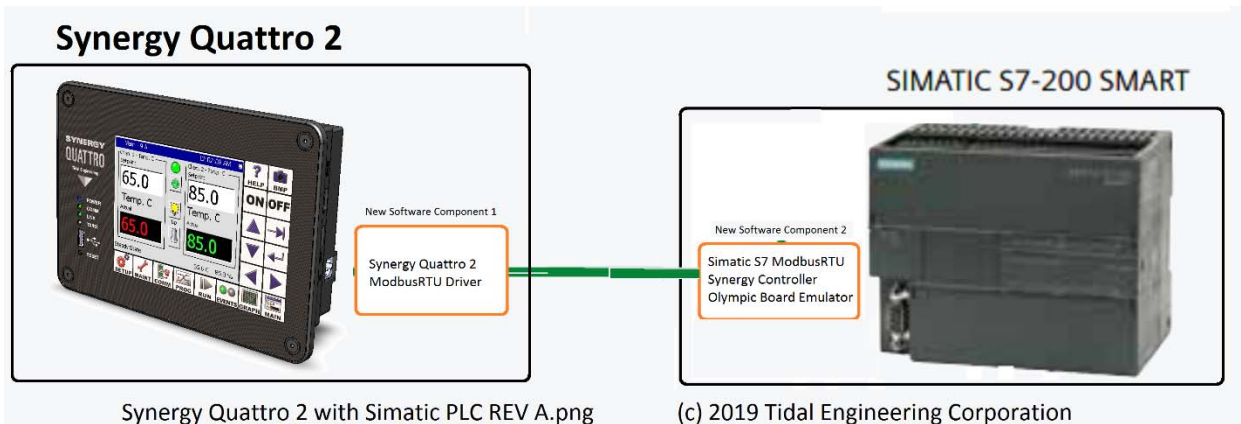


Synergy Controller Modbus Serial Expansion

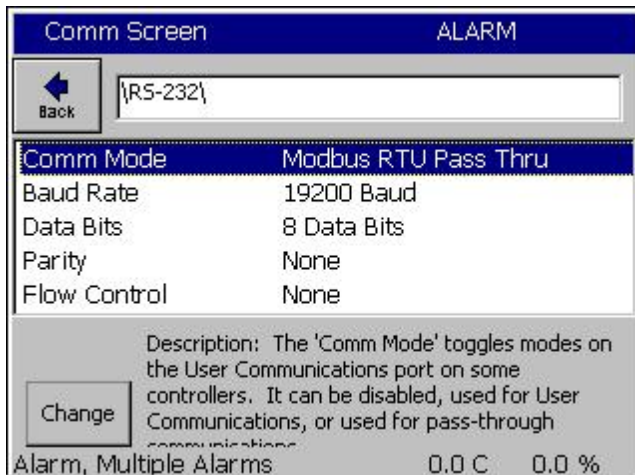


Introduction

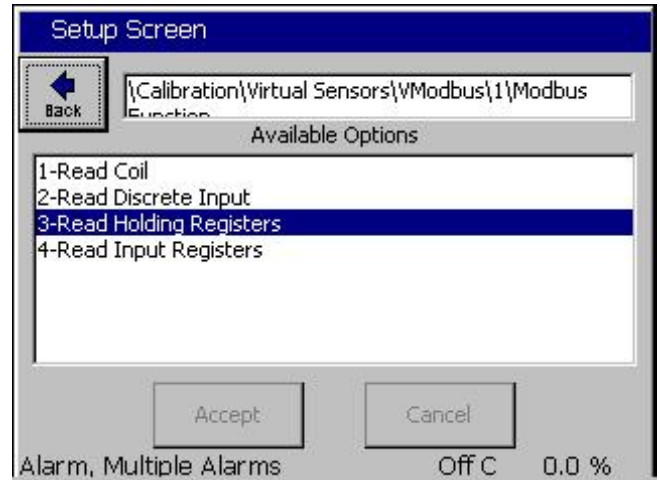
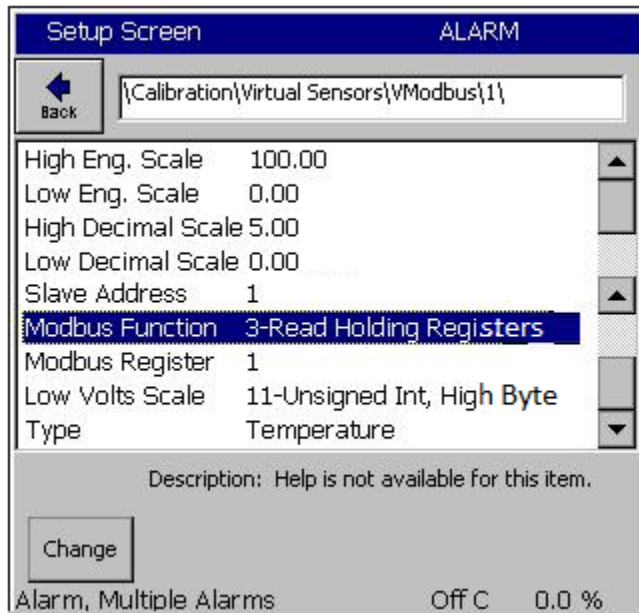
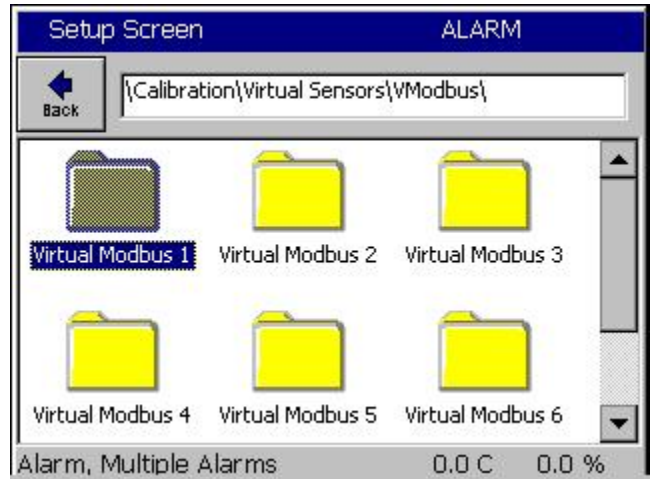
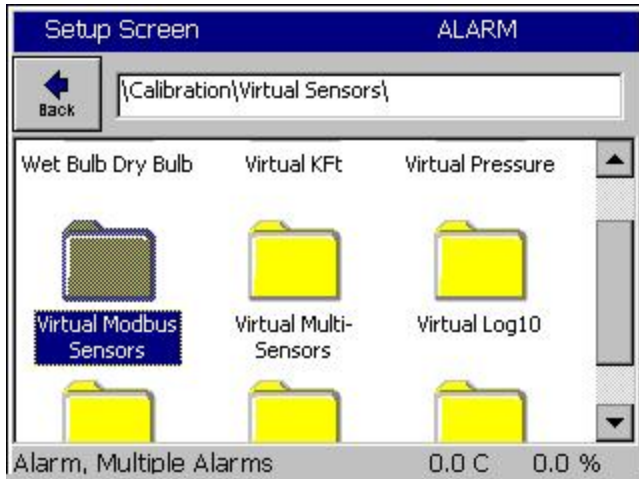
In Synergy Controller Version 5.4.n, the Synergy Nano and Quattro models support Modbus Serial Devices, both RTU and ASCII for inputs (Virtual Modbus Sensors) and outputs (Analog Retransmit).

