

## **DC/DC Gigabit PoE Injector**

### SPECIFICATION

1. INPUT :

- 1.1 Input Voltage: 10Vdc to 15Vdc Normal = 12V  
1.2 Input Current: 3.6A at 12Vdc

2. OUTPUT :

2.1 Output Voltage & Current:

OUTPUT	+56V
Max. load	0.625A
Power	35W
Min. Load	0.01A
Load reg. %	5%
Line reg. %	1%
Ripple %	1%
Noise %	1%

TOTAL POWER : 35W

Note 1: Noise bandwidth is from DC to 20Mhz. Ripple & Noise is measured by Paralleling a 0.1uF metalize capacitor on the test point.

3. EFFICIENCY : 82% min at Full Load , 10Vdc to 15Vdc Input Voltage

4. PROTECTION

4.1 Short Circuit Protection

Output Short GND Terminal will not damage the Power Supply and will Auto-Reset.

4.2 Input with Fuse Protection.

4.3 Safety Standard : meet IEC 60950-1.

4.4 EMC : meet FCC Class B , EN55032 Class B,

4.5 IEEE 802.3at compliant

4.6 Over Current : 120% ~ 160% @12Vdc Input F.L

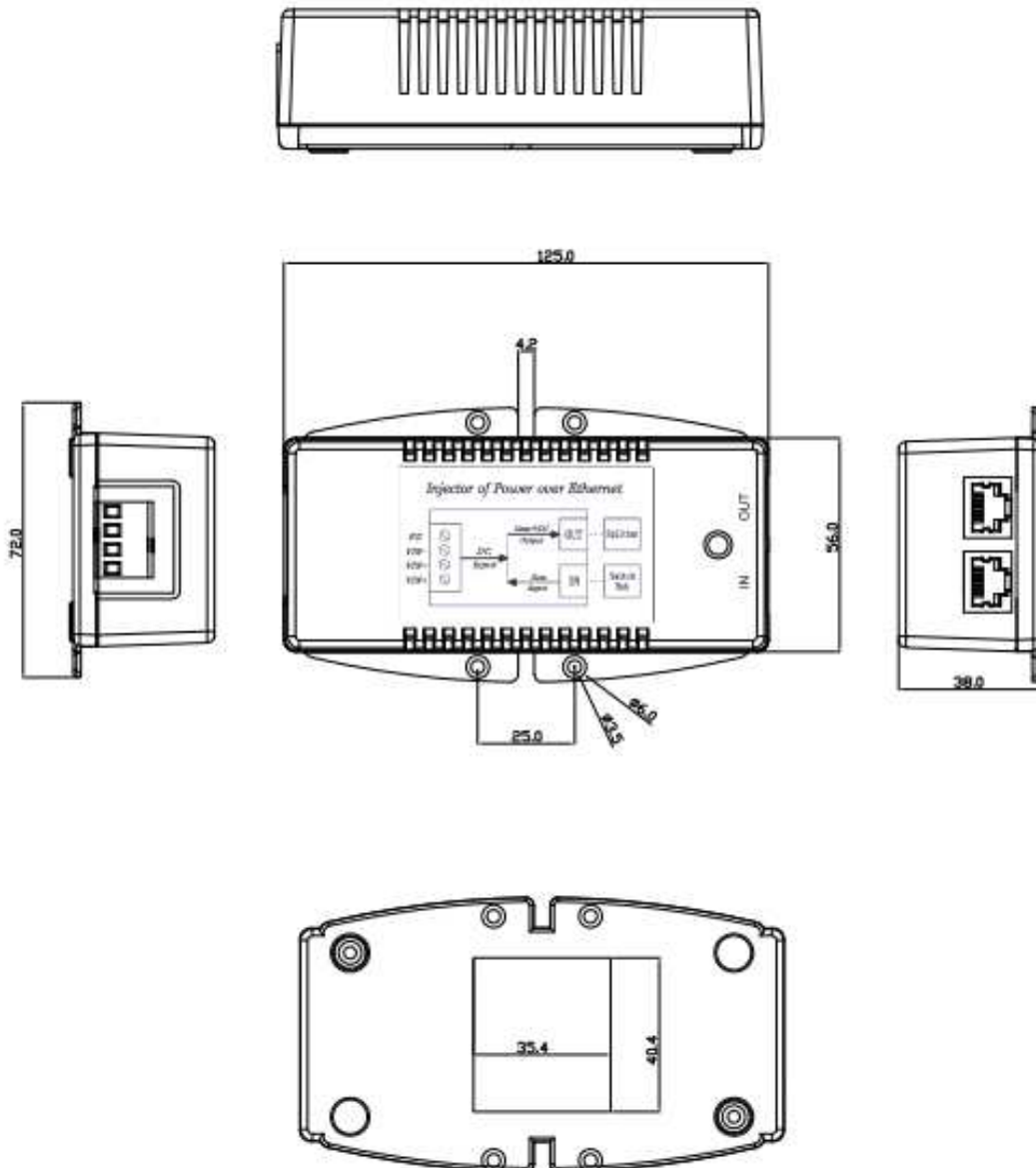
4.7 Input Polarity Reverse Protection -----NO Work

