Meters

ACTUAL SIDEWALL HEIGHT
NUMBER OF RINGS (courses)

TANK DIAMETER (Meters)	NUMBER OF SHEETS PER RING	MAXIMUM WATER DEPTH AWWA	MAXIMUM WATER DEPTH TC STD.	1.59 1	3.06 2	4.54 3	6.01 4	7.48 5	8.96 6	10.43 7	11.90 8	13.38 9	14.85 10	16.32 11	17.80 12	19.27 13	20.74 14	22.22 15
2.81	3	28.10	28.10	4	13	24 / 4.83	33 / 6.30	42 / 7.78	51 / 9.25	60 / 10.72	70 / 12.20	79 / 13.67	88 / 15.14	97 / 16.62	106 / 18.09	115 / 19.56	125 / 21.04	134 / 22.51
3.75	4	38.41	38.41	7	23	39	59 / 6.30	75 / 7.78	91 / 9.25	107 / 10.72	124 / 12.20	140 / 13.67	156 / 15.14	173 / 16.62	189 / 18.09	205 / 19.56	221 / 21.04	238 / 22.51
4.69	5	44.30	44.30	10	36	61	87	117 / 7.78	143 / 9.25	168 / 10.72	193 / 12.20	219 / 13.67	244 / 15.14	270 / 16.62	295 / 18.09	321 / 19.56	346 / 21.04	372 / 22.51
5.63	6	44.30	44.30	15	51	88	125	169 / 7.78	205 / 9.25	242 / 10.72	278 / 12.20	315 / 13.67	352 / 15.14	388 / 16.62	425 / 18.09	462 / 19.56	498 / 21.04	535 / 22.51
6.57	7	44.30	44.30	20	70	120	170	219	279 / 9.25	329 / 10.72	379 / 12.20	429 / 13.67	479 / 15.14	529 / 16.62	579 / 18.09	628 / 19.56	678 / 21.04	728 / 22.51
7.50	8	39.62	44.30	26	91	156	222	287	352	430 / 10.72	495 / 12.20	560 / 13.67	625 / 15.14	691 / 16.62	756 / 18.09	821 / 19.56	886 / 21.04	951 / 22.51
8.44	9	35.22	44.30	33	115	198	280	363	445	544 / 10.72	627 / 12.20	709 / 13.67	791 / 15.14	874 / 16.62	956 / 18.09	1,039 / 19.56	1,121 / 21.04	1,204 / 22.51
9.06	10	32.83	44.30	38	133	228	323	418	512	607	721 / 12.20	816 / 13.67	911 / 15.14	1,006 / 16.62	1,101 / 18.09	1,196 / 19.56	1,290 / 21.04	1,385 / 22.51
9.96	11	29.85	44.30	46	161	276	390	505	620	735	873 / 12.20	987 / 13.67	1,102 / 15.14	1,217 / 16.62	1,332 / 18.09	1,447 / 19.56	1,561 / 21.04	1,676 / 22.51
10.87	12	27.36	44.30	55	191	328	465	601	738	875	1,011	1,175 / 13.67	1,312 / 15.14	1,448 / 16.62	1,585 / 18.09	1,722 / 19.56	1,858 / 21.04	1,995 / 22.51
11.77	13	25.25	44.30	64	225	385	545	706	866	1,026	1,187	1,379 / 13.67	1,539 / 15.14	1,700 / 16.62	1,860 / 18.09	2,021 / 19.56	2,181 / 21.04	2,341 / 22.51
12.68	14	23.45	41.77	75	261	446	632	818	1,004	1,190	1,376	1,562	1,785 / 15.14	1,971 / 16.62	2,157 / 18.09	2,343 / 19.56	2,529 / 21.04	2,715 / 22.51
13.58	15	21.89	38.99	86	299	513	726	940	1,153	1,366	1,580	1,793	2,007	2,263 / 16.62	2,477 / 18.09	2,690 / 19.56	2,904 / 21.04	3,117 / 22.51
14.49	16	20.52	36.55	97	340	583	826	1,069	1,312	1,555	1,798	2,041	2,283	2,575 / 16.62	2,818 / 18.09	3,061 / 19.56	3,304 / 21.04	3,546 / 22.51
15.39	17	19.31	34.40	110	384	658	933	1,207	1,481	1,755	2,029	2,304	2,578	2,852	3,181 / 18.09	3,455 / 19.56	3,729 / 21.04	4,004 / 22.51
16.30	18	18.24	32.49	123	431	738	1,045	1,353	1,660	1,968	2,275	2,583	2,890	3,197	3,566 / 18.09	3,874 / 19.56	4,181 / 21.04	4,488 / 22.51
17.21	19	17.28	30.78	137	480	822	1,165	1,507	1,850	2,192	2,535	2,877	3,220	3,562	3,905	4,316 / 19.56	4,659 / 21.04	5,001 / 22.51
18.11	20	16.42	29.24	152	532	911	1,291	1,670	2,050	2,429	2,809	3,188	3,568	3,947	4,327	4,706	5,162 / 21.04	5,541 / 22.51
19.02	21	15.63	27.85	168	586	1,005	1,423	1,841	2,260	2,678	3,097	3,515	3,934	4,352	4,770	5,189	5,691 / 21.04	6,109 / 22.51
19.92	22	14.92	26.58	184	643	1,103	1,562	2,021	2,480	2,939	3,399	3,858	4,317	4,776	5,235	5,695	6,154	6,705 / 22.51
20.83	23	14.27	25.43	201	703	1,205	1,707	2,209	2,711	3,213	3,715	4,217	4,718	5,220	5,722	6,224	6,726	7,228
