

DATA SHEET**SPD for Category 5 LAN Networks
RayDat NET 5 Series**

IEC/EN Category: C1/C2/C3 (see Technical Data)
 Protection: All 4 Pairs
 Voltages: 5, 48V DC
 Maximum Operating Voltage: 6, 58V DC
 Frequency Range: 100MHz, Cat 5, PoE Compatible
 Surge Discharge Ratings: I_n : up to 300A per Line
 Enclosure: UTB In-line Patch
 Termination: RJ45, Cat 5 Connectors
 Housing: Compact Design
 Compliance: IEC/EN 61643-21

The RayDat NET 5 Series is intended to protect Local Area Networks (LAN) from overvoltage surges and electrostatic discharges created by switching transients in buildings. LAN systems are particularly prone to such disturbances because long cable lengths often behave like antennas to such atmospheric disturbances.

It provides protection to all 4 lines in the UTP and is Cat 5 capable. Ground potential equalization between signal and protective network or PC chassis ground is provided. PoE version RayDat NET 5 PoE is designed to fulfill all versions of PoE applications compatible with standards IEEE 802.3af and IEEE 802.3at.

Technical Data

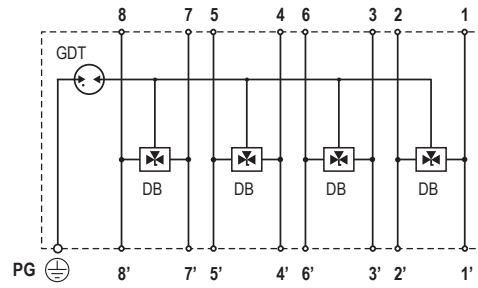
NET 5	NET 5	NET 5 PoE	NET 5 STP		
Electrical					
Type per IEC/EN 61643-21	C1/C2/C3	C1/C3	C1/C2/C3		
Number of Protected Pairs	4 Pairs (8 Conductors)				
Nominal Operating Voltage (DC)	U_n	5V	48V	5V	
Maximum Continuous Operating Voltage (DC)	U_c	6V	58V	6V	
C1 Nominal Discharge Current (8/20 μ s) (Line-Line)	I_n	300A	60A	300A	
C2 Total Discharge Current (8/20 μ s) (Lines-Ground)	I_{max}	1kA	250A	1kA	
Voltage Protection Level at I_n	(Line-Line)	U_p	35V	150V	35V
	(Lines-Ground)		350V	550V	350V
Response Time Overvoltage Protection	t_A		< 1 ns		
Cut-off Frequency	f_G		100MHz		
Mechanical					
Temperature Range	-40 °F to +176 °F [-40 °C to +80 °C]				
Connection Type	Input/Output: RJ45 Sockets				
Degree of Protection IEC/EN 60529	IP20 (built-in)				
Housing Material	Thermoplastic; Grey, Extinguishing Degree V-0				
Order Information					
Order Code	NET 5	NET 5 PoE	NET 5 STP		
NET 5 Series	7060.22	7060.23	7060.24		

RayDat NET 5 Series

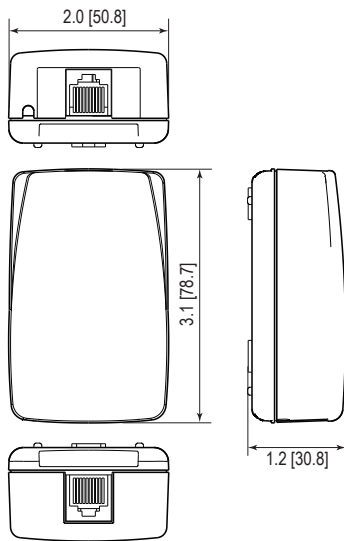
Internal Configuration

Legend

- DB Diode Block
- GDT Gas Discharge Tube
- PG Protective Grounding



Dimensions & Packaging



NET 5	NET 5	NET 5 PoE	NET 5 STP
Dimensions			
Weight per Unit		1.97 oz [56 g]	
Packaging Dimensions (Single Unit)		2.2 x 2 x 4.2" [55 x 50 x 106 mm]	
Minimum Package Quantity		8 pieces	

inches
[mm]

Information contained in this document is subject to change at any time without notice.