4.8 Input Over Voltage Protection : 15.3V ~ 15.8V Turn-off Input Voltage.

4.9 Input Over low Voltage Protection : 8.8V ~ 9.3V Turn-off Input Voltage.

## 5. GENERAL DESCRIPTION

- 5.1 Operation Temperature: -40 - +70 Degree
- 5.2 Storage Temperature: -40 - +85 Degree
- 5.3 Operation Humidity: 5% - 90%
- 5.4 Cooling: Free air cooling
- 5.5 SIZE : 125\*72\*38 (L)\*(W)\*(H) unit: m/m DIN rail mountable



## 6. Indicator :

6.1 the LED lights RED means Power Ready

6.2 the LED lights GREEN means Output 802.3af or 802.3at OK

## 7 CONNECTION :

RJ45 Connection and pin out: @100MBASE

RJ-45 Input (Data Only)			RJ-45 Output (Data & Power)	
Pin	Symbol	Description	Symbol	Description
1	RX+	Data Receive	RX+	Data Receive
2	RX-	Data Receive	RX-	Data Receive
3	TX+	Data Transmit	TX+	Data Transmit
4	NC	Not Connector	-Vdc	Feeding power(+)
5	NC	Not Connector	-Vdc	Feeding power(+)
6	TX-	Data Transmit	TX-	Data Transmit
7	NC	Not Connector	(-Vdc) return +	Feeding power(-)
8	NC	Not Connector	(-Vdc) return +	Feeding power(-)

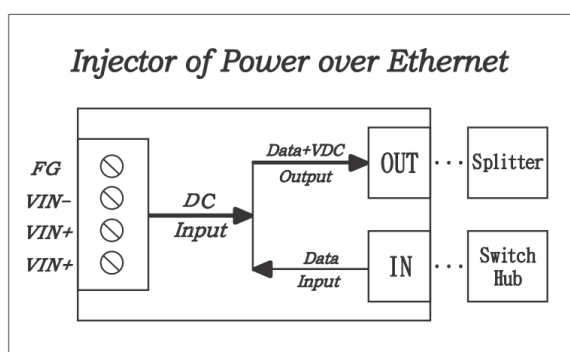
## 8. RJ45 Connection and pin out: @1000MBASE

RJ-45 Input (Data Only)			RJ-45 Output (Data & Power)	
Pin	Symbol	Description	Symbol	Description
1	BI_DA+	Data Pair A+	BI_DA+	Data Pair A+
2	BI_DA-	Data Pair A-	BI_DA-	Data Pair A-
3	BI_DB+	Data Pair B+	BI_DB+	Data Pair B+
4	BI_DC+	Data Pair C+	+Vdc + BI_DC+	power(+)+Data Pair C+
5	BI_DC-	Data Pair C-	+Vdc + BI_DC-	power(+)+Data Pair C-
6	BI_DB-	Data Pair B-	BI_DB-	Data Pair B-
7	BI_DD+	Data Pair D+	-Vdc + BI_DD+	power(-)+Data Pair D+
8	BI_DD-	Data Pair D-	-Vdc + BI_DD-	power(-)+Data Pair D-

Note

1. the model is isolated design, the output +/- or input +/- can be shorted to ground (FG).

## 9. INPUT CONNECTION



## SPEC. of SURGE/LIGHTNING PROTECTION

	Signal
Operating Voltage	Data 5V
Clamping Voltage	Data 16.5V (@I PP =5A, t p =8/20μs, I/O pin to GND)
Peak Pulse Current	20A (tp=8/20μs)
Pin Protected	All 8 pin protected
Max. Shut Capacitance	<3pF (VR = 0V, f = 1MHz, I/O pin to GND) < 1.5 pF (VR = 0V, f = 1MHz, Between I/O pins)
IEC COMPATIBILITY (EN61000-4)	IEC61000-4-2 (ESD) ±15kV (air), ±8kV (contact) IEC61000-4-4 (EFT) 40A (5/50ns) IEC61000-4-5 (Lightning) 20A (8/20μs)

