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CONTROL CONCEPTS

- Series-connected DIN/flange mount high-frequency noise filter/surge suppressor. Ideal applications include critical industrial loads drawing up to 20 amps of continuous current. Typical applications include any microprocessor-based products, including industrial PLCs, OEM applications, and motion control systems.

FEATURES

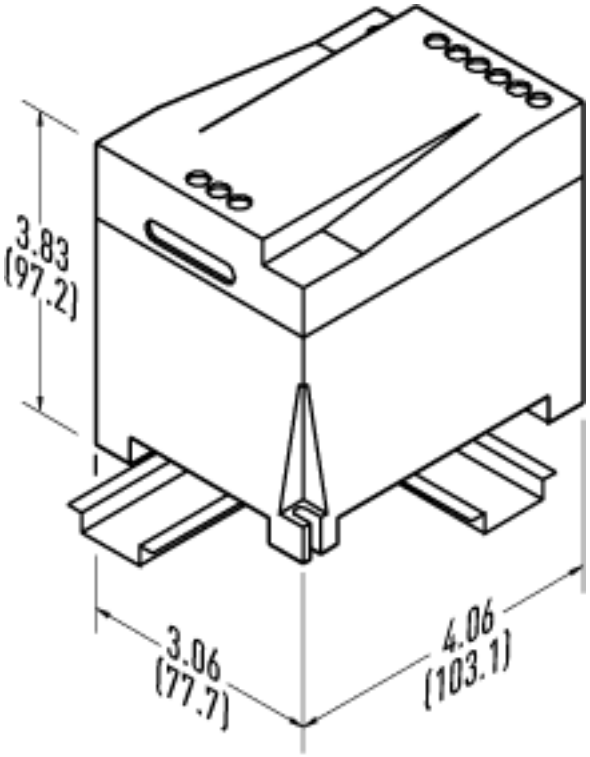
- Multi-staged design, combining a unique hybrid clamping network with the Active Tracking Technology of the Islatrol® family
- Surge current capacity—45,000 Amps
- Transient protection in all modes: line to neutral, line to ground, and neutral to ground
- LED status indication and form C contact for remote indication
- DIN mountable enclosure
- UL 1449, 1283, CUL recognized, CE
- 10-year warranty

GENERAL TECHNICAL SPECIFICATIONS

PERFORMANCE TECHNICAL SPECIFICATIONS

MCOV	
120 Volt	150 VRMS
240 Volt	275 VRMS
Line Frequency	47–63 Hz
Connection	Terminal
Mounting Type	DIN/Flange
Weight	< 3 lbs
Response Time	
Normal Mode	< 0.5 ns
Common Mode	< 5 ns
Operating Temperature	–40ºC to +45ºC
Derate Linearly to 60% at +70ºC	
Operating Humidity	0% to 95%

DIMENSIONAL DIAGRAM



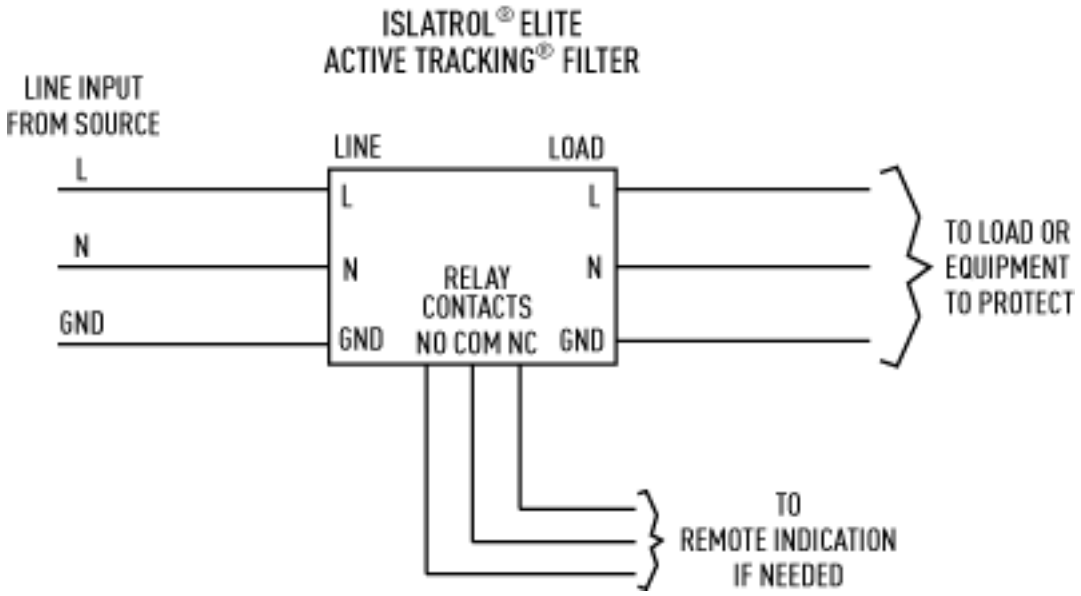
Metric Dimensions in mm
(shown in parentheses)

UL 1449 Classification	
120V Normal Mode	330 Volts
120V Common Mode	400 Volts
240V Normal Mode	600 Volts
240V Common Mode	800 Volts
Peak Surge Current Capability (8 x 20 µs)	
Line to Neutral	15,000 Amps
Line to Ground	15,000 Amps
Neutral to Ground	15,000 Amps
Total	45,000 Amps
Frequency Response (Forward-Reverse)	
Normal Mode	10 kHz to 50 MHz— 90 dB Min
Common Mode	5 MHz to 50 MHz— 60 dB Min
Typical Category A Ringwave (6 kV, 200A, 100 kHz)	
Normal Mode/Common Mode	
3 Amp	1V / 300V
5 Amp	0.7V / 292V
10 Amp	0.7V / 300V
20 Amp	0.7V / 300V
Typical Category B Ringwave (6 kV, 500A, 100 kHz)	
Normal Mode/Common Mode	
3 Amp	178V / 300V
5 Amp	162V / 291V
10 Amp	153V / 300V
20 Amp	200V / 300V

ORDERING INFORMATION

Voltage*	Continuous Current	Model
120V	3 Amps	IE-103
120V	5 Amps	IE-105
120V	10 Amps	IE-110
120V	20 Amps	IE-120
240V	3 Amps	IE-203
240V	5 Amps	IE-205
240V	10 Amps	IE-210
240V	20 Amps	IE-220
** All voltage configurations are single phase—2 wire + gnd.*		

CONNECTION DIAGRAM



SYSTEM DESIGN