement with GI/1mm 25GSM and 100% corrosion free, the profiles are multi	m2		1 M2 (One Square Meter)	

		chambered sections with wall thick of 2mm. The EPDM rubber (black colour) covered with over all the edges of frame and shutter the shutter will be provided with spag multi power point locks and also it operates as handle. The corners and joints should be welded and cleaned. Radiations free pin headed plain or brown olour glass 4mm thick should be provided to the shutter and it should not allow leakage of water even at most ranging storms and should have key lockable action, security protective hinges, strong locking systems and as per size for arresting noise and energy loss. The connecting mechanism between sash and outer frame that enables opening of the window. The window should be fixed to the wall with 100% packing with screws and silicon packing all round the frames. The window should be got approved from the executive Engineer before use on work				
30	25.00	Manufacturing, Supplying and Fixing of Stainless Steel Hand rails for staircase using 50mm dia 304L Grade Stainless Steel pipe of 1.60mm thick at required locations to a height of 900mm from finished floor level welded to 38mm dia Stainless Steel pipe post of 1.00mm thick as vertical at 900mm centre with 2 Nos. of 25mm dia intermediate horizontal stainless steel pipe of 1.60mm thick in between. The vertical pipe has to be welded to the 100 X 100 X 6mm MS base plate encased in the base concrete. The rate is inclusive of the charges for cutting, bending, welding, grinding, polishing, conveyance, electrical charges, etc. complete	sqm		Square Meter	
31	1785.40	Painting two coats of newly plastered wall surface with approved cement paint over cement plastered wall surface, ceiling and including preparing the surface, clean removal of dirt and including necessary plaster of paris putty wherever required and cost of painting materials, brushes, preparation of surfaces and scaffolding charges etc., complete complying with standard specification and as directed by the departmental officer	m2		1 M2 (One Square Meter)	

32	68.60	Painting the new iron work with two coats of best approved first quality and colour of synthetic enamel paint over the existing red oxide priming coat in all floors excluding cost of priming coat and including cost of painting materials, brushes, putty, preparation of surfaces and scaffolding charges etc., complete complying with standard specification and as directed by the departmental officer.	m2		1 M2 (One Square Meter)
33	47.86	Painting two coats in all floors over the new wood work with Ready Mixed Paint of approved quality and colour with one coat of priming coat including cost of painting materials, brushes, putty, preparation of surfaces and scaffolding charges etc., complete complying with standard specification and as directed by the departmental officer	m2		1 M2 (One Square Meter)
34	198.00	Paving the floor with design Rajasthan kotta tiles (colour and shade as directed) of size 610 mm x 610mm x 20mm in all floors over a base layer of cement mortar 1:3 (one cement and three sand) 20mm thick laid in-situ and pointed with same coloured cement etc, complete as per standard specification.	m2		1 M2 (One Square Meter)
35	2.00	Plain Cement Concrete 1:8:16 (one cement eight fine aggregates and sixteen coarse aggregates) using 20mm size ISS HBG metal including cost and conveyance of all materials to site and including for the mixing, laying and labour charges and all incidential charges etc., complete as per standard specification	m3		1 M3 (One Cubic Meter)
36	25.00	Providing & fixing PVC RAIN WATER DOWNFALL PIPE of 110mm dia with necessary T.W.Clamps Plugs, Shoes,Bemds, other clamps, screws nails etc.,complete complying with standard specification. The rate is inclusive of cost of removable iron gratings of appropriate size. The size of Teak Wood plugs used is 150X25mm in front & 200x75mm in rear (wall side) with a depth of 110mm. The pipe is to be fixed by means of "U" clamps at the centre of pipes to be fixed.110mm dia PVC Pipe [4 Kg/SqCm]	rm		1 Rm (One Running Meter)

