



Wire Guide

Maximum Wire Length for 0.5 Voltage Drop

* Include return wire length (i.e. ground path)

WIRE GAUGE	Maximum Current In Amps													
	1	2	3	4	5	7.5	10	15	20	25	30	35	40	50
18	91	45	30	23	18	12	9	6	5					
16	116	58	39	29	23	16	12	8	6	5				
14	185	93	62	46	37	25	19	12	9	7	6	5		
12	294	147	98	74	59	39	29	20	15	12	10	8	7	6
10	455	227	152	114	91	61	45	30	23	18	15	13	11	9
8	714	357	238	179	143	95	71	48	36	29	24	20	18	14
ATO Fuse Color	Black	Gray	Violet	Pink	Tan	Brown	Red	Blue	Yellow	White	Green	Blu/Grn	Orange	Red

Maximum wire length in feet [multiply by 0.3048 to convert to meters]

Wire Insulation O.D.

WIRE GAUGE	Insulation Diameter in Inches [MM]			
	Metric Wire Size [mm ²]	TXL	GXL	SXL
18	0.80	0.08 [2.0]	0.09 [2.3]	0.11 [2.7]
16	1.00	0.09 [2.3]	0.10 [2.6]	0.12 [3.0]
14	2.00	0.10 [2.5]	0.12 [3.0]	0.14 [3.6]
12	3.00	0.12 [2.9]	0.14 [3.6]	0.16 [4.1]
10	5.00	0.15 [3.8]	0.17 [4.4]	0.19 [5.0]
8	8.00	0.18 [4.6]	0.21 [5.3]	0.23 [5.8]



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Voltage Drop Through Connectors*

TERMINAL	Current in Amps RESULTS BELOW in Millivolts DC								
	5	7.5	10	15	20	25	30	35	40
0.250" Blade	2	4	5	7	10	12	15	17	20
630 Metri-Pack	5	7	10	15	20	25	30	35	
280 Metri-Pack	6	9	12	18	23	29	35		
Weather-Pack	9	14	18	27	36				
150 Metri-Pack	13	20	26	39					
100 Micro-Pack	19	29	38						
Deutsch Size 12	2	3	4	7	9	11			
Deutsch Size 16	4	6	8	13					
Deutsch Size 20	9	13							
Thermostat	61	70							
ISO Relay	46	54	62	79	95	111	128	144	161
Butt Splice	1	2	2	3	4	5	6	7	8
Ring Terminal	2	3	3	5	7	9	10	12	14

* Millivolt drop through connector terminals/components @ 20°C

Estimate only - values may vary due to condition and age of terminal/component and other ambient conditions.

Consult manufacturer for specific information and usage limitations.