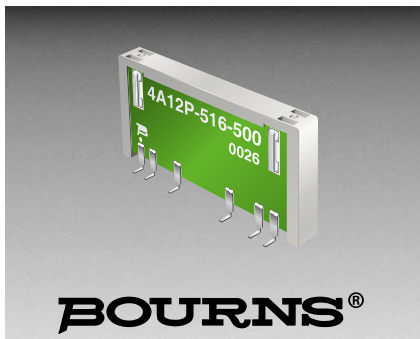




Features

- Overcurrent/lightning protection to BELLCORE GR-1089
- Typical application is secondary protection on telecom line cards
- UL497A recognition
- Thermal fuse links

4A12P-516-500 - Surge Line Protection Module

Electrical Characteristics

Resistance Value.....	50 Ω
Resistance Tolerance.....	$\pm 1\%$
TCR.....	100 ppm/ $^{\circ}\text{C}$
Ratio Tolerance.....	$\pm 0.5\%$
Temperature Range.....	-40 $^{\circ}\text{C}$ to +85 $^{\circ}\text{C}$

Physical Characteristics

Body Style	Dual In Line SMD - Twin Pack
Substrate Material	96 % Alumina
Lead Frame Material.....	Copper, solder coated
Flammability	Conforms to UL94V-0
Processability.....	Unit is only suitable for no-clean processing
Convection Reflow.....	Unit will withstand 260 $^{\circ}$, 20 seconds
Packaging	16 " diameter reels, 44 mm tape, 250 pcs./reel

Functional Characteristics (per Belcore GR-1089)

First Level Lightning Surge -

Resistors will remain within tolerance after testing.

1000 Volts Peak, 100 Amp Peak Current,
Max. Rise/Min. Decay Time 10x1000 μs ,
60 Seconds Between Pulses:
Number of Pulses25 each resistor each polarity

2500 Volts Peak, 500 Amp Peak Current,
Max. Rise/Min. Decay Time 2x10 μs ,
60 Seconds Between Pulses:
Number of Pulses10 simultaneous each polarity

First Level AC Power Fault -

Resistors will remain within tolerance after testing.

50 Vrms, 0.33 Amp Short Circuit Current:
Duration.....15 minutes

100 Vrms, 0.17 Amp Short Circuit Current:
Duration.....15 minutes

600 Vrms, 1.00 Amp Short Circuit Current:
Duration.....60 One-second pulses

Second Level Lightning Surge -

Resistor package must fail safely causing no fire, electrical, or fragmentation hazard.

5000 Volts Peak, 500 Amp Peak Current,
Max. Rise/Min. Decay Time 2x10 μs :
Number of Pulses1 simultaneous each polarity

Second Level AC Power Fault -

Resistor package must fail safely causing no fire, electrical, or fragmentation hazard. Device will fail prior to Bussman MDQ 1-6/10 A fuse in series.

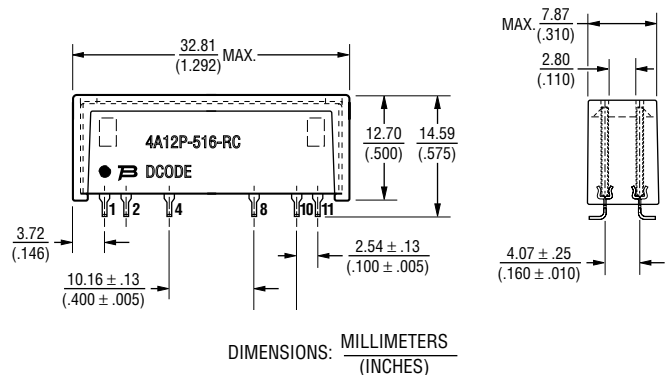
100 Vrms, 2.2 Amp Short Circuit Current:
Duration.....15 minutes

600 Vrms, 7 Amp Short Circuit Current:
Duration.....5 seconds

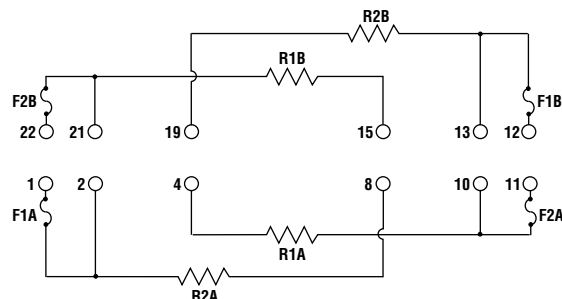
250 Vrms, 25 Amp Short Circuit Current:
Duration.....15 minutes

600 Vrms, 60 Amp Short Circuit Current:
Duration.....5 seconds

Product Dimensions



Electrical Schematic



How To Order

Model	4A 12 P - 516 - 500
(4A = Surface Mount)	
Number of Pins	
Physical Configuration	
Electrical Configuration	516 = Matched pair of resistors plus thermal fuse
Resistance Code	
• 500 = 50 Ω	



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