37	3.00	Supplying and fixing in position best quality approved make white glazed earthenware wash hand basin of size 550 X 400 mm with a pair of cast iron brackets, including cost of 15mm diametre brass chromium plated piller tape,32 mm diametre C.P. Waste union, 32 mm diametre P.V.C. waste pipe with rubber plug and chain, 15mm diametreG.M.wheel valve, 15mm dia brass nipple, 15mm dia nylon connections etc., including fixing the wash hand basin in the wall in position with a pair of C.I. brackets with teak wood plugs and screws and giving necessary water supply connection and paintiung the brackets with two coats of paint over a primimg coat of anticorrosive paint including testing for leackage etc., complete complying with standard specifications	no			1 No (One Number)	
38	3.00	Supplying and fixing in position White Glazed European Water Closet of best quality and approved make with 100mm 'P' os 'S" trap with Double flapped rigit P.V.C. seat cover with C.P. brass hinges with 12.5 litres PVC Low Level Flushing Tank with all internal fittings etc., complete complying with standard spoecifications, labor inclusive of fixing lowlevel flushing tank.	no			1 No (One Number)	
39	120.00	Supplying laying and jointing P.V.C pipes (6Kg/SqCm) of approved quality and best variety conforming to I.S.S & with I.S.I mark, of the following sizes including cutting, Fixing to PVC specials using Adhesive but excluding cost of such specials and fixing to wall with necessary teak - Wood Plugs,PVC Clamps and screws,making holes on the wall or drilling holes in roof and making good the dismantled portions to original condition with necessary brick work and plastering wherever necessary with necessary scaffolding charges.	RM			1 Rm (One Running Meter)	
A	120.00	25MM dia,PVC pipe	rm			1 Rm (One Running Meter)	

В	120.00	20mm dia.PVC pipe	rm		1 Rm (One Running Meter)
40	3.00	Supplying and fixing in position indian make bewelled edge mirror of approved quality and brand of size 600 X 450mm wth necessary plastic back, PVC frame with bottom stand of approved colour with brass screws,rawal plugs etc., complete complying with standard specifications.	no		1 No (One Number)
41	4.00	Supplying and fixing best approved quality Brass C.P anodised Towel rail 600mm. long and 20mm Diameter with brackets of same material including cost of Teak-Wood plugs and C.P.Screws etc., complete complying with standard specifications	no		1 No (One Number)
42	4.00	Supplying and fixing best approved quality C.P.Soap Tray of size 150mm X 100mm including cost of Teak Woodplugs, brass screws complete complying with standard specifications.	no		1 No (One Number)
43	9.00	Supply and fixing of PVC. Nahini / Floor Trap with stainless Steel Gratings - 100 mm x 75 mm including all charges etc, complete as per standard specification.	no		1 No (One Number)
44	120.00	Supplying laying and jointing G.I. Pipes of approved quality and best varity of B Class pipe of 25mm dia size including fixing G.I specials but excluding cost of such specials cutting threading of pipes and fixing to wall with necessary teak wood plugs, clamps and screws masking holes on the wall or drilling holes in roof and making good the dismandled portions to original conditions with necessary brick work and concrete and plastering where ever necessary with necessary scafolding charges. The pipes are to be painted with two coats of good variety and best approved quality of synthetic enamel paint over a priming coat of red-oxide primer etc., complete.	rm		1 Rm (One Running Meter)

45	5.00	Supplying and fixing in position first quality and approved variety of Gun Metal Gate Valve (Heavy type) with I.S.I.mark of 25mm dia size including cost of Shellac , thread etc,.including labour for cutting and threading of G.I.Pipesetc.,complete complying with standard specifications for both internal and external water Supply arrangements.	no			1 No (One Number)	
46	9.00	Suppling and fixing in position 15mm.diameter brass screw down tap (heavy duty) of approved make conforming to I.S.specifications and quality including cost of shellac, thread etc.complying with standard specifications and including cutting and threading wherever necessary.	no			1 No (One Number)	
47		Supply and fixing of following Plumbing G.I.materials including cost and conveyance of all materials etc,, completed as per standard specification					
A	3.00	15mm dia G.I Tee	no			1 No (One Number)	
В	3.00	15mm dia G.I Elbow	no			1 No (One Number)	
С	8.00	20mm dia G.I coupling	no			1 No (One Number)	
D	3.00	20mm dia G.I Tee	no			1 No (One Number)	

