

**BILL OF QUANTITY FOR CONSTRUCTION OF CEMENT CONCRETE PAVEMENT & PADESTRIAN PATHWAY  
NEAR BRT BUS PICK UP POINT AT OLD MANTRALAY (DKS BHAWAN) RAIPUR**

NOTES TO BILL OF QUANTITIES

- A All drawings to be studied carefully before quoting rates
- B All works shall be executed as per relevant specifications/codes and to the best of the Engineering practices
- C Rates shall be inclusive of all kind of material, equipment,labour,tubler,H frame scaffolding acrow props,adjustable acrow spans,MS shuttering sheet of good quality
- D Rates shall be includes of electricity and water

Sl. No.	Description of Item	Unit	Quantity	Rate	Amount	Remarks
Part A	<b>Concrete Work</b>					
1	Dry Lean Cement Concrete Sub- base (Construction of dry lean cement concrete Sub- base over a prepared sub-grade with coarse and fine aggregate conforming to IS: 383, the size of coarse aggregate not exceeding 25 mm, aggregate cement ratio not to exceed 15:1, aggregate gradation after blending to be as per table 600-1, cement content not to be less than 150 kg/ cum, optimum moisture content to be determined during trial length construction, concrete strength not to be less than 10 Mpa at 7 days, mixed in a batching plant, transported to site, laid with a paver with electronic sensor, compacting with 8-10 tonnes vibratory roller, finishing and curing.)	cum	158.63			
	(Rate in Words					)Only
2	Cement Concrete Pavement (Construction of un-reinforced, dowel jointed, plain cement concrete pavement over a prepared sub base with 43 grade cement @ 400 kg per cum, coarse and fine aggregate conforming to IS 383, maximum size of coarse aggregate not exceeding 25 mm, mixed in a batching and mixing plant as per approved mix design, transported to site, laid with a fixed form or slip form paver, spread, compacted and finished in a continuous operation including provision of contraction, expansion, construction and longitudinal joints, joint filler, separation membrane, sealant primer, joint sealant, debonding strip, dowel bar, tie rod, admixtures as approved, curing compound, finishing to lines and grades as per drawing)	cum	325.50			
	(Rate in Words					)Only
3	Providing & laying 60mm thick precast interlocking concrete blocks of approved size (approx 305 sqcm) and shape/ pattern, over 40 mm thick average complete coarse sand bed with joints of 3mm thick filled by fine sand including leveling with surface vibrator, temping and sweeping etc. complete of minimum compressive strength of 300 kg/sq.cm					
	Plain precast interlock concrete blocks 60MM	sqm	225.00			
	(Rate in Words					)Only
4	Providing and fixing approved quality Durato make vitrified porcelin body textured warning (tactile) floor tiles of size 300 x 300 x 10mm laid over bedding mortar of 50mm thick in 1:5 ratio.(1 cement : 5 sand) of required size and pattern as per drawings and details. The joints shall be well jointed using grey cement slurry mixed with pigments to match the shade of tile including rubbing and cleaning of tiles with water or oxalic acid (if directed). The rate shall be inclusive of tools, tackles etc complete at all levels and laid to desired slopes and levels. The rates shall include for applying of Zycoseal or any other weatherproof transparent coating of approved make on flooring surfaces.					
4.1	a) Tac Dots	sqm	0.90			
	(Rate in Words					)Only
4.2	b) Tac liners	sqm	51.00			
	(Rate in Words					)Only
5	Cast in Situ Cement Concrete M20 kerb (Construction of cement concrete kerb with top and bottom width 115 and 165 mm respectively, 250 mm high in M 20 grade PCC on M-10 grade foundation 150 mm thick, foundation having 50 mm projection beyond kerb stone, kerb stone laid with kerb laying machine, foundation concrete laid manually, all complete as per clause 408)	rmt	170.00			
	Earthwork					
6	Excavation for all types and sizes of foundations, trenches and drains or for any other purpose including disposal of excavated stuff upto 1.5 m lift and lead upto 50m (at least 5m away from the excavated area), including dressing and leveling of pits. Rates shall be inclusive of bailing and pumping out of water and sludge from excavation pits.					
	a. In all types of soil	cum	16.20			
	(Rate in Words					)Only
7	Extra rate for lead for every 50m average lead upto 500 m beyond 50 m free lead and 1.5 m free lift.a.					
7.1	. for soil	cum	4.05			
	(Rate in Words					)Only
8	Disposal of unused excavated / dismantled material lead upto 10 Km	cum	24.92			
	(Rate in Words					)Only
9	Filling from available excavated stuff (Excluding rock) in trenches, plinth, sides of foundation etc. in layers not exceeding 20cm in depth consolidating each deposited layer by ramming and watering with a lead upto 50 M. and lift upto 1.5 M.	cum	6.60			
	(Rate in Words					)Only
10	Providing and filling in plinth with sand/ Crusher dust under floor in layers not exceeding 20cm in depth consolidating each deposited layer by ramming and watering, including dressing etc. complete.	cum	253.87			
	(Rate in Words					)Only
	<b>Formwork</b>					
11	Providing and fixing formwork including centering, shuttering, strutting, staging, propping bracing etc. complete and including its removal at all levels, for:					
11.1	Foundations, footings, base of columns and plinth beam in any shape and size.	sqm	18.40			
	(Rate in Words					)Only
11.2	Columns, Pillars, Piers and likes- rectangular or square in shape	sqm	23.04			

