



**EARLE M. JORGENSEN
COMPANY**

REFERENCE BOOK

**ALLOY • ALUMINUM • BRASS • BRONZE
CARBON • CAST IRON • CHROME • NICKEL
STAINLESS • SUPER ALLOY • TITANIUM
BAR • PIPE • PLATE • SHEET • TUBE**

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SECTION S

WEIGHT TABLES

STEEL BARS

Rounds	2-3
Squares	3
Hexagons	4
Octagons	4
Flats	5-8

STEEL CIRCLES	9-10
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STEEL AND ALUMINUM WEIGHT FORMULAS	11
Bars, Tubing, Circles, Rings	

WEIGHT CONVERSION FACTORS	12
Aluminum, Steel, and Other Metals	

MILLIMETER CONVERSION CHART	13
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Weights for Other Products

Weights for Sheets, Plates, Shapes, Tubing, etc., will be found in connection with the listings of sizes in the preceding sections of this book.

WEIGHTS ARE FOR ESTIMATING PURPOSES ONLY

All weights in this book are theoretical; that is, they are computed on the basis of the specific gravities of the metals involved.

The weights shown would be accurate if steel and aluminum could always be produced to exact size, but this is seldom possible in commercial practice. Accuracy of dimensions, particularly of hot rolled steel products, is influenced by many factors, such as mill design, heating practice, reduction between passes, roll wear, roll pressure, composition of steel, and standard tolerances.

Therefore, all weight tables should be used for estimating purposes only.

STEEL WEIGHT TABLES



ROUNDS

Size in Inches	Weight in Pounds				Size in Inches	Weight in Pounds			
	Per Inch	Per Foot	12-Ft. Bar	20-Ft. Bar		Per Inch	Per Foot	12-Ft. Bar	20-Ft. Bar
1/8	.0035	.042	.50	.84	2	.8910	10.69	128.3	213.8
5/32	.0054	.065	.78	1.31	1/16	.9475	11.37	136.4	227.4
3/16	.0078	.094	1.13	1.88	1/8	1.006	12.07	144.8	241.4
7/32	.0107	.128	1.54	2.56	3/16	1.066	12.79	153.5	255.8
1/4	.0139	.167	2.01	3.34	1/4	1.128	13.53	162.4	270.6
9/32	.0176	.211	2.54	4.23	5/16	1.191	14.29	171.5	285.9
5/16	.0218	.261	3.13	5.22	3/8	1.256	15.08	180.9	301.5
11/32	.0263	.316	3.79	6.32	7/16	1.323	15.88	190.6	317.6
3/8	.0313	.376	4.51	7.52	1/2	1.392	16.71	200.5	334.1
13/32	.0368	.441	5.29	8.82	9/16	1.463	17.55	210.6	351.0
7/16	.0426	.512	6.14	10.23	5/8	1.535	18.42	221.0	368.4
15/32	.0489	.587	7.05	11.75	11/16	1.609	19.31	231.7	386.1
31/64	.0523	.627	7.53	12.54	3/4	1.684	20.21	242.6	404.3
1/2	.0557	.668	8.02	13.36	13/16	1.762	21.14	253.7	422.9
17/32	.0629	.754	9.05	15.09	7/8	1.841	22.09	265.1	441.9
9/16	.0705	.846	10.15	16.91	15/16	1.922	23.06	276.8	461.3
19/32	.0785	.942	11.31	18.85	3	2.005	24.06	288.7	481.1
39/64	.0827	.993	11.91	19.85	1/16	2.089	25.07	300.8	501.4
5/8	.0870	1.044	12.53	20.88	1/8	2.175	26.10	313.2	522.0
41/64	.0914	1.097	13.16	21.94	3/16	2.263	27.16	325.9	543.1
21/32	.0959	1.151	13.81	23.02	1/4	2.353	28.23	338.8	564.6
11/16	.1053	1.263	15.16	25.27	5/16	2.444	29.33	351.9	586.6
23/32	.1151	1.381	16.57	27.62	3/8	2.537	30.45	365.3	608.9
47/64	.1201	1.442	17.30	28.83	7/16	2.632	31.58	379.0	631.7
3/4	.1253	1.504	18.04	30.07	1/2	2.729	32.74	392.9	654.8
49/64	.1306	1.567	18.80	31.34	9/16	2.827	33.92	407.1	678.4
25/32	.1359	1.631	19.58	32.63	5/8	2.927	35.12	421.5	702.5
13/16	.1470	1.765	21.17	35.29	11/16	3.029	36.35	436.1	726.9
27/32	.1586	1.903	22.83	38.06	3/4	3.132	37.59	451.0	751.7
55/64	.1645	1.974	23.69	39.48	13/16	3.238	38.85	466.2	777.0
7/8	.1705	2.046	24.56	40.93	7/8	3.345	40.14	481.6	802.7
29/32	.1829	2.195	26.34	43.90	15/16	3.453	41.44	497.3	828.8
15/16	.1958	2.349	28.19	46.98	4	3.564	42.77	513.2	855.3
31/32	.2090	2.508	30.10	50.17	1/8	3.790	45.48	545.8	909.6
63/64	.2158	2.590	31.08	51.80	3/16	3.906	46.87	562.4	937.4
I	.2227	2.673	32.07	53.46	1/4	4.023	48.28	579.3	965.6
1/64	.2294	2.752	33.03	55.05	5/16	4.142	49.71	596.5	994.2
1/32	.2369	2.843	34.11	56.85	3/8	4.263	51.16	613.9	1023
1/16	.2515	3.017	36.21	60.35	7/16	4.386	52.63	631.6	1053
1/8	.2819	3.383	40.59	67.66	1/2	4.510	54.13	649.5	1083
3/16	.3141	3.769	45.23	75.38	9/16	4.637	55.64	667.7	1113
1/4	.3480	4.176	50.12	83.53	5/8	4.765	57.18	686.1	1143
5/16	.3837	4.604	55.25	92.09	11/16	4.894	58.73	704.8	1175
3/8	.4211	5.053	60.64	101.1	3/4	5.026	60.31	723.7	1206
7/16	.4603	5.523	66.28	110.5	7/8	5.294	63.52	762.3	1270
1/2	.5012	6.014	72.17	120.3	15/16	5.430	65.16	781.9	1303
9/16	.5438	6.526	78.31	130.5	5	5.569	66.82	801.9	1336
5/8	.5882	7.058	84.70	141.2	1/8	5.850	70.21	842.4	1404
11/16	.6343	7.612	91.34	152.2	1/4	6.139	73.67	884.0	1473
3/4	.6821	8.186	98.23	163.7	3/8	6.435	77.22	926.6	1544
13/16	.7317	8.781	105.4	175.6	7/16	6.586	79.03	948.3	1581
7/8	.7831	9.397	112.8	187.9	1/2	6.738	80.86	970.2	1617
15/16	.8361	10.03	120.4	200.7	5/8	7.048	84.57	1015	1691
					3/4	7.364	88.37	1060	1767
					15/16	7.852	94.23	1131	1885

(Continued next page)

