

Product: [OCTOPUS 8TX -EEC](#)

Unmanaged IP67 Switch, 8 ports, supply voltage 24 VDC, train approvals

Product Description

Unmanaged IP 65 / IP 67 switch in accordance with IEEE 802.3, store-and-forward-switching, Fast-Ethernet (10/100 MBit/s) ports, electrical Fast-Ethernet (10/100 MBit/s) M12-ports

Technical Drawing**Technical Specifications****Product description**

Type:	OCTOPUS 8TX-EEC
Description:	The OCTOPUS switches are suited for outdoor applications with rough environmental conditions. Because of the branch typical approvals they can be used in transport applications (E1), as well as in trains (EN 50155) and ships (GL).
Part Number:	942150001

Port type and quantity: 8 ports in total uplink ports: 10/100 BASE-TX, M12 "D"-coding, 4-pole 8 x 10/100 BASE-TX TP-cable, auto-crossing, auto-negotiation, auto-polarity.

More Interfaces

Power supply/signaling contact:	1 x M12 5-pin connector, A coding, no signaling contact
USB interface:	1 x M12 5-pin socket, A coding

Network size - length of cable

Twisted pair (TP):	0-100 m
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Network size - cascadability

Line - / star topology:	any
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Power requirements

Operating Voltage:	12 / 24 / 36 VDC (9,6 .. 45 VDC)
Power consumption:	4.2 W
Power output in BTU (IT)/h:	12.3
Redundancy functions:	redundant power supply

Software

Diagnostics:	LEDs (power, link status, data)
Configuration:	Switch: aging time, Qos 802.1p mapping, QoS DSCP mapping. Pro Port: port state, flow control, broadcast mode, multicast mode, jumbo frames, QoS trust mode, port-based priority, auto-negotiation, data rate, duplex mode, auto-crossing, MDI state

Ambient conditions

MTBF (Telecordia SR-332 Issue 3) @ 25°C:	6 779 960 h
Operating temperature:	-40-+70 °C
Note:	Please note that some recommended accessory parts only support a temperature range from -25 °C to +70 °C and might limit the possible operating conditions for the entire system.
Storage/transport temperature:	-40-+85 °C
Relative humidity (also condensing):	5-100 %

Mechanical construction

Dimensions (WxHxD):	60 mm x 200 mm x 31 mm
Weight:	470 g
Mounting:	Wall mounting
Protection class:	IP65, IP67

Mechanical stability

IEC 60068-2-6 vibration:	1 mm, 2 Hz-13.2 Hz, 90 min. 0.7 g, 13.2 Hz-100 Hz, 90 min. 3.5 mm, 3 Hz-9 Hz, 10 cycles, 1 octave/min. 1 g, 9 Hz-150 Hz, 10 cycles, 1 octave/min
IEC 60068-2-27 shock:	15 g, 11 ms duration, 18 shocks

EMC interference immunity

EN 61000-4-2 electrostatic discharge (ESD):	6 kV contact discharge, 8 kV air discharge
EN 61000-4-3 electromagnetic field:	20 V/m (80-3000 MHz)
EN 61000-4-4 fast transients (burst):	2 kV power line, 4 kV data line
EN 61000-4-5 surge voltage:	power line: 2 kV (line/earth), 1 kV (line/line), 2 kV data line
EN 61000-4-6 Conducted Immunity:	3 V (10 kHz-150 kHz), 10 V (150 kHz-80 MHz)

EMC emitted immunity

EN 55032:	EN 55032 Class A
FCC CFR47 Part 15:	FCC 47CFR Part 15, Class A

Approvals

Basis Standard:	CE, EAC, Australian Regulatory Compliance Mark (RCM)
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Safety of industrial control equipment:	cUL61010-2-201
Safety of information technology equipment:	EN62368
Hazardous locations:	ISA 12.12.01 Class 1 Div. 2
Railway norm:	EN 50155, EN 45545-2, EN 50121-4
Transportation:	E1

Reliability

Guarantee:	60 months (please refer to the terms of guarantee for detailed information)
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Scope of delivery and accessories

Accessories to Order Separately:	ACA22-M12 (EEC) (942 125-001), M12 conector, "D"-coded (934 445-001) 2 m cordset with M12-connector, "D"-coded (934 578-001) 5 m cordset with M12-connectors, "D"-coded (934 578-002) 10 m cordset with M12-connectors, "D"-coded (934 578-003) Bulkhead M12 "D"-coded to RJ45 (934 498-001), OCTOPUS metal dust cover set (25 pieces) (942 057-001), OCTOPUS plastic dust cover set (25 pieces) (942 057-002)*
Scope of delivery:	1 x Device, 1 x Transport protection cap for supply voltage connection, 7 x Protection cap for M12 socket, 1 x M12-connector (ELWIKA 5012 PG7) for power connection, General safety instructions

Further Instructions

Product Documentation:	https://www.doc.hirschmann.com
Certificates:	https://www.doc.hirschmann.com/certificates.html
Software Download:	https://hirschmann-support.belden.com/en-US/downloads

History

Update and Revision:	Revision Number: 0.108 Revision Date: 03-25-2025
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