	(Rate in Words				)Only	
11.3	Suspended floors, roofs, access platform, balconies (plain surfaces) and shelves (cast in situ)	sqm	116.13			
	(Rate in Words				)Only	
11.4	Beams, lintels, cantilevers & walls	sqm	1.80			
	(Rate in Words				)Only	
	Cement concrete (Plain and RCC)					
12	Providing and laying nominal mix cement concrete with crushed stone aggregate using concrete mixer in all works upto plinth level excluding cost of form work.					
12.1	. 1:3:6 (1 cement : 3 coarse sand : 6 graded stone aggregate 40mm nominal size).	cum	10.37			
	(Rate in Words				)Only	
12.2	Providing and laying design mix plain cement concrete with crushed graded stone aggregate 20mm nominal size using batching plant, transit mixer and concrete pump, in all works upto floor five level excluding cost of form work.					
	M-20 (using minimum cement 390 kg/cum concrete)	cum	25.03			
	(Rate in Words				)Only	
13	Providing and placing in position reinforcement for R.C.C. work including straightening, cutting, bending, binding etc. complete as per drawings including cost of binding wire all complete:					
	. Thermo-Mechanically treated bars	kg	1259.63			
	(Rate in Words				)Only	
	<b>Stonework</b>					
14	Random rubble masonry with hard stone in foundation and plinth in Cement Mortar 1:6 (1 Cement : 6 Coarse Sand) including leveling up with cement concrete 1:6:12 (1 cement : 6 coarse sand: 12 stone aggregate 20mm nominal size) upto plinth level.	Cum	4.69			
	(Rate in Words				)Only	
	<b>Brickwork</b>					
15	Brick work with modular fly-ash lime bricks (FaLG Bricks) conforming to IS:12894-2002 of class designation 4.0 in foundation and plinth and super structure					
	a.Cement Mortar 1:4 (1 Cement : 4 Coarse Sand)	cum	1.238			
	(Rate in Words				)Only	
	<b>Steel work</b>					
18	Steel work welded in built up sections/ framed work including cutting, hoisting, fixing in position and applying a priming coat of red oxide zinc chromate primer and then spraying two coats of Metallic / Auto paint of Asian, MRF, Duco, Dulux make using a compressor machine of approved shade in even and smooth finish. The rates shall be inclusive of all Materials, labour, scaffolding, providing and applying paint, factory bending of MS sections as per design profiles and erecting the same on site using all kinds of necessary hoisting machinery.					
	In gratings, frames, guard bar, ladder, railings (polished bars), brackets, gates (polished bars) and similar works.	kg	284.70			
	(Rate in Words				)Only	
	<b>Rolling Shutter</b>					
19	Supplying and fixing rolling shutter of approved makes made of M.S. laths interlocked together through their entire length and jointed together at the end by end locks, mounted on specially designed pipe shaft with brackets, side guides and arrangements for inside and out side locking with push and pull arrangement complete but excluding the cost of top cover and spring.					
19.1	80x1.20mm M.S. Laths	sqm	18			
	(Rate in Words				)Only	
19.2	Providing and fixing 27.5cm long wire spring for rolling shutters.	No	6			
	(Rate in Words				)Only	
19.3	Providing and fixing M.S. sheet top cover for rolling shutter					
	1.20mm thick	sqm	6			
	(Rate in Words				)Only	
19.4	Providing and fixing ball bearing for rolling shutters.	No	6			
	(Rate in Words				)Only	
	<b>SS WORK</b>					
20	Providing and fixing stainless steel ( Grade 304) railing made of Hollow, tubes, channels, plates etc., including welding, grinding, buffing, polishing and making curvature (wherever required) and fitting the same with necessary stainless steel nuts and bolts complete, i/c fixing the railing with necessary accessories & stainless steel dash fasteners , stainless steel bolts etc., of required size, on the top of the floor or the side of waist slab with suitable arrangement as per approval of Engineer-in-charge, ( for payment purpose only weight of stainless steel members shall be considered excluding fixing accessories such as nuts, bolts, fasteners etc.)	kg	468.67			
	(Rate in Words				)Only	
	<b>Plastering</b>					
21	Providing and making 15mm thick cement plaster on the rough side of single or half brick wall of mix:					
	a.) Cement Mortar 1:4 (1 Cement : 4 fine Sand)- (single coat finish and single coat rough plaster	sqm	118.23			
	(Rate in Words				)Only	
	<b>Flooring</b>					
22	Cement concrete flooring with cement concrete 1:2:4 (1 cement : 2 coarse sand : 4 graded stone aggregate 20mm) finished with a floating coat of neat cement..					
	40 mm thick	sqm	12.00			
	(Rate in Words				)Only	
	<b>Distemping Painting and finishing</b>					

