EDS-P206A Series

6-port unmanaged Ethernet switches with 4 IEEE 802.3af/at PoE+ ports

Features and Benefits

- IEEE 802.3af/at compliant PoE and Ethernet combo ports
- Up to 30 W output per PoE port
- 12/24/48 VDC redundant power inputs
- Intelligent power consumption detection and classification
- Redundant dual VDC power inputs
- -40 to 75°C operating temperature range (-T models)

Certifications

Introduction

The EDS-P206A-4PoE switches are smart, 6-port, unmanaged Ethernet switches supporting PoE (Power-over-Ethernet) on ports 1 to 4. The switches are classified as power source equipment (PSE), and when used in this way, the EDS-P206A-4PoE switches enable centralization of the power supply and provide up to 30 watts of power per port.

The switches can be used to power IEEE 802.3af/at-compliant powered devices (PD), eliminating the need for additional wiring, and support IEEE 802.3/802.3u/802.3x with 10/100M, full/half-duplex, MDI/MDI-X auto-sensing to provide an economical solution for your industrial Ethernet network.

Specifications

Ethernet Interface

10/100BaseT(X) Ports (RJ45 connector)	EDS-P206A-4PoE Series: 2 EDS-P206A-4PoE-M-SC/M-ST/S-SC Series: 1 Supported functions: Auto negotiation speed Full/Half duplex mode Auto MDI/MDI-X connection
100BaseFX Ports (multi-mode SC connector)	EDS-P206A-4PoE-M-SC Series: 1 EDS-P206A-4PoE-MM-SC Series: 2
100BaseFX Ports (multi-mode ST connector)	EDS-P206A-4PoE-M-ST Series: 1 EDS-P206A-4PoE-MM-ST Series: 2
100BaseFX Ports (single-mode SC connector)	EDS-P206A-4PoE-S-SC/P206A-4PoE-S-SC-T: 1 EDS-P206A-4PoE-SS-SC/P206A-4PoE-SS-SC-T: 2
PoE Ports (10/100BaseT(X), RJ45 connector)	4 Auto negotiation speed Full/Half duplex mode Auto MDI/MDI-X connection
Standards	IEEE 802.3 for 10BaseT IEEE 802.3af/at for PoE/PoE+ output IEEE 802.3x for flow control IEEE 802.3u for 100BaseT(X)

PoE Pinout	V+, V+, V-, V- for pins 1, 2, 3, 6 (Endspan, MDI, Mode A)

Optical Fiber

		100BaseFX		
		Multi-Mode		Single-Mode
Fiber Cable Type		OM1	50/125 µm 800 MHz x km	G.652
Typical Distance		4 km	5 km	40 km
Wavelength	Typical (nm)	1300		1310
	TX Range (nm)	1260 to 1360		1280 to 1340
	RX Range (nm)	1100 to 1600		1100 to 1600
Optical Power	TX Range (dBm)	-10 to -20		0 to -5
	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

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

Power Parameters

Input Current	5.55 A @ 24 VDC
Connection	1 removable 4-contact terminal block(s)
Operating Voltage	12 to 57 VDC
Input Voltage	12/24/48 VDC Redundant dual inputs
Power Budget	Max. 120 W for total PD consumption Max. 30 W for each PoE port
Power Consumption (Max.)	Max. 13.2 W full loading without PDs’ consumption
Reverse Polarity Protection	Supported
Overload Current Protection	Supported

Physical Characteristics

Housing	Metal
IP Rating	IP30
Dimensions	50.3 x 114 x 70 mm (1.98 x 4.53 x 2.76 in)

Weight	375 g (0.83 lb)
Installation	DIN-rail mounting Wall mounting (with optional kit)

Environmental Limits

Operating Temperature	Standard Models: -10 to 60°C (14 to 140°F) Wide Temp. Models: -40 to 75°C (-40 to 167°F)
Storage Temperature (package included)	-40 to 85°C (-40 to 185°F)
Ambient Relative Humidity	5 to 95% (non-condensing)

Standards and Certifications

EMI	CISPR 32, FCC Part 15B Class A
EMC	EN 55032/24
EMS	IEC 61000-4-2 ESD: Contact: 6 kV; Air: 8 kV IEC 61000-4-3 RS: 80 MHz to 1 GHz: 20 V/m IEC 61000-4-4 EFT: Power: 2 kV; Signal: 1 kV IEC 61000-4-5 Surge: Power: 2 kV; Signal: 2 kV IEC 61000-4-6 CS: 10 V IEC 61000-4-8 PFMF
Safety	UL 508
Shock	IEC 60068-2-27
Freefall	IEC 60068-2-31
Vibration	IEC 60068-2-6

MTBF

Time	EDS-P206A-4PoE: 1,398,743 hrs EDS-P206A-4PoE-M/S: 1,289,258 hrs
Standards	Telcordia (Bellcore), GB