STEEL WEIGHT TABLES

 ROUNDS					 SQUARES				
Weight in Pounds					Weight in Pounds				
Size in Inches	Per Inch	Per Foot	12-Ft. Bar	20-Ft. Bar	Size in Inches	Per Inch	Per Foot	12-Ft. Bar	20-Ft. Bar
6	8.019	96.22	1155	1924	1/8	.0044	.053	.64	1.06
1/4	8.701	104.4	1253	2088	3/16	.0100	.120	1.44	2.40
1/2	9.411	112.9	1355	2259	1/4	.0177	.213	2.55	4.25
3/4	10.15	121.8	1461	2436	5/16	.0277	.332	3.98	6.64
7	10.91	131.0	1572	2619	3/8	.0399	.479	5.74	9.57
1/4	11.71	140.5	1686	2810	7/16	.0543	.651	7.82	13.03
1/2	12.53	150.4	1804	3007	1/2	.0709	.851	10.21	17.02
3/4	13.38	160.5	1926	3211	9/16	.0897	1.077	12.92	21.54
8	14.26	171.1	2053	3421	5/8	.1108	1.329	15.95	26.59
1/4	15.16	181.9	2183	3638	1 1/16	.1340	1.609	19.30	32.17
1/2	16.09	193.1	2317	3862	3/4	.1595	1.914	22.97	38.29
3/4	17.05	204.6	2456	4093	1 3/16	.1872	2.247	26.96	44.93
9	18.04	216.5	2598	4330	7/8	.2171	2.606	31.27	52.11
1/4	19.06	228.7	2744	4574	1 5/16	.2493	2.991	35.89	59.82
1/2	20.10	241.2	2895	4824	1	.2836	3.403	40.84	68.06
3/4	21.17	254.1	3049	5082	1/16	.3202	3.842	46.10	76.84
10	22.27	267.3	3207	5346	1/8	.3589	4.307	51.69	86.14
1/4	23.40	280.8	3370	5616	3/16	.3999	4.799	57.59	95.98
1/2	24.56	294.7	3536	5894	1/4	.4431	5.381	63.81	106.4
3/4	25.74	308.9	3707	6178	5/16	.4885	5.863	70.36	117.3
11	26.95	323.4	3881	6468	3/8	.5362	6.434	77.21	128.7
1/2	29.46	353.5	4242	7070	1/2	.6381	7.657	91.89	153.1
12	32.07	384.9	4619	7698	9/16	.6924	8.309	99.71	166.2
1/2	34.80	417.6	5012	8353	5/8	.7489	8.987	107.8	179.7
13	37.64	451.7	5421	9034	3/4	.8685	10.42	125.1	208.4
1/2	40.59	487.1	5845	9743	7/8	.9970	11.96	143.6	239.3
14	43.66	523.9	6287	10478	2	1.134	13.61	163.4	272.3
15	50.12	601.4	7217	12028	1/8	1.281	15.37	184.4	307.4
16	57.02	684.3	8211	13685	1/4	1.436	17.23	206.7	344.6
1/2	60.64	727.7	8732	14554	3/8	1.600	19.20	230.4	383.9
17	64.37	772.5	9269	15449	1/2	1.773	21.27	255.2	425.4
1/2	68.21	818.6	9823	16371	5/8	1.954	23.45	281.4	469.0
18	72.17	866.0	10392	17320	3/4	2.145	25.74	308.8	514.7
19	80.41	964.9	11579	19298	7/8	2.344	28.13	337.6	562.6
20	89.10	1069	12830	21383	3	2.552	30.63	367.5	612.6
21	98.23	1179	14145	23575	1/4	2.996	35.95	431.4	718.9
22	107.8	1294	15524	25873	1/2	3.474	41.69	500.3	833.8
23	117.8	1414	16968	28280	3/4	3.988	47.86	574.3	957.2
24	128.3	1540	18475	30791	4	4.538	54.45	653.4	1089
25	139.3	1671	20052	33420	1/4	5.123	61.47	737.6	1229
26	150.6	1807	21682	36137	1/2	5.743	68.91	827.0	1378
27	162.4	1949	23388	38980	3/4	6.399	76.78	921.4	1536
28	174.6	2096	25152	41920	5	7.090	85.08	1021	1702
29	187.3	2248	26976	44960	1/2	8.579	102.9	1235	2059
30	200.5	2406	28872	48120	6	10.21	122.5	1470	2450
31	214.1	2569	30828	51380	7	13.90	166.8	2001	3335
32	228.1	2737	32844	54740	8	18.15	217.8	2614	4356
33	242.6	2911	34932	58220	9	22.97	275.6	3308	5512
34	257.5	3090	37080	61800	10	28.36	340.3	4084	6808
35	272.8	3274	39288	65480	12	40.84	490.0	5880	9800
36	288.7	3464	41568	69280	14	55.60	667.2	8004	13340
37	304.9	3659	43908	73180	16	72.60	871.2	10456	17424
38	321.7	3860	46320	77200	18	91.88	1102	13232	22048
39	338.8	4065	48780	81300					
40	356.4	4277	51324	85540					

Over 40" — Not usually supplied as bars.
See weights of steel circles on Pages 9
and 10 of this section.

STEEL WEIGHT TABLES



HEXAGONS



OCTAGONS

Weight in Pounds					Weight in Pounds				
Size in Inches	Per Inch	Per Foot	12-Ft. Bar	20-Ft. Bar	Size in Inches	Per Inch	Per Foot	12-Ft. Bar	20-Ft. Bar
3/16	.0086	.104	1.24	2.07	3/16	.0083	.099	1.19	1.98
1/4	.0154	.184	2.21	3.68	1/4	.0147	.176	2.11	3.52
5/16	.0240	.288	3.45	5.76	5/16	.0229	.275	3.30	5.51
3/8	.0345	.415	4.97	8.29	3/8	.0330	.397	4.76	7.93
7/16	.0470	.564	6.77	11.28	7/16	.0450	.540	6.48	10.79
1/2	.0614	.737	8.84	14.74	1/2	.0587	.705	8.46	14.10
9/16	.0777	.933	11.19	18.65	9/16	.0743	.892	10.70	17.84
5/8	.0959	1.151	13.82	23.03	5/8	.0918	1.101	13.21	22.02
11/16	.1161	1.393	16.72	27.86	11/16	.1110	1.333	16.00	26.66
3/4	.1382	1.658	19.89	33.16	3/4	.1322	1.586	19.03	31.72
13/16	.1621	1.946	23.35	38.91	13/16	.1551	1.861	22.33	37.22
7/8	.1880	2.257	27.08	45.13	7/8	.1799	2.159	25.91	43.18
15/16	.2159	2.590	31.08	51.81	15/16	.2065	2.478	29.74	49.56
1	.2456	2.947	35.37	58.95	1	.2349	2.819	33.83	56.38
1/16	.2773	3.327	39.93	66.54	1/16	.2652	3.183	38.20	63.66
1/8	.3108	3.730	44.76	74.60	1/8	.2973	3.568	42.82	71.36
3/16	.3463	4.156	49.87	83.12	3/16	.3313	3.976	47.71	79.52
1/4	.3838	4.605	55.26	92.10	1/4	.3671	4.405	52.86	88.10
5/16	.4231	5.077	60.93	101.5	5/16	.4047	4.857	58.28	97.14
3/8	.4643	5.572	66.87	111.4	3/8	.4442	5.330	63.96	106.6
7/16	.5075	6.090	73.08	121.8	7/16	.4855	5.826	69.91	116.5
1/2	.5526	6.631	79.56	132.6	1/2	.5286	6.343	76.12	126.9
9/16	.5996	7.196	86.35	143.9	9/16	.5736	6.883	82.60	137.7
5/8	.6485	7.783	93.39	155.7	5/8	.6204	7.445	89.34	148.9
11/16	.6994	8.393	100.7	167.9	11/16	.6690	8.028	96.34	160.6
3/4	.7522	9.026	108.3	180.5	3/4	.7195	8.634	103.6	172.7
13/16	.8068	9.682	116.2	193.6	13/16	.7718	9.262	111.1	185.4
7/8	.8634	10.36	124.3	207.2	7/8	.8260	9.912	118.9	198.2
15/16	.9220	11.06	132.8	221.3	15/16	.8819	10.58	127.0	211.6
2	.9824	11.79	141.5	235.8	2	.9398	11.28	135.4	225.6
1/8	1.109	13.31	159.7	266.2	1/8	1.061	12.73	152.8	254.6
3/16	1.175	14.10	169.2	282.1	3/16	1.124	13.49	161.9	269.8
1/4	1.243	14.92	179.0	298.4	1/4	1.189	14.27	171.2	285.4
3/8	1.385	16.62	199.5	332.5	3/8	1.325	15.90	190.8	318.0
7/16	1.459	17.51	210.1	350.2	7/16	1.396	16.75	201.0	335.0
1/2	1.535	18.42	221.0	368.4	1/2	1.468	17.62	211.4	352.4
5/8	1.692	20.31	243.7	406.2	5/8	1.619	19.43	233.2	388.6
3/4	1.857	22.29	267.5	445.8	3/4	1.777	21.32	255.8	426.4
7/8	2.030	24.36	292.3	487.2	7/8	1.942	23.30	279.6	466.0
3	2.210	26.53	318.3	530.5	3	2.114	25.37	304.4	507.4
1/8	2.398	28.78	345.4	575.6	1/8	2.294	27.53	330.4	550.6
1/4	2.594	31.13	373.6	622.6	1/2	2.878	34.54	414.5	690.8
1/2	3.009	36.10	433.2	722.1					
3/4	3.454	41.45	497.3	828.9					
4	3.930	47.16	565.9	943.1					

