

AWG Table - American Strand Construction

AWG - American Wire Gauge



In the North American economic area, the dimensions of copper conductors for high voltage and telecommunications purposes are usually given in AWG numbers*. In Germany, Europe and many other parts of the world, we speak of metric cross-sections in mm².

AWG means American Wire Gauge and represents the actual cable cross-section in mm² & conductor resistance. HEW uses the list below for this purpose.

AWG	UL 758 - Table 5.1				HEW standard (based on MIL)						
	Solid conductor (mm)		Stranded conductor (mm ²)		Cross section mm ²	Conductor structure			Conductor resistance at 20°C max. Ohm/km		
	nom.	min.	nom.	min.		Anzahl	x	mm	tp	sp	np
32	0.203	0.201	0.0324	0.0318	0.034	7	x	0.079	620	567	607
31	0.226	0.224	0.0401	0.393	-						
30	0.254	0.251	0.0507	0.497	0.057	7	x	0.102	374	330	363
29	0.287	0.284	0.0647	0.0633	-						
28	0.320	0.318	0.0804	0.0790	0.089	7	x	0.127	225	209	223
27	0.361	0.358	0.102	0.100	-						
26	0.404	0.399	0.128	0.126	0.141	7	x	0.160	142	133	141
					0.155	19	x	0.102	135	126	138
25	0.455	0.450	0.162	0.159	-						
24	0.511	0.506	0.205	0.201	0.227	7	x	0.203	88.6	82.7	86.9
					0.241	19	x	0.127	85.9	79.7	84.9
23	0.574	0.569	0.259	0.254	-						
22	0.643	0.635	0.324	0.318	0.355	7	x	0.254	56.1	52.1	54.4
					0.382	19	x	0.160	53.1	49.5	52.5
21	0.724	0.716	0.412	0.404	-						
20	0.813	0.805	0.519	0.509	0.563	7	x	0.320	35.1	32.8	34.1
					0.616	19	x	0.203	32.4	30.1	32.0
19	0.912	0.904	0.653	0.641	-						
18	1.02	1.016	0.823	0.807	0.897	7	x	0.404	21.9	20.6	21.3
					0.963	19	x	0.254	20.4	19.0	20.0
17	1.15	1.140	1.04	1.02	-						
16	1.29	1.278	1.31	1.28	1.229	19	x	0.287	15.7	14.8	15.6
15	1.45	1.435	1.65	1.62	-						
14	1.63	1.613	2.08	2.04	1.941	19	x	0.361	10.03	9.44	9.84
13	1.83	1.80	2.63	2.58	-						
12	2.05	2.03	3.31	3.24	3.085	19	x	0.455	6.29	5.94	6.17
11	2.30	2.29	4.17	4.09	-						
10	2.58	2.57	5.261	5.16	4.743	37	x	0.404	4.13	3.90	4.07
9	2.906	2.87	6.631	6.50	-						
8	3.264	3.23	8.367	8.20	8.604	133	x	0.287	2.30	2.16	2.28
7	3.665	3.63	10.55	10.34	-						
6	4.115	4.06	13.30	13.03	13.613	133	x	0.361	1.45	1.37	1.43
5	4.620	4.57	16.77	16.43	-						
4	5.189	5.13	21.15	20.73	21.153	133	x	0.450	0.918	0.865	0.902
3	5.827	5.77	26.67	26.14	-						
2	6.543	6.48	33.62	32.95	33.696	665	x	0.254	0.600	0.557	0.580
1	7.348	7.26	42.41	41.56	41.398	817	x	0.254	0.488	0.455	0.472
0	8.252	8.18	53.49	52.42	52.951	1045	x	0.254	0.380	0.354	0.370
00	9.226	9.17	67.43	66.08	67.392	1330	x	0.254	0.298	0.278	0.291
0000	10.40	10.31	85.01	83.31	106.865	2109	x	0.254	0.183	0.177	0.183
00000	11,68	11,56	107,2	105,1	-						