# Omada Industrial Easy Managed Switch

## Datasheet

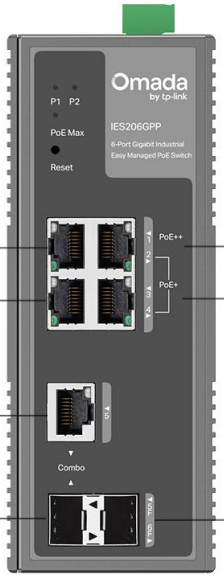
### IES206GPP

Omada 6-Port Gigabit Industrial Easy Managed Switch with 3-Port PoE+ and 1-Port PoE++


## Highlights

- 4× Gigabit RJ45 Ports (1× PoE++, 3× PoE+)
- 1× Gigabit Combo RJ45/SFP Slot, 1× Gigabit SFP Slot
- 120W Power Budget* with up to 60W for Each PoE++ Port
- Professional Industrial-Grade Design: -40~75°C Operating Temperature, 6kV Lighting Protection, and 1+1 Redundant Power Input
- Abundant Features: Up to 820ft (250m) PoE,** VLAN, QoS, and STP/RSTP
- Centralized Cloud Management via the Web or Omada App†
- Durable IP40 Aluminum Casing and DIN-rail / Wall-mount Design

# Product Pictures




120W Total PoE Budget*

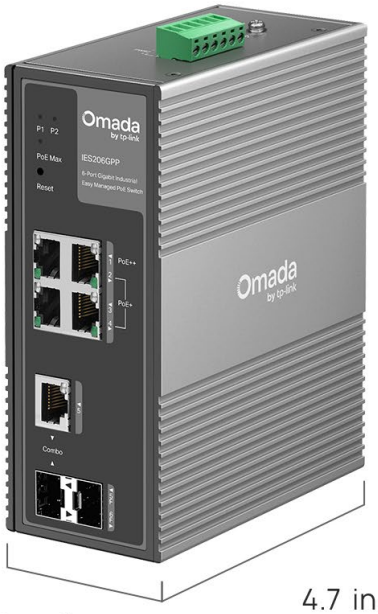
1× Gigabit Combo RJ45/SFP Slot

1× Gigabit RJ45 PoE++ Port (up to 60W per Port),
3× Gigabit RJ45 PoE+ Ports (up to 30W per Port)

1× Gigabit SFP Slot

DIN-rail / Wall-mount

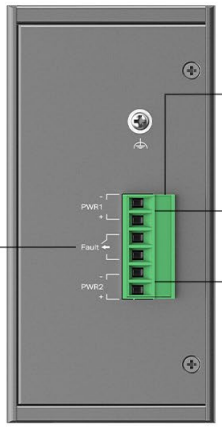
IP40 Aluminum Casing




6.1 in (155 mm)

2.4 in (60 mm)

4.7 in (120 mm)




Fault Alarm

Removable 6-Contact Terminal Block

1+1 Redundant Power Input

# Specifications

| Hardware Features & Performance | | |
|---|---|---|
| Model | | IES206GPP |
| General | Interface | 1× 10/100/1000 Mbps PoE++ RJ45 Port<br>3× 10/100/1000 Mbps PoE+ RJ45 Ports<br>1× Gigabit Combo RJ45/SFP Slot<br>1× Gigabit SFP Slot |
| | Flash | 64 Mbit |
| | Port Standard | IEEE 802.3i:10BASE-T Ethernet<br>IEEE 802.3u:100BASE-X Fast Ethernet<br>IEEE 802.3ab:1000BASE-T Gigabit Ethernet<br>IEEE 802.3z: 1000BASE-X Gigabit Ethernet (Optical fiber)<br>IEEE 802.3x: Flow Control<br>IEEE 802.1p: Traffic Class Expediting and Dynamic Multicast Filtering<br>IEEE 802.1q: Virtual Bridged Local Area Networks<br>IEEE 802.1d: Spanning Tree Protocol<br>IEEE 802.1w: Rapid Spaning Tree Protocol<br>IEEE 802.1ab: Station and Media Access Control Connectivity Discovery (LLDP) |
| PoE | PoE Standard | 802.3 af/at/bt |
| | PoE Ports | Port 1, up to 60 W per port<br>Port 2-4, up to 30 W per port |
| | PoE Power Budget | 60 W (Input: 12 V / 7.0 A - 21 V / 3.5 A)<br>120 W (Input: 21 V / 6.5 A - 57 V / 2.3 A) |
| | Fast PoE | Yes |
| | Perpetual PoE | Yes |
| Performance | Switching Capacity | 12 Gbps |
| | Packet Forwarding Rate | 8.93 Mpps |
| | MAC Address Table | 8K |
| | Packet Buffer | 4 Mbit |
| | Transmission Method | Store and Forward |
| | Jumbo Frame | 15 KB |
| Power Supply | Power Input | 12-57V Dual Redundant DC Power Input |
| | Overload Current Protection | Yes |
| | Overload Voltage Protection | Yes |
| | Reverse Polarity Protection | Yes |
| | Standby Power Consumption | 2.43 W max @ 12 VDC<br>2.85 W max @ 24 VDC<br>2.62 W max @ 48 VDC |
| | Max Power Consumption | 79.48 W (with 60 W PD connected @ 12 VDC)<br>135.64 W (with 120 W PD connected @ 24 VDC)<br>126.92 W (with 120 W PD connected @ 48 VDC) |
| Fault Relay | | 24 V / 1 A Max. (Normally closed contact) |

