AT-IMC1000TP/SFP

2-PORT GIGABIT ETHERNET POE+ INDUSTRIAL MEDIA CONVERTER

Allied Telesis Industrial Ethernet Media Converters offer an operating range from -40°C to 75°C. The temperature-hardened IMC Series feature Plug and Play and auto-negotiation.

Extend Networks

The AT-IMC1000TP/SFP industrial switch is designed to extend the distance of the network by converting any Ethernet data between twisted-pair cabling to multi-mode or single-mode fiber-optic cabling for Fast Ethernet (IEEE 802.3u) or Gigabit Ethernet (IEEE 802.3z). The AT-IMC1000TP/SFP features a 100FX or 1000X SFP fiber port and a 10/100/1000T twisted-pair port supporting 30W Class 4 injector for any PoE+ requirement accordingly with IEEE 802.3at standard. The fiber-optic port features a modular SFP bay for any kind of MSA-compliant pluggable SFP model working at 100Mbps or 1Gbps. The twisted-pair port has an RJ-45 connector with a maximum operating distance of 100 m (328 ft).

VLAN Support

Many new backbone switch products now support the industry-standard IEEE 802.1Q specification for Virtual LANs (VLANs) that send extra-long data packets on the network. The IMC1000 switches are fully compatible with these long packets, enabling them to be used in modern networks. Switches not supporting this feature will discard these extra-long packets, making them unsuitable for modern networks.

Small and Flexible

The small size and dual external power supply inputs of the IMC1000 Series allows them to be used almost anywhere in harsh environmental conditions. Additionally, they can be mounted both on DIN rail (EN50022) or by wall-mount, allowing users to deploy any mix of network conversions required.

Key Features

- RJ-45 port supports auto MDI/MDI-X function
- Embedded one port PoE+ injector function
- Store-and-Forward switching architecture
- Built-in Link Loss Forwarding (LLF)
- RoHS compliant
- Jumbo frame: 10Kbytes
- Supports wide operating temperature (-40°C to 75°C)
- IP-31 protection
- DIN rail (EN50022) and wall-mount design
- 48 vDC power connectors

Specifications

Connector

Fiber	1 x SFP slot, supports 100/1000Mbps dual-mode
RJ-45	10/100/1000T Auto MDI/MDI-X Supports PoE PSE

Status LEDs

Power	Off/On
PoE power	Off/On
Fault	Fault/Functional
Giga (RJ-45)	Connected/Not connected
LINK/ACT (RJ-45)	Connected/Not connected/Active
LINK/ACT (SFP)	Connected/Not connected/Active

DIP Switch

100M / 1000M

Link Loss Forward

TX to fiber	If TX port link down, the media converter will force fiber port to link down
Fiber to TX	If fiber port link down, the media converter will force TX port to link down

Standards and Compliance

IEEE 802.3	10T
IEEE 802.3u	100TX/100FX
IEEE 802.3ab	1000T
IEEE 802.3x	Flow control and back pressure
IEEE 802.3z	1000SX/LX standards
IEEE 802.3at	PoE Plus

Power Characteristics

External power supply	48 vDC
Power consumption	32.73 Watts

Environmental Specifications

Operating temperature	-40°C to 75°C (-40°F to 167°F)
Operating humidity	5% to 95% relative humidity (non-condensing)
Storage temperature	-40°C to 85°C (-40°F to 185°F)
Altitude	0 m to 2000 m (operational)

Physical Specifications

Dimensions	3.6 cm x 9.5 cm x 10.8 cm
(W x D x H)	1.41 in x 3.74 in x 4.25 in
Weight	0.5 kg (1.1 lbs)
Case material	Metal, IP-31

Installation

DIN rail (EN50022) or wall-mount

Electrical and Mechanical Approvals

EMI	FCC Class A
	CE EN61000-4-2 (ESD)
	CE EN61000-4-3 (RS)
	CE EN61000-4-4 (EFT)
	CE EN61000-4-5 (Surge)
	CE EN61000-4-6 (CS)
	CE EN61000-4-8
	CE EN61000-6-2
	CE EN61000-6-4
	C-TICK
Safety	UL508
	CE EN60950-1 (LVD)
	Class I, Division 2, Groups A, B, C, Hazardous Locations
Stability	IEC60068-2-32 (Free fall)
	IEC60068-2-27 (Shock)
	IEC60068-2-6 (Vibration)

Ordering Information

AT-IMC1000TP/SFP-80
10/100/1000T PoE+ to 100/1000X SFP, industrial temperature

Supported SFP Modules

AT-SPFX/15 (100FX)
AT-SPSX
AT-SPLX10
AT-SPSX/I
AT-SPLX10/I
AT-SPBD10-13
AT-SPBD10-14

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