Rugged PoE Booster Switch for Vehicle and Industry

DP210-LV

Industrial 8FE+2G Combo Unmanaged PoE Switch

The DP210-LV is an unmanaged Ethernet PoE switch designed for industrial use, that offers 10 ports, including 8 Fast Ethernet IEEE 802.3at/af PoE+ ports and two Combo uplink Gigabit RJ45 and Fiber 100M/Giga SFP ports.

This PoE switch has been specifically tailored to cater to low voltage power input systems found in vehicle applications and can boost input voltages of 12V/24V to 54V for PoE feeding. Additionally, the DP210-LV switch is equipped with Quality of Service (QoS) features in the two Gigabit ports to prioritize and optimize streams such as video and VoIP traffic.

FC CE IEC61000-6-2 IEC61000-6-4 PoE+ 802.3 at -40~70°C

Features & Benefits
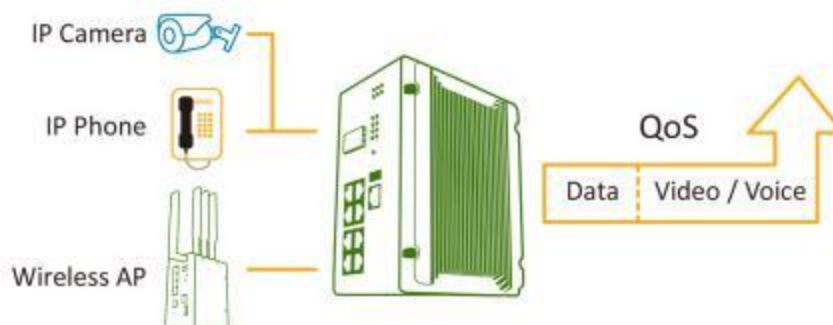
High Throughput Ethernet Switching
- 10-port Ethernet, including 8-port Fast Ethernet PoE+ and 2-port **Gigabit Combo RJ45/SFP**
- 2-port **Gigabit** Ethernet/Fiber uplink features QoS for video and VoIP data stream
- Fiber ports support auto detect 100M/1000M speed
- 8K MAC address table
- Stores and Forwards with non-blocking switch fabric

