

EDS-208 Series

8-port entry-level unmanaged Ethernet switches



Features and Benefits

- 10/100BaseT(X) (RJ45 connector), 100BaseFX (multi-mode, SC/ST connectors)
- IEEE802.3/802.3u/802.3x support
- Broadcast storm protection
- DIN-rail mounting ability
- -10 to 60°C operating temperature range

Certifications



Introduction

The EDS-208 Series supports IEEE 802.3/802.3u/802.3x with 10/100M, full/half-duplex, MDI/MDIX auto-sensing RJ45 ports. The EDS-208 Series is rated to operate at temperatures ranging from -10 to 60°C, and is rugged enough for any harsh industrial environment. The switches can be easily installed on a DIN rail as well as in distribution boxes. The DIN-rail mounting capability, wide operating temperature capability, and the IP30 housing with LED indicators make the plug-and-play EDS-208 switches easy to use and reliable.

Specifications

Ethernet Interface

| | | | | |
|---|--|--------------|--------------|-------|
| Standards | IEEE 802.3 for 10BaseT IEEE 802.3u for 100BaseT(X) and 100BaseFX IEEE 802.3x for flow control | | | |
| 10/100BaseT(X) Ports (RJ45 connector) | EDS-208: 8 EDS-208-M-SC: 1 EDS-208-M-ST: 1 Auto negotiation speed Full/Half duplex mode Auto MDI/MDI-X connection | | | |
| 100BaseFX Ports (multi-mode SC connector) | EDS-208-M-SC: 1 | | | |
| 100BaseFX Ports (multi-mode ST connector) | EDS-208-M-ST: 1 | | | |
| Optical Fiber | | | 100BaseFX | |
| | | | Multi-Mode | |
| | | | Single-Mode | |
| | Fiber Cable Type | OM1 | 50/125 μm | G.652 |
| | | | 800 MHz x km | |
| | Typical Distance | | 4 km | 5 km |
| | Wavelength | Typical (nm) | 1300 | |
| TX Range (nm) | | 1260 to 1360 | | |
| RX Range (nm) | | 1100 to 1600 | | |
| Optical Power | TX Range (dBm) | -10 to -20 | | |
| | | 0 to -5 | | |

| | | 100BaseFX | | |
|--|-------------------------|------------------|--------------|-------------|
| | | Multi-Mode | | Single-Mode |
| | | Fiber Cable Type | OM1 | 50/125 μm |
| | | | 800 MHz x km | |
| | RX Range (dBm) | -3 to -32 | | -3 to -34 |
| | Link Budget (dB) | 12 | | 29 |
| | Dispersion Penalty (dB) | 3 | | 1 |

Note: When connecting a single-mode fiber transceiver, we recommend using an attenuator to prevent damage caused by excessive optical power.
Note: Compute the “typical distance” of a specific fiber transceiver as follows: Link budget (dB) > dispersion penalty (dB) + total link loss (dB).

Switch Properties

| | |
|--------------------|-------------------|
| Processing Type | Store and Forward |
| MAC Table Size | 2 K |
| Packet Buffer Size | 768 kbits |

Power Parameters

| | |
|-----------------------------|---|
| Input Voltage | 12/24/48 VDC |
| Operating Voltage | 9.6 to 60 VDC |
| Input Current | EDS-208 Models: 0.07 A @ 24 VDC EDS-208-M Models: 0.1 A @ 24 VDC |
| Connection | 1 removable 3-contact terminal block(s) |
| Overload Current Protection | 2.5 A @ 24 VDC |
| Reverse Polarity Protection | Supported |

Physical Characteristics

| | |
|--------------|--|
| Housing | Plastic |
| IP Rating | IP30 |
| Dimensions | 40 x 100 x 86.5 mm (1.57 x 3.94 x 3.41 in) |
| Weight | 170 g (0.38 lb) |
| Installation | DIN-rail mounting |

Environmental Limits

| | |
|--|----------------------------|
| Operating Temperature | -10 to 60°C (14 to 140°F) |
| Storage Temperature (package included) | -40 to 85°C (-40 to 185°F) |
| Ambient Relative Humidity | 5 to 95% (non-condensing) |

