

TN-5305 Series

EN 50155 5-port IP67 unmanaged Ethernet switches



- > 10/100BaseT(X), 4-pin M12 (D-coding), F/H duplex mode, and auto MDI/MDI-X connection
- > IP67 rated housing protection
- > Power input: 12 to 45 VDC, 18 to 30 VAC
- > Complies with a portion of EN 50155 specifications
- > -40 to 75°C operating temperature range (T models)



Introduction

The TN-5305 series Ethernet switches are IP67 rated for the toughest industrial applications, which means that the rugged housing and connectors guard against dust, water, and oil. By using M12 connectors, you can rest assured that Ethernet cables will connect tightly to the switch, and will be robust enough to protect your applications from external disturbances, such as the vibration and shock encountered in the transportation industry. The space-saving

TN-5305 switches can be mounted virtually anywhere, and wide operating temperature (-40 to 75°C) models are also available for use in the extremest of conditions. The TN-5305 Series Ethernet switches comply with a portion of EN 50155 specifications, covering operating temperature, power input voltage, surge, ESD, and vibration, making the switches suitable for a variety of industrial applications.

Specifications

Technology

Standards:

- IEEE 802.3 for 10BaseT
- IEEE 802.3u for 100BaseT(X)
- IEEE 802.3x for Flow Control

Processing Type: Store and Forward

Flow Control: IEEE 802.3x full duplex, back pressure flow control

Interface

M12 Ports: 10/100BaseT(X) auto negotiation speed, F/H duplex mode, and auto MDI/MDI-X connection

LED Indicators: Power, LNK/ACT

Power Requirements

Input Voltage:

- 24 VDC (12 to 45 V)
- 18 to 30 VAC (47 to 63 Hz)

Note: Compliant with EN 50155 on 24 VDC

Input Current:

- 0.12A @ 24 VDC
- 0.28A @ 24 VAC

Overload Current Protection: 1.1 A (Limited Current)

Connection: 1 M12 socket (A-coding), single power input

Reverse Polarity Protection: Present

Physical Characteristics

Housing: Plastic, IP67 protection

Dimensions: 60 x 125 x 29.6 mm (2.36 x 4.92 x 1.09 in)

Weight: 250 g

Installation: Field-style mounting, DIN-Rail mounting (with optional kit)

Environmental Limits

Operating Temperature:

- Standard Models: -25 to 60°C (-13 to 140°F)
- Wide Temp. Models: -40 to 75°C (-40 to 167°F)

Storage Temperature: -40 to 85°C (-40 to 185°F)

Ambient Relative Humidity: 5 to 95% (non-condensing)

Standards and Certifications

Safety: UL 508

EMI: FCC Part 15 Subpart B Class A, EN 55022 Class A

EMS:

- EN 61000-4-2 (ESD) Level 3
- EN 61000-4-3 (RS) exceeds Level 3
- EN 61000-4-4 (EFT) Level 3
- EN 61000-4-5 (Surge) Level 3
- EN 61000-4-6 (CS) Level 2
- EN 61000-4-8

Rail Traffic: (for panel mounting installations)

EN 50155*, EN 50121-4 (Pending)

**Complies with a portion of EN 50155 specifications. Please contact Moxa or a Moxa distributor for details.*

Shock: IEC 60068-2-27

Freefall: IEC 60068-2-32

Vibration: IEC 60068-2-6

Note: Please check Moxa's website for the most up-to-date certification status.

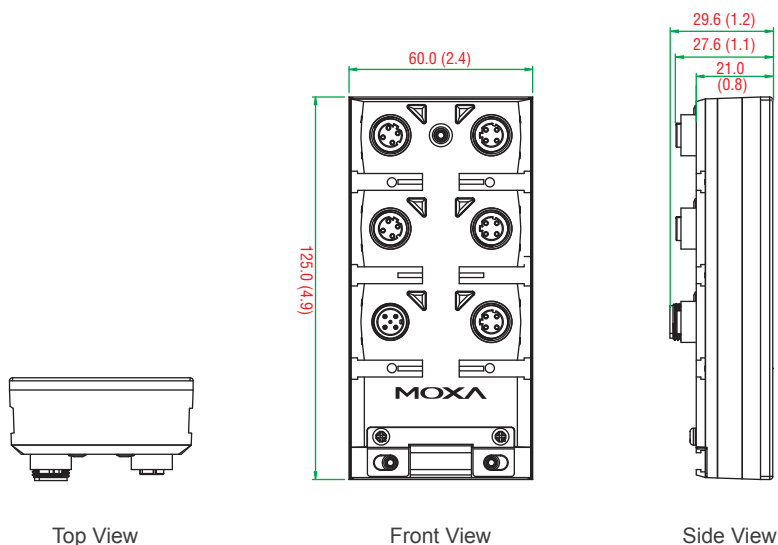
Warranty

Warranty Period: 5 years

Details: See www.moxa.com/warranty

Dimensions

Unit: mm (inch)



Ordering Information

Available Models		Port Interface
Standard Temperature (-25 to 60°C)	Wide Temperature (-40 to 75°C)	10/100BaseT(X), M12 connector
TN-5305	TN-5305-T	5

Note: Conformal coating is available on request.

Optional Accessories (must be purchased separately)

Power Cords, M12 Connectors, Protective Caps: See page 2-29

DK-TN-5308: DIN-Rail mounting kit

Package Checklist

- TN-5305 switch
- 3 protective caps for unused ports and 8 port labels
- Panel mounting kit
- Documentation and software CD
- Hardware installation guide
- Warranty card