Suggested Ampacities for Copper

All types of Insulations
Based on the National Electrical Code

AMPERES PER CONDUCTOR 100% LOAD FACTOR						
Size AWG or MCM	No more than 3 conductors in raceway or cable		Single conductor in free air			
	Conductor Temperature Rating		Conductor Temperature Rating			
	85-90°C (185 F)	**110°C** (230 F)	**85-90°C** (185 F)	**110°C** (230 F)	**125°C** (257 F)	**200°C** (392 F)
14	25	30	30	40	40	45
12	30	35	40	50	50	55
10	40	45	55	65	70	75
8	55	60	75	85	90	100
6	70	80	100	120	125	135
4	95	105	135	160	170	180
2	125	135	185	210	225	240
1	145	160	215	245	265	280
1/0	165	190	250	285	305	325
2/0	190	215	290	330	355	370
3/0	215	245	335	385	410	430
4/0	250	275	390	445	475	510
250	275	315	440	495	530	–
300	310	345	485	555	590	–
350	340	390	550	610	655	–
400	365	420	595	665	710	–
500	415	470	675	765	815	–
600	460	525	750	855	910	–
700	500	560	825	940	1005	–
750	515	580	855	980	1045	–
800	535	600	885	1020	1085	–
900	565	–	950	–	–	–
1000	590	680	1020	1165	1240	–
Correction factors for various ambient air temperatures						
40C	0.90	0.94	0.90	0.94	0.95	–
50	0.80	0.87	0.80	0.87	0.89	–
60	0.67	0.79	0.67	0.79	0.83	0.91
70	0.52	0.71	0.52	0.71	0.76	0.87
80	0.30	0.61	0.30	0.61	0.69	0.84
90	–	0.5	–	0.50	0.61	0.80
100	–	–	–	–	0.51	0.77
120	–	–	–	–	–	0.69
140	–	–	–	–	–	

Based on ambient temperature of 30°C (86 F).