Е	8.00	20mm dia G.I Elbow	no			1 No (One Number)	
F	8.00	20mm dia G.I Bend	no			1 No (One Number)	
G	6.00	20mm dia G.I union	no			1 No (One Number)	
Н	3.00	25mm dia G.I coupling	no			1 No (One Number)	
I	3.00	25mm dia G.I Tee	no			1 No (One Number)	
J	3.00	25mm dia G.I Elbow	no			1 No (One Number)	
К	3.00	25mm dia G.I Bend	no			1 No (One Number)	

L	1.00	25mm dia G.I union	no		1 No (One Number)	
М	3.00	20mm X 15mm dia G.I Reducer	no		1 No (One Number)	
N	3.00	20mm X 15mm dia G.I Reducer Elbow	m		1m (one meter	
0	3.00	25mm X 20mm dia G.I Reducer	no		1 No (One Number)	
P	3.00	20mm X 15mm dia G.I Reducer Tee	no		1 No (One Number)	
Q	10.00	50mm GI pipe	no		1 No (One Number)	
R	5.00	50mm GI Elbow	no		1 No (One Number)	

S	5.00	50mm GI tee	no		1 No (One Number)	
Т	5.00	50mm GI Coupling	no		1 No (One Number)	
U	5.00	50mm GI Union	no		1 No (One Number)	
V	5.00	50mm GI bend	m		1m (one meter)	
W	5.00	20mm GM Value	no		1 No (One Number)	
X	5.00	20mm GI Hex nipple	no		1 No (One Number)	
Y	10.00	20mm GI pipe	no		1m (one meter)	

Z	5.00	20mm GI Tee	no		1 No (One Number)	
48		Supplying and fixing in position P.V.C. specials such as plain bend, door bend, plain tee, door tee, offsets, Y-junction, plain or with door of various sizes best quality confirming to I.S.S and providing leakproof joints including fixing to wall and giving connection to the P.V.C, soil stacks, dismadling the brick masonry or R.C.C. floor or Roof slab and redoing the dismandled portion to original condition etc., complete complying with standard specifications.				
A	2.00	110mm dia PVC Elbow	no		1 No (One Number)	
В	2.00	110mm dia PVC Tee	no		1 No (One Number)	
С	2.00	110mm dia PVC Door Elbow	no		1 No (One Number)	
D	2.00	110mm dia PVC Door Tee	no		1 No (One Number)	

Е	2.00	110mm dia PVC Door Yee	no				1 No (One Number)	
F	2.00	90mm dia PVC Elbow	no				1 No (One Number)	
G	2.00	90mm dia PVC Tee	no				1 No (One Number)	
Н	2.00	90mm dia PVC Door Elbow	no				1 No (One Number)	
I	2.00	90mm dia PVC Door Tee	no				1 No (One Number)	
J	2.00	90mm dia PVC Door Yee	no				1 No (One Number)	
49		Supplying and fixing in position best quality P.V.C soil/ waste pipes (6KSC) of various sizes having ISI mark and providing leakproof joints including fixing to the wall with P.V.C/ M.S clamps etc., and making connection to all sanitary fittings, dismandling masonry/R.C.C. works wherever necessary and making good the dismandled portion to the original condition, complying with standard specifications.						
			,	25	ı I	Didde	r's Signat	