Extreme PoE Capability
- 8-port IEEE 802.3at/af compliant PoE+ technology, up to 30W per port
- Low voltage 24VDC input to deliver 120W@70°C output or 12VDC input to deliver 60W@70°C output
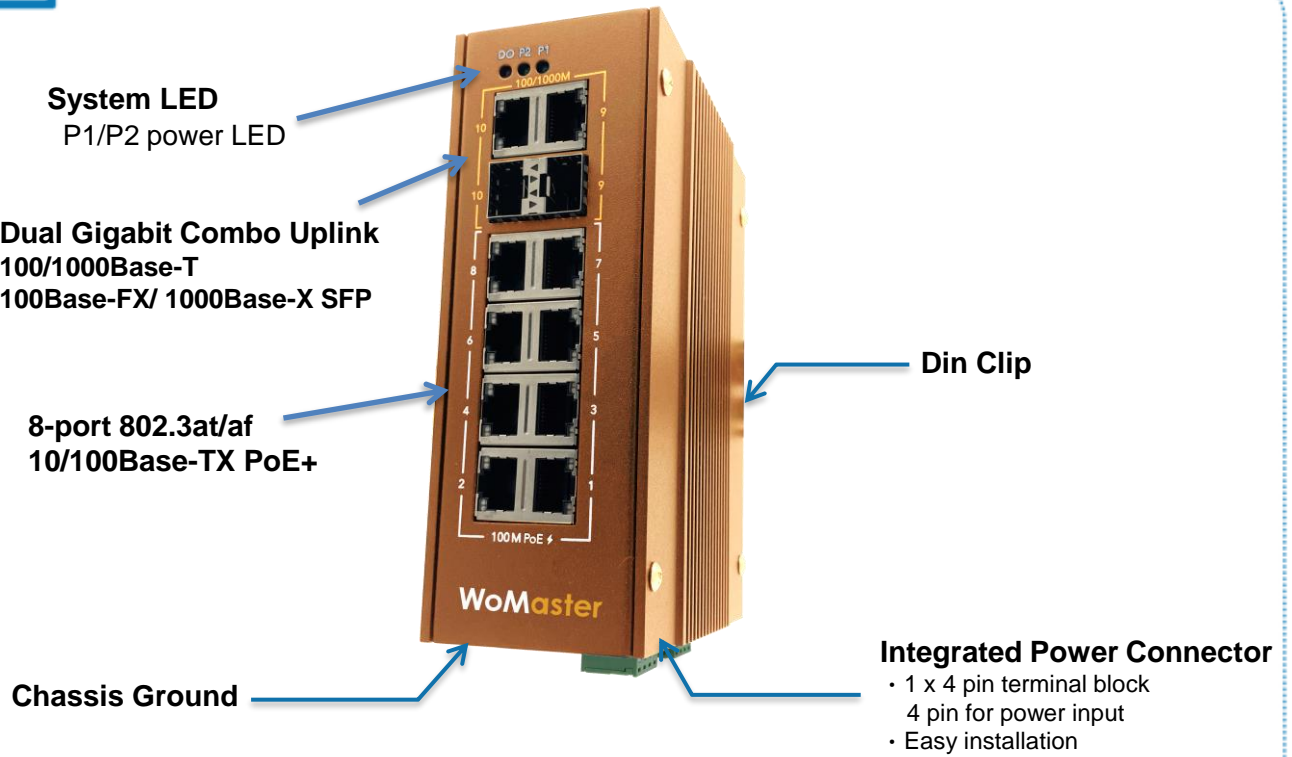
Rugged Mechanical Design
- Robust design protects from mechanical deformation
- Ribbed side panels for effective heat dissipation
- **10~30V** wide power input range design with **booster** to deliver 8-port PoE at **54V** for vehicle applications
- Wide operating temperature range **-40 ~ 70°C**
- Selectable gigabit uplink: RJ45 or SFP by model for high flexibility of cable types and distances
- EN IEC 61000-6-2 Immunity standard for Industrial Environment
- EN IEC 61000-6-4 Emission standard for Industrial Environment

System LED
P1/P2 power LED

Dual Gigabit Combo Uplink
100/1000Base-T
100Base-FX/ 1000Base-X SFP

8-port 802.3at/af
10/100Base-TX PoE+

Chassis Ground

Din Clip

Integrated Power Connector
· 1 x 4 pin terminal block
  4 pin for power input
· Easy installation

Dimensions

(mm)

58
50
120
155

⚙ Specifications

Technology	
Standard	IEEE 802.3 10Base-T Ethernet
	IEEE 802.3u 100Base-TX Fast Ethernet
	IEEE 802.3ab 1000Base-T Gigabit Ethernet copper
	IEEE 802.3x Flow Control and back-pressure
	IEEE 802.1p Class of Service (CoS)
	IEEE 802.3 at Power Over Ethernet Plus (PoE+), compatible with 802.3af

Performance	
Switch Technology	Store and Forward Technology with Non-Blocking Switch Fabric
Number of MAC Address	8K
Packet Buffer Memory	1M bits
Transfer performance	10Base-T: 14,880pps, 100Base-TX: 148,800pps, 1000Base-TX: 1,488,100pps

Interface	
Ethernet Port	8 x 10/100Base-TX RJ45, Half/Full Duplex, Auto Negotiation 2 x Combo Ports • 2 x 100/1000Base-T RJ45, Half/Full Duplex, Auto Negotiation • 2 x 100/1000MBase SFP, 100/1000M Speed Auto Detect, 100M SFP must be installed before power on
System LED	1 x Power: Green On
Ethernet Port LED	Link (Green On), Activity (Green Blinking), PoE power feeding (Amber on), PoE power not feeding (Amber Off)
Gigabit Ethernet Port LED	Link (Green On), Activity (Green Blinking), Speed (Amber Blinking, 10M:1, 100M:2 1000M:3 times)
SFP LED	Port: Link (Green On), Activity (Green Blinking)
Power Input, Digital Output	4-Pin Removable Terminal Connector 4 Pin for Power Input