STEEL WEIGHT TABLES



FLATS

Weight in Pounds					Weight in Pounds				
Size in Inches	Per Inch	Per Foot	12-Ft. Bar	20-Ft. Bar	Size in Inches	Per Inch	Per Foot	12-Ft. Bar	20-Ft. Bar
$\frac{1}{16}$					$\frac{3}{16}$				
x $\frac{1}{4}$	.0044	.053	.64	1.06	x $\frac{1}{4}$	.0133	.160	1.91	3.19
$\frac{3}{8}$	.0066	.080	.96	1.60	$\frac{5}{16}$	.0166	.199	2.39	3.99
$\frac{1}{2}$	.0089	.106	1.28	2.13	$\frac{3}{8}$	.0199	.239	2.87	4.79
$\frac{5}{8}$	.0111	.133	1.60	2.66	$\frac{7}{16}$	.0233	.279	3.35	5.58
$\frac{3}{4}$	.0133	.160	1.91	3.19	$\frac{1}{2}$	.0266	.319	3.83	6.38
$\frac{7}{8}$	.0155	.186	2.23	3.72	$\frac{5}{8}$	.0332	.399	4.79	7.98
1	.0177	.213	2.55	4.25	$\frac{3}{4}$	.0399	.479	5.74	9.57
1 $\frac{1}{8}$	.0199	.239	2.87	4.79	$\frac{7}{8}$	.0465	.558	6.70	11.17
1 $\frac{1}{4}$	.0222	.266	3.19	5.32	1	.0532	.638	7.66	12.76
1 $\frac{1}{2}$	.0266	.319	3.83	6.38	1 $\frac{1}{8}$	.0598	.718	8.61	14.36
1 $\frac{3}{4}$	.0310	.372	4.47	7.45	1 $\frac{1}{4}$	.0665	.798	9.57	15.95
2	.0355	.425	5.11	8.51	1 $\frac{3}{8}$	.0731	.877	10.53	17.55
2 $\frac{1}{2}$	.0443	.532	6.38	10.64	1 $\frac{1}{2}$	.0798	.957	11.49	19.14
3	.0532	.638	7.66	12.76	1 $\frac{3}{4}$	.0931	1.117	13.40	22.33
$\frac{3}{32}$					2	.1064	1.276	15.31	25.52
x $\frac{3}{8}$	.0100	.120	1.44	2.39	2 $\frac{1}{4}$	.1196	1.436	17.23	28.71
$\frac{1}{2}$	.0133	.160	1.91	3.19	2 $\frac{1}{2}$	.1329	1.595	19.14	31.91
$\frac{5}{8}$	.0166	.199	2.39	3.99	2 $\frac{3}{4}$	.1462	1.755	21.06	35.10
$\frac{3}{4}$	.0199	.239	2.87	4.79	3	.1595	1.914	22.97	38.29
$\frac{7}{8}$	.0233	.279	3.35	5.58	3 $\frac{1}{2}$	.1861	2.233	26.80	44.67
1	.0266	.319	3.83	6.38	4	.2127	2.552	30.63	51.05
1 $\frac{1}{8}$	.0299	.359	4.31	7.18	4 $\frac{1}{2}$	.2393	2.871	34.46	57.43
1 $\frac{1}{4}$	.0332	.399	4.79	7.98	5	.2659	3.191	38.29	63.81
1 $\frac{1}{2}$	.0399	.479	5.74	9.57	6	.3191	3.829	45.94	76.57
1 $\frac{3}{4}$	.0465	.558	6.70	11.17	8	.4254	5.105	61.26	102.1
2	.0532	.638	7.66	12.76	10	.5318	6.381	76.57	127.6
2 $\frac{1}{2}$	.0665	.798	9.57	15.95	12	.6381	7.657	91.89	153.1
3	.0798	.957	11.49	19.14	$\frac{1}{4}$				
$\frac{1}{8}$					x $\frac{5}{16}$	.0222	.266	3.19	5.32
x $\frac{3}{16}$	.0066	.080	.96	1.60	$\frac{3}{8}$	.0266	.319	3.83	6.38
$\frac{1}{4}$	.0089	.106	1.28	2.13	$\frac{7}{16}$	.0310	.372	4.47	7.44
$\frac{5}{16}$	.0111	.133	1.60	2.66	$\frac{1}{2}$	.0355	.425	5.11	8.51
$\frac{3}{8}$	.0133	.160	1.91	3.19	$\frac{9}{16}$	.0399	.479	5.74	9.57
$\frac{1}{2}$	.0177	.213	2.55	4.25	$\frac{5}{8}$	.0443	.532	6.38	10.64
$\frac{5}{8}$	.0222	.266	3.19	5.32	$\frac{3}{4}$	.0532	.638	7.66	12.76
$\frac{3}{4}$	.0266	.319	3.83	6.38	$\frac{7}{8}$	.0620	.745	8.93	14.89
$\frac{7}{8}$	.0310	.372	4.47	7.45	1	.0709	.851	10.21	17.02
1	.0355	.425	5.11	8.51	1 $\frac{1}{8}$	.0798	.957	11.49	19.14
1 $\frac{1}{8}$	.0399	.479	5.74	9.57	1 $\frac{1}{4}$	.0886	1.064	12.76	21.27
1 $\frac{1}{4}$	.0443	.532	6.38	10.64	1 $\frac{3}{8}$	.0975	1.170	14.04	23.40
1 $\frac{1}{2}$	.0532	.638	7.66	12.76	1 $\frac{1}{2}$	.1064	1.276	15.31	25.52
1 $\frac{3}{4}$	.0620	.745	8.93	14.89	1 $\frac{5}{8}$	.1152	1.383	16.59	27.65
2	.0709	.851	10.21	17.02	1 $\frac{3}{4}$	.1241	1.489	17.87	29.78
2 $\frac{1}{4}$	.0798	.957	11.49	19.14	2	.1418	1.702	20.42	34.03
2 $\frac{1}{2}$	.0886	1.064	12.76	21.27	2 $\frac{1}{4}$	.1595	1.914	22.97	38.29
2 $\frac{3}{4}$	.0975	1.170	14.04	23.40	2 $\frac{1}{2}$	.1773	2.127	25.52	42.54
3	.1064	1.276	15.31	25.52	2 $\frac{3}{4}$	.1950	2.340	28.08	46.79
3 $\frac{1}{2}$	.1241	1.489	17.87	29.78	3	.2127	2.552	30.63	51.05
4	.1418	1.702	20.42	34.03	3 $\frac{1}{4}$	.2304	2.765	33.18	55.30
4 $\frac{1}{2}$	.1595	1.914	22.97	38.29	3 $\frac{1}{2}$	.2482	2.978	35.73	59.56
5	.1773	2.127	25.52	42.54	3 $\frac{3}{4}$	.2659	3.191	38.29	63.81
6	.2127	2.552	30.63	51.05	4	.2836	3.403	40.84	68.06
8	.2836	3.403	40.84	68.06	4 $\frac{1}{2}$	.3191	3.829	45.94	76.57
10	.3545	4.254	51.05	85.08	4 $\frac{3}{4}$	.3368	4.041	48.49	80.82
12	.4254	5.105	61.26	102.1	(Continued next page)				

