


INJ 1000 DIN Rail PoE Injectors

 perle.com/products/poe-injectors/din-rail-inj-1000.shtml

IEEE 802.3bt/at/af Mid-span Injector up to 60W

- 10/100/1000 Mbps
- Supply PSE power to PoE, PoE+ and Hi-PoE compliant devices
- Provide 4 to 60 Watts of PoE power
- IEEE 802.3af, IEEE802.3at and IEEE802.3bt compliant
- Support for PoE PDs: Class 1 to 6 & Type 1, 2 and 3
- Extended supply voltage range of 18 V DC ... 57 V DC, redundant
- Safe shield connection to ground potential
- Optional Extended temperature range of -40°C to +75°C



INJ 1000 PoE Injectors are DIN Rail mounted single port, **PoE mid-span injectors**. They act as an intermediary devices between a non-PoE switch and a PoE device to inject **fully compliant** power over the Ethernet cable.

Generating **up to 60 Watts**, the INJ 1000 provides electrical power to remote **PD access points, pan-tilt and zoom (PTZ) cameras** and **video-phones**. It complies with the **IEEE802.3bt Hi-PoE (60W of power)** or **IEEE 802.3at PoE+ (30W of power)** standards and is also backward compatible with IEEE802.3af PoE (15.4W of power). [Learn more about PoE.](#)

With the INJ 1000, there is no need to buy an expensive PoE switch or install electrical wiring and outlets in hard to reach locations. Just use an open port on an existing non-PoE switch to save time and money by sending power and data over the same cable.

INJ 1000 PoE Injector Benefits

DIN Rail Enclosure	Easily mount on a DIN rail or inside distribution boxes using native DIN Rail enclosure with grounding clip. No need for add-on brackets.
--------------------	---

Power Over Ethernet (PSE)	Performs the Power Sourcing Equipment (PSE) function on 1 UTP port for IEEE 802.3af (up to 15.4 watts PoE), IEEE 802.3at (up to 30 watts PoE+) or IEEE802.3bt (up to 60 watts Hi-PoE) compliant devices.
-----------------------------	--

On-board PoE Power Controller This PoE power controller provides compliant power provisioning and monitoring, properly sensing through signature detection whether or not the attached Ethernet devices are PoE capable or not. This provides a safe connection for both PoE and Non-PoE capable devices. [Click here for more details](#)

- Advanced Power Management
- PD signature detection
 - Current limiting protection
 - Over-Current Protection
 - PD power classification detection (Class 0,1,2,3,4,5,6)
 - Reverse polarity protection

	INJ 1000 27030058	INJ 1000-T 27030068	INJ 1010 27030078	INJ 1010-T 27030088
--	----------------------	------------------------	----------------------	------------------------

Serial interface

Interface 1 Ethernet

Connection method RJ45 socket

Transmission length 100 m (including patch cables)

Pin assignment 1:1

Basic functions PSE/Midspan, compliant with IEEE 802.3af, at

Serial transmission speed 10/100/1000 Mbps

Output nominal voltage 54 V DC (PoE)

Output power 30 W 60 W

Interface 2 Ethernet

Connection method RJ45 CAT5e

Ambient conditions

Ambient temperature (operation)	0°C ... 60°C	-40°C ... 75°C	0°C ... 60°C	-40°C ... 75°C
---------------------------------	--------------	----------------	--------------	----------------

Ambient temperature (storage/transport)	-40°C ... 85°C
Permissible humidity (operation)	10 % ... 95 % (non-condensing)
Altitude	5000 m (For restrictions see manufacturer's declaration) / 2000 m (With UL approval)
Degree of protection	IP20 (Non-certificated by UL)

General

Electromagnetic compatibility	Conformance with EMC Directive 2014/30/EU			
Mounting position	vertical			
Net weight	396.6 g	377.8 g	380.8 g	380.6 g
Housing material	Plastic			
Color	Gray			
Conformance	CE-compliant			
UL, USA/Canada	Class I, Div. 2, Groups A, B, C, D, T4			

