

# FOSTCDRI-Sx

## Industrial Serial to Single-mode Fiber Converter

- ✓ Data Rates up to 115.2 kbps
- ✓ 9 Mile (15 km) Range
- ✓ 10 to 48 VDC Input Voltage
- ✓ Wide Operating Temperature
- ✓ 2000V Isolation
- ✓ MODBUS ASCII/RTU Compatible
- ✓ Removable Terminal Blocks
- ✓ EMI/RFI Protection

The FOSTCDRI-Sx is our premium Serial to Single-mode Fiber Optic Converter. Designed for industry, it extends serial data range up to nine miles and provides the most versatile connection possible between any asynchronous full or half-duplex serial equipment. In addition to direct point-to-point connectivity, it is capable operating in a multi-drop mode. This allows one serial device to communicate with up to 31 others around a fiber optic ring. Since it supports mixed serial standards, you can replace other converters and isolators and add the EMI/RFI immunity inherent to fiber optic communications. Fiber optic connector options are SC (FOSTCDRI-SC) and ST (FOSTCDRI-ST)

In RS-232 mode, the FOSTCDRI-Sx supports transmit and receive data. Handshaking signals are not passed through.

B&B's Automatic Send Data Control circuit controls the RS-422/485 driver chip, eliminating the requirement for special software.

Easy to install and configure, it has a 12 position DIP Switch to set up the RS-422/485 parameters and removable terminal blocks to connect serial signals and power.

When it comes to reliable communications in harsh duty industrial environments, ILinx™ is your Number One choice.



### Specifications

#### Serial Technology

RS-232	TD, RD, GND
RS-485 2-Wire	Data A(-), Data B(+), GND
RS-422/485 4-Wire	TDA(-), TDB(+), RDA(-), RDB(+), GND
Serial Connector	Removable Terminal Block (12 to 28 AWG)
Data Rate	9.6 to 115.2 kbps
Isolation	2KV RMS, 1 minute
Surge Protection	600 W Peak Power Dissipation Clamping time < 1 pico-second
Industrial Bus	MODBUS ASCII/RTU

#### Fiber Optic Technology

Type / Wavelength	Single Mode / 1310 nm
Output Power	(-) 15 to (-) 8 dBm
Receive Sensitivity	Less than or equal to (-) 32 dBm
Cable	9/125 micro-meter
Connector	SC or ST (See ordering information)
Data Rate	9.6 TO 115.2 kbps
Maximum Distance	9 miles (15 km)

#### Power

Source	External
Input Voltage	10 to 48 VDC (Class 2)
Power Consumption	1.4 Watts
Connector	Removable Terminal Block (12 to 28 AWG)

#### Mechanical

LED Indicators	FO Receive, FO Transmit, Power
Dimensions	5.0 x 3.8 x 1.1 in (12.8 x 9.7 x 2.8 cm)
Enclosure	35mm DIN Mount, Plastic, IP 30
Weight	0.3 lbs (149.7 g)

#### Environmental

Op Temperature	- 40 to 176°F (- 40 to 80°C)
Storage Temp	- 40 to 185°F (- 40 to 85°C)
Op Humidity	0 to 95% Non-condensing

#### Regulatory

Approvals	FCC, CE, UL (File Number E222870)
MTBF	88423 hours
MTBF Calc. Method	Parts Count Reliability Prediction

### Ordering Information

FOSTCDRI-SC	Serial to Single-mode fiber converter (SC Con)
FOSTCDRI-ST	Serial to Single-mode fiber converter (ST Con)

#### Accessories

MDR-20-24	24VDC DIN Rail Power Supply (not included)
7444	2 Position Terminal Block (1 included)
7466	5 Position Terminal Block (1 included)

#### FOSTCDRI-SM Compatibility

Due to a change in the modulation scheme, model FOSTCDRI-SM is not compatible with model FOSTCDRI-SC. Contact our Technical Support team for a warranty upgrade.