

Thank You

Thanks for purchasing a RST-5003 control module from us! We appreciate your business and your trust. Please take a moment to familiarize yourself with the product and this manual before installation. If you have any questions, don't hesitate to call us at 888-525-7300.

Table of Contents

1. Description	5. Dimensions	9. General Care
2. How To Read Your Label	6. Power Supply Wiring Diagrams	10. Removal Instructions
3. Warranty and Return Information	7. Modbus System Wiring Diagrams	
4. Installation Procedure	8. Embedded Webpage	

1 Description

The RST-5003 Web Enabled Control Module offers a wide degree of integrated and flexible remote and local control and monitoring for your system. The RST-5003 can control up to ten APG Modbus sensors—any combination of level, pressure, magnetostrictive, and ultrasonic—along with one 4-20 mA sensor, and two input or out relay terminals. All readings are available for control and monitoring via TCP/IP for local or remote network access. The RST-5003 also has flexible power options: it can use either POE or an independent 12-28 VDC power source.

2 How To Read Your Label

Each label comes with a full model number, a part number, and a serial number. The model number for the RST-5003 will look something like this:

SAMPLE: RST-5013

The model number correlates with all the configurable options and tells you exactly what you have. Compare the model number to the options on the datasheet to identify your exact configuration. You can also call us with the model, part, or the serial number and we can help you.

3 Warranty and Return Information

This product is covered by APG's warranty to be free from defects in material and workmanship under normal use and service of the product for 24 months. For a full explanation of our Warranty, please visit <https://www.apgsensors.com/resources/warranty-certifications/warranty-returns/>. Contact Technical Support to receive a Return Material Authorization (RMA) before shipping your product back.

If your radar level sensor needs to be returned for evaluation, contact us via email, phone, or on-line chat on our website. We will issue you an RMA number with instructions. You can also find the form on our website by clicking "RMA" in the web footer, or go to https://share.hsforms.com/1rPTIAWbsTMiDOXD_SkBs6g2rio0.

- Phone: 888-525-7300
- Email: sales@apgsensors.com
- Online chat at www.apgsensors.com

Please have your part number and serial number available.

4 Installation Procedure

Installing your RST-5003 is easy if you follow a few simple steps:

- STEP 1: Connect any 4-20 mA sensor, relays, or switched inputs first.
- STEP 2: Connect RST to Ethernet/network.
- STEP 3: Connect independent 12-28 VDC supply if not using POE.
- STEP 4: Connect and set up one Modbus sensor at a time.

Please keep the following limitations in mind:

- Up to 10 Modbus sensors can be connected to the RST-5003 in any combination.
- Only one 4-20 mA sensor can be connected to the RST-5003.

IMPORTANT: Each Modbus sensor must be added to the network individually and assigned a unique Sensor Number before the next sensor can be added.

NOTE: If you can control power to each Modbus sensor individually, you can connect them all simultaneously, and power them on individually.

