The Advanced Networking Technology

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#### RP-IPG312

### 3-P Gigabit + 1-SFP(100/1G) slot Industrial Ethernet Switch w/ 1-P 802.3at PoE

RP-IPG312 Industrial Ethernet Switch with PoE feature complies with IEEE802.3af and IEEE802.3at. It delivers 30watts power from PoE port to PD devices, and 1 SFP slots is supported.



RP-IPG312 provides power input voltage 48~56Vdc, especially for IP surveillance, traffic monitoring and for a broad range of applications. It can be used as a stand-alone device for buses, trucks, and other vehicles for Surveillance purposes. It can also be cascaded/daisy-chained to other devices to cover wider area through the SFP connection.

With IP-30 standard industrial case protection allows for either DIN rail or wall mounting for efficient use of cabinet space. Its wide operating temperature ranges from -40°C to 75°C for under harsh environment.

### **Features**

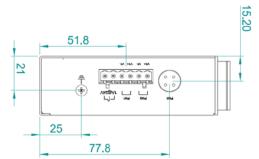
- Supports 1 PSE ports based on IEEE 802.3at up to 30 Watts per port
- SFP port supports 100Base-FX and 1000Base-X speed
- Support 48~56VDC power inputs for power redundancy
- Support overload current protection
- Support reserve polarity protection
- Supports auto-negotiation and auto-MDI/MDI-X
- Supports store and forward transmission
- Supports flow control
- Rigid IP-30 housing design
- DIN-Rail and wall mounting enabled
- Built-in power DIN for 110/240VAC environment
- Support Wide Operating Temperature -40°C~75°C

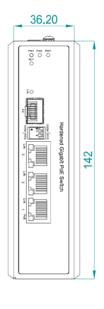
# **Specifications**

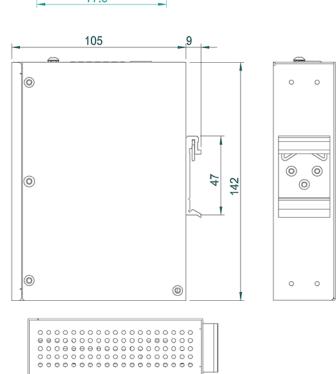
Standards	<ul> <li>IEEE 802.3 10Base-T Ethernet</li> </ul>
	<ul> <li>IEEE 802.3u 100Base-TX Fast Ethernet</li> </ul>
	<ul> <li>IEEE 802.3ab 1000Base-T Gigabit Ethernet</li> </ul>
	<ul> <li>IEEE 802.3z 1000Base-X Gigabit Ethernet</li> </ul>
	<ul> <li>IEEE802.3x Flow Control and Back Pressure,</li> </ul>
	• IEEE802.3af PoE
	IEEE802.3at PoE+
	• 3 x RJ-45 10/100/1000BaseT(X) auto negotiation, 1 Giga
	30Watts PoE 802.3af/at PSE port, Auto MDI/MDI-X, Full/Half
Interface	duplex and 2 x 10/100/1000M TX
	• 1 x 100/1000M SFP slot
Switch Architecture	Back-plane (Switching Fabric): 8 Gbps
Data Processing	Store and Forward
Flow Control	IEEE 802.3x Flow Control and Back Pressure
Jumbo Frame	• 10KB
MAC Table Size	• 8K
Packet Buffer Size	1Mbits
	UTP/STP above Cat.5e Cable, EIA/TIA-568 100-ohm (100m)
Network Cable	Fiber Cable (Multi-mode):50/125um,62.5/125um
	Fiber Cable (Single-mode): 9/125um
Protocol	CSMA/CD
	<ul> <li>PW1(Green), PW2(Green), PW3(Amber), RLY(Amber)</li> </ul>
LED indicator	<ul> <li>TX/RJ-45 port: LNK (Green), PoE(Amber)</li> </ul>
	SFP (Green)
DIP Switch	• DIP 1: OFF: Port 4 SFP 1000M (Default) ; ON: Port 4 SFP 100M
	DIP 2: Reserve
Reserve polarity protection	Present
Overload current protection	Present
Power Supply	Redundant Dual DC 48V-56V Power Input
	PoE input 48-56VDC
Power Consumption	4W@48 VDC full load, Without PoE
Alarm Dalay Contact	<ul> <li>Relay outputs with current carrying capacity of 1 A @24VDC,</li> <li>Relay in an an aircuit mode when 2 powers are connected in</li> </ul>
Alarm Relay Contact	<ul> <li>Relay in open circuit mode when 2 powers are connected. in short circuit mode when only one power supply is connected</li> </ul>
PoE power budget	<ul> <li>PoE power per port 30watts</li> <li>Maximum total power 30Watts, Supports IEEE802.3af/at</li> </ul>
	<ul> <li>Provide 2 Redundant power, Alarm relay contact, 6 Pin. And</li> </ul>
	circular Power Din for power adapter
	<ul> <li>Wire range: 0.34mm^2 to 2.5mm^2</li> </ul>
Removable Terminal Block	<ul> <li>Solid wire (AWG):12-24/14-22</li> </ul>
	<ul> <li>Stranded wire(AWG): 12-24/14-22</li> </ul>
	<ul> <li>Torque:5lb-In/0.5Nm/0.56Nm</li> </ul>
	<ul> <li>Wire Strip length: 7-8mm</li> </ul>
	<ul> <li>Operating temperature : -40°C~75°C</li> </ul>
Environment	<ul> <li>Storage temperature: -40°C ~85°C</li> </ul>
	<ul> <li>Operating Humidity: 5% to 95% (Non-Condensing)</li> </ul>
Housing	Rugged Metal ,IP30 Protection

Dimension	• 142 x 36.2 x 105mm (LxWxD)
Installation mounting	DIN Rail and Wall Mount Design
EMC/EMS	• CE, FCC
ЕМІ	FCC Part 15 Subpart B Class A
	CE EN 55022 Class A
Safety	• IEC EN60950-1
Stability Testing	• EN 60068-2-6 (Vibration), EN 60068-2-27(Shock), EN
	60068-2-32(Free Fall)

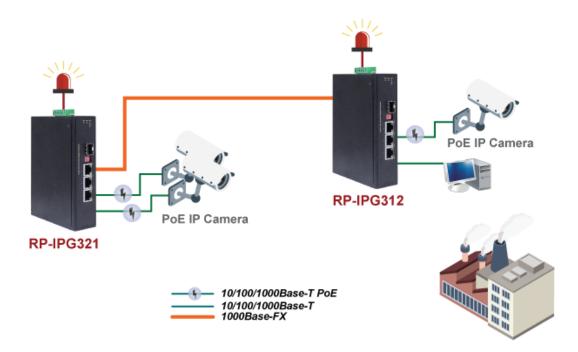
## Diagram(mm)







## **Application**



## **Ordering information**

**RP-IPG312**3-P Gigabit + 1-SFP(100/1G) slot Industrial Ethernet Switch<br/>w/ 1-P 802.3at PoE, External DC power DIN