

# EL900 Series

Hardened 10/100BASE-TX to 100BASE-FX Media Converter



## Overview

The EL900 Series provides media conversion between 10/100BASE-T and 100BASE-SX-LX Fiber. Built specifically for mission-critical applications in harsh environments, the EL900's hardened design features high shock & vibration resistance, electrical noise immunity, wide operating temperature range from -40°C to 75°C, and ruggedized aluminum housing. With triple power inputs, link down alarming, Link-Fault-Pass-Through and a wide range of fiber connectivity options, the EL900 is the ideal media converter for harsh environments.

EtherWAN — "When Connectivity is Crucial."

## Spotlight

### + ISA 12.12.01 Certification

Highly qualified for explosive environmental applications and certified by UL with ISA12.12.01 Class I, Division 2 classified for use in hazardous locations

### + Link-Fault-Pass-Through (LFPT)

LFPT function let network operators be aware of network connection status  
When fiber link is down, LFPT function will turn down Ethernet port to inform connected device that the link is down and vise versa

### + Wide Operating Temperature

-40°C to 75°C wide operating temperature range design is suitable for installation in outdoor cabinet

## Specifications

### + Technology

#### Standards

IEEE 802.3 10BASE-T  
IEEE 802.3u 100BASE-TX and 100BASE-FX  
IEEE 802.3x Full duplex and flow control

#### Forward and Filtering Rate

14,880pps for 10Mbps  
148,810pps for 100Mbps

#### Packet Buffer Memory

128K bits

#### Processing Type

Store-and-forward  
Auto Negotiation  
Half-Duplex back-pressure and IEEE 802.3x Full-Duplex flow control  
Auto MDI/MDIX

### + Interface

#### Ethernet Ports

10/100BASE-TX: 1 ports  
100BASE-FX: 1 ports

#### LED Indicators

Per Unit: Power1, Power2, Alarm  
Per 10/100BASE-TX port: Link/Activity, 100, Full-Duplex/Collision, LFPT  
Per 100BASE-FX port: Link/Activity, Full-Duplex/Collision

#### Relay Contact

Dry contact with current 0.6A/30VDC

### + Environment

#### Operating Temperature

-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)

## + Power

### Input

10-48VDC (DC Terminal Block)  
12VDC (DC Jack) or 24VAC, 0.185A (AC Terminal Block)

### Power Consumption

4.32W Max  
0.36A@12VDC  
0.09A@48VDC

### Protection

Overload Current Protection  
Reverse Polarity Protection

## + Mechanical

### Casing

Aluminum Case  
IP30

### Dimensions

50 x 110 x 135mm (W x D x H)  
(1.97" x 4.33" x 5.31")

### Weight

0.8Kg (1.76lbs.)

### Installation

DIN-Rail (top hat type 35mm) or panel mounting

## + Regulatory Approvals

### ISO

Manufactured in an ISO 9001 facility

### Safety

ISA 12.12.01

- Class 1, Division 2 group A, B, C & D for hazardous locations

### EMC

FCC Part 15B Class A

VCCI Class A

EN 55022

EN 61000-3-2

EN 61000-3-3

EN 61000-6-3

### EMS

EN 61000-6-2

- EN 61000-4-2 (ESD Standards)
- EN 61000-4-3 (Radiated FRI Standards)
- EN 61000-4-4 (Burst Standards)
- EN 61000-4-5 (Surge Standards)
- EN 61000-4-6 (Induced RFI Standards)
- EN 61000-4-8 (Magnetic Field Standards)

### Environmental Test Compliances

IEC 60068-2-6 Fc (Vibration)

IEC 60068-2-27 Ea (Shock)