A	40.00	110mm dia PVC 6KSC Pipe	rm		1 Rm (One Running Meter)	
В	40.00	90mm dia PVC 6KSC Pipe	rm		1 Rm (One Running Meter)	
50	50.00	Supply and laying of 3.5 X 35 Sq.mm PVC armoured LTUG cable in a trench to be excavated at a depth of 0.75 metre putting 0.15 mt. Layer of sand and covering the cable completely with bricks and sand and refilling the earth to make good.	rm		1 Rm (One Running Meter)	
51	40.00	Wiring with 2 x 1.5 sqmm (22 /0.3) PVC insulated single core unsheathed copper conductor cable of 1100V grade in suitable PVC rigid pipe concealed in wall and ceiling with PVC accessories inflush with wall with 3mm thick hylum sheet cover with TW switch box and 5A F.T. switch with continuous earth wire connection of 14 SWG TC wire for making good of the concealed portion with suitable colour for PVC concealed light point / Fan point (For Electronic regulator). SD 23	pt		1 Pt (One Point)	
52	7.00	Wiring with 2 x 1.5 sqmm (22 $/0.3$) PVC insulated single core unsheathed copper conductor cable of 1100V grade in suitable PVC rigid pipe concealed in wall and ceiling with PVC accessories inflush with wall with 150 x 100 x 113 mm TW switch box with 3mm hylum sheet cover for 5A 3 pin non inter locking CS plug with continuous earth wire connection of 14 SWG TC wire and making good of the concealed portion with suitable colour for concealed PVC plug point. SD 38	pt		1 Pt (One Point)	
53	150.00	Supply and run of 2 of 1.5 sqmm (22/0.3) PVC insulated SC unsheathed Cu.Conductor of 1100V grade in suitable PVC rigid pipe concealed in wall and ceiling with continuous earth wire connection of 14 SWG TC wire and making good of the concealed portion with suitable colour. SD 54	rm		1 Rm (One Running Meter)	

54	25.00	SUPPY AND FIXING OF 30W LED FITTING LIGHTS EMITTING DIODE ETC,, COMPLRTE AS STANDARD SPECIFICATION PAGE NO 13	no	(0	No One mber)
55	3.00	Earthing as per P.W.D. standard with an earth electrode of 2Mtr. Class 'B' GI pipe of dia not less than 32mm complete with necessary masonry work.SD 234	no	(0	No One mber)
56	1.00	Supply and fixing of 3 phase 4 wire 4 way ICDB of 32 A per way with 100 A TPN MC switch with suitable trunking box Ms cable entry boxes and internal connection on suitable angle iron frame work with earth connection SD. 175	no	(0	No One mber)
57	2.00	Supply and fixing of Horizontal type 4 way triple pole neutral MCB distribution board in sheet steel enclosure with 40 A 4 pole MCB isolater as incoming and 12 Nos. 6A to 32 A SP MCB as outgoing in flush with wall and making good of the concealed portion with earth connection. The MCBDB and MCB's should be with the ISI mark (lik standard make) SD. 179	no	(0	No One mber)
58	30.00	Supply and run of 2 of No.8 SWG GI wire for guarding with cradle with No.8 SWG GI wire at the equal interval of 1.5m SD.75	rm	(C Rui	Rm One nning eter)
59	46.00	Supply and run of 4 X 6 sq.mm (84/0.3) 7/20sqmm PVC unshealed copper cable in suitable PVC rigid pipe concealed on wall and ceiling withcontinuos earth wire connection of 14 SWG TC wire with painting of suitable colour SD 68	rm	(C Rui	Rm One nning eter)
60	4.00	Supply and fixing of 300mm (12") sweep AC exhaust fan complete with necessary wall opening and making good of the wall. SD 115	no	(0	No One mber)