## Hardware Features & Performance

| | | |
|---|---|---|
| Model | | IES206GPP |
| Physical & Environment | MTBF | 469922h @ 25°C |
| | Max Heat Dissipation | 270.23 BTU/hr (with 60 W PD connected @ 12 VDC)<br>461.18 BTU/hr (with 120 W PD connected @ 24 VDC)<br>431.53 BTU/hr (with 120 W PD connected @ 48 VDC) |
| | Dimensions<br>(W x D x H) | 6.1 × 4.7 × 2.4 in (155 × 120 × 60 mm) |
| | Net Weight | 1.12 kg (2.47 lbs) |
| | Fan Quantity | Fanless |
| | Installation | DIN-rail mounting / Wall mounting |
| | IP Rating | IP40 |
| | Operating Temperature | -40 °C to 75 °C (-40 °F to 167 °F) |
| | Storage Temperature | -40 °C to 85 °C (-40 °F to 185 °F) |
| | Operation Humidity | 5% to 95% RH, non-condensing |
| | Storage Humidity | 5% to 95% RH, non-condensing |
| | Surge Protection | ±6 kV in common mode for Ethernet ports<br>±4 kV in common mode for DC power input ports |
| | ESD Protection | Air: ±8 kV, Contact: ±6 kV |
| | Certification | CE, FCC, RoHS |
| | EMC | IEC 61000-4-2 ESD: Contact: 6 kV; Air: 8 kV<br>IEC 61000-4-3 RS: 80 MHz to 1 GHz: 20 V/m<br>IEC 61000-4-4 EFT: Power: 2 kV; Signal: 2 kV<br>IEC 61000-4-5 Surge: Power: 4 kV; Signal: 6 kV<br>IEC 61000-4-6 CS: 10 V<br>IEC 61000-4-8 PFMF: 100 A/m<br>EN 55032/35<br>EN61000-6-2<br>EN61000-6-4 |
| | Shock | IEC 60068-2-27 |
| | Freefall | IEC 60068-2-32 |
| | Vibration | IEC 60068-2-6 |

| Software Features | |
|---|---|
| Model | IES206GPP |
| SDN Support | • Support Hardware Controller, Software Controller, Cloud-Based Controller<br>• Automatic Device Discovery<br>• Batch Configuration<br>• Batch Firmware Upgrading<br>• Unified Configuration |
| L2 Features | • Link Aggregation<br>- Static Link Aggregation<br>- Up to 2 aggregation groups and up to 4 ports per group<br>• Loopback Detection<br>• Flow Control<br>- 802.3x Flow Control<br>• Mirroring<br>- Port Mirroring<br>- One-to-One<br>- Many-to-One<br>- Ingress/Egress/Both<br>• Port Statistics<br>- Port Mirror Status<br>- Traffic Statistics<br>• 802.1ab LLDP<br>• Spanning Tree<br>- STP (802.1d)<br>- RSTP (802.1w) |
| L2 Multicast | • IGMP Snooping<br>- IGMP v1/v2/v3 Snooping<br>- Fast Leave |
| VLAN | • MTU VLAN<br>• Port-Based VLAN<br>• 802.1Q Tag VLAN<br>- Max 32 VLAN Groups<br>- 4K VID |
| QoS | • 802.1p DSCP Priority<br>• 8 Priority Queues<br>• Priority Schedule Mode<br>- WRR (Weighted Round Robin)<br>• Queue Weight Config<br>• Bandwidth Control<br>- Port-Based Rate Limit<br>• Storm Control<br>- Multiple Control Modes (kbps/pps)<br>- Broadcast/Multicast/Unknown-Unicast Control |
| Management | • Web-based GUI<br>• DHCP Client<br>• Cable Diagnostics<br>• Digital Diagnostic Monitoring (DDM) |

†These functions require the use of the Omada Controller. Zero-Touch Provisioning requires the use of Omada Central (Omada Central Standard or Omada Central Essentials). Go to the Omada Central Standard Product List or Omada Central Essentials Product List to find all the supported models.

*PoE budget calculations are based on laboratory testing. The actual PoE power budget is not guaranteed and will vary due to power supply, client limitations and environmental factors.

**When Extend Mode is enabled, the speed of ports that support 820ft (250m) PoE transmission will be downgraded to 10 Mbps. Actual transmission distance may vary depending on the quality of the cables. 