



DESCRIPTION

An exciting new products, the PCI-769 combines 16 channels of opto-isolated input and 16 channels of reed-relay output on one PCI board. This is ideally suited for switching or monitoring applications in industrial automation environments.

In addition to the relays and opto-isolators, the board also features 16 general purpose inputs and 16 general purpose outputs. Both the 16 opto-isolated inputs, as well as the 16 general purpose digital inputs, can be configured as an interrupt source.

FEATURES

- 16 Opto-Isolated Inputs
 - 2500V (max.) Isolation Voltage
 - Up to 24VDC voltage protection for isolation channel
 - Inputs can accept DC & AC
 - Frequency response up to 10kHz
- 16 SPST Reed-Relay Outputs
 - 4200V (max.) Isolation Voltage
 - Relay switching speed up to 0.5mS
 - Load switching up to 20W
- 16 General Purpose Digital Inputs (TTL)
- 16 General Purpose Digital Outputs (TTL)
- Windows98/ME/2000/XP OS Support (NT on request)
- Linux OS Support
- WaveView for Windows Data Acquisition & Logging Software
- Labview, Testpoint and VEE Pro Drivers
- PCI-bus revision 2.2 compliant

Ordering Information

Supplied with EDR Enhanced Software and Internal Cable for Digital I/O and Opto-isolators (1-16) (converts from IDC40 to DB37)	
PCI-769	16 Channel Opto-Isolated

Specifications

Optically Isolated Input Characteristics	
Optically Isolated Inputs:	16
Interrupt Capability:	All 16 inputs can be configured as interrupt source
Frequency Response:	Up to 10kHz (Computer and software dependent)
Logic Levels:	
0V to 3V:	Logic 0
3.1V to 24V:	Logic 1
Isolation Voltage:	2500Vrms
Input Current:	
Continuous:	30mA
Peak:	1A (Pulse 300ms, 2% Cycle)
Max forward current [LED]:	50mA
Reed Relay Characteristics	
Number of channels:	16
Relay Contact Data	
Contact Form:	Form A (SPST)
Rated Power:	20W (max)
Switching Voltage:	200VDC (DC or peak AC)
Switching Current:	1A (max) (DC or peak AC)
Carry Current:	1.25A (DC or peak AC)
Contact Resistance:	0.15 Ohm (Static); 0.2 Ohm (Dynamic)
Breakdown Voltage:	320 VDC (min) (Across Contacts) 4200 VDC (min) (Contact to Coil)
Switching Time:	0.5mS
Release Time:	0.1mS
Digital In / Digital Out	
No of TTL I/O lines:	16 Digital Inputs, 16 Digital Outputs
Interrupt Capability:	All 16 inputs can be configured as interrupt source
Digital Logic Levels:	High: 2.0V (min), 5.3V max Low: 0.0V (min), 0.8V (max)
Current Output:	20mA (open collector outputs)
Frequency Response:	20MHz
External Interface	
Connector:	DB37 Female (16x Reed Relay) IDC40 #1 (DIO) IDC40 #2 (16x Opto Inputs)
Environmental / Physical	
Operating Temp:	0°C to 70°C
Board Dimensions:	182mm x 99mm
Power Requirements	
+5V:	400mA typ
+5V:	200mA (external loads)
+12V:	200mA (external loads)

Optional Accessories

ADPT-3740	DB37 (M) & IDC40 (M) to 41way Screw Terminal Adaptor
DB37M/F	DB37 (M) to DB37 (F) Screened Cable
IDC40	40way Ribbon Cable

Optional Accessories Diagram