RST-5003 CONTROL MODULE

Web Enabled Series

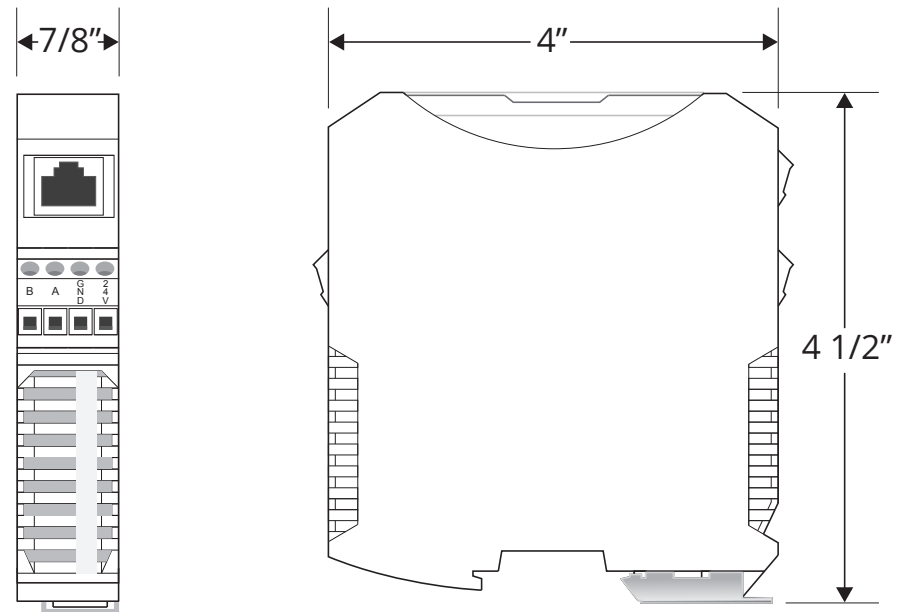
Installation Guide



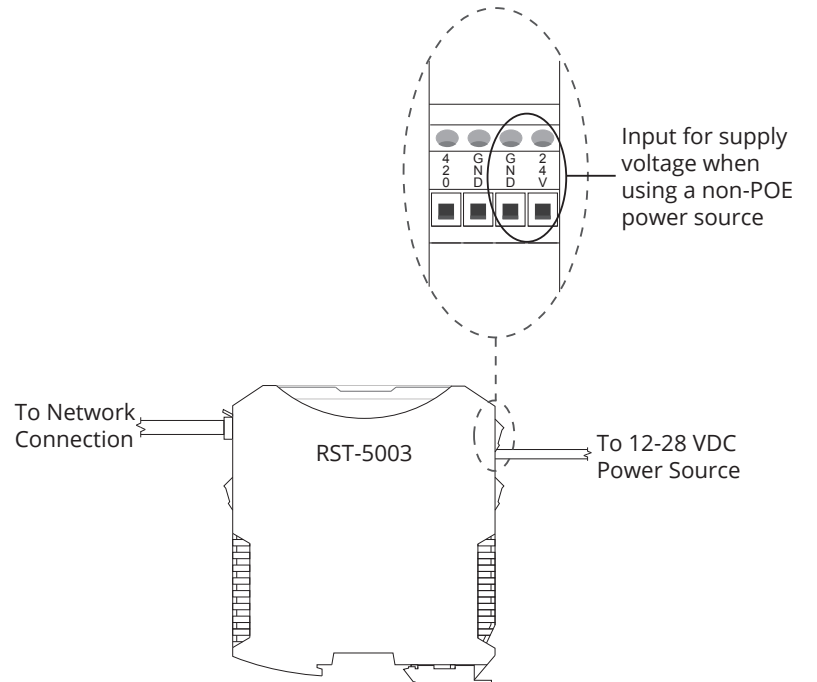
Automation Products Group, Inc.
1025 W 1700 N Logan, UT 84321
www.apgsensors.com | phone: 888-525-7300 | email: sales@apgsensors.com

