Lantech

POA-100A

Single Port POE Power Source Injector with Internal Power

User Guide

Rev.1.01

Aug 2008

Revision History

Document Release	Date	Revision	Initials
1.00	Apr 16, 2008	First release	A.H.
1.01	Aug 05, 2008	Modify power consumption value. Add version in manual.	E.C.

Content

Overview

The Power over Ethernet Injector provides data and AC power through the Ethernet cable to PoE-equipped device, such as AP, PoE splitter or other equipment support IEEE 802.3af standard. The injector supports IEEE 802.3af standard that can detect the connected device, which supports the IEEE 802.3af and then provide the power to the device. If the injector detects that the connected device does not support the IEEE 802.3af, then the injector will not provide the power to the connected device. The injector is typically installed near the Ethernet hub. The following figures show the example applications of the Power over Ethernet Injector.
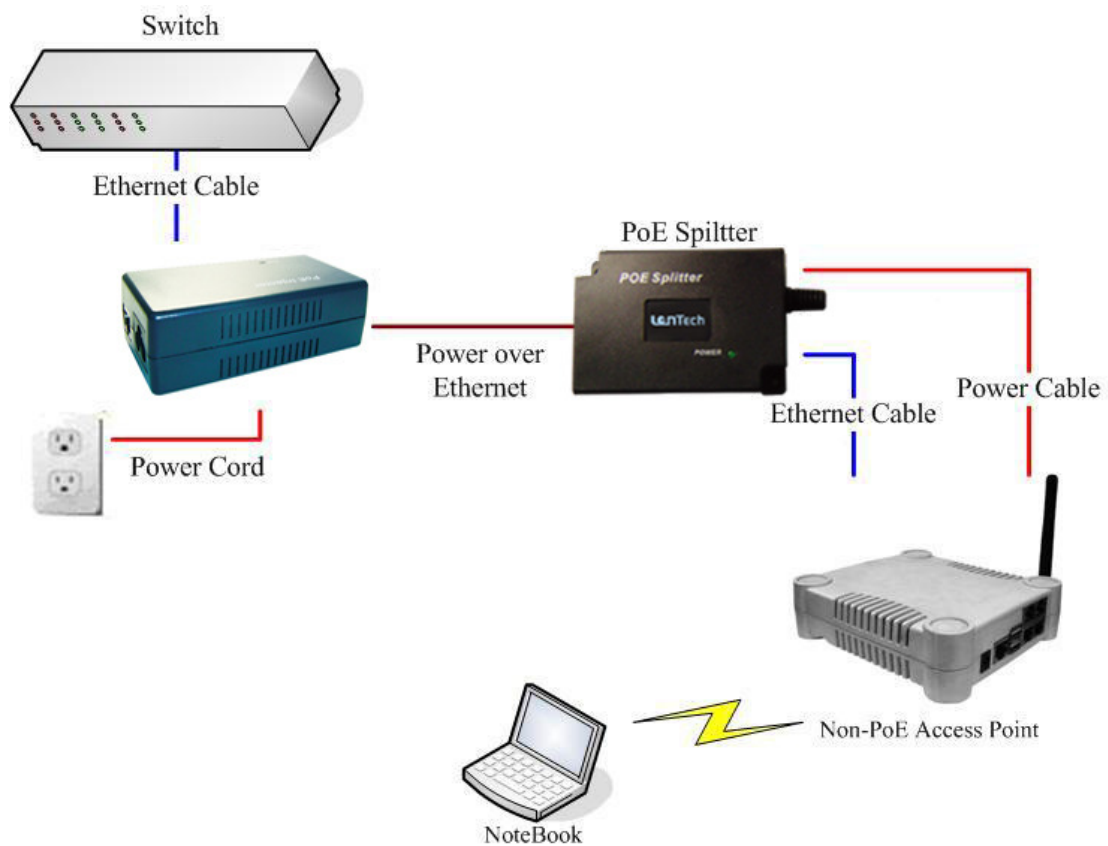
Power over Ethernet Injection Application for non-PoE device
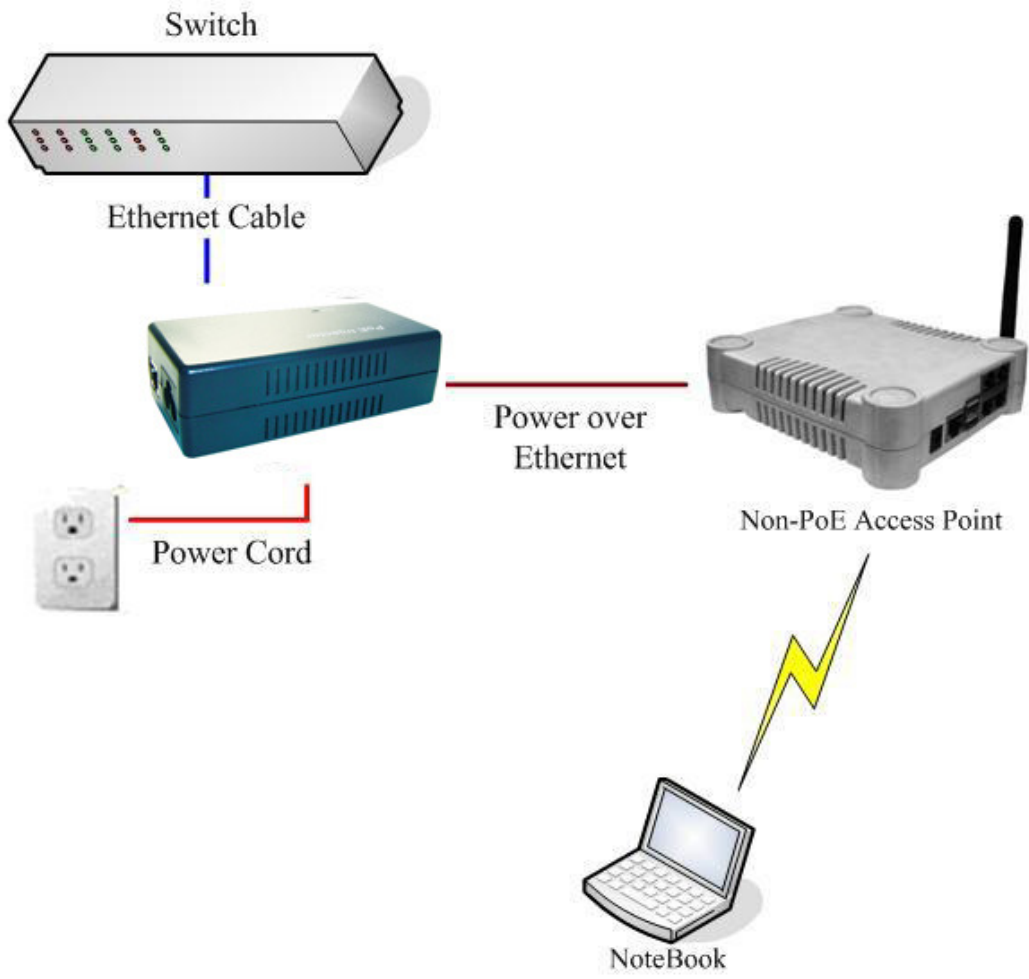
Power over Ethernet Injection Application for PoE device

