

## LABOUR PRODUCTIVITY / OUTPUT COEFFECIENTS IN CONSTRUCTION WORKS

Description of Works	Unit	Quantity	Mason / Carpenter / Fabricator / Painter	Helper	Remarks
<b>Civil Works</b>					
<b>Foundation Excavation</b>					
Excavation & Getting Out upto Depth 1.5 to 3.0 Metre	Cum	1		0.96	Foundation
Excavation & Getting Out upto Depth 1.5 to 3.0 Metre	Cum	1		0.63	Trench
Backfilling by Manual	Cum	1		0.3	Upto 50 Meter Lead / Normal Filling
Backfilling by JCB	Cum	30		1	Trench & Foundation Works
<b>Foundation Excavation by JCB</b>					
Excavation & Getting Out upto Depth 1.5 to 3.0 Metre	Cum	1		0.03	Foundation / Hour
Excavation & Getting Out upto Depth 1.5 to 3.0 Metre	Cum	20		1	Trench / Hour
<b>Concreting Works</b>					
Plain Cement Concrete	Cum	1	0.17	3.13	By Hand Mix
Plain Cement Concrete	Cum	1	0.17	2.54	By Plant / Mixer Machine
Concrete In Foundation / Raft / Footing	Cum	1	0.17	2.9	By Mixer Machine & Manually Placing
Concrete In Isolated Footing & Foundations	Cum	1	0.08	0.73	By Batching Plant Through Pump
Concrete In Mass Concrete Raft Foundations	Cum	1	0.027	0.36	By Batching Plant Through Pump
Concrete In Columns / Shaer Walls / Retaining Walls	Cum	1	0.22	4.11	By Mixer Machine & Manually
Concrete In Columns / Shaer Walls / Retaining Walls	Cum	1	0.22	1.36	By Plant / Mixer Machine by Tower Crane
Concrete In RCC Slab & Beams	Cum	1	0.24	3.4	By Mixer Machine & Manually Placing
Concrete In RCC Slab & Beams	Cum	1	0.16	1.12	By Batching Plant Through Pump
Concrete In Staicase / Chajjas / Counter Slabs	Cum	1	0.3	5.41	By Mixer Machine
Concrete In Staicase / Chajjas / Counter Slabs	Cum	1	0.3	3.03	By Batching Plant Through Pump
<b>Concrete Pump Capacity Per Hour</b>	<b>Cum</b>	<b>25</b>			<b>1 Concrete Pump with 2 Transit Mixer</b>
<b>Conventional Plywood Shuttering Works - Shuttering Making, Fabrication, Shifting &amp; Erection &amp; Dshuttering</b>					
Foundation Shuttering	Sqm	1	0.1	0.15	Slab Height upto 3600mm
Rectangular Column, Pedestal Shuttering	Sqm	1	0.18	0.3	
Retaining / RCC Walls	Sqm	1	0.22	0.38	
Beam & Slab Shuttering	Sqm	1	0.13	0.23	
Lintal & RCC Band, Counter Shuttering	Sqm	1	0.25	2.25	
<b>Reinforcement Steel Works</b>					
Reinforcement Steel Works	MT	1	6	8	
<b>Masonry Works - Including, Mixing of Mortar, Shifting of Materials, Scaffolding &amp; Curing</b>					
Brick Work 230mm Thick Walls (650 to 700 Bricks/ Per	Cum	1	0.72	1.78	Upto Plinth Level
Brick Work 230mm Thick Walls (530 to 550 Bricks/ Per	Cum	1	0.94	3.34	Super Structure Works Above Plinth Level
Half Brick Work 115mm Thick (625 to 650 Bricks / Per	Sqm	1	0.09	0.25	Upto Plinth Level
Half Brick Work 115mm Thick (470 to 500 Bricks / Per	Sqm	1	0.12	0.42	Super Structure Works Above Plinth Level
AAC Block 100mm Thick	Sqm	1	0.07	0.29	Super Structure Works Above Plinth Level
AAC Block 150 / 230 / 300mm Thick	Cum	1	0.62	1.75	Super Structure Works Above Plinth Level
<b>Plastering Works - Including Scaffolding, Mixing &amp; Curing</b>					
Internal Plaster Works 12-15mm Thick	Sqm	1	0.08	0.26	Internal Walls upto 3600mm Height
Gypsum Plaster Works 12-15mm Thick	Sqm	1	0.2	0.12	Internal Walls upto 3600mm Height
External Plaster Works in Two Coats 18-20mm Thick	Sqm	1	0.12	0.34	0% Labour for additional floors for Scaffolding
External Plaster Works in Single Coats 18-20mm Thick	Sqm	1	0.07	0.18	0% Labour for additional floors for Scaffolding
Ceiling Plaster 6-8mm Thick	Sqm	1	0.06	0.17	Ceiling Height upto 3600mm Lvl.
Neat Cement Punning @ 4.4 Kg / Sqm	Sqm	1	0.03	0.03	In Drains & Wall Dados