21.73	24	13.68	24.37	219	766	1,312	1,859	2,405	2,952	3,498	4,045	4,591	5,138	5,684	6,231	6,777	7,324	7,870
22.64	25	13.13	23.39	238	831	1,424	2,017	2,610	3,203	3,796	4,389	4,982	5,575	6,168	6,761	7,354	7,947	8,540
23.54	26	12.63	22.49	257	899	1,540	2,181	2,823	3,464	4,105	4,747	5,388	6,030	6,671	7,312	7,954	8,595	9,237
24.45	27	12.16	21.66	277	969	1,661	2,352	3,044	3,736	4,427	5,119	5,811	6,502	7,194	7,886	8,577	9,269	9,961
25.36	28	11.73	20.89	298	1,042	1,786	2,530	3,274	4,018	4,761	5,505	6,249	6,993	7,737	8,481	9,224	9,968	----- / 69.02
26.26	29	11.32	20.17	320	1,118	1,916	2,714	3,512	4,310	5,108	5,905	6,703	7,501	8,299	9,097	9,895	----- / 67.09	
27.17	30	10.94	19.49	342	1,196	2,050	2,904	3,758	4,612	5,466	6,320	7,174	8,028	8,882	9,735	10,589	----- / 65.15	
28.98	32	10.26	18.28	390	1,361	2,333	3,304	4,276	5,247	6,219	7,190	8,162	9,134	10,105	11,077	----- / 61.29		
30.79	34	9.66	17.20	440	1,537	2,633	3,730	4,827	5,924	7,021	8,117	9,214	10,311	11,408	----- / 57.42			
32.60	36	9.12	16.24	493	1,723	2,952	4,182	5,412	6,641	7,871	9,100	10,330	11,560	12,789	----- / 54.52			
34.41	38	8.64	15.39	549	1,919	3,289	4,659	6,030	7,400	8,770	10,140	11,510	12,880	----- / 51.62				
36.22	40	8.21	14.62	609	2,127	3,645	5,163	6,681	8,199	9,717	11,235	12,753	14,271					
38.03	42	7.82	13.92	671	2,345	4,018	5,692	7,366	9,039	10,713	12,387	14,060	----- / 46.79					
39.84	44	7.46	13.29	736	2,573	4,410	6,247	8,084	9,921	11,758	13,595	15,431	----- / 44.85					
41.65	46	7.14	12.71	805	2,813	4,820	6,828	8,836	10,843	12,851	14,858	----- / 42.92						
43.47	48	6.84	12.18	876	3,063	5,249	7,435	9,621	11,807	13,993	16,179	----- / 40.99						
45.28	50	6.57	11.70	951	3,323	5,695	8,067	10,439	12,811	15,183	17,555							
47.09	52	6.31	11.25	1,029	3,594	6,160	8,725	11,291	13,856	16,422	----- / 38.09							
48.90	54	6.08	10.83	1,109	3,876	6,643	9,409	12,176	14,943	17,709	----- / 36.15							
50.71	56	5.86	10.44	1,193	4,168	7,144	10,119	13,095	16,070	19,045	----- / 35.19							
52.52	58	5.66	10.08	1,280	4,471	7,663	10,855	14,047	17,238	20,430								
54.33	60	5.47	9.75	1,370	4,785	8,201	11,616	15,032	18,448	----- / 33.25								
56.14	62	5.30	9.43	1,462	5,110	8,757	12,404	16,051	19,698	----- / 32.29								
57.95	64	5.13	9.14	1,558	5,444	9,331	13,217	17,103	20,989	----- / 31.32								
59.77	66	4.97	8.86	1,657	5,790	9,923	14,056	18,189	22,322	----- / 30.35								
61.58	68	4.83	8.60	1,759	6,146	10,534	14,921	19,308	23,695									
63.39	70	4.69	8.35	1,864	6,513	11,162	15,811	20,460	----- / 28.42									
65.20	72	4.56	8.12	1,972	6,891	11,809	16,728	21,646	----- / 27.45									
67.01	74	4.44	7.90	2,083	7,279	12,474	17,670	22,866	----- / 27.45									
68.82	76	4.32	7.69	2,197	7,678	13,158	18,638	24,118	----- / 26.49									
70.63	78	4.21	7.50	2,314	8,087	13,859	19,632	25,404	----- / 25.52									
72.44	80	4.10	7.31	2,435	8,507	14,579	20,652	26,724										
74.25	82	4.00	7.13	2,558	8,938	15,317	21,697	28,077										
76.07	84	3.91	6.96	2,684	9,379	16,074	22,768	----- / 23.59										
77.88	86	3.82	6.80	2,814	9,831	16,848	23,865	----- / 23.59										
79.69	88	3.73	6.65	2,946	10,293	17,641	24,988	----- / 22.62										
81.50	90	3.65	6.50	3,081	10,767	18,452	26,137	----- / 22.62										

