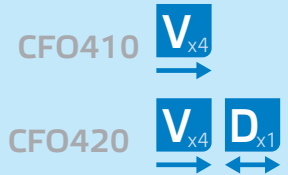


Four channel video link

For high performance uncompressed real time digital video transmission. CFO First Mile series consist of fibre optic modems which provide a high quality and lossless video transmission for variety of CCTV applications.



The new CFO410 series provides a low cost video transmission by utilising the industry standard swappable SFP optics for a proprietary point-to-point communication.

A selection of SFP optics allows the operation up to 2 km in a multimode fibre or up to 40 km in a singlemode fibre.

The configuration of the link can be modified on site which offers a quick re-

sponse time for e.g. cable re-routings or spare part replacements.

The CFO420 is an extended model and in addition to video transmission provides a dedicated channel for bi-directional RS-data channel. The data channel is configurable and supports all major PTZ-data protocols.

This new series utilises uncompressed digital technology to provide a high per-

formance video transmission. All common composite video formats are supported. Units are compatible with all previous and current CFO installation systems. Both rack and stand-alone installations are supported.

As with all CFO platform products the new series meet all typical EMC as well as generic environmental requirements.

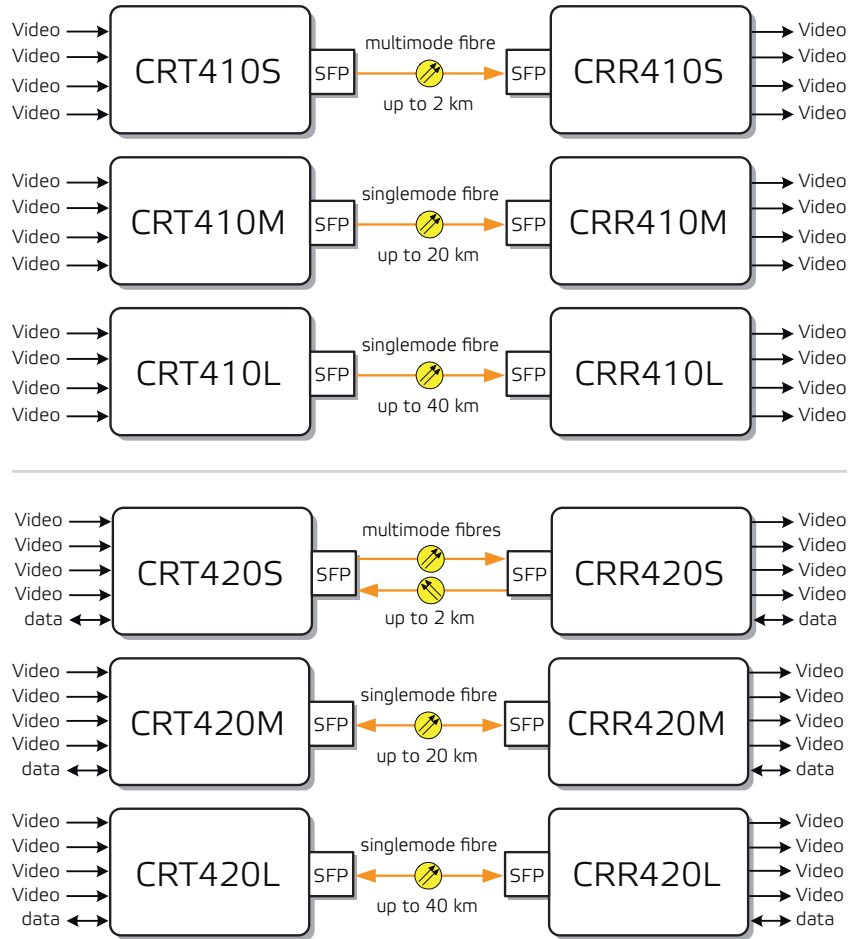
Features

- Four channel video multiplexer
- Alternative SFP optics for various optical needs
- Standard alternatives 2 km MMF, 20 km SMF and 40 km SMF
- Four CVBS (PAL/NTSC) video channels
- Video SNR 60 dB typical, 8 bit video sampling
- Data model supports RS232, RS422 or RS485
- Uncompressed zero delay digital transmission
- Common card units for rackmount or stand-alone installations
- Compatible with all CFO installation systems
- EMC and environmental conformance



CFO420 model with bi-directional RS-data channel.

CFO410 & CFO420 block diagrams



Technical specifications *(Typical values unless otherwise stated)*

Optical			General		
SFP plug-in optics	see block diagram examples		485/422 specific	Line termination	selectable
2 km multimode	1310 & 1310 nm	bidi 2-fibre, model S	Data rate	Line bias	selectable
20 km singlemode	1310/1550 nm	bidi 1-fibre, model M	Sampling rate	Half-duplex dwell-time	selectable
40 km singlemode	1310/1550 nm	bidi 1-fibre, model L	Connector	0...230 kbps	
Connector	Single or duplex-LC			16 MHz	oversampled
				5-pin screw terminal	
Video			General		
Number of channels	4	composite video	Supply voltage	10.5...14 VDC	regulated
Sampling frequency	13.88 MHz		Current consumption, max	360 mA	operational with SFP
Sampling resolution	8 bits		Dimensions	3U x 5HP x 190 mm	CFO410
Source and load impedance	75 ohm			3U x 10HP x 190 mm	CFO420
Input and output signal levels	1 Vp-p		Weight	0.5 kg	
Input overload level	1.5 Vp-p	DC component	IP Housing	00	dry indoor required
Insertion gain	+/- 5%		Operating temperature	-34...+74 °C	
Bandwidth	5.5 MHz	-3 dB	Storage temperature	-40...+80 °C	
C/L gain inequality	+/-5%		Humidity	0...90%	non-condensing
C/L delay inequality	40 ns		Indicators LEDs	Video presence, link status	
Differential gain	2%		Alarm	Link status	B-alarm (open collector)
Differential phase	1°		EMC conformance	EN61000-6-3, EN50130-4	
S/N ratio	better than 60 dB	unified weighted ITU-T J.61	Optical conformance	EN 60825-1, FDA 21 CFR 1040.21 and 1040.11	
Connector	BNC female		Safety	EN 60951-1	
Data			Other	RoHS	
Number of channels	1 bi-directional	CFO420	Notes		
Data format			1) Class 1M Laser product		
RS232	bi-state, 3-wire, EIA RS232C				
RS422	bi-state, 4-wire, EIA RS422				
RS485-2W	tri-state, 2-wire half-duplex, EIA RS485				
RS485-4W	tri-state, 4-wire, EIA RS485				