STEEL WEIGHT TABLES



FLATS (Continued)

Weight in Pounds					Weight in Pounds				
Size in Inches	Per Inch	Per Foot	12-Ft. Bar	20-Ft. Bar	Size in Inches	Per Inch	Per Foot	12-Ft. Bar	20-Ft. Bar
$\frac{1}{4}$					$\frac{3}{8}$				
x 5	.3545	4.254	51.05	85.08	x 3	.3191	3.829	45.94	76.57
5 $\frac{1}{2}$	.3900	4.679	56.15	93.59	3 $\frac{1}{4}$	.3436	4.148	49.77	82.95
6	.4254	5.105	61.26	102.1	3 $\frac{3}{8}$	.3589	4.307	51.69	86.14
6 $\frac{1}{2}$	.4609	5.530	66.36	110.6	3 $\frac{1}{2}$	.3722	4.467	53.60	89.33
7	.4963	5.956	71.47	119.1	3 $\frac{3}{4}$	.3988	4.786	57.43	95.72
8	.5672	6.806	81.68	136.1	4	.4254	5.105	61.26	102.1
9	.6381	7.657	91.88	153.1	4 $\frac{1}{4}$	.4520	5.424	65.09	108.5
10	.7090	8.508	102.1	170.2	4 $\frac{1}{2}$	.4786	5.743	68.91	114.9
12	.8508	10.21	122.5	204.2	5	.5318	6.381	76.57	127.6
$\frac{5}{16}$					5 $\frac{1}{2}$	.5849	7.019	84.23	140.4
x $\frac{3}{8}$	.0332	.399	4.79	7.98	6	.6381	7.657	91.89	153.1
$\frac{1}{2}$	.0443	.532	6.38	10.64	6 $\frac{1}{2}$	.6913	8.295	99.54	165.9
$\frac{5}{8}$	.0554	.665	7.98	13.29	7	.7445	8.933	107.2	178.7
$\frac{3}{4}$	.0665	.798	9.57	15.95	8	.8508	10.21	122.5	204.2
$\frac{7}{8}$	.0775	.931	11.17	18.61	9	.9572	11.49	137.9	229.8
1	.0886	1.064	12.76	21.27	10	1.064	12.76	153.1	255.2
1 $\frac{1}{8}$	.0997	1.196	14.36	23.93	12	1.276	15.31	183.8	306.3
1 $\frac{1}{4}$	.1108	1.329	15.95	26.59	$\frac{7}{16}$				
1 $\frac{3}{8}$	.1219	1.462	17.55	29.25	x $\frac{1}{2}$	.0620	.745	8.93	14.89
1 $\frac{1}{2}$	.1329	1.595	19.14	31.91	$\frac{5}{8}$	.0775	.931	11.17	18.61
1 $\frac{5}{8}$	.1440	1.729	20.74	34.56	$\frac{3}{4}$	.0931	1.117	13.40	22.33
1 $\frac{3}{4}$	.1551	1.861	22.33	37.22	$\frac{7}{8}$	.1086	1.303	15.63	26.06
2	.1773	2.127	25.52	42.54	1	.1241	1.489	17.87	29.78
2 $\frac{1}{4}$	.1994	2.393	28.71	47.86	1 $\frac{1}{4}$	.1551	1.861	22.33	37.22
2 $\frac{1}{2}$	.2216	2.659	31.91	53.18	1 $\frac{1}{2}$	.1861	2.333	26.80	44.67
2 $\frac{3}{4}$	.2437	2.925	35.10	58.50	1 $\frac{3}{4}$	.2171	2.606	31.27	52.11
3	.2659	3.191	38.29	63.81	2	.2482	2.978	35.73	59.56
3 $\frac{1}{2}$	.3102	3.722	44.68	74.45	2 $\frac{1}{4}$	.2792	3.350	40.20	67.00
4	.3545	4.254	51.05	85.08	2 $\frac{1}{2}$	.3102	3.722	44.67	74.45
4 $\frac{1}{2}$	.3988	4.786	57.43	95.72	3	.3722	4.467	53.60	89.33
5	.4431	5.318	63.81	106.4	3 $\frac{1}{2}$	.4343	5.211	62.53	104.2
5 $\frac{1}{2}$	.4874	5.849	70.19	117.0	4	.4963	5.956	71.47	119.1
6	.5318	6.381	76.57	127.6	5	.6204	7.445	89.33	148.9
7	.6204	7.445	89.33	148.9	6	.7445	8.933	107.2	178.7
8	.7090	8.508	102.1	170.2	$\frac{1}{2}$				
10	.8863	10.64	127.6	212.7	x $\frac{5}{8}$	.0886	1.064	12.76	21.27
12	1.064	12.76	153.1	255.2	$\frac{3}{4}$	.1064	1.276	15.31	25.52
$\frac{3}{8}$					$\frac{7}{8}$	.1241	1.489	17.87	29.78
x $\frac{7}{16}$	.0465	.558	6.70	11.17	1	.1418	1.702	20.42	34.03
$\frac{1}{2}$	.0532	.638	7.66	12.76	1 $\frac{1}{8}$	.1595	1.914	22.97	38.29
$\frac{5}{8}$	.0665	.798	9.57	15.95	1 $\frac{1}{4}$	.1773	2.127	25.52	42.54
$\frac{3}{4}$	.0798	.957	11.49	19.14	1 $\frac{3}{8}$	.1950	2.340	28.08	46.79
$\frac{7}{8}$	.0931	1.117	13.40	22.33	1 $\frac{1}{2}$	.2127	2.552	30.63	51.05
1	.1064	1.276	15.31	25.52	1 $\frac{5}{8}$	.2304	2.765	33.18	55.30
1 $\frac{1}{8}$	.1196	1.436	17.23	28.71	1 $\frac{3}{4}$	.2482	2.978	35.73	59.56
1 $\frac{1}{4}$	.1329	1.595	19.14	31.91	2	.2836	3.403	40.84	68.06
1 $\frac{3}{8}$	.1462	1.755	21.06	35.10	2 $\frac{1}{4}$	.3191	3.829	45.94	76.57
1 $\frac{1}{2}$	.1595	1.914	22.97	38.29	2 $\frac{1}{2}$	.3545	4.254	51.05	85.08
1 $\frac{5}{8}$	.1728	2.074	24.89	41.48	2 $\frac{3}{4}$	.3900	4.679	56.15	93.59
1 $\frac{3}{4}$	.1861	2.233	26.80	44.67	3	.4254	5.105	61.26	102.1
2	.2127	2.552	30.63	51.05	3 $\frac{1}{4}$	.4609	5.530	66.36	110.6
2 $\frac{1}{4}$	.2393	2.871	34.46	57.43	3 $\frac{1}{2}$	.4963	5.956	71.47	119.1
2 $\frac{1}{2}$	.2659	3.191	38.29	63.81	3 $\frac{3}{4}$	.5813	6.381	76.57	127.6
2 $\frac{3}{4}$	.2925	3.510	42.11	70.19	4	.5672	6.806	81.68	136.1
					4 $\frac{1}{4}$	.6027	7.232	86.78	144.6

