

Submittal Spec Sheet ETSP Series Data Line Surge Protection



Ideal for LAN, Data, Signal and Instrumentation Interfaces

Introduction

The ETSP Series of terminal strip protectors will ensure the reliable operation of networked equipment connected to RS-422, RS-232, Muxes, DDS, Analog Dial-up, ISDN, T1 and most other communication interfaces.

ETSPs Offer

- State-of-the-art, avalanche diode and thyristor technology
- · Compact, in-line installation
- High speed, high energy handling capability
- · Low shunt capacitance to reduce signal loss

You Receive

- Affordable, superior, equipment protection
- Improved reliability and maximized system up-time
- · Protection at the interface card
- Adaptability to most industry applications

The ETSP Series devices will guard sensitive data networks against lightning induced surges, AC power interference, electrostatic discharge, and ground loop energies.

Typical applications include: data communications and instrumentation interfaces using RS-422, RS-232, Muxes, CSU/DSU, T1, PLCs, and most other communication interfaces.

When installed on the system I/O ports, ETSPs prevent equipment damage and system errors which are a common result of transient surge energies induced onto the communications interface and ground plane.

ETSPs utilize low capacitance avalanche diode arrays for low loss, high speed protection. These field-proven circuits offer the most dependable protection available for today's highly sensitive electronic systems.

Whether you need to protect a single communication line, or an entire installation, Eaton's protectors are an easy, cost-effective solution to overvoltage problems.

Installation

To install, insert the protector in series between the incoming communication line and the I/O port of the equipment to be protected. The protector ground wire must be connected to the metal chassis of the equipment being protected. Units should be installed at both ends of the data cable for the most effective protection.

Caution!

Ground wire MUST be grounded directly to the metal chassis of the equipment being protected. The equipment chassis MUST be connected to earth through a properly grounded AC power receptacle.

Warranty

Eaton Corporation offers a standard 5-year warranty for data communications surge protection. For more information, visit www.EatonElectrical.com.

Electrical Specifications

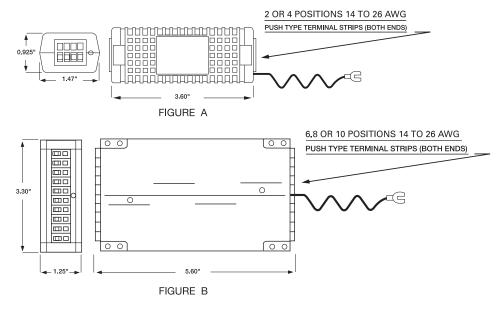
Specification	Standard Clamp Voltage	Peak Pulse Current (10/1000 us s.c. Waveform @Vcl)	Response Time	Maximum Shunt Capacitance
10Base-T Ethernet	7.5 Volts	132 Amps	< 5 Nanoseconds	<40 pF
RS-422, RS-485, RS-423	7.5 Volts	132 Amps	< 5 Nanoseconds	<40 pF
RS-232 or Digital 4 – 20 mA Current Loop	18 Volts	60 Amps	< 5 Nanoseconds	<40 pF
Analog 4 – 20 mA Current Loop	27 Volts	40 Amps	< 5 Nanoseconds	<40 pF
CSU/DSU, T1, DDS, ISDN (Fused)	60 Volts	50 Amps	< 5 Nanoseconds	<75 pF
Dial-up/Modem/Fax (Fused)	240 Volts	75 Amps	< 5 Nanoseconds	<95 pF

System Application and Catalog Number ®

Connector Type	10Base-T Ethernet, RS-422, RS-485, RS-423	RS-232 or Digital 4 – 20 mA Current Loop	Analog 4 – 20 mA Current Loop	CSU/DSU, T1, DDS, ISDN (Fused)	Dial-up/Modem/Fax (Fused)
2 Terminal Barrier Strip (Figure A)	ETSP-2B-E	ETSP-2B-T	ETSP-2B-A	ETSP-2B-B	ETSP-2B-G
4 Terminal Barrier Strip (Figure A)	ETSP-4B-E	ETSP-4B-T	ETSP-4B-A	ETSP-4B-B	ETSP-4B-G
6 Terminal Barrier Strip (Figure B) ^②	ETSP-6B-E	ETSP-6B-T	ETSP-6B-A	ETSP-6B-B	ETSP-6B-G
8 Terminal Barrier Strip (Figure B) ^③	ETSP-8B-E	ETSP-8B-T	ETSP-8B-A	ETSP-8B-B	ETSP-8B-G
10 Terminal Barrier Strip (Figure B)	ETSP-10B-E	ETSP-10B-T	ETSP-10B-A	ETSP-10B-B	ETSP-10B-G
32 Terminal Barrier Strip (Not Shown)	ETSP-32B-E	ETSP-32B-T	ETSP-32B-A	ETSP-32B-B	ETSP-32B-G

① See Ordering Guidelines below.

Note: Special configurations available.



Note: All specifications and dimensions are subject to change without notice.

Ordering Guidelines

Note: Do not include any dashes, brackets or hyphens in the catalog numbers when ordering.

Example: ETSP-2B-G = ETSP2BG.





² With 6 terminals.

 $^{^{\}scriptsize 3}$ With 8 terminals.