





# FRM220-CCF

#### **Contact Closure Fiber Converter**

The FRM220-CCF contact closure fiber converter provides the transmission of contact closure over a single fiber optic link. With SFP socket on fiber ports, the FRM220-CCF gives you the fiber cabling connector SFP-LC, both multi-mode and single-mode are available as well as BiDi which allows bi-directional transmission using only a single fiber cable. The FRM220-CCF has a contact input and a 0.5 amp contact output. The contact closure module has two relay outputs and two relay input. The relay output follows the "relay input" at the remote end. When the remote "relay input" is shorted, the local relay output is closed and vice-versa. The second relay output is closed when "carrier" is detected from the remote end, this indicates that the optical fiber is connected and that the remote end has power and is operating.

#### **Features**

- Transmits a single contact closure in one or two directions
- Distances up to 120km
- 30 VDC, 0.5 amp relay output, normally open
- Point-to-Point transmission architecture
- Plug-and-play design ensures ease of installation requiring no electrical or optical adjustments
- Relay contact for Carrier Detect (normally closed with carrier present)
- Indicating LEDs are provided for confirming equipment operating status

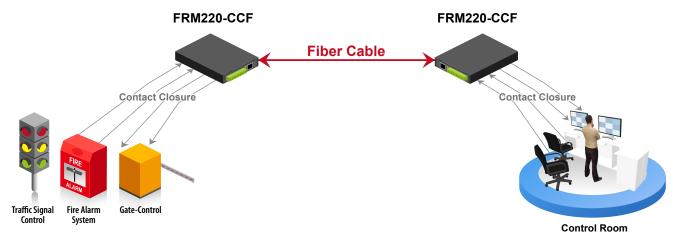
### **Specifications**

Contacts	Contact Interface Response Time : 0.5 msec
	Input Dry Contact Closure
	Output SPST Relay, 30 VDC @ 0.5 A, Resistive loads only. 0.5 A Contact Rating - normally open
Number of Fibers	x1
Connectors	Optical SFP-LC, Contact, Terminal Block
LED Indicators	Contact Relay, Carrier Detect
Power	Operating Voltage Range 8 to 15 VDC
	Power Consumption 4W Max

Electrical & Mechanical	Current Protection Automatic Resettable Solid-State Current Limiters	
	Circuit Board Meets IPC Standard	
Dimension	155 x 208 x 88mm (D x W x H)	
Weight	200g	
MTBF	>100,000 hours	
Operating Temperture	0°C to +50°C	
Storage Temperture	-10°C to +85°C	
Relative Humidity	0% to 95% (non-condensing) <sup>1</sup>	

### **Application**

- Alarm Event Triggering
- Fire and Alarm Systems
- PIR Signal Transmission
- Building Automation and Environmental Control Systems
- Gate Control
- Traffic Signal Control Equipment



## **Ordering Information**

Model Name	Description
FRM220-CCF40	4ch Contact closure fiber converter
FRM220-CCF20	2ch Contact closure fiber converter