<b>Flooring Works</b>					
<b>Concrete Flooring Works</b>					
Concrete Flooring Works / IPS Flooring (40-50mm Thick)	Sqm	1	0.09	0.25	
Concrete Pavement in Road Work	Cum	1	0.45	2.56	(Mixing with Mixer & Placed Manually)
Concrete Pavement in Road Work (Through Concrete)	Cum	1	0.45	1.28	Mixing with Plant & Placed with Concrete Pump)
<b>Tile Flooring Works</b>					
Tile Flooring - 15-20mm Thick Mortar	Sqm	1	0.2	0.38	Without Grouting (Joint to Joint Finish)
Tile Cladding with 12mm Thick Mortar	Sqm	1	0.25	0.43	
Tile Skirting with 12mm Thick Mortar	Rmt	1	0.033	0.04	
Tile Flooring in Staircase Riser & Treads - Cutting & Fixing	Sqm	1	0.25	0.43	
Tile Flooring - 15-20mm Thick Mortar	Sqm	1	0.3	0.48	3mm Spacer with Epoxy Grout in Groove Finish
Tile Cladding with 12mm Thick Mortar	Sqm	1	0.35	0.53	
<b>18-20mm Thick Stone - Granite/ Kota / Indian / Italian./ Imported Marble Flooring</b>					Normal Plain Flooring
Stone Flooring - Cutting & Fixing	Sqm	1	0.12	0.38	
Polishing & Rubbing	Sqm	1		0.5	
<b>18-20mm Thick Stone - Granite/ Kota / Indian / Italian./ Imported Marble Flooring</b>					Pattern Flooring
Stone Flooring - Cutting & Fixing	Sqm	1	0.175	0.41	
Polishing & Rubbing	Sqm	1		0.5	
Stone Flooring in Staircase Riser & Treads - Cutting & Fixing	Sqm	1	0.195	0.4	
Polishing & Rubbing	Sqm	1		0.7	
Kota Stone Flooring in Staircase Steps & Risers- Cutting & Fixing	Sqm	1	0.3	0.58	
Polishing & Rubbing	Sqm	1		0.7	
<b>18-20mm Thick Stone - Granite/ Kota / Indian / Italian / Imported Marble Flooring</b>					
Stone Flooring - Cutting & Fixing	Sqm	1	0.12	0.38	
Polishing & Rubbing	Sqm	1		0.5	
<b>Laminate Wooden Flooring (Normal)</b>	Sqm	1	0.1	0.15	Shifting, Cutting & Installation
Laminate Wooden Flooring (Harringbone Pattern)	Sqm	1	0.3	0.15	Shifting, Cutting & Installation
<b>Painting &amp; Finishing Works - Including Surface Prepration &amp; Scaffolding (Note for Old Surfaces Painting Factors are 50% Applicable)</b>					
1mm Thick - Birla Putty	Sqm	1	0.045	0.045	Min. Two Coats
<b>Internal Finishings</b>					
White Wash / Colour Washing Works - Two Coats	Sqm	1	0.03	0.01	Min. Two Coats
Distempering on Walls including Priming Coat	Sqm	1	0.08	0.04	Min. Two Coats
OBD Paint on Walls including Priming Coat	Sqm	1	0.054	0.05	Min. Two Coats
Acrylic / Plastic Emulsion Interior Paint on Walls including Priming Coat	Sqm	1	0.06	0.054	Min. Two Coats
<b>External Finishings</b>					
Exterior Texture / Weather Shield Paint including Priming Coat	Sqm	1	0.06	0.035	Min. Two Coats
<b>Painting on Wood &amp; MS Steel Surfaces</b>					
Painting of Wood Surfaces with Primer	Sqm	1	0.085	0.06	Min. Two Coats
Synthetic Enamel Paint of MS Plain Surfaces with Priming Coat	Sqm	1	0.066	0.066	Min. Two Coats
<b>Polishing on Wood Surfaces</b>					
French Spirit Polish	Sqm	1	0.35	0.1	Single Coat
Melamine Polish	Sqm	1	0.035	0.035	Single Coat
Wax Polish	Sqm	1	0.08	0.08	Min. Two Coats
<b>Water Proofing Treatments Works</b>					
Tapecrete / Polymer Based Water Proofing in Toilet / Kitchen	Sqm	1	0.22	0.25	With Two Layer Coating with Mortar Protection
Water Proofing Treatment Over Roof	Sqm	1	0.3	0.15	With Two Layer Coating with Concrete Protection