Part # 122950-0012
Doc # 9004245 Rev B

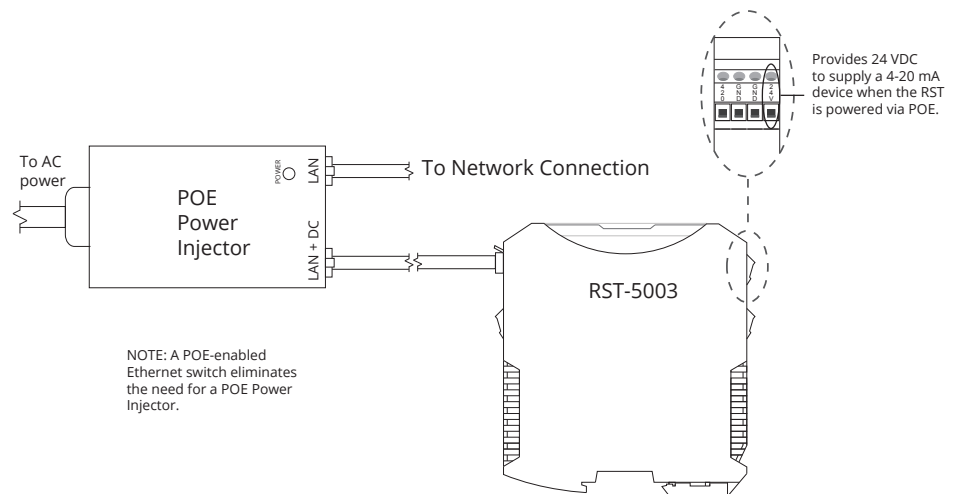
5 Dimensions



6 Power Supply Wiring Diagrams



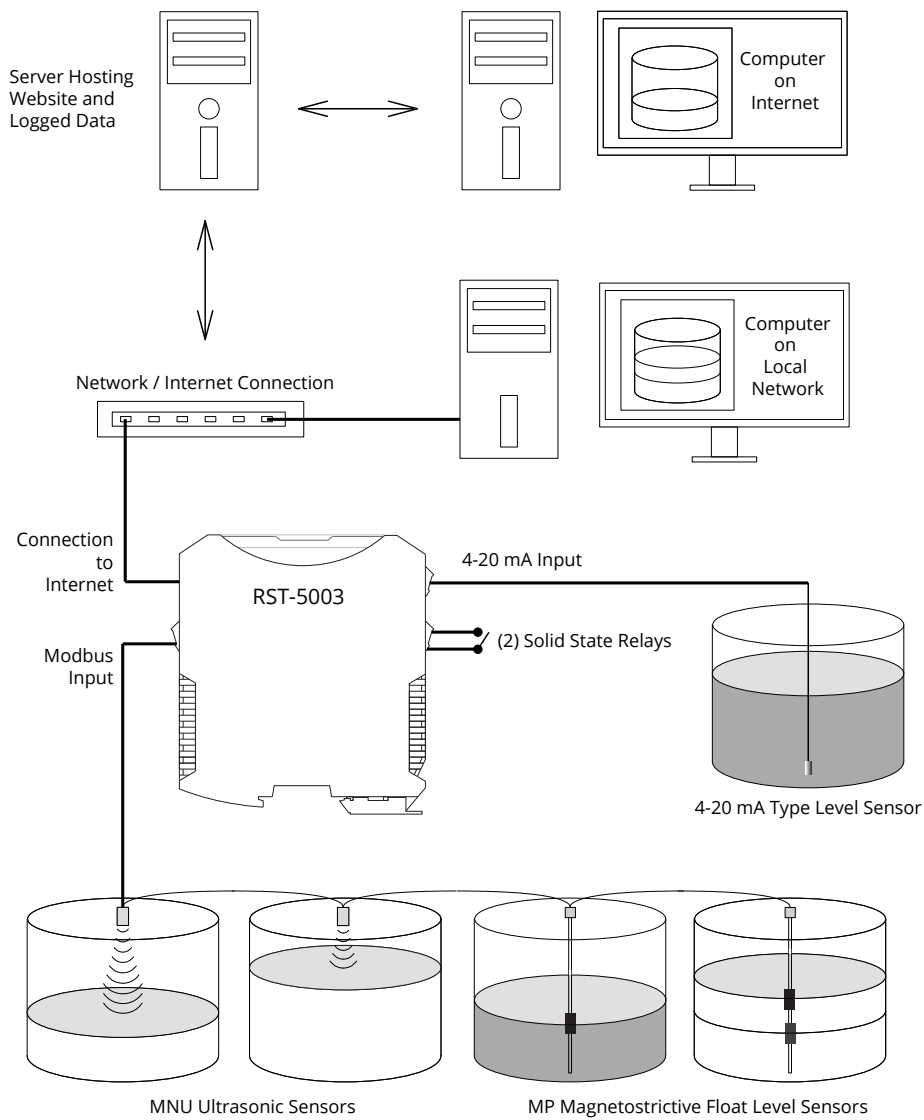
External 12-28VDC Power Supply Wiring



POE (Power Over Ethernet) Wiring

NOTE: A POE-enabled Ethernet switch eliminates the need for a POE Power Injector.

7 Modbus System Wiring Diagrams



Modbus System & Network Diagram

8 Accessing the RST-5003's Embedded Webpage

Each Modbus sensor attached to your RST-5003 must be configured via the RST-5003's embedded webpage before the next sensor can be added. The easiest way to access the embedded webpage is to type `rst_xxx` into a web browser on a computer connected to the same local network as the RST-5003. `xxx` represents the numeric portion of the RST-5003's serial number. See Figures 8.1 and 8.2.