Power Requirement	
Input Voltage	24VDC (10-30VDC)
Reverse Polarity Protect	Yes
Input Current	0.2 @ 24V (without PoE load)
Power Consumption	Max. 4.8W@24VDC full traffic without PoE load Max. 130W@24VDC full traffic with PoE load, suggest to reserve 15% tolerance

PoE	
Power forwarding mode	Alternative B
PoE Power Budget	System: Max. 120W@70°C/24VDC, Max.60W@70°C/12VDC Per Port: Max. 30W
PoE Standard	IEEE 802.3at/af

Mechanical	
Installation	DIN Rail
Enclosure Material	Steel Metal with Aluminum
Dimension	58(W) x 155(H) x 120(D) mm / without DIN Rail Clip
Ingress Protection	IP31
Weight	1.15KG (device) / 1.55KG (full package)

Environmental	
Operating Temperature & Humidity	-40°C~70°C , 0%~95% Non-Condensing
Storage Temperature	-40°C~80°C
MTBF	>200,000 hours
Warranty	5 years

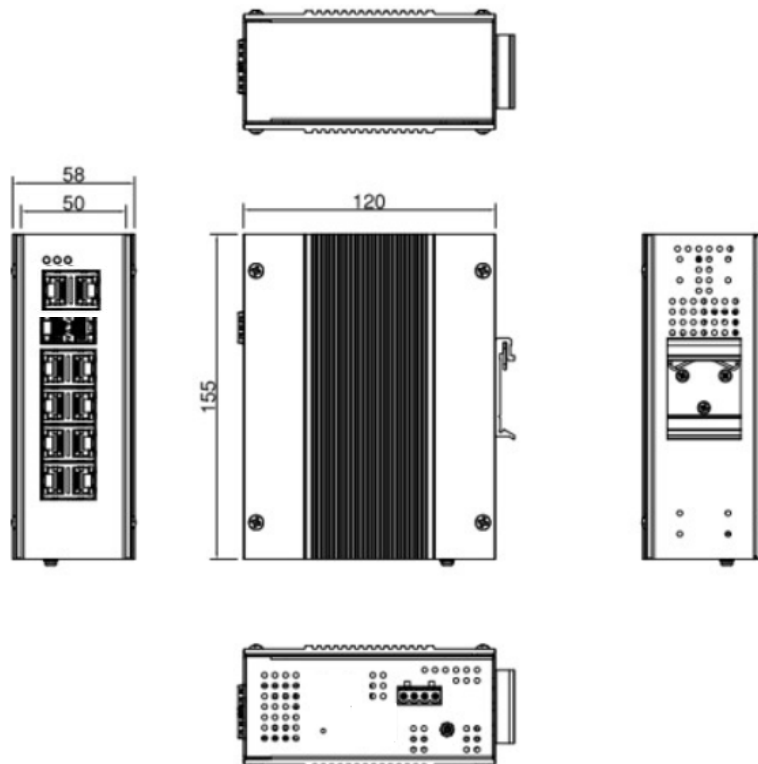| Standard	

CE	EN IEC 61000-6-2 Immunity standard for Industrial Environment
	EN IEC 61000-6-4 Emission standard for Industrial Environment,
	  includes EN61000-4-2, EN61000-4-3, EN61000-4-4, EN61000-4-5, EN61000-4-6,
	  EN61000-4-8

FCC	FCC part 15B Class A

Ordering Information

Model Name	Description
DP210-LV	Industrial 8FE+2G Combo RJ45/SFP Unmanaged PoE Switch, 24V booster
	Package List
	1 x Product Unit
	1 x 4-pin Removable Terminal Connector
	1 x Attached Din Clip
	1 x Quick Installation Guide

Optional Accessory

Item	
MK-D1-2	Wall-mounting kit with 2 plates and 8 screws
PSD240-12	240W/12VDC DIN-rail power supply
PSD240-24	440W/24VDC DIN-rail power supply