

MaxGen Silicone Copper Wire Ampacity Chart**	Strands	Cross-Section Area	Outside Diameter	Optimal	Acceptable	Poor	Burst*
AWG	0.08mm <sup>2</sup>	mm <sup>2</sup>	mm	<26°C	<55°C	<80°C	<2s
24AWG	40	0.2	1.6	3A	5A	7.5A	15A
22AWG	60	0.3	1.7	5A	9A	12.5A	23A
20AWG	100	0.5	1.8	10A	15A	20A	35A
18AWG	150	0.8	2.3	15A	20A	30A	50A
16AWG	250	1.3	3.0	20A	30A	40A	85A
14AWG	400	2.1	3.5	30A	40A	50A	120A
12AWG	680	3.4	4.5	40A	60A	75A	200A
10AWG	1050	5.3	5.5	55A	80A	100A	300A
8AWG	1650	8.4	6.5	70A	100A	140A	450A
7AWG	2400	13	7.2	90A	130A	175A	650A
6AWG	3200	16	8.5	125A	175A	225A	900A
4AWG	5000	25	12	175A	250A	350A	1400A
2AWG	10000	50	13	250A	375A	500A	2800A

Results based on combination of manufacturer datasheet and community made datasheets and real life test.

Generally you should spec between Optimal and Acceptable. Don't overthink it, Acceptable is totally fine.

\*Burst rating is just a ratio calculation, you could do more over less time. For pulse (<0.2s) you can easily double the numbers.

\*\*All measurements & results have ±10% maximum error.

\*\*\*This sheet is only for use with hobby size electronics. (short runs max 2M (6ft)) If using more than 2M you must spec Optimal.

MaxGen INC 2024 (CA)