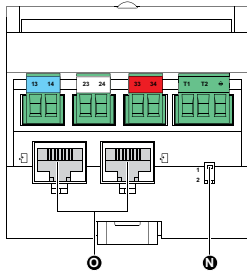
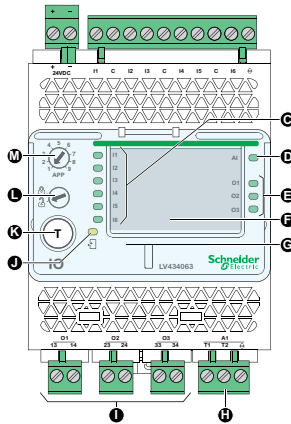
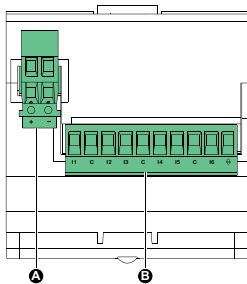


I/O Module

Facilitates breaker status and metering communication in a single device.



The programmable I/O Module facilitates communication capabilities of Square D™ by Schneider Electric Masterpact™ and PowerPact™ circuit breakers to help improve uptime and optimize your facility's energy and asset usage.

Using a single device, the I/O Module, improves upon traditional Cradle Communication Module (CCM) functions by providing an additional range of solutions for breaker communication, control, and monitoring.

Flexibility and customization

- 9-position switch for both embedded and customizable applications provides flexibility to monitor circuit breaker cradle position, control opening/closing of circuit breaker, or other user-customized functions
- Module communicates with the Micrologic™ trip unit to provide monitoring, control, alarming, and metering data
- Digital inputs & outputs provide system status information
 - 6 digital inputs are self-powered for either NO and NC dry contact or pulse counter
 - 3 digital outputs are bistable relays (5 A maximum)
 - 1 analog input for Pt100 temperature sensor

- | | |
|--|---|
| A 24 V DC power supply terminal block | H Analog input terminal block |
| B Digital input terminal block: 6 inputs, 3 commons, and 1 shield | I Digital output terminal blocks |
| C 6 input status LEDs | J ULP status LED |
| D Analog input status LED | K Test/reset button (accessible with cover closed) |
| E 3 output status LEDs | L Setting locking pad |
| F I/O application module identification labels | M Application rotary switch: 1 to 9 |
| G Sealable transparent cover | N Switch for I/O addressing (I/O 1 or I/O 2) |
| | O ULP connectors |