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STEEL WEIGHT TABLES



FLATS (Continued)

Weight in Pounds					Weight in Pounds				
Size in Inches	Per Inch	Per Foot	12-Ft. Bar	20-Ft. Bar	Size in Inches	Per Inch	Per Foot	12-Ft. Bar	20-Ft. Bar
1/2					3/4				
x 4 1/2	.6381	7.657	91.89	153.1	x 4	.8508	10.21	122.5	204.2
4 3/4	.6736	8.083	97.00	161.7	4 1/2	.9572	11.49	137.8	229.7
5	.7090	8.508	102.1	170.2	5	1.064	12.76	153.1	255.2
5 1/2	.7799	9.359	112.3	187.2	5 1/2	1.170	14.04	168.5	280.8
6	.8508	10.21	122.5	204.2	6	1.276	15.31	183.8	306.3
6 1/2	.9217	11.06	132.7	221.2	7	1.489	17.87	214.4	357.3
7	.9926	11.91	142.9	238.2	8	1.702	20.42	245.0	408.4
8	1.134	13.61	163.4	272.3	9	1.914	22.97	275.7	459.4
9	1.276	15.31	183.8	306.3	10	2.127	25.52	306.3	510.5
10	1.418	17.02	204.2	340.3	12	2.552	30.63	367.5	612.6
12	1.702	20.42	245.0	408.4	7/8				
5/8					x 1	.2482	2.978	35.73	59.56
x 3/4	.1329	1.595	19.14	31.91	1 1/8	.2792	3.350	40.20	67.00
7/8	.1551	1.861	22.33	37.22	1 1/4	.3102	3.722	44.67	74.45
1	.1773	2.127	25.52	42.54	1 3/8	.3412	4.094	49.13	81.89
1 1/8	.1994	2.393	28.71	47.86	1 1/2	.3722	4.467	53.60	89.33
1 1/4	.2216	2.659	31.91	53.18	1 3/4	.4343	5.211	62.53	104.2
1 3/8	.2437	2.925	35.10	58.49	2	.4963	5.956	71.47	119.1
1 1/2	.2659	3.191	38.29	63.81	2 1/4	.5583	6.700	80.40	134.0
1 5/8	.2880	3.456	41.47	69.12	2 1/2	.6204	7.445	89.33	148.9
1 3/4	.3102	3.722	44.67	74.45	2 3/4	.6824	8.189	98.27	163.8
2	.3545	4.254	51.05	85.08	3	.7445	8.933	107.2	178.7
2 1/4	.3988	4.786	57.43	95.72	3 1/2	.8685	10.42	125.1	208.4
2 1/2	.4431	5.318	63.81	106.4	4	.9926	11.91	142.9	238.2
2 3/4	.4874	5.849	70.19	117.0	4 1/2	1.117	13.40	160.8	268.0
3	.5318	6.381	76.57	127.6	5	1.241	14.89	178.7	297.8
3 1/4	.5761	6.913	82.95	138.3	6	1.489	17.87	214.4	357.3
3 1/2	.6204	7.445	89.33	148.9	7	1.737	20.84	250.1	416.9
4	.7090	8.508	102.1	170.2	8	1.985	23.82	285.9	476.4
4 1/2	.7976	9.572	114.9	191.4	10	2.482	29.78	357.4	595.6
5	.8863	10.64	127.6	212.7	12	2.975	35.73	428.4	714.7
5 1/2	.9749	11.70	140.4	234.0	1				
6	1.064	12.76	153.1	255.2	x 1 1/8	.3191	3.829	45.94	76.57
7	1.241	14.89	178.7	297.8	1 1/4	.3545	4.254	51.05	85.08
8	1.418	17.02	204.2	340.3	1 3/8	.3900	4.679	56.15	93.59
10	1.773	21.27	255.2	425.4	1 1/2	.4254	5.105	61.26	102.1
12	2.127	25.52	306.3	510.5	1 5/8	.4609	5.530	66.36	110.6
3/4					1 3/4	.4963	5.956	71.47	119.1
x 7/8	.1861	2.233	26.80	44.67	2	.5672	6.806	81.68	136.1
1	.2127	2.552	30.63	51.05	2 1/4	.6381	7.657	91.89	153.1
1 1/8	.2393	2.871	34.46	57.43	2 1/2	.7090	8.508	102.1	170.2
1 1/4	.2659	3.191	38.29	63.81	2 3/4	.7799	9.359	112.3	187.2
1 3/8	.2925	3.510	42.11	70.19	3	.8508	10.21	122.5	204.2
1 1/2	.3191	3.829	45.94	76.57	3 1/4	.9217	11.06	132.7	221.2
1 5/8	.3456	4.148	49.77	82.95	3 1/2	.9926	11.91	142.9	238.2
1 3/4	.3722	4.467	53.60	89.33	4	1.134	13.61	163.4	272.3
2	.4254	5.105	61.26	102.1	4 1/2	1.276	15.31	183.8	306.3
2 1/4	.4786	5.743	68.91	114.9	5	1.418	17.02	204.2	340.3
2 1/2	.5318	6.381	76.57	127.6	5 1/2	1.560	18.72	224.6	374.4
2 3/4	.5849	7.019	84.23	140.4	6	1.702	20.42	245.0	408.4
3	.6381	7.657	91.89	153.1	6 1/2	1.843	22.12	265.4	442.4
3 1/4	.6913	8.295	99.54	165.9	7	1.985	23.82	285.9	476.4
3 1/2	.7445	8.933	107.2	178.7	8	2.269	27.23	326.7	544.4
3 3/4	.7976	9.572	114.9	191.4	9	2.552	30.63	367.5	612.6
					10	2.836	34.03	408.4	680.6
					11	3.120	37.44	449.3	748.8
					12	3.403	40.84	490.1	816.8

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STEEL WEIGHT TABLES



FLATS (Continued)