61	5.00	Wiring with 2 x 4sqmm (56 /0.3) PVC insulated single core unsheathed copper conductor cable of 1100V grade in suitable PVC rigid pipe concealed in wall and ceiling with PVC accessories inflush with wall with 150 x 100 x 113 mm TW switch box with 3mm hylum sheet cover for 15A 3 pin non inter locking CS plug with continuous earth wire connection of 14 SWG TC wire and making good of the concealed portion with suitable colour for concealed PVC power plug point.SD 40	pt	1 Pt (One Point)
62	50.00	Supplying and laying of PVC insulated, PVC sheathed, armoured, LTUG cable of size 2 core 10 sqmmAl.cable clamped on walls etc, complete as per standard specification (SD 198)	rm	1 Rm (One Running Meter)
63	2.00	Supplying and fixng of cable gland and termination with earth connection of size 2 core 10 sqmmetc, complete as per standard specification. (SD 182)	no	1 No (One Number)
64	2.00	Supply and fixing of TNEB Board suitable for 3 Phases 63A service connection made up of suitable angle iron frame work of size 2 feet x 1 1/2 feet using angle iron of size 1 1/2" x 1 1/2" x 1/4" rigidly fixed on wall covered with hylem sheet of size 2 feet x 1/2 feet of 6mm thickness with necessary bolts and nuts supports and supply and fixing of 3 Nos 63A fuse units(500V) 1 No. Neutral link, copper earth flat of size 1" x 1/4" with inter connection of EB meter to fuse units by 7/16 PVC insulated copper wire with earth connection complete.SD 129	no	1 No (One Number)
65	1.00	Supply and fixing of 32 A TPN MC switch on incoming and 3 Nos 32 A DPMC Switch (Front Handle) as outgoing with suitable adoptor box with suitable MS cable entry box trunking boxes and internal connections on internal connections on suitable AI frame work with earth connection etc, complete.SD 172	no	1 No (One Number)

66	1.00	Supply and fixing of 3 phase 4 wire 4 way ICDB of 16 A per way with 32 A TPN MC switch with suitable MS cable entry boxes trunking box and internal connections on suitable angle iron frame work with PWD earthingetc, complete.SD 173	no	1 No (One Number)
67	53.00	Supply and run of 2 of 4sqmm (56/0.3) PVC insulated SC unsheathed Cu.Conductor of 1100V Grade in suitable PVC rigid pipe concealed in wall and ceiling with continuous earth wire connection of 14SWG Cu wireand making good of the concealed portion with suitable colour (SD57)	rm	1 Rm (One Running Meter)
68	30.00	Supplying and Laying of 3½ x 50 sq.mm PVC armoured LTUG cable in a trench to be excavated at a depth of 0.75 M putting 0.15 M layer of sand and covering the cable completely with bricks and sand and refilling the earth to make good. [SD 206]	rm	1 Rm (One Running Meter)
69	15.00	Supplying of 4 x 10 sq.mm PVC armoured LTUG cable in a trench to be excavated at a depth of 0.75 M putting 0.15 M layer of sand and covering the cable completely with bricks and sand and refilling the earth to make good. [SD 202]	rm	1 Rm (One Running Meter)
70	2.00	Supplying and fixing of 1200mm (48") sweep AC ceiling fan complete with regulator with 1M down rod including S & F of fan clamp with side plates and cross arm SD 107	no	1 No (One Number)
71	1.00	Brick Lining for 300mm thick in furance roof Fibre Li 2800L X 900W X 700H in mmning chamber size, Door operation: Up & Down movement manual operated max operating temparature: 700-900 Dec Celsius. Etc, complete.	no	1 No (One Number)
72	1.00	LPG Burner set with LPG Bank & Control Panel: Supply of 4 Nos, 5 Burner with Blower and Fully auto control system like 0,000 Kcal Capacity LPG Fired Ignition, Flame sensor and Auto cut off incorperated in a separate sequence contoller equivalent to Imported Contol system for air and LPG with auto Igniting system and supply of 20 + 20 cylinder bank with pipeline from LPg cylinder bank up to each Burner end by using TATA	no	1 No (One Number)

