



# Rockwell Automation Remote I/O to Honeywell DE Master Gateway

## 5606-RIO-DEM

The ProLinx Rockwell Automation Remote I/O Adapter to Honeywell DE Master Gateway creates a powerful connection between devices on a Remote I/O network and Honeywell DE slave devices. This stand-alone DIN-rail mounted protocol gateway provides one Remote I/O port and eight Honeywell DE Master channels.

The RIO interface is an adapter (slave) which can be connected to a scanner (master) that controls the data transfer. The module also supports limited high speed data transfer via the Input and Output images.

The DEM protocol driver is designed to provide a tightly integrated communications interface between other protocols of the ProLinx platform and the Honeywell DE instruments. Compatible DE devices include a large array of field devices including pressure, temperature, metering, and many other instruments.

## Rockwell Automation Remote I/O

The RIO interface is an adapter (slave) and is connected to a scanner (master) that controls the data transfer. For example, the master/slave relationship can be accomplished using the RIO module (adapter/slave unit) with a Rockwell Automation PLC5 (scanner/master unit). Ladder logic must be programmed into a PLC to perform BTR/BTW commands to receive and transmit data between the module and the PLC. The module also supports limited high speed data transfer via the input and output images.

### Software Configurable Parameters

Rack Number	0 to 63
Addressing	
Rack Size	1/4-rack, 1/2-rack, 3/4-rack and full rack
Starting Group	0,2,4,6
Last Rack	Yes or No
Baud Rate	57.6K, 115K, 230K

### Functional Specifications

Supports block-transfers of data with scanner
Supports I/O data movement. Amount determined by rack size configuration
BTW Command – up to 64 words
BTR Command – up to 63 words

### Physical Connection

Remote I/O connector	Standard 3-screw termination connector
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*The RIO-DEM modules are the ideal solution for the many applications where Remote I/O connectivity can be used to integrate Honeywell DE devices into a system. The Remote I/O gateway is a powerful module designed with Slave support, enabling easy connection to Rockwell Automation PLCs (CLX, SLC, PLC, CPLX, and similar devices). In combination with the Honeywell DE Master support, the module provides a very powerful interface to the many Honeywell DE slave devices which are in use in the industrial marketplace today. Applications for the module are found in most industries, especially Manufacturing, Oil and Gas, Electrical Power and Food Processing.*

### How to Contact Us: Sales and Support

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## Honeywell DE Master

The ProLinx DEM Protocol Driver is designed to interface with up to 8 DE devices. Data is exchanged between the DE instruments and the driver using the internal database contained in the DEM module.

### DE Communications

- Built in accordance with the Honeywell DE specification
- Supports up to 8 single PV transmitters, 2 multivariable transmitters with 4 PVs each, or a mix of single and multivariable equaling 8 input channels
- Instrument database mismatch verification
- Interfaces directly to Honeywell Field Terminal Assembly (FTA) with ProSoft-supplied cable
- Supports redundant and non-redundant FTA implementations
- Single cable connection from DEM module to FTA

### Physical Specifications

Power Source	External 24 VDC source connection on the front of the DEM module provides instrument loop power
LEDs for Visual Module Status	DE Active DE Error

### General Specifications

The ProLinx Communication Modules provide connectivity for two or more dissimilar network types. The modules, encased in sturdy extruded aluminum, are stand-alone DIN-rail mounted protocol gateways, providing communication between many of the most widely used protocols in industrial automation today.

### Hardware Specifications

Specification	Description
Power Supply	24 VDC nominal 18 to 36 VDC allowed Positive, Negative, GND Terminals 2.5 mm screwdriver blade
Current Load	500 mA max@ 24 VDC
Operating Temperature	-20 to 50°C (-4 to 122°F)
Storage Temperature	-40 to 85°C (-40 to 185°F)
Relative Humidity	5 to 95% (non-condensing)
Dimensions	Standard: 5.20H x 2.07W x 4.52D in. (13.2cmH x 5.25cmW x 11.48cmD) Extended: 5.20H x 2.73W x 4.52D in. (13.2cmH x 6.934cmW x 11.48cmD)
LED Indicators	Power and Module Status Application Status Serial Port Activity LED Serial Activity and Error LED Status

Specification	Description
Configuration Serial Port	DB-9M RS-232 only No hardware handshaking
Ethernet Port (Ethernet modules only)	RJ45 Connector Link and Activity LED indicators
Application Serial Ports	RS-232/422/485 RS-232 handshaking configurable RS-422/485 screw termination included
Serial Port Isolation	2500V RMS port signal isolation per UL 1577 3000V DC min. port to ground and port to logic power isolation
Shipped with Each Unit	Mini-DIN to DB-9M serial cables 4 ft RS-232 configuration cable 2.5mm screwdriver CD (docs and Configuration utility) RS-422/485 DB-9 to Screw Terminal Adaptor (1 or 4, depending on ports)

### ProSoft Configuration Builder

ProSoft Configuration Builder (PCB) provides a quick and easy way to manage module configuration files customized to meet your application needs. PCB is not only a powerful solution for new configuration files, but also allows you to import information from previously installed (known working) configurations to new projects.

### Additional Products

ProSoft Technology offers a full complement of hardware and software solutions for a wide variety of industrial communication platforms.

Visit our web site at <http://www.prosoft-technology.com> for a complete list of products.

### Ordering Information

To order this product, please use the following:

**5606-RIO-DEM** Rockwell Automation Remote I/O to Honeywell DE Master Gateway

To place an order, please contact your local ProSoft Technology distributor. For a list of ProSoft distributors near you, go to <http://www.prosoft-technology.com>

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