Weight in Pounds					Weight in Pounds				
Size in Inches	Per Inch	Per Foot	12-Ft. Bar	20-Ft. Bar	Size in Inches	Per Inch	Per Foot	12-Ft. Bar	20-Ft. Bar
$1\frac{1}{8}$					$1\frac{3}{4}$				
x $1\frac{1}{4}$	.3988	4.786	57.43	95.72	x 2	.9926	11.91	142.9	238.2
1 $\frac{1}{2}$	.4786	5.743	68.92	114.9	2 $\frac{1}{4}$	1.117	13.40	160.8	268.0
1 $\frac{3}{4}$	.5583	6.700	80.40	134.0	2 $\frac{1}{2}$	1.241	14.89	178.7	297.8
2	.6381	7.657	91.89	153.1	2 $\frac{3}{4}$	1.365	16.38	196.5	327.6
2 $\frac{1}{4}$	.7179	8.614	103.4	172.3	3	1.489	17.87	214.4	357.3
2 $\frac{1}{2}$	.7976	9.572	114.9	191.4	3 $\frac{1}{2}$	1.737	20.84	250.1	416.9
3	.9572	11.49	137.8	229.7	4	1.985	23.82	285.9	476.4
4	1.276	15.31	183.8	306.3	4 $\frac{1}{2}$	2.233	26.80	321.6	536.0
5	1.595	19.14	229.7	382.9	5	2.482	29.78	357.3	595.6
6	1.914	22.97	275.7	459.4	6	2.978	35.73	428.8	714.7
$1\frac{1}{4}$					8	3.970	47.64	571.7	952.8
x $1\frac{3}{8}$	.4874	5.849	70.19	117.0	9	4.467	53.60	643.2	1072
1 $\frac{1}{2}$	.5318	6.381	76.57	127.6	10	4.963	59.56	714.7	1191
1 $\frac{5}{8}$	.5761	6.913	82.96	138.3	2				
1 $\frac{3}{4}$	.6204	7.445	89.33	148.9	x 2 $\frac{1}{4}$	1.276	15.31	183.8	306.3
2	.7090	8.508	102.1	170.2	2 $\frac{1}{2}$	1.418	17.02	204.2	340.3
2 $\frac{1}{4}$	.7976	9.572	114.9	191.4	2 $\frac{3}{4}$	1.560	18.72	224.6	374.4
2 $\frac{1}{2}$	.8863	10.64	127.6	221.7	3	1.702	20.42	245.0	408.4
2 $\frac{3}{4}$	.9749	11.70	140.4	234.0	3 $\frac{1}{4}$	1.843	22.12	265.4	442.4
3	1.064	12.76	153.1	255.2	3 $\frac{1}{2}$	1.985	23.82	285.9	476.4
3 $\frac{1}{4}$	1.152	13.82	165.8	276.4	3 $\frac{3}{4}$	2.127	25.52	306.2	510.4
3 $\frac{1}{2}$	1.241	14.89	178.7	297.8	4	2.269	27.23	326.7	544.5
3 $\frac{3}{4}$	1.329	15.95	191.4	319.0	4 $\frac{1}{2}$	2.552	30.63	367.5	612.6
4	1.418	17.02	204.2	340.3	5	2.836	34.03	408.4	680.6
4 $\frac{1}{2}$	1.595	19.14	229.7	382.9	5 $\frac{1}{2}$	3.120	37.44	449.3	748.8
5	1.773	21.27	255.2	425.4	6	3.403	40.84	490.1	816.8
5 $\frac{1}{2}$	1.950	23.40	280.8	467.9	7	3.970	47.64	571.7	952.9
6	2.127	25.52	306.3	510.5	8	4.538	54.45	653.4	1089
7	2.482	29.78	357.3	595.6	10	5.672	68.06	816.8	1361
8	2.836	34.03	408.4	680.6	12	6.806	81.68	980.1	1634
9	3.191	38.29	459.5	765.8	2 $\frac{1}{2}$				
10	3.545	42.54	510.5	850.8	x 2 $\frac{3}{4}$	1.949	23.40	280.8	468.0
12	4.254	51.05	612.6	1021	3	2.127	25.52	306.3	510.5
$1\frac{1}{2}$					3 $\frac{1}{2}$	2.482	29.78	357.3	595.6
x $1\frac{5}{8}$	.6913	8.295	99.54	165.9	4	2.836	34.03	408.4	680.6
1 $\frac{3}{4}$	.7445	8.933	107.2	178.7	4 $\frac{1}{2}$	3.191	38.29	459.4	765.7
2	.8508	10.21	122.5	204.2	5	3.545	42.54	510.5	850.8
2 $\frac{1}{4}$	.9572	11.49	137.8	229.7	5 $\frac{1}{2}$	3.900	46.79	561.5	935.8
2 $\frac{1}{2}$	1.064	12.76	153.1	255.2	6	4.254	51.05	612.6	1021
2 $\frac{3}{4}$	1.170	14.04	168.5	280.8	7	4.963	59.56	714.7	1191
3	1.276	15.31	183.8	306.3	8	5.672	68.06	816.8	1361
3 $\frac{1}{4}$	1.383	16.59	199.1	331.8	9	6.381	76.57	918.9	1531
3 $\frac{1}{2}$	1.489	17.87	214.4	357.3	10	7.090	85.08	1021	1702
4	1.702	20.42	245.0	408.4	11	7.799	93.59	1123	1872
4 $\frac{1}{2}$	1.914	22.97	275.7	459.4	12	8.508	102.1	1225	2042
5	2.127	25.52	306.3	510.5	3				
5 $\frac{1}{2}$	2.340	28.08	336.9	561.5	x 3 $\frac{1}{2}$	2.978	35.73	428.8	714.7
6	2.552	30.63	367.5	612.6	4	3.403	40.84	490.1	816.8
7	2.978	35.73	428.8	714.7	4 $\frac{1}{2}$	3.829	45.94	551.3	918.9
8	3.403	40.84	490.1	816.8	5	4.254	51.05	612.6	1021
9	3.829	45.94	551.3	918.8	6	5.105	61.26	735.1	1225
10	4.254	51.05	612.6	1021	7	5.957	71.47	857.6	1429
12	5.105	61.26	735.1	1225	8	6.806	81.68	980.1	1634
					10	8.508	102.1	1225	2042
					12	10.21	122.5	1470	2450