		"c" class grate material pipe with required material etc, complete					
73	1.00	3 hp motor 2no.for use to Id fan & 1hp motor use for wet scrubber Wet Scrubber for gas cleaning system: The system should be enhanced with Stainless steel cylinder and SS ID fan (3hp motor x 2nos. With ISI standard) to avoid rusting, Volume of water should be increased for effective scrubbing.	no			1 No (One Number)	
74	1.00	Guy Supported Chimney: This is a Cylindrical type MS IS - 2062 quality, 8MM Plate Chimney With two coasted of aluminium Heat Resistance Paint Exrernally, 7000 mm, Long Bottom Cylindrical Chimney. It is Rested on 16mm type MS IS - 2062 Qyality (100 feet Thick Base Flange and Stool Flange 16mm Thick with 12mm Gusset Support, Cylindrical Chimney Mounted on foundation 12nos x 25mm Dia Bolt, Nut Joints, Top 1 Cylindrical Shell Boiler Quality 8mm Plate x 7000mm long base chimney. It is Rested 50mm width base Flange & wind forece curtain MS Flat Set, with Lightening arrestor 25mm x 3mm copper flat earthing, with easy hinges type manual opened manhole door, necessary for pollution control board monitoringm sample ports arrangment ladder assembly with safety guard set 70 feet full height, one sets of detachable platform, over all size: 800mm Dia x 400mm Dia x 21000mm length with necessary all arrangements etc., complete	no			1 No (One Number)	
75	1.00	Erection, Testing and Commissioning charges for Gasifieretc, complete	no			1 No (One Number)	

76	2.00	Supply and delivery and fixing of HDPE tank Capacity 1000 litres as per IS 12701 / 1996 including loading, unloading, transportation and labour charges for fixing of the GI pipes and specials for pipe connection works including cutting, threading and fixing charges etc., as per standard specification.	no	1 No (One Number)
77	10.00	Plain Cement Concrete 1:2:4 (one cement, Two fine aggregates and Four coarse aggregates) using 20mm size ISS HBG metal including cost and conveyance of all materials to site and including for the mixing, laying and labour charges and all incidential charges etc., complete as per standard specification	m3	1 M3 (One Cubic Meter)
78	62.88	Providing and laying, spreading and compacting graded stone aggregate to wet mix macadam (WMM) specification including premixing the material with water at OMC in mechanical mix plant carriage to mixed material by tipper to site laying in uniform layers with paver in sub base / base course on well prepared surface and compacting with vibratory roller to achive the desired density complete as per clasue 406 of MORTH specifications.	m3	1 M3 (One Cubic Meter)
79	485.00	Supplying and laying Rubberised interlocking Paver block M40 grade Providing and laying of 63mm thick high strength type conforming IS 15658-2006 of rubberized interlocking paver lock in size of minimum compressive strength of 40 N/mm2 in uniform shape of approved make to be laid in flurring bone pattern with stone dustcushion below the uniform shap of approved non skitting surface in the top and the rate including levelling the base preparation of pavers as sub base, Stone Dust cushion 150mm thick laying out of pavement cut the pieces to fix the edge vibring the pavers, sweepingtranporting loading unloading of laying paver block as per standard specification,.	m3	1 M3 (One Cubic Meter)
80	1000.00	Supplying, fabricating, erecting structural steel work for roofing welded or bolted type using MS channels, angles, plates and round bars etc. conforming to IS specification including primer coating and enamal painting as per Design given by the departmental	kg	kg

		officers etc, complete as per standard specification			
81	57.82	Fabricating supplying and fixing of pre painted galvanized iron sheets with the following specification. The materials should be of PPGI tile profile with a red colour or any other approved design 0.47 mm thick 24 guage having width 1050 mm. The sheet should be G.I.base pre painted hot dipped galvanized iron sheet and to be fixed with shelf tapping screws, plasticwasher. The washer and screws to be fixed by using minute power machine drilled with out damaging the sheets paint coating to be regular modified polyster coat with zinc coating of Z 120 GSM paint thickness the finish should be terra cotta finish like malabarmangalore tiles finish optional matt finish. The sheet to be fixed with making suitable corrugated, cutting the sheet in to the required ssize and making ornamental designs as per the site condition and as directed by the departmental officers.	m2		1 M2 (One Square Meter)
82	18.69	Paving the floor with design Antiskid ceramic tiles (colour and shade as directed) of size 305 mm x 305mm x 6 mm in all floors over a base layer of cement mortar 1:3 (one cement and three sand) 20mm thick laid in-situ and pointed with same coloured cement etc, complete as per standard specification.	m2		1 M2 (One Square Meter)
83	4.00	Supplying and fixing UPVC (Un-Plasticized PolyvinylChloride) Louvered Ventilators of from the profile the size of outer frame 60mm x 58mm and shutter profile size of 60 x 78mm both profiles are reinforced with GI/1mm 125GSM and 100% corrosion free, the profile are multi chambered sections with wall thick of 2mm. The EPDM rubber (black colour) covered with all over the edges of frame and shutter. The corners and joints should be welded and cleaned. Radiations pin headed glass 4mm thick should be provided in the louvers. The window should be fixed to	m2		1 No (One Number)

