

CURRENT CARRYING CAPACITY OF ROUND NICKEL CHROMIUM RESISTANCE WIRE



Degrees F		400	600	800	1000	1200	1400
A.W.G.	Inches Dia.	Amperes					
15	0.057	7.2	10	12.8	16.1	20	24.5
16	0.051	6.4	8.7	10.9	13.7	17	20.9
17	0.045	5.5	7.5	9.5	11.7	14.5	17.6
18	0.04	4.8	6.5	8.2	10.1	12.2	14.8
19	0.036	4.3	5.8	7.2	8.7	10.6	12.7
20	0.032	3.8	5.1	6.3	7.6	9.1	11
21	0.0285	3.3	4.3	5.3	6.5	7.8	9.4
22	0.0253	2.9	3.7	4.5	5.6	6.8	8.2
23	0.0226	2.58	3.3	4	4.9	5.9	7
24	0.0201	2.21	2.9	3.4	4.2	5.1	6
25	0.0179	1.92	2.52	3	3.6	4.3	5.2
26	0.0159	1.67	2.14	2.6	3.2	3.8	4.5
27	0.0142	1.44	1.84	2.25	2.73	3.3	3.9
28	0.0126	1.24	1.61	1.95	2.38	2.85	3.4
29	0.0113	1.08	1.41	1.73	2.1	2.51	2.95
30	0.01	0.92	1.19	1.47	1.78	2.14	2.52
31	0.0089	0.77	1.03	1.28	1.54	1.84	2.17
32	0.008	0.68	0.9	1.13	1.36	1.62	1.89
33	0.0071	0.59	0.79	0.97	1.17	1.4	1.62
34	0.0063	0.5	0.68	0.83	1	1.2	1.41
35	0.0056	0.43	0.57	0.72	0.87	1.03	1.21
36	0.005	0.38	0.52	0.63	0.77	0.89	1.04
37	0.0045	0.35	0.46	0.57	0.68	0.78	0.9
38	0.004	0.3	0.41	0.5	0.59	0.68	0.78
39	0.0035	0.27	0.36	0.42	0.49	0.58	0.66
40	0.0031	0.24	0.31	0.36	0.43	0.5	0.57

**CURRENT CARRYING CAPACITY OF RIBBON
NICKEL CHROMIUM RESISTANCE WIRE**

Thickness Inches	Width-Inches					
	1/64	1/32	1/16	3/32	1/8	3/16
	Amperes					
0.0063	1.56	2.89	5.5	8.2	10.1	16.6
0.0056	1.45	2.69	5.2	7.2	9.5	15.6
0.005	1.35	2.52	4.9	6.8	9	14.7
0.0045	1.26	2.38	4.6	6.4	8.5	14
0.004	1.18	2.23	4.1	6	8	13.1
0.0035	1.09	2.07	3.8	5.6	7.5	12.3
0.0031	1.01	1.94	3.6	5.3	7	11.5
0.002	***	***	***	***	***	***
0.0015	4	***	***	***	***	***

**CURRENT CARRYING CAPACITY OF FG INSULATED WIRE,
VARYING WIRE METAL, AMBIENT 86°F**

(AWG)	Copper	Ni-Clad Copper	Nickel
24	7.5	5.3	3.1
22	10	7	4.1
20	13	9.1	5.4
18	17	11.9	7.1
16	22	15.4	9.2
14	30	21	12.5
12	40	28	16.8
10	50	35	21
8	65	45.5	27
6	85	59.5	36
4	115	80.5	48
3	131	91.7	55
2	147	103	62
1	172	120.4	72

**CURRENT CARRYING CAPACITY OF COPPER WIRE,
VARYING INSULATION, AMBIENT 86°F**

(AWG)	Rubber Type R, RU, RW	Rubber Type RII	Thermoplastic Type I, IW
14	15	15	15
12	20	20	20
10	30	30	30
8	40	45	40
6	55	65	55
4	70	85	70
3	80	100	80
2	95	115	95
1	110	130	110
0	125	150	125
00	145	175	145