WEIGHTS OF STEEL CIRCLES

For Circumferences and Areas of Circles, see Section Q

Diameter In Inches	3/16" Thick	1/4" Thick	5/16" Thick	3/8" Thick	1/2" Thick	5/8" Thick	3/4" Thick	7/8" Thick	1" Thick
2	.17	.22	.28	.33	.45	.56	.67	.78	.89
1/4	.21	.28	.35	.42	.56	.70	.85	.99	1.13
1/2	.26	.35	.44	.52	.70	.87	1.04	1.22	1.39
3/4	.32	.42	.53	.63	.84	1.05	1.26	1.47	1.68
3	.38	.50	.63	.75	1.00	1.25	1.50	1.75	2.00
1/4	.44	.59	.74	.88	1.18	1.47	1.76	2.06	2.35
1/2	.51	.68	.85	1.02	1.36	1.71	2.05	2.39	2.73
3/4	.59	.78	.98	1.17	1.57	1.96	2.35	2.74	3.12
4	.67	.89	1.11	1.34	1.78	2.23	2.67	3.12	3.56
1/4	.75	1.01	1.26	1.51	2.01	2.51	3.02	3.52	4.02
1/2	.85	1.13	1.41	1.69	2.26	2.82	3.38	3.95	4.51
3/4	.94	1.26	1.57	1.88	2.51	3.14	3.77	4.40	5.03
5	1.04	1.39	1.74	2.09	2.78	3.48	4.18	4.87	5.57
1/4	1.15	1.53	1.92	2.30	3.07	3.84	4.60	5.37	6.14
1/2	1.26	1.68	2.11	2.53	3.37	4.21	5.05	5.90	6.74
3/4	1.38	1.84	2.30	2.76	3.68	4.60	5.52	6.44	7.36
6	1.50	2.00	2.51	3.01	4.01	5.01	6.01	7.02	8.02
1/4	1.63	2.18	2.72	3.26	4.35	5.44	6.53	7.61	8.70
1/2	1.76	2.35	2.94	3.53	4.71	5.88	7.06	8.23	9.41
3/4	1.90	2.54	3.17	3.81	5.07	6.34	7.61	8.88	10.15
7	2.05	2.73	3.41	4.09	5.46	6.82	8.19	9.55	10.91
1/4	2.20	2.93	3.66	4.39	5.85	7.32	8.78	10.24	11.71
1/2	2.35	3.13	3.92	4.70	6.26	7.83	9.40	10.96	12.53
3/4	2.51	3.34	4.18	5.02	6.69	8.36	10.03	11.71	13.38
8	2.67	3.56	4.46	5.35	7.13	8.91	10.69	12.47	14.26
1/4	2.84	3.79	4.74	5.69	7.58	9.47	11.37	13.27	15.16
1/2	3.18	4.02	5.03	6.04	8.05	10.06	12.07	14.08	16.09
3/4	3.20	4.26	5.33	6.40	8.53	10.66	12.79	14.92	17.05
9	3.38	4.51	5.64	6.77	9.02	11.28	13.53	15.79	18.04
1/4	3.57	4.76	5.96	7.15	9.53	11.91	14.29	16.68	19.06
1/2	3.77	5.03	6.28	7.54	10.05	12.56	15.08	17.59	20.10
3/4	3.97	5.29	6.62	7.94	10.59	13.23	15.88	18.53	21.17
10	4.18	5.57	6.96	8.35	11.14	13.92	16.71	19.49	22.27
1/4	4.39	5.85	7.31	8.78	11.70	14.63	17.55	20.48	23.40
1/2	4.60	6.14	7.67	9.21	12.28	15.35	18.42	21.49	24.56
3/4	4.83	6.44	8.04	9.65	12.87	16.09	19.31	22.52	25.74
11	5.05	6.74	8.42	10.11	13.48	16.84	20.21	23.58	26.95
1/4	5.29	7.05	8.81	10.57	14.10	17.62	21.14	24.67	28.19
1/2	5.52	7.37	9.21	11.05	14.73	18.41	22.09	25.78	29.46
3/4	5.77	7.69	9.61	11.53	15.38	19.22	23.06	26.91	30.75
12	6.01	8.02	10.02	12.03	16.04	20.05	24.06	28.07	32.07
1/4	6.27	8.36	10.45	12.53	16.71	20.89	25.07	29.25	33.42
1/2	6.53	8.70	10.88	13.05	17.40	21.75	26.10	30.45	34.80
3/4	6.79	9.05	11.32	13.58	18.10	22.63	27.16	31.68	36.21
13	7.06	9.41	11.76	14.12	18.82	23.53	28.23	32.94	37.64
1/4	7.33	9.78	12.22	14.66	19.55	24.44	29.33	34.22	39.10
1/2	7.61	10.15	12.69	15.22	20.30	25.37	30.45	35.52	40.59
3/4	7.90	10.53	13.16	15.79	21.06	26.32	31.58	36.85	42.11
14	8.18	10.92	13.64	16.37	21.83	27.29	32.74	38.20	43.66
1/4	8.48	11.31	14.14	16.96	22.62	28.27	33.92	39.58	45.23
1/2	8.78	11.71	14.64	17.56	23.42	29.27	35.12	40.98	46.83
3/4	9.09	12.12	15.14	18.17	24.23	30.29	36.35	42.40	48.46
15	9.40	12.53	15.66	18.79	25.06	31.32	37.59	43.85	50.12
1/4	9.71	12.95	16.19	19.43	25.90	32.38	38.85	45.33	51.80
1/2	10.03	13.38	16.72	20.07	26.76	33.45	40.14	46.82	53.51
3/4	10.36	13.81	17.27	20.72	27.36	34.53	41.44	48.35	55.25
16	10.69	14.26	17.82	21.38	28.51	35.64	42.77	49.84	57.02
1/4	11.03	14.71	18.38	22.06	29.41	36.76	44.11	51.47	58.82
1/2	11.37	15.16	18.95	22.74	30.38	37.90	45.48	53.06	60.64
3/4	11.72	15.62	19.53	23.44	31.25	39.06	46.87	54.68	62.49

(Continued next page)

For Circumferences and Areas of Circles, see Section Q

For Circumferences and Areas of Circles, see Section Q

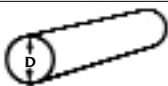
LARGER DIAMETERS

Page 10

WEIGHT FORMULAS

Steel bar weights are based on .2836 lb. per cubic inch. Aluminum weights are based on .098 lb. per cubic inch, which applies to 1100 alloy. (See next page for conversion factors for other alloys.)

ROUNDS



Steel:

Lbs. per lineal foot = $2.6729 \times D^2$

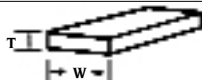
Lbs. per lineal inch = $.22274 \times D^2$

Aluminum:

Lbs. per lineal foot = $.924 \times D^2$

D = Size in inches

FLATS



Steel:

Lbs. per lineal foot = $3.4032 \times T \times W$

Lbs. per lineal inch = $.2836 \times T \times W$

Aluminum:

Lbs. per lineal foot = $1.18 \times T \times W$

T = Thickness in inches

W = Width in inches

SQUARES



Steel:

Lbs. per lineal foot = $3.4032 \times D^2$

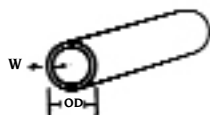
Lbs. per lineal inch = $.2836 \times D^2$

Aluminum:

Lbs. per lineal foot = $1.18 \times D^2$

D = Size in inches

TUBING



Steel:

Lbs. per lineal foot = $10.68 \times (OD - W) \times W$

Lbs. per lineal inch = $.89 \times (OD - W) \times W$

Aluminum:

Lbs. per lineal foot = $3.70 \times (OD - W) \times W$

OD = Outside Diameter to 3 decimal places

W = Wall Thickness to 3 decimal places

HEXAGONS



Steel:

Lbs. per lineal foot = $2.9473 \times D^2$

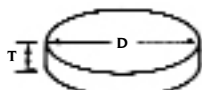
Lbs. per lineal inch = $.2456 \times D^2$

Aluminum:

Lbs. per lineal foot = $1.02 \times D^2$

D = Size in inches

CIRCLES



Steel:

Wt. of Circle in Lbs. = $.22274 \times T \times D^2$

Aluminum:

Wt. of Circle in Lbs. = $.077 \times T \times D^2$

D = Diameter in inches

T = Thickness in inches

OCTAGONS



Steel:

