Specification sheet

# PD-12 / 7.5

## Power & Data Line Surge Protector For Long Range Reader

**LPS**


Consist of data and high power (12V, 5A) protection in a single device.

**Features:**

- PD series is ideal for RS485, RS 422, RS 423, Ethernet signal of instrumentation interfaces and equipment such as long range RFID reader, servers, card reader that uses high power 12V DC supply.
- Protects sensitive data networks against lightning induced surges without impairing the system normal operation or cause excessive in line resistance
- PD series employs multistage protection with GDT for primary protection then linked by a second stage series impedance and semiconductor voltage dependant device to provide unsurpassed performance in lightning surge protection

### Data Protection Specification

| Technical Specification | PD-12/7.5 |
|---|---|
| Number of wire to be protected | 2 wires |
| Signal Type | RS 422, RS 423, RS485, LAN |
| Nominal Operating Signal Voltage | ±5V |
| Max. Operating Signal Voltage | ±7.5V |
| Standard Clamp Voltage @ 1mA | 9.5V (Line-Screen, Line-Line) |
| Left-through Voltage (Line - Ground) @ IEEE C 62.36 - 1994 (CCITT) / ITU-k.20 Enhanced 6kV, 150A, 10/700µs | 12V(Line-Screen, Line-Line) 600V (Screen - Ground) |
| Max. Surge Current per pair @ 8/20µs | 20kA |
| -3db Band width @ 600 ohm circuit | From DC to 20MHz |
| @ 110 ohm circuit | From DC to > 100MHz |
| Insertion Loss @ 600 ohm circuit | <0.1db |
| Max. Signal Current (Line-Line) | 350mA |
| Loop Resistance | 4 ohm |
| Response Time | <1ns |
| Connector Interface | Screw Terminal |
| Mounting Interface | DIN-Rail / Panel Mount |
| Operation & Storage Temperature | -40°C to +70°C |

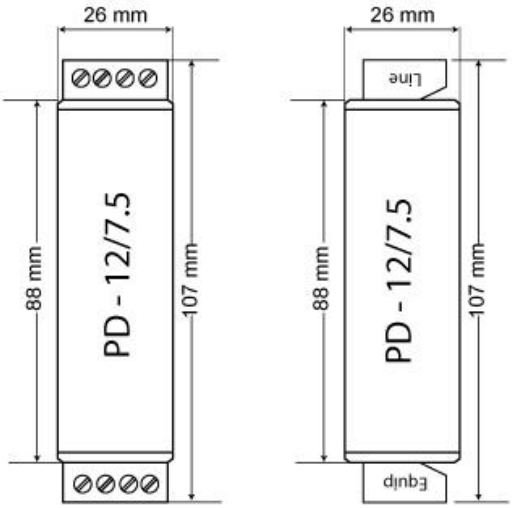
### 12V Power Protection Specification

| Technical Specification | Description |
|---|---|
| Number of wire to be protected | 2 |
| Nominal Operating Voltage | ± 12V |
| Max. Operating Voltage | ± 18VDC |
| Standard Clamp Voltage @ 1mA | 22V |
| Left-through Voltage (Line-Line)@ ITU-k.20 Enhanced 6kV, 150A, 10/700µs | 30V |
| Max. Surge Current 8/20 µs | 10kA |
| Max Loading Current | 5A |
| Earth | Floating Earth |
| Response Time | < 5ns |
| Connector Interface | Screw Terminal |
| Mounting Interface | DIN-Rail / Panel Mount |
| Operation & Storage Temperature | -40°C to +70°C |
| Number of wire to be protected | 2 |

### Ordering Info

| Protected Wires | Model Number |
|---|---|
| 2 wire data<br>2 wire 12V, 5A power | PD 12 / 7.5 |

### Dimension




### Connection Diagram