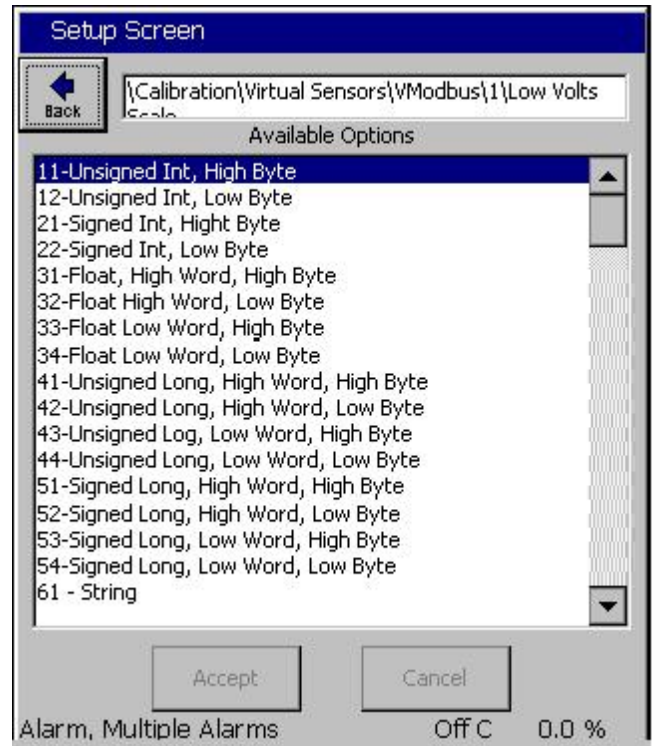
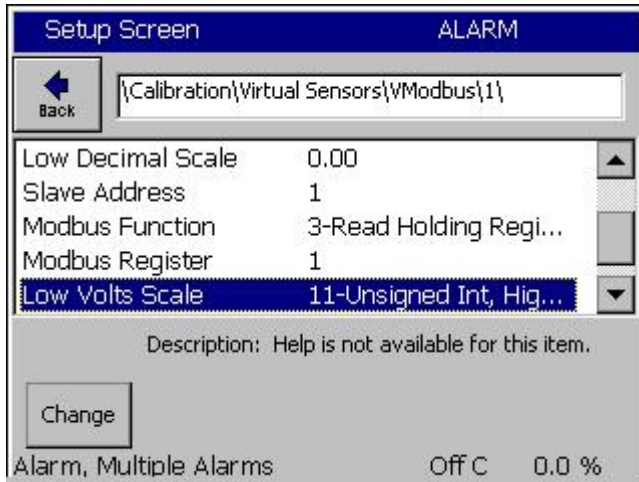
The ubiquitous Modbus industrial protocol provides connectivity for a plethora of Fail-Safe temperature controllers, vibration sensors, pressure transducers, and general-purpose PLC applications.

The Serial Port setup parameters for the Modbus serial device are set from the RS-232 folder on the COMM screen as shown below.



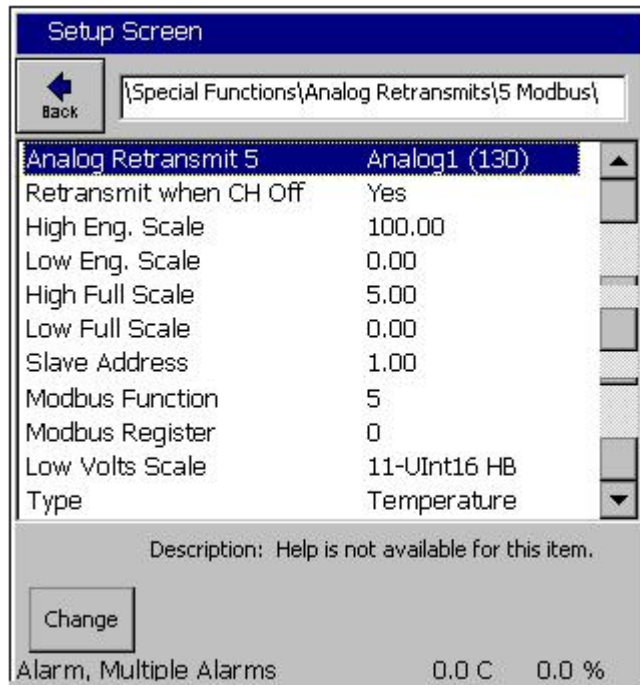
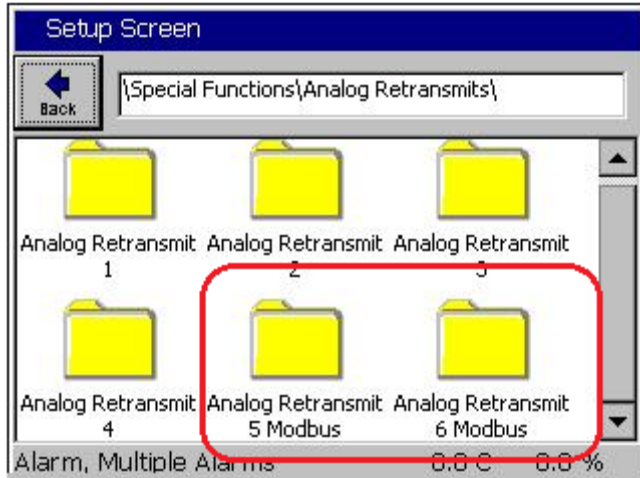
Virtual Modbus Sensors