		the wall with 100% packing with screws and silicon packing all round the frames. The ventilator should be got approved from the Executive Engineer before use on work			
84	77.54	Dadooing walls with Glazed tiles of sizes 305mm X200mm X 6mm size of approved make and quality and colour Set in cement mortar 1:2 (one cement ,two sand) over 10 mm base layer plastering and pointing with white cement neatly as directed etc., complete as per standard specification	m2		1 M2 (One Square Meter)
85	2.00	Supplying and fixing in position C.I.Manhole covers (light or heavy duty) of 600 X 600mm in size of best approved quality and as per standard specifications etc.,complete.	no		1 No (One Number)
86	6.00	Supplying and fixing P.V.C. ventilating shaft of 100mmdia and 3m height of best approved quality and as per standard specifications.	rm		1 Rm (One Running Meter)
87	1.00	Conducting Geophysical survey, quality and quantity test and transportation charges etc, (This includes labour charges in the field, rent of the vehicle for reaching the place, rent of the instrument and excluding charges for the geologist)	no		1 No (One Number)
88	18.00	Drilling of borewell anywhere in Tamilnaduincludingtransportation from one place to another place withinTamilnadu in alluvial soil or sedimentary strata of clayand sand or sand, stone, shale, pebbles, boulders etc.,by first taking a pilot bore of 140 mm/150mm diaandthen enlarging to required dia by direct or reverse rotatrymud and circulation method using Contractor's rig, fuel,labour, drilling, betonite mud and water required fordrilling at the site shown by the TWAD Officers including construction of mud pit (only Calyx drills are to be used).	m		m

89	18.00	Supply and delivery of unplasticised ribbed screen PVC casing pipe of the 140mm dia in 3m length with screwed and socket end and centering guide for every 15m length of pipes as per IS / 12818 / 92 and as amended from time to time to suit the borewellupto 80m depth (C.S) with ISI marking including, loading, unloading , freight, stacking and transit insurance charges etc, complete.	m		m	
90	1.00	Supply and delivery of wet type submersible pumpsetrequired is 30LPM discharge and 50m Head with stainless steel shaft, bronze impellers, bronze diffusers, C1 casing etc., complete as per relevent ISI specification in 150mm diaborewell. The pump set should be dynamically balanced and should be supplied with ISI marking. The pumpset should be supplied with 5 meter of 3 core copper cable with cable jointing kit free of cost. As per specifications as per IS rules and confirming to ISI standard should also be supplied.(7.50 HP Motor)	no		1 No (One Number)	
91	1.00	Supply and delivery of 2HP Single phase 415Volt DOC Panal board with ISI Specification including all charge etc as per standard specification	no		1 No (One Number)	
92	50.00	Supply and delivery of 3 core copper flat 4sqm cable as per IS 694: 1990. Including packing, loading, frieght, unloading & Stocking, transit insuraance., third party inspection charges etc.	rm		1 Rm (One Running Meter)	
93	30.00	Supply and erection of 2" UPVC Heavey Pressure Coloumrepipe to relvent IS specification including cost of pipe etc complete as directed by the departmental officers	rm		1 Rm (One Running Meter)	
94	5.00	Random rubble masonry in cement motor 1:5 (one Part of cement, Five part of Sand) mix using all granite stones and bond stones for foundation and basement from approved quarry including watering, curing, and labour charges etc., completed as per standard	m3		1 M3 (One Cubic Meter)	

		specification			
95	1.00	Supply and fixing of 32A TPN metal clad switch on suitable angle iron frame work with MS cable entry boxes with PWD earthing.(SD - 157)	no		1 No (One Number)