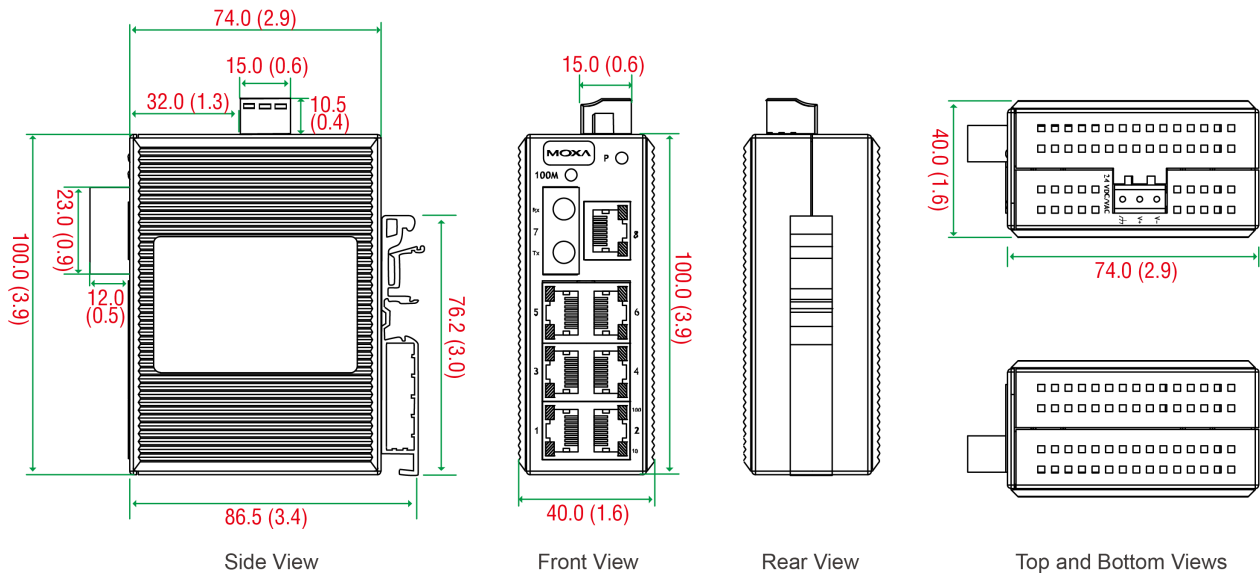
Standards and Certifications

| | |
|--------|------------------------------------|
| Safety | UL 508 UL 60950-1 EN 62368-1 |
| EMC | EN 55032/35 |

| | |
|-------------------------|--|
| EMI | CISPR 32, FCC Part 15B Class A |
| EMS | IEC 61000-4-2 ESD: Contact: 4 kV; Air: 8 kV IEC 61000-4-3 RS: 80 MHz to 1 GHz: 3 V/m IEC 61000-4-4 EFT: Power: 1 kV; Signal: 0.5 kV IEC 61000-4-5 Surge: Power: 1 kV; Signal: 1 kV IEC 61000-4-6 CS: 3 V IEC 61000-4-8 PFMF |
| Shock | IEC 60068-2-27 |
| Vibration | IEC 60068-2-6 |
| Freefall | IEC 60068-2-32 |
| MTBF | |
| Time | EDS-208 Models: 3,902,526 hrs EDS-208-M Models: 3,562,556 hrs |
| Standards | Telcordia (Bellcore), GB |
| Warranty | |
| Warranty Period | 5 years |
| Details | See www.moxa.com/warranty |
| Package Contents | |
| Device | 1 x EDS-208 Series switch |
| Documentation | 1 x quick installation guide 1 x warranty card |

Dimensions

Unit: mm (inch)



Ordering Information

| Model Name | 10/100BaseT(X) Ports RJ45 Connector | 100BaseFX Ports Multi-Mode ST Connector | 100BaseFX Ports Multi-Mode SC Connector | Housing Material | Operating Voltage | Operating Temp. |
|--------------|---|---|---|------------------|-------------------|-----------------|
| EDS-208 | 8 | – | – | Plastic | 12-48 VDC | -10 to 60°C |
| EDS-208-M-ST | 7 | 1 | – | Plastic | 12-48 VDC | -10 to 60°C |
| EDS-208-M-SC | 7 | – | 1 | Plastic | 12-48 VDC | -10 to 60°C |

Accessories (sold separately)

Power Supplies

| | |
|-----------|---|
| MDR-40-24 | DIN-rail 24 VDC power supply with 40W/1.7A, 85 to 264 VAC, or 120 to 370 VDC input, -20 to 70°C operating temperature |
| MDR-60-24 | DIN-rail 24 VDC power supply with 60W/2.5A, 85 to 264 VAC, or 120 to 370 VDC input, -20 to 70°C operating temperature |

Rack-Mounting Kits

| | |
|-------|---------------------------|
| RK-4U | 19-inch rack-mounting kit |
|-------|---------------------------|

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