1-1 Single Wire ASTM B415-92

Size AWG	Diameter		Ultimate tensile strength		Breaking load		Weight		Resistance at 20°C		Cross section		
	in.	mm	ksi	kg/mm²	lb.	kg	lb./1,000 ft.	kg/km	Ω/1,000 ft.	Ω/km	C mils	in²	mm²
4	0.2043	5.189	155	109.0	5,081	2,304.6	93.63	139.34	1.222	4.010	41,740	0.03278	21.15
	0.1880	4.775	160	112.5	(4,441)	(2,014.6)	(79.29)	(118.0)	(1.443)	(4.735)	(35,340)	(0.02776)	(17.91)
5	0.1819	4.620	165	116.0	4,290	1,945.9	74.25	110.50	1.541	5.056	33,090	0.02599	16.77
	0.1729	4.392	170	119.5	(3,991)	(1,810.4)	(67.09)	(99.84)	(1.706)	(5.598)	(29,900)	(0.02348)	(15.15)
6	0.1620	4.114	175	123.0	3,608	1,636.6	58.88	87.62	1.943	6.375	26,240	0.02061	13.30
	0.1549	3.934	180	126.6	(3,392)	(1,538.8)	(53.84)	(80.13)	(2.126)	(6.974)	(24,000)	(0.01885)	(12.16)
7	0.1443	3.665	185	130.1	3,025	1,372.1	46.69	69.48	2.450	8.038	20,820	0.01635	10.55
	0.1369	3.477	190	133.6	(2,796)	(1,268.5)	(42.04)	(62.57)	(2.722)	(8.931)	(18,740)	(0.01472)	(9.495)
8	0.1285	3.264	195	137.1	2,529	1,147.1	37.03	55.11	3.089	10.135	16,510	0.01297	8.367
9	0.1144	2.906	195	137.1	2,005	909.4	29.37	43.71	3.896	12.783	13,090	0.01028	6.632
10	0.1019	2.588	195	137.1	1,590	721.2	23.29	34.66	4.912	16.116	10,380	0.008155	5.261
11	0.0907	2.304	195	137.1	1,261	571.9	18.47	27.49	6.194	20.322	8,230	0.006460	4.168
12	0.0808	2.052	195	137.1	1,000	453.6	14.65	21.80	7.811	25.627	6,530	0.005130	3.310

Coefficient of linear expansion: 0.000 0007 2/deg F (12.96 x 10^{-4}/deg C)
Modulus of elasticity: 23,500 ksi (16.520 kg/mm²)
Temperature coefficient of resistance: 0.0020/deg F (0.0036/deg C)
Min. aluminum thickness: 10% of nominal wire radius