General characteristics

Environmental characteristics		Digital inputs							
Conforming to standards	UL 508, UL 60950, IED 60950, 60947-6-2	Digital input type	Self-powered digital input with current limitations as per IEC 61131-2 type 2 standards (7 mA)						
Certification	cULus, GOST, FCC, CE	Input limit values at state 1 (close)	19.8 – 25.2 V DC, 6.1 – 8.8 mA						
Ambient temperature	-20 to +70 °C (-4 to +158 °F)	Input limit values at state 0 (open)	0 – 19.8 V DC, 0 mA						
Relative humidity	5 – 85%	Maximum cable length	10 m (33 ft)						
Level of pollution	Level 3	<i>Note: For a length greater than 10 m (33 ft) and up to 300 m (1,000 ft), it is mandatory to use a shielded twisted cable. The shield cable is connected to the I/O functional ground of the I/O application module.</i>							
Flame resistance	ULV0	Digital outputs							
Mechanical characteristics		Digital output type	Bistable relay						
Shock resistance	1000 m/s ²	Rated load	5 A at 250 V AC						
Resistance to sinusoidal vibrations	-5 Hz < f < 8.4 Hz	Rated carry current	5 A						
Electrical characteristics		Maximum switching voltage	380 V AC, 125 V DC						
Resistance to electromagnetic discharge	Conforming to IEC/EN 61000-4-3	Maximum switch current	5 A						
Immunity to radiated fields	10 V/m	Maximum switching power	1250 VA, 150 W						
Immunity to surges	Conforming to IEC/EN 61000-4-5	Minimum permissible load	10 mA at 5 V DC						
Consumption	165 mA	Contact resistance	30 mΩ						
Physical characteristics		Maximum operating frequency	<ul style="list-style-type: none"> • 18000 operations/hr (Mechanical) • 1800 operations/hr (Electrical) 						
Dimensions	71.7 x 116 x 70.6 mm (2.83 x 4.56 x 2.78 in.)	Digital output relay protection by an external fuse	External fuse of 5 A or less						
Mounting	DIN rail	Maximum cable length	10 m (33 ft)						
Weight	229.5 g (0.51 lb)	Analog inputs							
Degree of protection of the installed I/O application module	<ul style="list-style-type: none"> • On the front panel (wall-mounted enclosure): IP4x • I/O parts: IP3x • Connectors: IP2x 	The I/O application module analog input can be connected to a Pt100 temperature sensor							
Connections	Screw type terminal blocks, RJ45 (ULP)	Range	<table border="1"> <tr> <td>-30 to 200 °C</td> <td>-22 to 392 °F</td> </tr> </table>	-30 to 200 °C	-22 to 392 °F				
-30 to 200 °C	-22 to 392 °F								
		Accuracy	<table border="1"> <tr> <td>±2 °C from -30 to 20 °C</td> <td>±3.6 °F from -22 to 68 °F</td> </tr> <tr> <td>±1 °C from 20 to 140 °C</td> <td>±1.8 °F from 68 to 284 °F</td> </tr> <tr> <td>±2 °C from 140 to 200 °C</td> <td>±3.6 °F from 284 to 392 °F</td> </tr> </table>	±2 °C from -30 to 20 °C	±3.6 °F from -22 to 68 °F	±1 °C from 20 to 140 °C	±1.8 °F from 68 to 284 °F	±2 °C from 140 to 200 °C	±3.6 °F from 284 to 392 °F
±2 °C from -30 to 20 °C	±3.6 °F from -22 to 68 °F								
±1 °C from 20 to 140 °C	±1.8 °F from 68 to 284 °F								
±2 °C from 140 to 200 °C	±3.6 °F from 284 to 392 °F								
		Refresh interval	<table border="1"> <tr> <td>5 s</td> <td>5 s</td> </tr> </table>	5 s	5 s				
5 s	5 s								

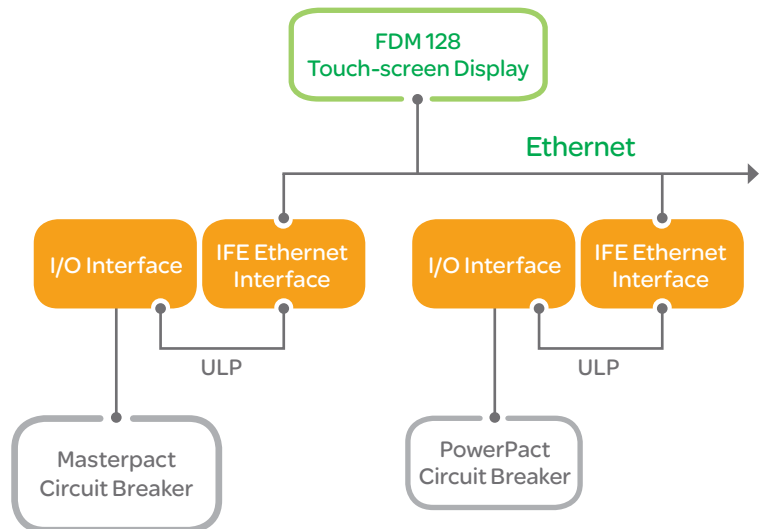
To learn more



Call your Schneider Electric representative at 888-778-2733



To learn more about the IFE Ethernet Interface and FDM128 Monitor, visit www.schneider-electric.com/us



Schneider Electric – USA

800 Federal Street
Andover, MA 01810
Tel: 978-794-0800
www.schneider-electric.com/us