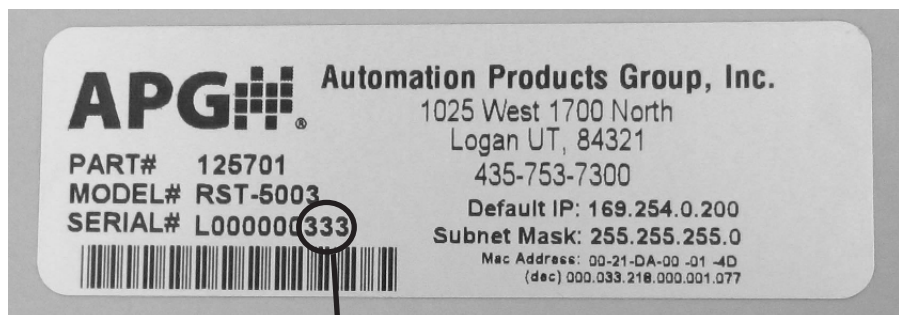


Figure 8.1

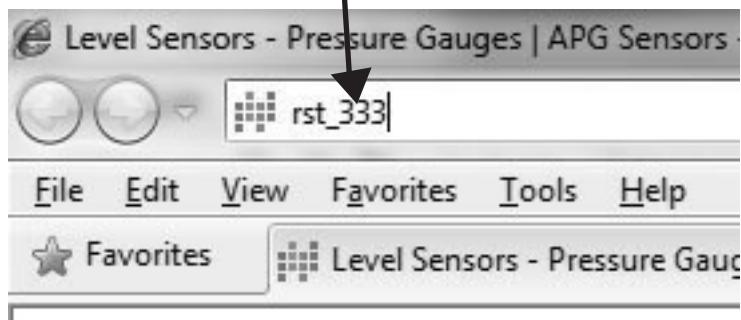
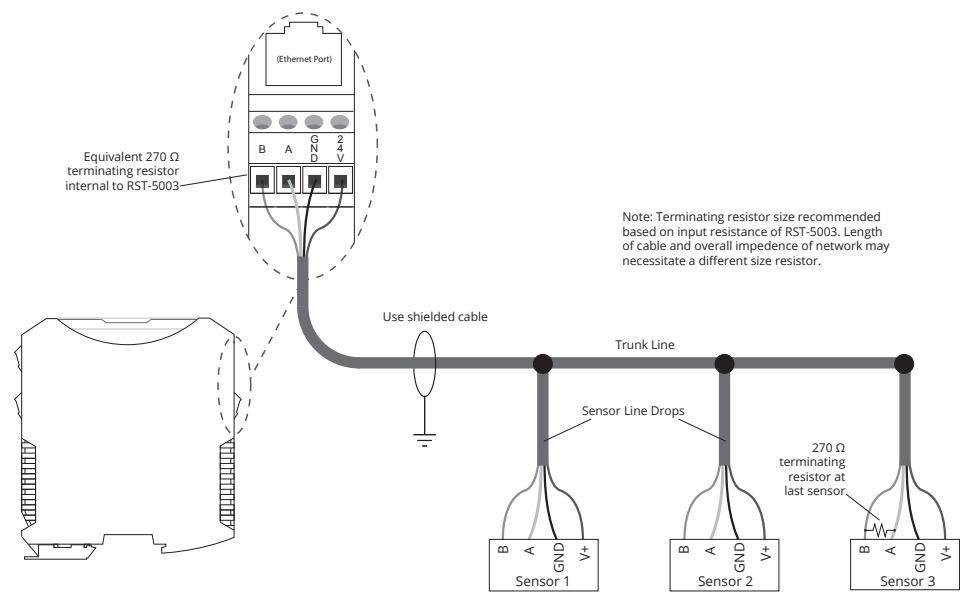


Figure 8.2

IMPORTANT: See your RST-5003 User Manual for complete Modbus programming instructions and troubleshooting tips.

NOTE: Refer to each sensor's user manual for sensor specific wiring instructions. User Manuals for all APG sensors and equipment are available at www.apgsensors.com.



Modbus Daisy Chain Wiring

NOTE: Port 6700 must be open on your local network for the RST-5003 to connect.

9 General Care

Your RST-5003 is very low maintenance and will need little care as long as it is installed correctly. However, in general, you should:

Avoid applications for which the control module was not designed, such as extreme temperatures, contact with incompatible corrosive chemicals and fumes, or other damaging environments.

10 Removal Instructions

- STEP 1: Disconnect power source to control module.
- STEP 2: Disconnect sensors and network cable to control module.
- STEP 3: Remove the control module and store it in a dry place, at a temperature between -40° F and 180° F.