

MCG 1812 Process Propane Package

Process Propane Package

The MCG 1812 Process Propane Package is a revolutionary non-contact level gauging kit for both new and existing propane bullet tanks. The package consists of L&J Engineering's MCG 1800 Process Radar Gauge, a special target float which will be dropped into the stilling well or bridle to ride on the product and a ball valve with a special spool piece to allow for easy maintenance and troubleshooting of the gauge without having to disrupt the tank. The MCG 1800's easy 5-Step Setup Wizards further simplifies setup by allowing you to have the gauge up and operational within minutes.

Process Applications

The MCG 1812 is designed for use with pressurized and atmospheric propane and butane tanks along with similar types of products. The usage of the MCG 1812 is not limited to just propane and butane applications, but it can also be mounted to bullet tanks which have both internal stilling wells and also bullet tanks which have external bridles in applications where the user wants to isolate the level gauge from the product environment. Either way the MCG 1812 configuration can be easily adapted to your specific tank requirements.

Infrared Compatibilities

L&J Engineering's patented Infrared technology provides the ability to setup, calibrate, diagnose and maintain your MCG 1812 package by using the intrinsically safe L&J Engineering MCG 2150 Remote Calibrator, along with the local or remote LCD display with infrared pickup.

Ground Level Display

A ground level display is also available for use with this package, which is identical to the gauge display itself. This will allow full calibration, programming and diagnostic functionality from the ground level using the intrinsically safe MCG 2150 Handheld Infrared Calibrator.

Multiple Protocol

The standard unit is 24 VDC loop powered with a 2-wire 4-20mA output. Digital HART compliant output is also available as well as; L&J Tankway, Foundation Fieldbus, Profibus DP and many others.

Input / Output

The MCG 1812 can also accept remote temperature devices such as the MCG 300 3-Wire Remote Spot Temperature Detector or other similar 3-wire RTD's. Up to 4 relay switches can also be provided with the MCG 1812.



Features

- 6.3 GHz Low Frequency Radar Loop Powered
- 2-Wire, Lightweight Design
- Ultra Low Power
- Non-Contact and Low Maintenance
- Microwave Pulse Radar Technology
- Local Display With IR Programmability
- Analog 4-20 mA and Digital HART Outputs
- Calibration Via MCG 2150 or HART Handheld
- Special Antenna for Process Stilling Wells / Bridles

Applications

Propane	Pressurized Bullet Tanks
Butane	Non-pressurized Bullet Tanks
Other Applications with Stilling well or Bridle	

Specifications

Measuring Principle:

Pulse Radar Technology

Frequency:

6.3GHZ

Accuracy:

+/- 10MM

Resolution:

1 mm

Supply Volt:

20-36VDC, 110 VAC

Range:

0-60 feet standard.

Radar Power:

Less than 1mw (0dBm)

Electronics Temperature:

-40° F to 150° F (-40°C to +65° C)

Product Temperature:

-148° F to 482° F (-100° C to 250° C)

Max. Pressure:

150PSIG (or 300PSIG optional)

Local Display:

2 line x16 Character LCD

Optional Digital Communications:

HART, Profibus DP, Fieldbus, L&J Tankway

Construction:

Cast Aluminum (Standard)

Stainless Steel (Optional)

Mounting:

Flanged

Weight:

8 lbs. (Aluminum)

Approvals:

Radar Gauge: Explosion Proof/Intrinsically Safe*,
Class I, Div. 1, Group B, C & D

*(with Appropriate Barriers)

Antennas:

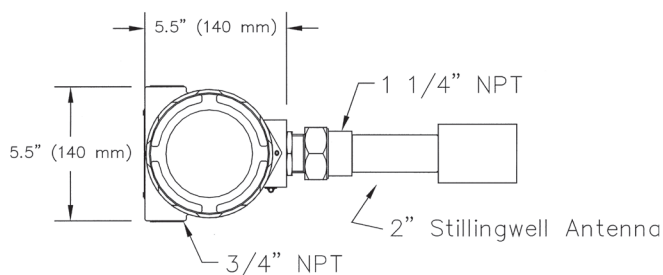
Stilling Well

Optional Input/Outputs:

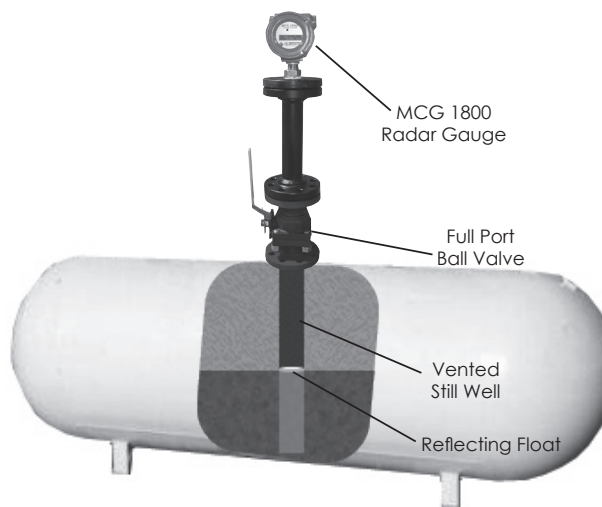
Temperature Input

4 Relay Outputs

Dimensions



Typical System Layout



All designs subject to change. Certified dimensions and specifications available upon request.