Title: OS808 Contact echo on fibre/copper card
Product number: OS808
Brochure Number: OS808

The OS808 contact echo card is a bi-directional 8-channel contact echo system, which accepts potential free contact inputs, and provides potential free contact, outputs. The cards are designed to fit into the OS800 racks and can be used in innumerable applications, which need contact closures to control any given process. The cards provide LED monitoring on each transmitted or received channel. The system requires two optical fibres interconnecting the cards, one for transmitted data the other for received data. The units are fitted with ST type Connectors

Features:
Each relay has a LED that will light up when the relay is activated, and each input also has a LED that will light up when activated.
Error indication: There is a green LED on the card that indicates the status of the data communications link between the two units.
Power indicator. A red LED under the optics interface card will light up when power is connected to the micro controller section.
Easy to use, just connect and play.
General:
The unit is supplied as a single eurocard size PCB which fits into a 3U card frame. Two cards are in a set echoing the contacts of eight relays over an optical fibre (or optional RS232 link).
Each unit in a pair has eight opto isolated inputs and eight relay outputs. It operates in full duplex mode, echoing the local inputs to the relays on the remote unit and the remote inputs to the relays on the local unit. It uses a communications channel in each direction thus two fibres are necessary for duplex working.
An additional a power supply can be provided with the unit, which will fit alongside it.

Operation:
Inputs: The opto isolation inputs will sense the status of the potential free relay contacts connected to it. It will then convert this data into a serial data stream that is routed to connector that can house a variety of interfaces.(usually a fibre optic interface).This interface will send the information to the remote unit.
Outputs: The information that is received from the communication interface is converted to an electrical data stream. This data stream is decoded and will echo the remote side input on the local relay outputs.
Uses:
Suitable for use with video security systems to extend the PTZ signal, unlock doors, control lights and many other functions.
Specifications:
Inputs:
Number: 8 inputs
Type: Opto isolated,needs contact closure(all 8 use common opto isolation ground connection).2500V isolation voltage.
Connector: Miniature Phoenix plug in screw terminals.
Outputs:
Number: 8 outputs
Type: Relay(normally open with no power)
Rating: 220VAC,5A
Switch time:10mS on,10mS off(worst case)
Electrical:
Power Supply:
Voltages: +12VDC @ 400mA(all relays on)
+/-5%
-12VDC @ 50mA +/-5%

Optional power supply:220VAC/110VAC
Opto Isolation input: Potential free contact.
Voltages:  Between 12 to 40 VDC @ 5mA
Connectors:  2 pin Phoenix screw type.
Data standard options:RS232 or encoded serial on optical fibre
Data coding:
Impedance:
Frequency variation:
Jitter tolerance:
Jitter transfer:
Connections: 3 pin Phoenix screw type
Optical:850/1300 nm
Connectors:Industry standard ST
Fibre compatibility:Multimode or Singlemode
Physical
Dimensions:
Width:  100mm
Length: 160mm
Height: 25mm
Weight: 100mm
Functions:
Indicators:
Preset:
Alarm Output:
Environmental conditions:0-40 deg.C. RH 95% noncondencing
Controller:
Type:  80C31
Link baudrate: 19200
Sampling time: Sampled every 2.5 milliseconds.
Response time: 2.5mS + relay response time
Interlocks:  None. Software interlocks can be supplied on request.