V102M-PD

100Mbps 2-wire LAN Extender with 802.3af PoE PD embedded

V102M-PD is a VDSL2 LAN Extender providing a broadband transmission up to 100/100Mbps for downstream/upstream over single pair copper line for point-to-point Ethernet connectivity. With 100/100Mbps data rate, V102M-PD supports transmission distance up to 250 meters and less data rate for 1.5km long range connection. Users may also select a fixed data rate or a fixed SNR margin for different copper line ranging.

With plug and play features and minimum installation time, a pair of V102M and V102M-PD offers a cost effective solution for bandwidth-hungry applications such as video streaming and FTTB over single twisted pair telephone line or coaxial cable.

In some working environment, there is no power outlet near the V102M-PD, it is able to be powered by PoE Switch or injector. This makes the V102M-PD is working without local power facility and perform LAN extender over DSL perfectly.

Features:

- Compliant with ITU-T G.993.1, G.993.2 VDSL2 Standard
- Compliant with IEEE 802.3af PoE PD

- Supports Back-to-back applications
- Ethernet packets over 2-wire copper

- 100/100Mbps full duplex for distance up to 250 meters
- Supports DSL connection up to 1500 meters
- Auto MDIX for 10/100 BaseT Ethernet LAN Ports
- 4 Dip Switches for Master/Slave Configurations
- Low-Latency for Video/Voice/Data applications

Technical Specifications:

VDSL Transmission:
- Max Data Rate: 100/100 Mbps
- RJ-11 Connector x 1

LAN Interface:
- Auto-Detection for 10/100 BaseT and Half/Full duplex
- High performance bridge for Ethernet extension
- Fully compatible with IEEE802.3/IEEE802.3u
- Automatic MDIX Function,
- RJ-45 Connector x 2

LED Indicators:
- **POWER:** PoE powered is ON
- **LAN1:** Data and PoE PD Activity
- **LAN2:** Data Activity

DSL: VDSL Loop Connection Status
M/S: Master/Slave Selection

Physical Dimension:
Desktop: 120 x 90 x 28 (mm)

Operating Environment:
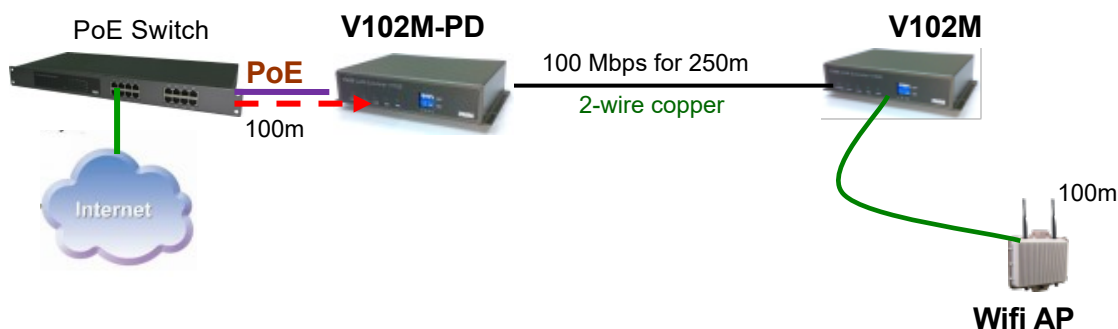- Humidity: 5% to 95% non-condensing
- Temperature: 0 ~ 40 degree C

Regulatory Compliance:
- FCC Rules Part 15,
- CE
- RoHS

Application Diagram:

*LAN Extension over 2-wire copper: PoE-enabled

Data Rate & Distance:

Performance in AWG 26 Line at 6dB without rate limit

Down Stream Data Rate (Mbps)	Up Stream Data Rate (Mbps)	Distance (feet)
100	100	1000
100	60	1200
90	44	1350
80	36	1500
70	27	1750
60	18	2000
48	11	2500
39	8	3000
35	3.5	3500
28	0.3	4000

Ordering Information	
V102M	2-wire copper LAN Extender, local power, RJ45 x 2
V102M-PD	2-wire copper LAN Extender, PoE PD built-in, RJ45 x2 (LAN 1 : PD)
V102M-PSE	2-wire copper LAN Extender, local power, RJ45 x 2 (LAN 1 : PSE)
PS800-V102M	19" rack mount cabinet for up to 8 V102M series devices