Meters

ACTUAL SIDEWALL HEIGHT
NUMBER OF RINGS (courses)

Meters

ACTUAL SIDEWALL HEIGHT
NUMBER OF RINGS (courses)

TANK DIAMETER (Meters)	23.69 16	25.16 17	26.64 18	28.11 19	29.58 20	31.06 21	32.53 22	34.00 23	35.47 24	36.95 25	38.42 26	39.89 27	41.37 28	42.84 29	44.31 30
2.81	143 / 23.98	152 / 25.46	161 / 26.93	170 / 28.40	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----	-----
3.75	254 / 23.98	270 / 25.46	287 / 26.93	303 / 28.40	319 / 29.88	335 / 31.35	352 / 32.82	368 / 34.30	384 / 35.77	401 / 37.24	417 / 38.72	-----	-----	-----	-----
4.69	397 / 23.98	422 / 25.46	448 / 26.93	473 / 28.40	499 / 29.88	524 / 31.35	550 / 32.82	575 / 34.30	601 / 35.77	626 / 37.24	651 / 38.72	677 / 40.19	702 / 41.66	728 / 43.14	753 / 44.61
5.63	572 / 23.98	608 / 25.46	645 / 26.93	682 / 28.40	718 / 29.88	755 / 31.35	791 / 32.82	828 / 34.30	865 / 35.77	901 / 37.24	938 / 38.72	975 / 40.19	1,011 / 41.66	1,048 / 43.14	1,085 / 44.61
6.57	778 / 23.98	828 / 25.46	878 / 26.93	928 / 28.40	978 / 29.88	1,027 / 31.35	1,077 / 32.82	1,127 / 34.30	1,177 / 35.77	1,227 / 37.24	1,277 / 38.72	1,327 / 40.19	1,376 / 41.66	1,426 / 43.14	1,476 / 44.61
7.50	1,016 / 23.98	1,081 / 25.46	1,146 / 26.93	1,212 / 28.40	1,277 / 29.88	1,342 / 31.35	1,407 / 32.82	1,472 / 34.30	1,537 / 35.77	1,602 / 37.24	1,668 / 38.72	1,733 / 40.19	1,798 / 41.66	1,863 / 43.14	1,928 / 44.61
8.44	1,286 / 23.98	1,369 / 25.46	1,451 / 26.93	1,533 / 28.40	1,616 / 29.88	1,698 / 31.35	1,781 / 32.82	1,863 / 34.30	1,946 / 35.77	2,028 / 37.24	2,111 / 38.72	2,193 / 40.19	2,275 / 41.66	2,358 / 43.14	2,440 / 44.61
9.06	1,480 / 23.98	1,575 / 25.46	1,670 / 26.93	1,765 / 28.40	1,860 / 29.88	1,955 / 31.35	2,049 / 32.82	2,144 / 34.30	2,239 / 35.77	2,334 / 37.24	2,429 / 38.72	2,524 / 40.19	2,619 / 41.66	2,714 / 43.14	2,809 / 44.61
9.96	1,791 / 23.98	1,906 / 25.46	2,021 / 26.93	2,135 / 28.40	2,250 / 29.88	2,365 / 31.35	2,480 / 32.82	2,595 / 34.30	2,709 / 35.77	2,824 / 37.24	2,939 / 38.72	3,054 / 40.19	3,169 / 41.66	3,284 / 43.14	3,398 / 44.61