Lbs. per lineal foot = $2.8193 \times D^2$

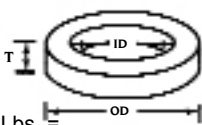
Lbs. per lineal inch = $.23494 \times D^2$

Aluminum:

Lbs. per lineal foot = $.974 \times D^2$

D = Size in inches

RINGS



Steel:

Wt. of Ring in Lbs. = $.22274 \times T \times (OD^2 - ID^2)$

Aluminum:

Wt. of Ring in Lbs. =

$.077 \times T \times (OD^2 - ID^2)$

OD = Outside Diameter in inches

ID = Inside Diameter in inches

T = Thickness in inches

WEIGHT CONVERSION FACTORS

To Obtain Weight of	Density (Weight Lbs. per Cubic Inch)	Multiply Weight of Steel by	To Obtain Weight of	Density (Weight Lbs. per Cubic Inch)	Multiply Weight of Steel by
Aluminum	0.098	.3462	Gold	0.698	2.466
			Tungsten	0.697	2.462
1100 Aluminum	0.098	.3462	Tantalum	0.600	2.120
2011 Aluminum	0.102	.3604	Lead	0.410	1.448
			Silver	0.379	1.339
2014 Aluminum	0.101	.3568	Molybdenum	0.369	1.303
			Copper	0.324	1.144
2017 Aluminum	0.101	.3568	Nickel	0.322	1.137
2024 Aluminum	0.101	.3568	Columbium	0.310	1.095
			Brass	0.307	1.084
3003 Aluminum	0.099	.3498	Monel	0.307	1.084
			Stainless Steels		
5005 Aluminum	0.098	.3462	300 Series	0.286	1.010
5052 Aluminum	0.097	.3427	400 Series	0.283	1.000
			Carbon and Alloy		
5056 Aluminum	0.095	.3356	Steels	0.283	1.000
5083 Aluminum	0.096	.3392	Tin	0.264	0.932
			Cast Iron	0.258	0.911
5086 Aluminum	0.096	.3392	Zirconium	0.230	0.812
			Titanium Com'l Pure	0.163	0.575
6061 Aluminum	0.098	.3462	Titanium 3AL 2½ V	0.162	0.572
			Beryllium	0.067	0.236
6063 Aluminum	0.097	.3427	Magnesium	0.065	0.229
			Gray Iron	0.260	0.919
7075 Aluminum	0.101	.3568	Ductile Iron	0.255	0.901
7178 Aluminum	0.102	.3604			

MILLIMETERS CONVERTED TO DECIMAL AND FRACTIONAL INCHES

Milli- meters	Decimal Inches	Fractional Inches (to nearest 64th)	Milli- meters	Decimal Inches	Fractional Inches (to nearest 64th)	Milli- meters	Decimal Inches	Fractional Inches (to nearest 64th)
1	.0394	$\frac{3}{64}$	34	1.339	$1\frac{11}{32}$	67	2.638	$2\frac{41}{64}$
2	.0787	$\frac{5}{64}$	35	1.378	$1\frac{3}{8}$	68	2.677	$2\frac{43}{64}$
3	.1181	$\frac{1}{8}$	36	1.417	$1\frac{27}{64}$	69	2.717	$2\frac{23}{32}$
4	.1575	$\frac{5}{32}$	37	1.457	$1\frac{29}{64}$	70	2.756	$2\frac{3}{4}$
5	.1969	$\frac{13}{64}$	38	1.496	$1\frac{1}{2}$	71	2.795	$2\frac{51}{64}$
6	.2362	$\frac{15}{64}$	39	1.535	$1\frac{17}{32}$	72	2.835	$2\frac{53}{64}$
7	.2756	$\frac{9}{32}$	40	1.575	$1\frac{37}{64}$	73	2.874	$2\frac{7}{8}$
8	.3150	$\frac{5}{16}$	41	1.614	$1\frac{39}{64}$	74	2.913	$2\frac{29}{32}$
9	.3543	$\frac{23}{64}$	42	1.654	$1\frac{21}{32}$	75	2.953	$2\frac{61}{64}$
10	.3937	$\frac{25}{64}$	43	1.693	$1\frac{11}{16}$	76	2.992	$2\frac{63}{64}$
11	.4331	$\frac{7}{16}$	44	1.732	$1\frac{47}{64}$	77	3.031	$3\frac{1}{32}$
12	.4724	$\frac{15}{32}$	45	1.772	$1\frac{49}{64}$	78	3.071	$3\frac{5}{64}$
13	.5118	$\frac{33}{64}$	46	1.811	$1\frac{13}{16}$	79	3.110	$3\frac{7}{64}$
14	.5512	$\frac{35}{64}$	47	1.850	$1\frac{27}{32}$	80	3.150	$3\frac{5}{32}$
15	.5906	$\frac{19}{32}$	48	1.890	$1\frac{57}{64}$	81	3.189	$3\frac{3}{16}$
16	.6299	$\frac{5}{8}$	49	1.929	$1\frac{59}{64}$	82	3.228	$3\frac{15}{64}$
17	.6693	$\frac{43}{64}$	50	1.969	$1\frac{31}{32}$	83	3.268	$3\frac{17}{64}$
18	.7087	$\frac{45}{64}$	51	2.008	$2\frac{1}{64}$	84	3.307	$3\frac{5}{16}$
19	.7480	$\frac{3}{4}$	52	2.047	$2\frac{3}{64}$	85	3.346	$3\frac{11}{32}$
20	.7874	$\frac{25}{32}$	53	2.087	$2\frac{3}{32}$	86	3.386	$3\frac{25}{64}$
21	.8268	$\frac{53}{64}$	54	2.126	$2\frac{1}{8}$	87	3.425	$3\frac{27}{64}$
22	.8661	$\frac{55}{64}$	55	2.165	$2\frac{11}{64}$	88	3.465	$3\frac{15}{32}$
23	.9055	$\frac{29}{32}$	56	2.205	$2\frac{13}{64}$	89	3.504	$3\frac{1}{2}$
24	.9449	$\frac{15}{16}$	57	2.244	$2\frac{1}{4}$	90	3.543	$3\frac{35}{64}$
25	.9843	$\frac{63}{64}$	58	2.283	$\frac{29}{32}$	91	3.583	$3\frac{37}{64}$
26	1.024	$1\frac{1}{32}$	59	2.323	$2\frac{21}{64}$	92	3.622	$3\frac{5}{8}$
27	1.063	$1\frac{1}{16}$	60	2.362	$2\frac{23}{64}$	93	3.661	$3\frac{21}{32}$
28	1.102	$\frac{17}{64}$	61	2.402	$2\frac{13}{32}$	94	3.701	$3\frac{45}{64}$
29	1.142	$\frac{19}{64}$	62	2.441	$\frac{27}{16}$	95	3.740	$3\frac{47}{64}$
30	1.181	$\frac{13}{16}$	63	2.480	$2\frac{31}{64}$	96	3.780	$3\frac{25}{32}$
31	1.220	$\frac{17}{32}$	64	2.520	$2\frac{33}{64}$	97	3.819	$3\frac{13}{16}$
32	1.260	$1\frac{17}{64}$	65	2.559	$\frac{29}{16}$	98	3.858	$3\frac{55}{64}$
33	1.299	$1\frac{19}{64}$	66	2.598	$2\frac{19}{32}$	99	3.898	$3\frac{57}{64}$
						100	3.937	$3\frac{15}{16}$

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