Standards and Regulations

Electromagnetic compatibility	Conformance with EMC Directive 2014/30/EU	
Type of test	Vibration resistance in acc. with EN 60068-2-6/IEC 60068-2-6	
Test result	10 Hz ... 57 Hz, amplitude ± 3.5 mm, 57 Hz ... 150 Hz, 5g	
Type of test	Shock in acc. with EN 60068-2-27/IEC 60068-2-27	
Test result	30g for 11 ms, three shocks in each spatial direction	
Type of test	Continuous shock according to EN 60068-2-27/IEC 60068-2-27	Continuous shock according to EN 60068-2-27/IEC 60068-2-27
Test result	10g for 16 ms, 1000 shocks in each spatial direction	

Standards/regulations	EN 61000-4-2	
Contact discharge	± 6 kV (Test Level 3)	
Indirect discharge	± 6 kV	
Standards/regulations	EN 61000-4-3	
Frequency range	80 MHz ... 3 GHz (Test Level 3)	
Standards/regulations	EN 61000-4-4	
Comments	Criterion B	
Standards/regulations	EN 61000-4-5	
Signal	± 1 kV (Data line, asymmetrical)	
	± 2 kV (I/O cable on field side only, asymmetric)	
Standards/regulations	EN 61000-6-4	
	EN 61000-4-6	
Frequency range	0.15 MHz ... 80 MHz	
Conformance	CE-compliant	
UL, USA/Canada	Class I, Div. 2, Groups A, B, C, D, T4	
Noxious gas test	ISA-S71.04-1985 G3 Harsh Group A	
Dimensions		
Width	30.2 mm	
Height	130 mm	
Depth	120 mm	
Note		
Utilization restriction	EMC: class A product, see manufacturer's declaration in the download area	EMC: class A product, see manufacturer's declaration in the download area
Power supply		

Nominal supply voltage	24 V DC		
		48 V DC	
Supply voltage range	18 V DC ... 57 V DC (Ordinary locations)		
	24 V DC ... 48 V DC (Hazardous locations)		
Max. current consumption	2.1 A		
		1.4 A (24 V DC)	2.73 A (24 V DC)
		0.7 A (48 V DC)	1.34 A (48 V DC)
Power consumption	≤ 75 W		
Protective circuit	Reverse polarity protection		
Conductor cross section flexible max.	4.00 mm ²		
Conductor cross section flexible min.	0.75 mm ²		
Conductor cross section solid max.	4.00 mm ²		
Conductor cross section solid min.	0.75 mm ²		
Conductor cross section AWG max.	12		
Conductor cross section AWG min.	20		