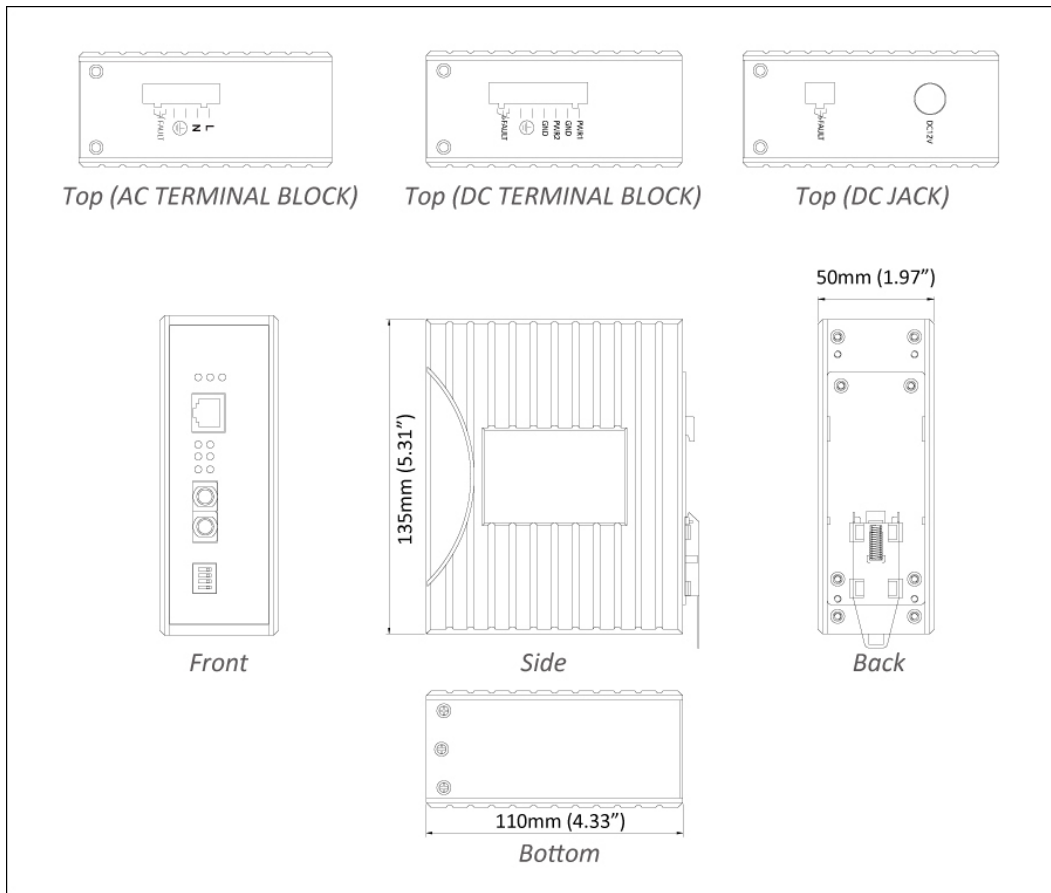
FED STD 101C Method 5007.1 (Free fall w/ package)

IEC 60068-2-27 Ea (Shock)

NEMA TS1/2

\* Environmental requirements for traffic control equipment

# Dimensions



## Ordering Info

### + Model

<b>EL900-A-Y-1-P</b>	10/100BASE-TX to 100BASE-FX Hardened Media Converter
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\* DIN-Rail mounting kit included.

### + 100FX Fiber Options (Y)

<b>B</b>	Multi Mode (SC) - 2Km (1310nm)
<b>C</b>	Multi Mode (ST) - 2Km (1310nm)
<b>D</b>	Multi Mode (SC) WDM-TX: 1310nm/RX: 1550nm-2Km
<b>E</b>	Multi Mode (SC) WDM-TX: 1550nm/RX: 1310nm-2Km
<b>F</b>	Multi Mode (SC) WDM-TX: 1310nm/RX: 1550nm-5Km
<b>G</b>	Multi Mode (SC) WDM-TX: 1550nm/RX: 1310nm-5Km
<b>Q</b>	Single Mode (SC) WDM-TX: 1310nm/RX: 1550nm-20Km
<b>R</b>	Single Mode (SC) WDM-TX: 1550nm/RX: 1310nm-20Km
<b>S</b>	Single Mode (SC) WDM-TX: 1310nm/RX: 1550nm-40Km
<b>T</b>	Single Mode (SC) WDM-TX: 1550nm/RX: 1310nm-40Km
<b>M</b>	Single Mode (ST) - 20Km (1310nm)
<b>N</b>	Single Mode (SC) - 20Km (1310nm)
<b>O</b>	Single Mode (SC) - 40Km (1310nm)

### + Power Connector Options (P)

<b>A</b>	DC Terminal Block
<b>B</b>	DC Jack
<b>C</b>	24VAC Terminal Block

### + Optional Accessories

<b>KP-AA96-480</b>	Panel mounting Kit
<b>HDR-30-24</b>	30W/1.5A DIN-Rail 24VDC Industrial Power Supply
<b>HDR-60-24</b>	60W/2.5A DIN-Rail 24VDC Industrial Power Supply
<b>EDR-75-24</b>	75W/3.2A DIN-Rail 24VDC Industrial Power Supply
<b>EX41-145046-X</b>	Power Supply 45W 12VDC with Open Wire (X) = 1: US, 2: EU, 3: UK, 4: AU, 5: JP, 6: SA
<b>EX41-145044-X</b>	Power Supply 45W 12VDC with Latch (X) = 1: US, 2: EU, 3: UK, 4: AU, 5: JP, 6: SA



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