23	Wall painting with acrylic emulsion paint, having VOC (Volatile Organic Compound ) content less than 50 grams/ litre, of approved brand and manufacture, including applying additional coats wherever required, to achieve even shade and colour.					
23.1	On new work (two or more coats) (Rate in Words	sqm	80.00			)Only
23.2	Painting on new work (two or more coats over one coat of priming coat ) to give an even shade with: cost of primer shall also to be included.					
	Satin synthetic enamel paint (Rate in Words	Sq M	38.23			)Only
24	<b>Dismantling And Demolishing</b>					
24.1	Demolishing R.C.C. work including stacking of steel bars and disposal of unserviceable material within 50 metre lead. (Rate in Words	cum	3.06			)Only
24.2	Demolishing brick/stone masonry including arches, stacking of serviceable material disposal of unserviceable material within 50 metres lead.					
	a)In cement mortar. (Rate in Words	cum	10.71			)Only
24.3	Dismantling steel work in built-up section without dismembering for a span upto 10 metre and height upto 5.0 metre above plinth level including stacking with in 50 metre lead. (Rate in Words	kg	14338.37			)Only
	<b>Drainage</b>					
25	Providing and laying non-pressure NP2 class (light duty) R.C.C. pipes with collars jointed with stiff mixture of cement mortar in the proportion of 1:2 (1 cement : 2 fine sand) including testing of joints etc. complete : 300mm dia (Rate in Words	Mtr	18			)Only
	<b>Road Marking</b>					
26	Painting Lines, Dashes, Arrows etc on Roads in Two Coats on New Work (Painting lines, dashes, arrows etc on roads in two coats on new work with ready mixed road marking paint conforming to IS:164 on bituminous surface, including cleaning the surface of all dirt, dust and other foreign matter, demarcation at site and traffic control )					
26.1	Over 10 cm in width (Rate in Words	Sq M	75.00			)Only
26.2	Road Markers/Road Stud with Lens Reflector (Providing and fixing of road stud 100x 100 mm, die cast in aluminum, resistant to corrosive effect of salt and grit, fitted with lens reflectors, installed in concrete or asphaltic surface by drilling hole 30 mm upto a depth of 60 mm and bedded in a suitable bituminous grout or epoxy mortar, all as per BIS:873, part-IV:1973) (Rate in Words	No	40.00			)Only
					Grand Total	
Rate in Words						)Only
Signature of Contractor						