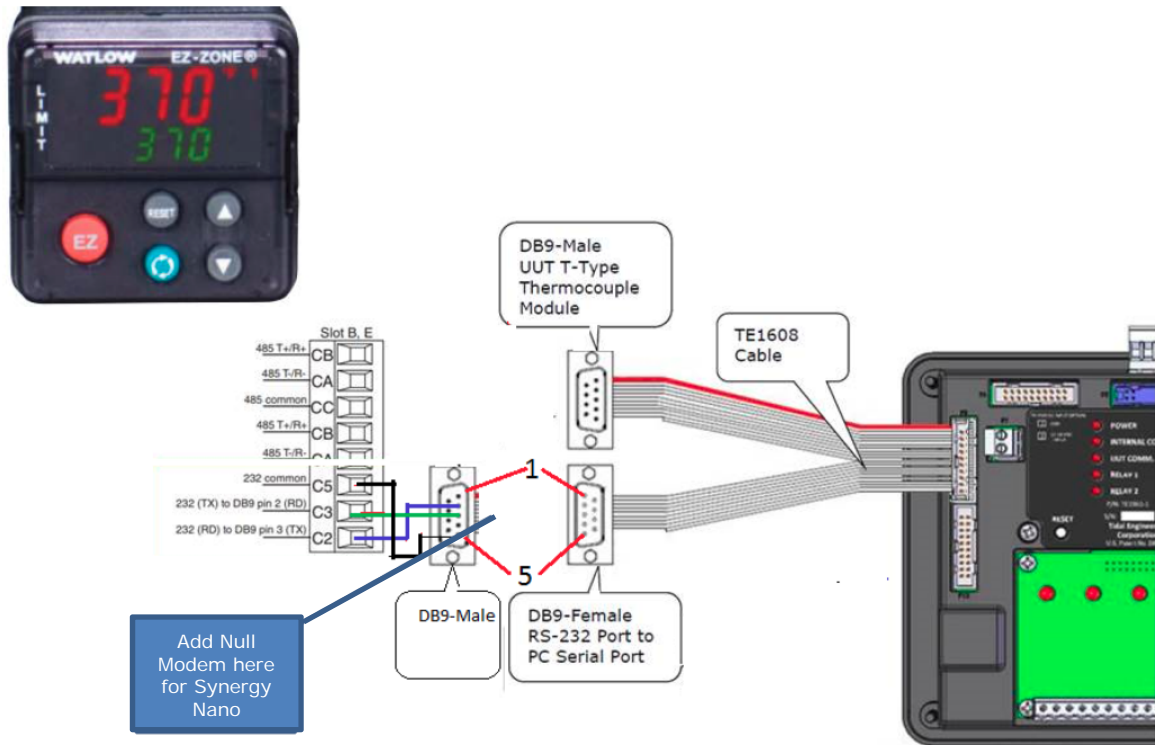


Modbus Outputs

There are two Analog Retransmit Outputs that can control Modbus Serial Devices.



Synergy Controller Modbus RTU wiring example





About the Synergy Family

Tidal Engineering's Synergy Controllers, the ¼ DIN Synergy Nano, Synergy Micro 2 and the Synergy Quattro provide state-of-the-art usability and connectivity for environmental test control and data acquisition. They combine the functions of a chamber controller and a data logger and are designed to improve test efficiency by supporting both factory automation and test and measurement protocols and standards.

Synergy Controller feature highlights includes:

- ➔ Color touch screen
- ➔ Ethernet, RS-232 and GPIB communications
- ➔ Built in 100 MB Data logger with USB drive support
- ➔ Data Acquisition, up to 64 T-type thermocouples (Optional)
- ➔ Built-in Web Server for remote control; WebTouch Remote™
- ➔ Compatible with Synergy Manager for PC based control, monitoring and programming.
- ➔ Built-in FTP Server for factory automation and test and measurement applications

For more information regarding these controllers please see the full Synergy Controller Technical Manual on our website at <http://www.tidaleng.com/synergy.htm>

About Tidal Engineering

Headquartered in Randolph, NJ, Tidal Engineering Corporation has been designing and building award-winning embedded hardware and software for test and measurement and data acquisition applications since 1992. The company is recognized for technical expertise in such areas as Embedded IEEE 488, and turnkey SCADA (Supervisory Control and Data Acquisition) systems.

Tidal Engineering Corporation
2 Emery Avenue
Randolph, NJ 07869
Tel: (973) 328-1173
Fax: (973) 328-2302
www.TidalEng.com
info@tidaleng.com

