



# City of Los Alamitos

Community Development: Building & Safety Division  
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## Weights of Building Materials – Pounds Per Square Foot [PSF]

### CEILING

Acoustical fiber board	1
Suspended steel channel system	2
Suspended wood channel system	2.5
2x8 ceiling joists @ 16" o.c., R-49 insulation, 1/2" gypsum board	7
1" Plaster	8
1/2" gypsum board	2.2
5/8" gypsum board	2.75

### ROOF

Fiberglass shingles	3
Asphalt shingles	2
Wood shingles	3
Spanish clay tile	18
Concrete roof tile	12
Composition Roofing:	
Three-ply ready roofing	1
Four-ply felt and gravel	5.5
Five-ply felt and gravel	6
20 gage metal deck	2.5
18 gage metal deck	3
0.05" thick polyvinyl chloride polymer membrane	0.35
1" fiberglass batt insulation	0.04
1" loose fiberglass insulation	0.04
1" loose cellulose insulation	0.14
1" rigid insulation	1.5
Blowing wool insulation R-38 (16"deep)	0.62
3/16" slate	7
1/4" slate	10
Single-ply (no ballast)	0.7
Single-ply (ballasted)	11
Dry gravel	8.7
2x8 rafters @ 16" o.c., fiberglass shingles, 15# felt, 3/8" sheathing	8
Skylight: metal frame w/ 3/8" wire glass	8

### FLOOR

1" reinforced regular weight concrete	12.5
1" plain lightweight concrete	8
7/16" cementitious backer board	3
Ceramic or quarry tile (3/4") on 1/2" mortar bed	16
Ceramic or quarry tile (3/4") on 1" mortar bed	23
1" mortar bed	12
1" slate	15
3/8" marble tile	6
3/8" ceramic floor tile	4.7

### FLOOR (cont.)

Hardwood flooring, 7/8-in	4
1/4" linoleum or asphalt tile	1
BCI/AJS joists @ 16" o.c., 3/4" sheathing, 1/2" gypsum board	10
3/4" Gyp-Crete® topping	6.5
Carpet & Pad	2.0
Waterproofing Membranes	
Bituminous, smooth surface	1.5
Liquid applied (1)	1

### SHEATHING

11/32" or 3/8" Plywood- OSB	1.0-1.2
15/32" or 1/2" Plywood- OSB	1.4-1.7
19/32" or 5/8" Plywood- OSB	1.8-2.1
23/32" or 3/4" Plywood- OSB	2.2-2.5
7/8" Plywood- OSB	2.6-2.9
1 1/8" Plywood- OSB	3.3-3.6
1/2" cementitious backer board	3
1-1/2" softwood T & G decking	4.6

### WALL

5/16" x 7-1/2" fiber cement lap siding	3
4" clay brick	39
1/4" ceramic wall tile	3.1
1 3/4" Cultured Stone®	12
2x4 studs @ 16" o.c., 5/8" gypsum, insulation, 3/8" siding	11
2x6 studs @ 16" o.c., 5/8" gypsum, insulation, 3/8" siding	12
Wood or steel studs, 1/2" gypsum board each side	8
Exterior stud walls w/ brick veneer	48
Windows: glass, frame and sash	8
Stucco	10
Log Wall: 10" diameter	26

### FRAMING

2x4 @ 16" o.c.	1.1
2x6 @ 16" o.c.	1.7
2x8 @ 16" o.c.	2.2
2x10 @ 16" o.c.	2.9
2x12 @ 16" o.c.	2.5

### MISCELLANEOUS

1" of sand	8
1" of water 5.2Hay: baled (dry)	15 PCF
Straw: baled (dry)	8 PCF
Saturated soil (garden/landscaped roof)	135 PCF
Grand Piano	1000LB