

API-Cecomcomp Group *n'fo*

Technical & Application Note C156

Application: Maintain line pressure for water lines

Type Of company: Pharmaceutical Company

Location: Illinois

Problem: The customer is a pharmaceutical company that produces drugs and chemicals for many different applications and uses purified water throughout the plant during the production process. They currently use analog gauges to monitor the water line pressure to determine activation of the water pumps in order to maintain proper water pressure under varying water system loads. The engineer wants to automate the process by allowing the Building Automation System (BAS) to automatically control the activation of the pumps. The engineer would like a 4-20 mA signal to feed to the BAS but also wants a local display. The customer needs a loop powered NEMA 4X gauge mounted on a tri-clamp sanitary fitting. The gauge must be both cost effective and accurate.

Note: for additional information on this process see http://en.wikipedia.org/wiki/Water_purification

Solution: The customer used a F4L100PSIG mounted on a tri-clamp sanitary fitting. This allowed the customer to have a visual indication of the water pressure in the lines and use the 4-20 mA signal to send to the Building Automation System (BAS) to control the water pumps in order to maintain the proper line pressure under varying water system loads.



F4L

2 wire Loop Powered Digital Pressure Transmitter



Benefits of API's solution:

±0.25% Test Gauge Accuracy

Ease of installation

0.5" digit height on Display for ease of reading

4-20 mA output with a Test Function

Cecomcomp Unique Feature



Functional Test Pushbutton

The Functional Test Pushbutton will, when pressed, output a test signal independent of the applied pressure/vacuum. This signal is adjustable from 0-100% of span by holding the Test button down and adjusting the Test potentiometer on the unit. This signal is typically preset to 50% at the factory. This feature allows the technician to temporarily inject a test or preset calibration signal into the output loop without manipulating the input signal. This signal can be used to check loop status, downstream display operation, downstream alarm operation, etc.

To find your local representative:
www.api-usa.com/api_rep_map.php

FREE FACTORY APPLICATION ASSISTANCE
Contact  Customer Service
Where People Answer The Phone
www.api-usa.com
800-942-0315



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