Approvals

- cULus Listed
- cUL Listed
- UL Listed

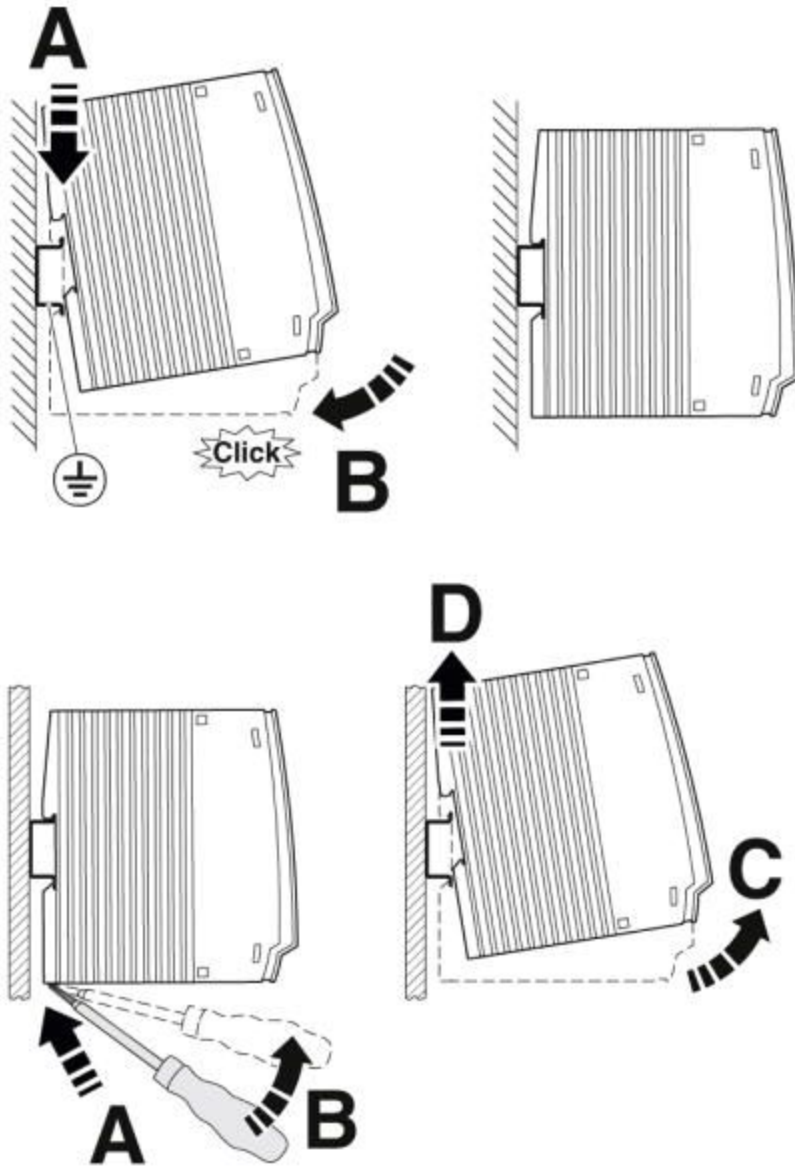
Environmental Product Compliance

REACH SVHC	Lead 7439-92-1
------------	----------------

China RoHS

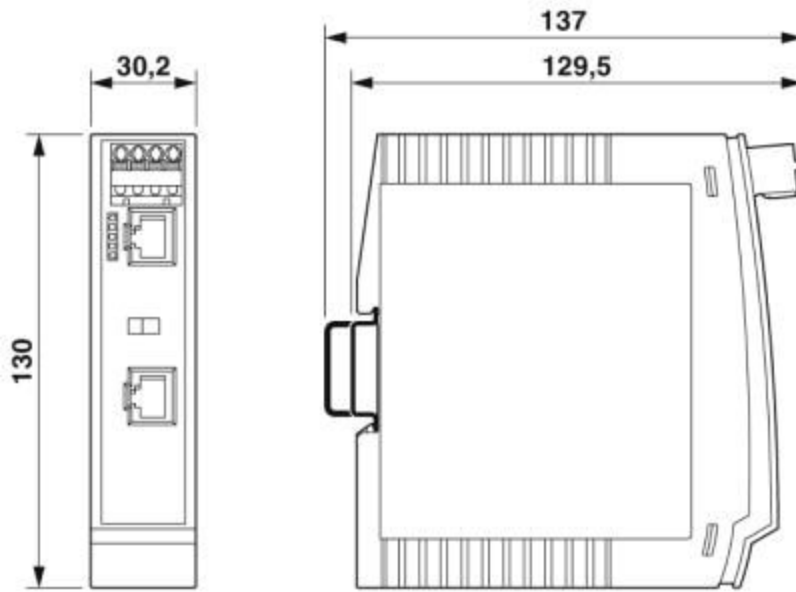
Environmentally Friendly Use Period = 10;

Easily Mount your PoE Injector on a DIN Rail



INJ 1000 PoE Injector Dimensional drawing of Compact housing

Two RJ45 Sockets



INJ 1000 PoE Injector Front View

Two RJ45 Sockets