10.87	2,131 / 23.98	2,268 / 25.46	2,405 / 26.93	2,541 / 28.40	2,678 / 29.88	2,815 / 31.35	2,951 / 32.82	3,088 / 34.30	3,225 / 35.77	3,361 / 37.24	3,498 / 38.72	3,634 / 40.19	3,771 / 41.66	3,908 / 43.14	4,044 / 44.61
11.77	2,502 / 23.98	2,662 / 25.46	2,822 / 26.93	2,983 / 28.40	3,143 / 29.88	3,303 / 31.35	3,464 / 32.82	3,624 / 34.30	3,784 / 35.77	3,945 / 37.24	4,105 / 38.72	4,265 / 40.19	4,426 / 41.66	4,586 / 43.14	4,746 / 44.61
12.68	2,901 / 23.98	3,087 / 25.46	3,273 / 26.93	3,459 / 28.40	3,645 / 29.88	3,831 / 31.35	4,017 / 32.82	4,203 / 34.30	4,389 / 35.77	4,575 / 37.24	4,761 / 38.72	4,947 / 40.19	5,133 / 41.66	5,222 / 42.37	
13.58	3,330 / 23.98	3,544 / 25.46	3,757 / 26.93	3,971 / 28.40	4,184 / 29.88	4,398 / 31.35	4,611 / 32.82	4,825 / 34.30	5,038 / 35.77	5,252 / 37.24	5,465 / 38.72	5,568 / 39.42			
14.49	3,789 / 23.98	4,032 / 25.46	4,275 / 26.93	4,518 / 28.40	4,761 / 29.88	5,004 / 31.35	5,247 / 32.82	5,490 / 34.30	5,732 / 35.77	----- / 120.25					
15.39	4,278 / 23.98	4,552 / 25.46	4,826 / 26.93	5,100 / 28.40	5,375 / 29.88	5,649 / 31.35	5,923 / 32.82	6,197 / 34.30	----- / 113.49						
16.30	4,796 / 23.98	5,103 / 25.46	5,411 / 26.93	5,718 / 28.40	6,026 / 29.88	6,333 / 31.35	6,640 / 32.82								
17.21	5,344 / 23.98	5,686 / 25.46	6,029 / 26.93	6,371 / 28.40	6,714 / 29.88	7,056 / 31.35									
18.11	5,921 / 23.98	6,300 / 25.46	6,680 / 26.93	7,059 / 28.40	7,439 / 29.88										
19.02	6,528 / 23.98	6,946 / 25.46	7,365 / 26.93	7,783 / 28.40											
19.92	7,164 / 23.98	7,623 / 25.46	8,083 / 26.93												
20.83	7,830 / 23.98	8,332 / 25.46	----- / 84.49												
21.73	8,526 / 23.98	----- / 80.62													
22.64	9,133														
23.54	----- / 74.82														

SPLIT-CELL CHART KEY:

363,833
50.65

1. Top number is tank volume based on INPUT of freeboard.
2. Bottom number is actual sidewall height.

NOTES:
1. 100 MPH wind speed
2. 25 PSF roof live load
3. Seismic zone = 0
4. Importance factor, I=1.25
5. Site amplification factor, S=1.5
6. Specific gravity = 1.0 @ STP