Warranty

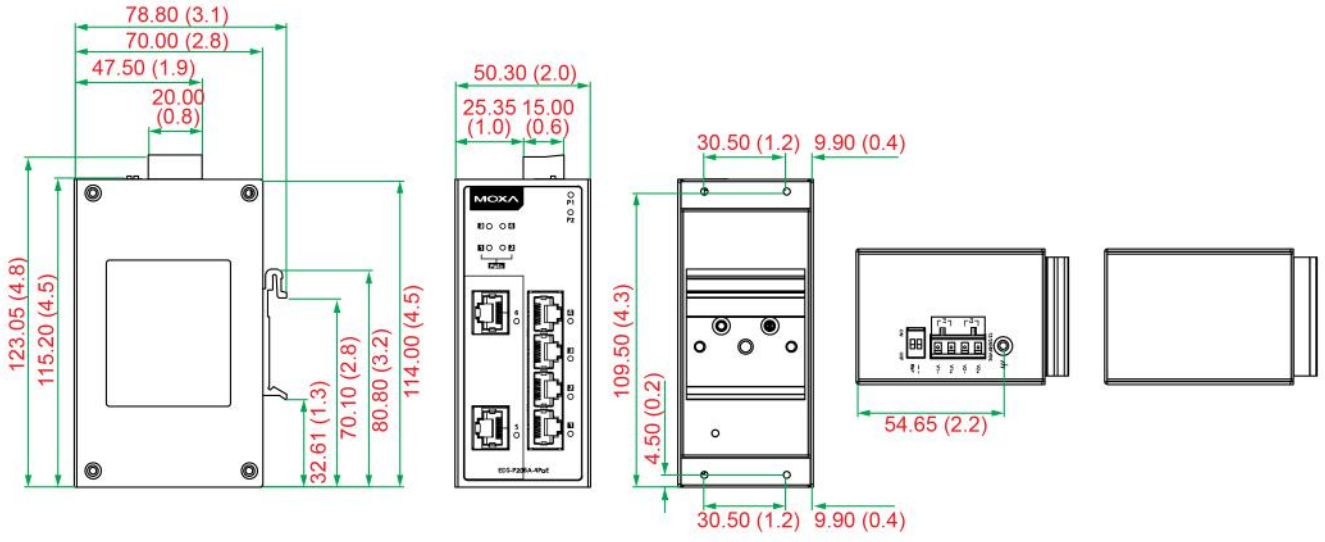
Warranty Period	5 years
Details	See www.moxa.com/warranty

Package Contents

Device	1 x EDS-P206A Series switch
Installation Kit	4 x cap, plastic, for RJ45 port
Documentation	1 x quick installation guide 1 x warranty card

Dimensions

Unit: mm (inch)



Side View | Front View | Rear View | Top and Bottom Views

Ordering Information

Model Name	10/100BaseT(X) Ports RJ45 Connector	PoE Ports, 10/100BaseT(X) RJ45 Connector	100BaseFX Ports Multi-Mode, SC Connector	100BaseFX Ports Multi-Mode, ST Connector	100BaseFX Ports Single-Mode, SC Connector	Operating Temp.
EDS-P206A-4PoE	2	4	–	–	–	-10 to 60°C
EDS-P206A-4PoE-T	2	4	–	–	–	-40 to 75°C
EDS-P206A-4PoE-M-SC	1	4	1	–	–	-10 to 60°C
EDS-P206A-4PoE-M-SC-T	1	4	1	–	–	-40 to 75°C
EDS-P206A-4PoE-M-ST	1	4	–	1	–	-10 to 60°C
EDS-P206A-4PoE-M-ST-T	1	4	–	1	–	-40 to 75°C
EDS-P206A-4PoE-MM-SC	–	4	2	–	–	-10 to 60°C
EDS-P206A-4PoE-MM-SC-T	–	4	2	–	–	-40 to 75°C
EDS-P206A-4PoE-MM-ST	–	4	–	2	–	-10 to 60°C
EDS-P206A-4PoE-MM-ST-T	–	4	–	2	–	-40 to 75°C
EDS-P206A-4PoE-S-SC	1	4	–	–	1	-10 to 60°C
EDS-P206A-4PoE-S-SC-T	1	4	–	–	1	-40 to 75°C
EDS-P206A-4PoE-SS-SC	–	4	–	–	2	-10 to 60°C
EDS-P206A-4PoE-SS-SC-T	–	4	–	–	2	-40 to 75°C

Accessories (sold separately)

Power Supplies

DR-120-24	120W/2.5A DIN-rail 24 VDC power supply with universal 88 to 132 VAC or 176 to 264 VAC input by switch, or 248 to 370 VDC input, -10 to 60°C operating temperature
DR-75-24	75W/3.2A DIN-rail 24 VDC power supply with universal 85 to 264 VAC or 120 to 370 VDC input, -10 to 60°C operating temperature
DR-120-48	120W/2.5A DIN-rail 48 VDC power supply with universal 88 to 132 VAC or 176 to 264 VAC input by switch, or 248 to 370 VDC input, -10 to 60°C operating temperature
DR-75-48	75W/1.6A DIN-rail 48 VDC power supply with universal 85 to 264 VAC or 120 to 370 VDC input, -10 to 60°C operating temperature
DRP-240-48	DIN-rail 48 VDC power supply with 240W/5A, 85 to 264 VAC, or 120 to 370 VDC input, -10 to 70°C operating temperature

Wall-Mounting Kits

WK-46-01	Wall-mounting kit, 2 plates, 8 screws, 46 x 66.8 x 2 mm

Rack-Mounting Kits

RK-4U	19-inch rack-mounting kit