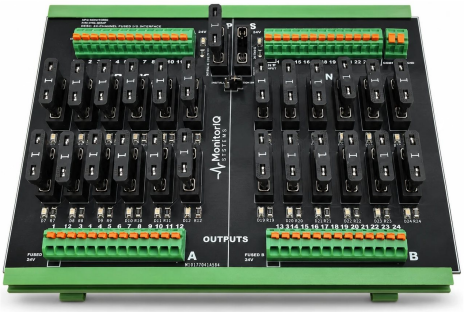
MIQ-IO24F

24-Channel Fused PLC I/O Interface Module

PLC BRAND INDEPENDENT • 24 VDC DISCRETE I/O • DIN-RAIL MOUNTED

The MIQ-IO24F is an industrial interface module that provides individually fused protection and visual status indication for twenty-four 24 VDC PLC discrete I/O field circuits. Two 12-channel banks support independent-bank or common-source PLC output configurations.

Designed for compatible standard 24 VDC PLC discrete I/O systems without dependence on a specific PLC brand.



KEY SPECIFICATIONS

Manufacturer	MonitorIQ Systems LLC
Model / MPN	MIQ-IO24F
Product type	24-channel fused PLC I/O interface module
Nominal operating voltage	24 VDC
Signal type	Digital / discrete
PLC compatibility	Brand-independent for compatible 24 VDC PLC discrete I/O systems
Number of channels	24, arranged as two 12-channel banks
Installed channel fuse	1 A, 32 VDC ATO/ATC per channel
Independent-bank source fusing	2 A source fuse per bank
Common-source configuration	4 A active source fuse; second source fuse omitted
Status indication	Individual channel LEDs plus source/power LED per bank
PCB construction	1.6 mm, 2-layer FR-4
DIN compatibility	EN 60715 TH35, TH15, G32
Approx. overall footprint	158 mm x 124 mm

WHY MONITORIQ

- 24 individually fused channels arranged as two 12-channel banks for organized field wiring.
- Dedicated channel LEDs provide fast visual status confirmation and simplify troubleshooting.
- Independent-bank and common-source configurations support different compatible PLC output architectures.
- Standard full-size ATO/ATC blade fuses are readily serviceable and widely available.
- Brand-independent interface architecture supports use across multiple compatible PLC platforms.

TYPICAL APPLICATIONS

PLC digital outputs, relay coils, indicators, solenoids, contactor-interface circuits, machine controls, OEM control panels, industrial automation, test equipment, retrofit control systems.

TECHNICAL & ORDERING INFORMATION

Operating Configurations

Independent-bank operation: Each 12-channel bank receives its own 24 VDC source. Typical setup uses one 2 A source fuse per bank with J5 removed.

Common-source operation: A single protected source may be used with a compatible 24-channel sourcing PLC output module. The active source uses a 4 A fuse, the second source fuse is omitted, and J5 is installed for Bank B power indication.

J5 limitation: J5 is for Bank B power indication and is not intended to carry Bank B field-load current in the common-source configuration.

Connection & Installation

I/O conductor range	16-24 AWG
I/O strip length	8 mm
Common/GND conductor range	18-24 AWG
Common/GND strip length	8 mm
Mounting	DIN rail - EN 60715 TH35, TH15, G32
Installation	Open-type industrial control component; install inside a suitable control enclosure
DIN carrier material	Self-extinguishing flame-retardant PVC, UL94 V-0 material rating

Ordering Information

Order model	MIQ-IO24F
Description	24-channel 24 VDC fused PLC I/O interface module
Channel architecture	Two 12-channel banks
Supplied mounting	DIN-rail carrier
Supplied protection	Required channel and source fuses
Ordering / availability	See monitoriqsystems.com for current sales channels, availability, and quotation information

Package Contents

- 1 x MIQ-IO24F interface module
- 1 x DIN-rail mounting carrier
- Required channel and source fuses

Installation & Compliance. The complete MonitorIQ assembly is not currently UL Listed or UL Recognized. Individual components may carry independent UL Listing, UL Recognition, UL94 material ratings, or other manufacturer approvals where applicable. Component-level approvals do not constitute certification of the complete assembly. The UL94 V-0 statement applies to the DIN-rail