

# ZoneBarrier Power

Protects 24Vac lines and equipment from surges and transients



- For 24Vac applications
- Expandable, modular protection for one to an unlimited number of ports
- Hybrid protection circuitry including Metal Oxide Varistors and Silicon Avalanche Diode technology
- Easy installation - DIN rail or wall mounting
- 10 year product warranty



The **ZoneBarrier Power Series** is a uniquely modular protection device for 24Vac systems. By providing an effective barrier between uncontrolled transient environments and your valuable electronic systems, the ZoneBarrier Power Series protects your business from costly system downtime and equipment failure.

The **sophisticated hybrid circuitry** employed by the ZoneBarrier Power Series protects your equipment without impeding normal operation. ZoneBarrier protection components comprise of a combination of high energy Metal Oxide Varistors (MOVs) along with a network of Silicon Avalanche Diodes (SADs). This combination of high quality surge protection components give the ZoneBarrier Series its characteristic low let-through voltage and 3kA surge current capacity which provides excellent protection. ZoneBarrier 24Vac power devices have easy to use terminal strip connectors (plug and header).

**Designed for power applications**, the ZoneBarrier Series offers a flexible surge protection solution that is capable of growing with your requirements. A ZoneBarrier Power module can be used as a stand-alone device or in conjunction with ZoneBarrier Network or ZoneBarrier Telecom devices forming a building block in a surge protection solution as simple or as complex as your requirements; now and in the future.

**One simple manual operation clamps modules securely onto DIN rail**, an action that also automatically provides the essential high-integrity ground connection. Standard 'Top-hat' (T-section) DIN rail is generally suitable for mounting ZoneBarrier Series modules. Where a number of ZoneBarrier Series modules are mounted on one rail, any that are incorrectly mounted (and therefore not securely grounded) are very obvious and can easily be

remounted correctly. The ZoneBarrier Series also has two mounting feet at either end of the unit, enabling mounting to a flat surface such as a cabinet wall.

**Additional protection** should be provided for other systems which may be interconnected e.g. telephone wiring, fire and security systems, IT networks etc. Other ZoneBarrier modules are available to meet these requirements, contact your local supplier for details.

## AC Power Protection

# Specification

All figures typical at 77°F (25°C) unless otherwise stated

## Maximum load current

10 Amps

## Ambient temperature limits

-40°F to +185°F (working)

-40°C to +85°C (working)

## Humidity

95% RH (non-condensing)

## Casing

Molded plastic

## Weight

2.8 oz (0.08Kg)

## Dimensions

See figure 1

## EMC compliance

BS EN 60950: 1992

BS EN 61000-6-2: 1999

## Installation

All ZoneBarrier modules are installed in-line and are identified with "Protected" and "Unprotected" for fail-safe installation.

### DIN rail mounting (figure 2)

ZoneBarrier modules can be mounted on any standard T-section ("Top-hat") DIN rail or on the optional 19" DIN rail assembly. To attach the ZoneBarrier module to the DIN rail, simply locate the DIN rail foot of the module over the edge of the DIN rail and then push the ZoneBarrier firmly to secure the unit into place. *Note the DIN rail must be properly grounded.*

### Stand-alone installation (figure 3)

To install a ZoneBarrier module as a stand-alone protector, attach a ground lead to the supplied ring terminal and secure this with the self tapping screw provided to the base of the unit. Using screws (or bolts), mount the module on any flat surface.

## To order specify –

90543

## Mounting options

**21605** 5" DIN rail for up to 4 ZoneBarriers

**21649** 17.5" DIN rail for up to 16 ZoneBarriers

**24500** 19" DIN rail (with mounting brackets) for up to 32 ZoneBarriers

Note: In accordance with our policy of continuous improvement, we reserve the right to change the product's specification without notice.

Model	Type	Wires	Maximum surge current (kA)*	Working voltage (V)	Let-through voltage (V)^	Maximum continuous operating voltage (V)	Connectors
90543	24Vac/10A	2 x 2 plus shield	3	24	58	33Vac	Terminal strip

\* 8/20μs per wire ^ @ 3kA 8/20μs

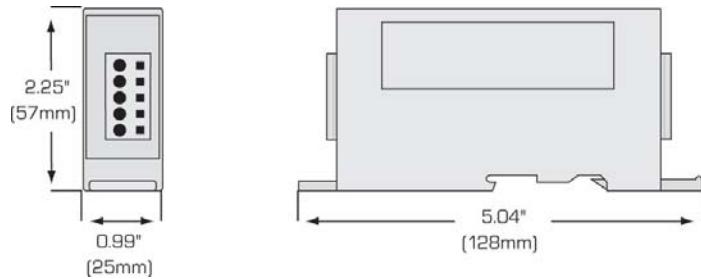


Figure 1 Dimensions

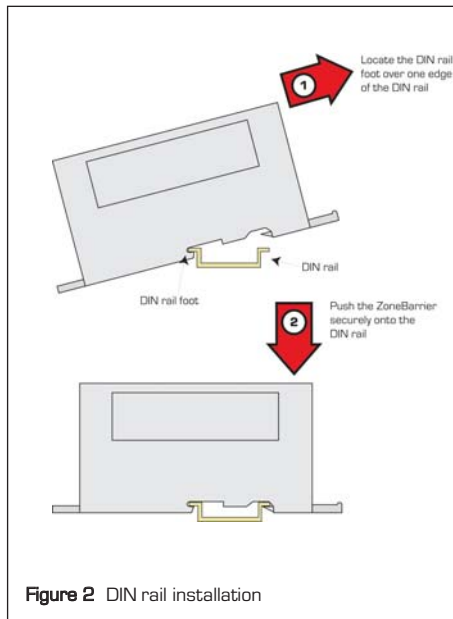


Figure 2 DIN rail installation

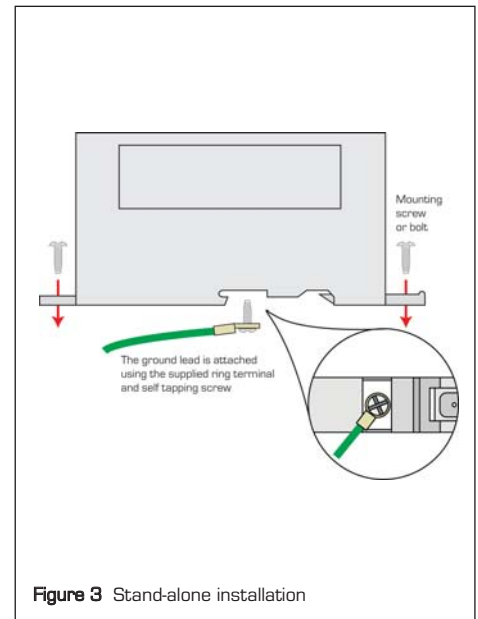


Figure 3 Stand-alone installation