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**MODEL 4829A GPIB TO MODBUS RTU INTERFACE BOARD
ANNOUNCED BY ICS ELECTRONICS**



PLEASANTON, CA, January 6, 2009. Today ICS Electronics announced a new GPIB-to-Modbus Interface Board for controlling slave Modbus devices that use RS-422 or RS-485 signals from the GPIB bus. Designated the Model 4829A, this new GPIB Interface Board simplifies the user's control programs by handling all of the message formatting and checking required to communicate with devices that use the Modbus RTU protocol. The 4829A also includes a RS-232 to RS-485 converter so that the slave Modbus device can also be controlled serially from a PC COM port or other serial source. The physical design of the 4829A makes it easy to add a GPIB interface to equipment such as temperature chambers, ovens, and any industrial equipment that uses a Modbus controller.

ICS's 4829A GPIB<->Modbus Interface is an IEEE 488.2/GPIB to Serial Interface board that adapts Modbus RTU slave devices with RS-422/RS-485 interfaces to the GPIB bus and to RS-232 serial links. The 4829A is unique in that it provides the user with two interfaces for controlling the slave Modbus RTU device. The GPIB interface lets the user send simple ASCII messages on the GPIB bus to control and query slave Modbus RTU devices. The 4829A does all of the Modbus packet formatting and handles the response packets. The 4829A also provides all of the required IEEE-488.2 functions and an expanded IEEE-488.2 Status Reporting Structure to report Modbus communication errors. The RS-232 interface has an RS-232 to RS-422/RS-485 converter function so that a RS-232 data source can control RS-422/RS-485 Modbus slave devices with the serial Modbus RTU protocol. The RS-232 interface can also be used to monitor packets from the Modbus device when it is being controlled by the GPIB bus.

The 4829A includes an expanded set of Modbus RTU commands for handling 16 and 32-bit fixed and floating point variables. This lets the 4829A controls a wider range of Modbus RTU devices. The 4829A is similar to ICS's 4819A board but provides RS-422 and RS-485 differential signals for controlling newer Modbus RTU devices like Watlow's EZ-Zone Temperature Controllers which only have RS-485 signals.

The 4829A is designed as a low cost interface for OEM applications. The unit is a small 4 in x 4.5 in board that can be mounted to the rear panel of the host chassis so that the GPIB and RS-232 Serial connectors protrude through the rear panel. Connections to the Modbus slave device are made via a DE-9S connector on the backside of the 4829A. The 4829A provides for 2 or 4-wire connections and includes a termination network for biasing the RS-485 network when it is idle. The unit can operate on regulated 5 Vdc or on unregulated 5.5 to 15 volt power.

Delivery is 4 weeks ARO. Prices start at \$ 355.00 each and include the Instruction Manual and a Support CD with example software and utility programs.

ICS Electronics is a pioneer and leader in the design and development of IEEE 488/GPIB, Serial, Ethernet and VXI bus products. The ICS has been supplying GPIB interfaces for over 30 years and the 4829A is the latest interface in this series of products.

ICS Electronics is headquartered at 7034 Commerce Circle, Pleasanton, CA 94588. **Phone (925) 416-1000. Contact Jerry Mercola, Marketing Manager for more information.**

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