Features

The following table provides the technical specification of the Power over Ethernet Injector.

|	
IEEE Standard	IEEE802.3 10BASE-T IEEE802.3u 100BASE-TX IEEE802.3af
Connector	RJ-45 Data in/out: Data/signal pairs pin 1,2,3,6 RJ-45 Power out: power over spare wire pairs pin: 4,5(V+) , 7,8(V-)
Network Cable	10Base-T: 2-pair UTP/STP Cat. 3, 4, 5 cable EIA/TIA-568 100-ohm (100m) 100Base-TX: 2-pair UTP/STP Cat. 5 cable EIA/TIA-568 100-ohm (100m)
LED	System: power (green)
Power Output	15.4W 48VDC, 0.32A
Power Supply	Input power: AC 100~240V,50~60Hz,0.3A
Power Consumption	3.6 Watts
Operating Humidity	10%~90% (Non-condensing)
Operating Temperature	0℃~45℃
Storage Temperature	-40℃~70℃
Case Dimension	117mm x 60mm x 35mm (W x D x H)
EMI	FCC Class B, CE
Safety	UL, cUL, CE/EN60950-1

Hardware Description

The Power over Ethernet Injector has three connection ports and one LED indicator. We will describe each in following.

- **Data In port:** It is an RJ-45 Ethernet interface port for data transmitting into the PoE Injector. It is for connecting with the switch.
- **Power In port:** The Power In port is for supplying the power into the Injector.
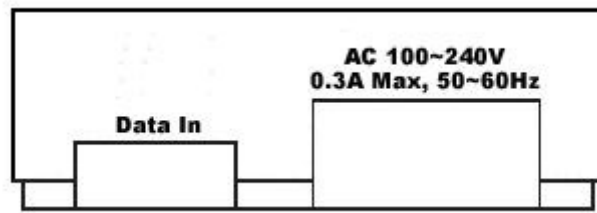
The Data In and Power in port figure

- **Data Out port:** It is an RJ-45 Ethernet port to connect with PoE Splitter, or PD.
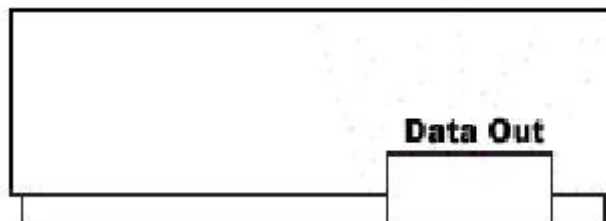
Data Out port figure

Package Contents

- One Power over Ethernet Injector
- User Manual
- Four Rubber Feet
- Power cord x 1, 1830mm

Compare the contents of your Power over Ethernet Injector package with the standard checklist above. IF any item is missing or damaged, please contact your local dealer for service.

Installation

To install the Power over Ethernet Injector, please follow the steps below.

1. Use RJ-45 cable to connect the **Data in** port of the Power over Ethernet Injector to Switch/HUB.
2. Use RJ-45 cable to connect the **Data out** port of the Power over Ethernet Injector to PoE Splitter, PD (Such as Router, Access Point…etc.) or PoE Hub.
3. Plug in the power cord of the Power over Ethernet Injector to the wall power plug.
4. Before starting, make sure all connections are correct.
   - The Power over Ethernet Injector connects to the Splitter, POE Hub or PD via **Data Out** port.
   - The Power over Ethernet Injector connects to the switch/hub via **Data In** port**.**
   - The **Power In** port is to get the power supply for Power over Ethernet Injector from wall power plug.