# SLX-3ES Industrial Ethernet Media Converter

Sixnet Networking Series



# >>> SlimLine Plus Unmanaged Industrial Connectivity



### **PRODUCT HIGHLIGHTS**

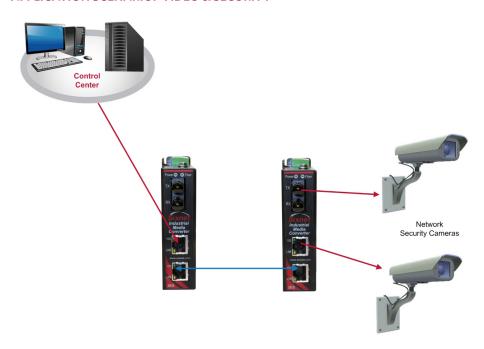
- 2 fast Ethernet (10/100) ports
- 1 fiber optic (10/100BaseFX) port for distances up to 120km
- Slim DIN-rail packaging
- High performance and reliability
- Industrial-hardened design

#### **APPLICATIONS**

- Video & Security
- Transportation
- Oil & Gas
- Mining
- Maritime

The SLX-3ES is an Ethernet copper to fiber media converter that provides fast performance allowing for real-time operation in industrial networking applications. These ruggedized converters are industrial hardened to provide superior reliability. They require no user setup and immediately start operating as soon as they're powered up.

#### **APPLICATION SCENARIO: VIDEO & SECURITY**



## **FEATURES & BENEFITS**

### Real-Time Ethernet Performance

- Provides plug-and-play simplicity
- Offers ease of use
  - Fast wire-speed switching
  - Intelligent message routing
  - Auto-sensing for speed and duplex
  - Auto-mdi/mdix-crossover works with straight or crossed cables
  - Auto-polarity corrects for crossed signals
  - No user configuration required
  - Dual redundant power inputs

## Rugged, Reliable Operation

- Supports deployment in extreme environments
- Provides high reliability in the toughest applications
  - Ultra-reliable 1,000,000+ hours MTBF
  - -40 to 85°C operating temperature
  - Rugged corrosion-resistant metal enclosure
  - Hazardous locations for Class I, Div 2 and Zone 2



# >>> SLX-3ES Industrial Ethernet Media Converter Specifications

#### **SPECIFICATIONS**

#### **Ethernet Performance**

- Type: Unmanaged
- Operation: store and forward wire-speed switching, non-blocking
- Modes: full or half duplex operation with flow control on all ports
- MAC addresses: 1,024
- Memory bandwidth: 3.2 Gbps
- Latency (typical): (plus frame time) 5 uS for 100 Mbps

  - 16 uS for 10 Mbps
- Ethernet isolation: 1,500 Vrms 1 minute

#### **RJ45 Copper Ports**

- 2 RJ45 ports fully IEEE 802.3 compliant
- Speed (10/100) and duplex settings (full or half): auto-detecting or manually configurable
- Auto-MDI/MDIX-crossover automatically supports either straight or crossed cables
- Auto-polarity for automatic correction of crossed TD and RD pairs

### Fiber Optic Ports

- 1 100 Mbps fiber optic ports
- Connector style: SC or ST
- Multimode: links up to 4 km typical; use with 50-62.5/125 micron fiber
- Singlemode: links up to 120 km typical; use with 9/125 micron fiber

- Dual power inputs for redundant power
- Reverse polarity protection
- Input voltage range: 10 to 30 VDC
- Power consumption (typical with all ports linked and active): 3.0 W
- Transient protection: 15,000 W peak Spike protection: 5,000 W (10 times for 10 uS)

#### Environmental

- Operating temperature: -40 to 85°C
- Cold startup: -40°C
- Storage temperature: -40 to 85°C
- Humidity: 5 to 95% RH (non-condensing; conformal coating optional)
- Shock and vibration: IEC60068-2-6 and -27
- Maximum Operating Altitude: 30,000 ft.

#### Standards & Compliance

- Standards: IEEE 802.3, 802.3u, 802.3x, 802.1D/w, 802.1p and 802.1Q
- Electrical safety: UL508, CSA C22.2/14; EN61010-1, CE
- EMC: FCC part 15, ICES-003; EN610006-2/4, CE
- Hazardous locations: UL1604, CSA C22.2/213 (Class I, Div 2); EN60079-15 (Zone 2; Category 3), CE (ATEX)
- Marine/maritime/offshore rated per ABS
- MTBF: >2MM hours GB @ 40°C per MIL-HNDBK-217F2
- RoHs and WEEE compliant

## Mechanical

- Material: corrosion-resistant aluminum
- Ingress protection: IP40
- Mounting: DIN-rail or direct-to-panel
- Weight: 6 oz (0.17 kg) Dimensions: 3" x 1" x 4.50" (7.62cm x 2.54cm x 11.43cm)

All specifications are subject to change. Contact Sixnet to learn more.

### **ORDER GUIDE**

| PART NUMBER  | DESCRIPTION                                    |
|--------------|--|
| SLX-3ES-2SC  | 2 RJ45 ports and 1 multimode fiber SC, 4 km    |
| SLX-3ES-2ST  | 2 RJ45 ports and 1 multimode fiber ST, 4 km    |
| SLX-3ES-3SC  | 2 RJ45 ports and 1 singlemode fiber SC, 20+ km |
| SLX-3ES-3ST  | 2 RJ45 ports and 1 singlemode fiber ST, 20+ km |
| SLX-3ES-3SCL | 2 RJ45 ports and 1 singlemode fiber SC, 40+ km |
| SLX-3ES-3STL | 2 RJ45 ports and 1 singlemode fiber ST, 40+ km |

