

Round Footings

Residential Sizing Guide

Minimum Thickness in Inches	Required Footing Size			Minimum Soil Load Bearing Capacity in Pounds per Square Foot for the Total Column Loading				
	Diameter in Inches	Square Inches	Square Feet	1000	1500	2000	2500	3000
8 Inches	8	50.27	0.35	349	524	698	873	1047
	9	63.62	0.44	442	663	884	1104	1325
	10	78.54	0.55	545	818	1091	1364	1636
	11	95.03	0.66	660	990	1320	1650	1980
	12	113.10	0.79	785	1178	1571	1964	2356
	13	132.73	0.92	922	1383	1844	2304	2765
	14	153.94	1.07	1069	1604	2138	2673	3207
	15	176.72	1.23	1227	1841	2454	3068	3682
10 Inches	16	201.06	1.40	1396	2094	2793	3491	4189
	17	226.98	1.58	1576	2364	3153	3941	4729
	18	254.47	1.77	1767	2651	3534	4418	5301
	19	283.53	1.97	1969	2953	3938	4922	5907
12 Inches	20	314.16	2.18	2182	3273	4363	5454	6545
	21	346.36	2.41	2405	3608	4811	6013	7216
	22	380.13	2.64	2640	3960	5280	6600	7919
	23	415.48	2.89	2885	4328	5771	7213	8656
	24	452.39	3.14	3142	4712	6283	7854	9425
	25	490.88	3.41	3409	5113	6818	8522	10227
	26	530.93	3.69	3687	5531	7374	9218	11061
	27	572.56	3.98	3976	5964	7952	9940	11928
	28	615.75	4.28	4276	6414	8552	10690	12828*
	29	660.52	4.59	4587	6880	9174	11467	13761*
14 Inches	30	706.86	4.91	4909	7363	9818	12272	14726*
	31	754.77	5.24	5241	7862	10483	13104*	15724*
	32	804.25	5.59	5585	8378	11170	13963*	16755*
	33	855.30	5.94	5940	8909	11879	14849*	17819*
	34	907.92	6.31	6305	9458	12610*	15763*	18915*
	35	962.12	6.68	6681	10022	13363*	16703*	20044*
	36	1017.88	7.07	7069	10603	14137*	17672*	21206*

NOTES

This table is only a guide. Consult with the local Building Code Official for questions or for use of this table.
For total-load figures with an asterisk (*), the large total loading may require special column types, or sizes, or the addition of steel reinforcement.
Concrete compressive strength (psi) may vary. A **minimum** of Plain Structural Concrete (**2500 psi**) is assumed.
Soil type and bearing capacity must be verified at each site.
When the actual column type, size, and total loading has been determined, then each column footing condition should be reviewed to determine the required round column pad size and thickness.