

APT-5-50 Switch PoE 5 ports –gigabit LAN+PoE extender 1xPoE IN 802.3at/af/bt90 + 4xPoE OUT 802.3at/af/bt60

INSTRUCTION MANUAL

APT-5-50 is an unmanaged gigabit PoE network switch working as an extender (repeater) of the LAN network and PoE power supply. Most often used as an "active splitter" in situations when we need to run several network devices (e.g. several IP cameras) on one UTP cable or when an additional network branch is necessary.

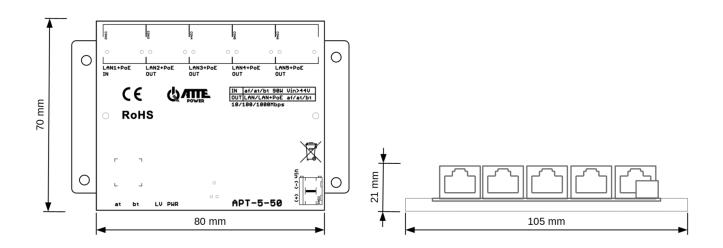
It is designed to work with any network devices, IP cameras and other devices powered by the PoE 802.3 at/af/bt standard.

The APT (Atte Power Tree) series devices provide compatibility with the IEEE 802.3 at/af/bt90 standards as PoE power receivers and IEEE 802.3 at/af/bt60 on all output ports. After connecting the device to ports 2-5, the receiver is identified and, if it is a PoE-powered device, power will be turned on in the port.

All ports provide a throughput of 1Gbps, which is important for connections in a bus topology.

The device has a very small size, which allows for easy installation in small spaces.

The APT (Atte Power Tree) product series allows you to connect system elements in a tree topology. APT devices can be powered directly from PoE. Power transmitted over a single UTP cable allows you to power several IP cameras.



General view of the device



Technical Specification

LAN Ports	5 ports RJ45 10/100/100Mbps (auto MDI-MDIX) 1 x LAN+PoE IN 4 x LAN+PoE OUT
Ports Functions	LAN 1 PoE IN (switch power supply): Passive (up to 40W) or 802.3bt (up to 90W) or 802.3at (up to 30W) or 802.3af (up to 15W)
	LAN 2 – LAN 4 LAN or LAN + PoE Out 10/100/1000Mbps 802.3 at/af/bt60
	RJ45 PINS PoE: 1,2 (V-) 3,6 (V+) 4,5 (V+) 7,8 (V-)
PoE (at/af/bt) Selection	LAN1 (PoE IN): automatic
Power Supply Voltage	LAN1 POE IN: 44 58 V DC IN: 44 58 VDC (Vin)
Output Voltage	Vout = Vin
Power consumption	0,3 W
Ports Protection	LAN 1 LAN 5: Surge protection LAN 2 LAN 5: Overload protection with auto recovery 0,7A
Indication	LEDs in RJ45 connectors: LAN 1 LAN 5 (green) - link and data transmission LAN 2 LAN 5 (yellow) - PoE power LED PWR - power LED at - identification as a 30W PoE receiver LED bt - identification as a 60W PoE receiver LED bt + LED at - identification as a 90W PoE receiver LED bt - LED at - identification as a 90W PoE receiver LED bt - LED at - identification as a 90W PoE receiver
Housing Construction	Universal mounting base, mounting studs, can be screwed to flat surface
Operating Temperature	-25°C+65°C
Ingress Protection Rating	IP20
Dimensions	70x 80(105) x 21 mm
Weight	0,08 kg



Safety Precautions

- The installation and wiring must be performed by a competent engineer. For permanently connected equipment, a readily accessible disconnect device must be incorporated in the fixed wiring. The device must be connected to the mains supply 230 VAC 50 Hz via a specified fused connection outlet.
- Despite the fact that the enclosure of the device has a high degree of protection, it is recommended that the device should be mounted in places protected from direct influence of atmospheric factors, in particular against rain and direct sunlight.
- Since the power supply does not have a switch to isolate the mains supply, the installer is responsible for notifying the user of the means of isolating the mains supply from the device.
- When replacing fuses, use original or compatible types. The exact parameters of the fuses can be found on the inside of the device cover.

WARNING



Before installation and during maintenance make sure that the mains voltage 230VAC is disconnected

Installation

- Install the device in the selected place
- Connect the PoE power supply line (44 ... 58VDC) to the PoE IN port.
- Connect UTP cables to the PoE OUT ports leading to the IP LAN or LAN+PoE receivers

Attention!

- The total power consumed by the cameras (PoE receivers) connected to the extender cannot exceed the power budget offered by the switch powering the entire line:
 - for the 802.3af standard, it is approximately 13W available on the extender
 - for the 802.3at standard, it is approximately 25W available on the extender
 - for the 802.3bt standard, it is approximately up to 60W available on the extender
 - for PoE Passive standard, it is a maximum of 40W available on the extender
- Include IR illuminators they turn on at night, significantly increasing power consumption.
- Also take into account losses in the power cable they depend on its cross-section, length and voltage value on the PoE line.
- When the voltage on the switch drops below 44V, the LV LED will turn on. In such a case, verify the power supply system to avoid situations when the IP PoE devices connected to the switch do not turn on due to too low voltage.



Operation Indication

LED PWR - power

LED at - identification as a 30W PoE receiver

LED bt - identification as a 60W PoE receiver

LED bt + LED at - identification as a 90W PoE receiver

LED LV LowVoltage signaling LED (<44V)

LEDs in RJ45 connectors:

- LAN 1 ... LAN 5 (green) link and data transmission
- LAN 2 ... LAN 5 (yellow) PoE power

WEEE MARKING



This symbol on the product or on its packaging indicates that the product must not be disposed of with normal household waste. Instead such equipment must be disposed of by arranging to return it to a designated collection point for the recycling of waste electrical and electronic equipment.

