

GALLUS

Residential Diaphragm Gas Meter

The GALLUS is a compact residential gas meter designed to measure accurately volumes of natural gas, LPG and all non-corrosive gases.

Application

The GALLUS, with an installed base of over 30 million units, is a versatile meter that makes it the preferred choice of many large utilities world-wide.

Metrology

The GALLUS meets O.I.M.L., EN 1359 and MID (certificate delivered by the LNE), and more than 25 national metrological standards (DVGW, NMI Class 1...).

Its design and the careful choice of materials enable the GALLUS to meet the highest demand in international markets in terms of accuracy and long-term stability.

During the preliminary test controls on the sonic nozzle test benches, all meters are tested at Q_{min} , $0.2 Q_{max}$ and Q_{max} .

Operating Principle

The GALLUS is a positive displacement diaphragm gas meter with a stand-alone twin chamber measuring unit.

The twin chambers are each fitted with a flexible and gas-tight diaphragm which is moved by the differential between the inlet and outlet pressure. The gas enters one side of the diaphragm pan while on the other side it comes out through a separate port on the valve. When one side is full, the rotating mono-valve moves on to the next position, allowing the gas to fill the empty side.

A transmission gear and a mechanical coupling or stuffing box transfer the reciprocating motion to the mechanical retrofittable index.

The measuring unit is housed in a robust gas-tight casing.



> GALLUS (MID approved) Steel Version

> Basic Features

- Compact size
- 1.2 dm^3 cyclic volume
- Range G1.6, G2.5, G4
- EN 1359 & O.I.M.L compliance

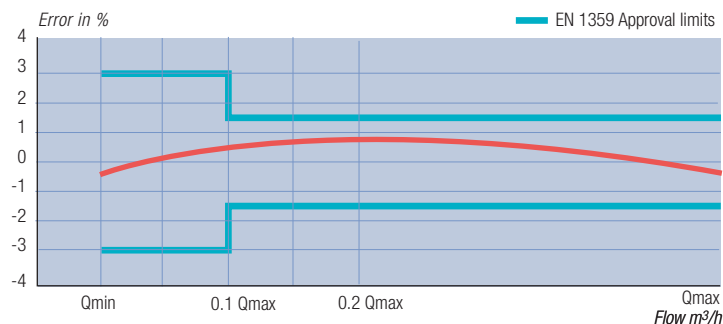
> Design

- Long-term accuracy & safety
- Ready for remote reading & data management

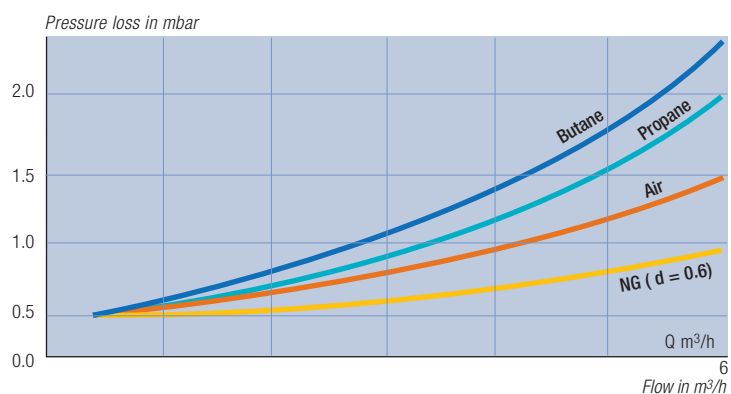
> Quality

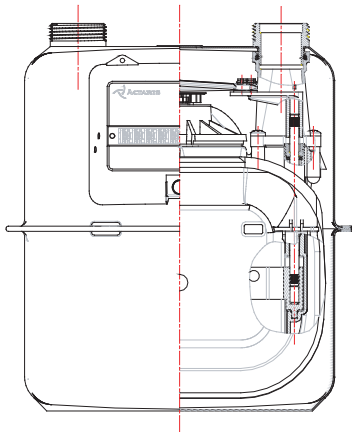
- World-class, ISO9001 certified, European Engineering and Manufacturing

Accuracy Curve



Pressure Loss





Construction

> Casing

With its casing in steel, high protection against corrosion is ensured by 500 hours salt fog spray test resistant cataphoresis treatment. The aluminium version can withstand up to 1000 hours salt fog spray test.

The extreme strength of the case joint is achieved by rolling the belt & compressing the flanges into contact with a sealant applied between the faces. This forms a joint which is both gas -tight and fire -resistant.

> Measuring Unit

The achievement of the fixed stroke mechanism is the result of precision and high quality automation, and eliminates the need for an adjustable tangent. This confines all registration adjustments to the accessible change wheels behind the index.

The long life synthetic diaphragms, coupled to the well -proven movement design, combine to give excellent stability and accuracy during the whole life of the meter.

All materials have been selected for their superior resistance to chemicals and gas. The valve and the grid, thanks to a special bakelite formulation, enjoy high gliding properties and are protected against premature wear.

Finally, a backrun stop prevents the meter from running backwards in case of tampering.

> Index

The meters are available with metric or cubic inch indexes. They come with a permanent magnet for pulse generation and can be retrofitted with a pulse transmitter. IP54 and IP67 versions are available for specific environments.

Quality Assurance

Quality assurance procedures - such as ISO 9001- and strict controls throughout the manufacturing process ensure a very high quality level.

Technical Characteristics

Gas Type	Natural gas, LPG and all non-corrosive gases	
Cyclic Volume	1.2 dm ³	
Operating Temperature	- 25°C to + 55°C	
Storage Temperature	- 30°C to + 70°C	
Maximum Operating Pressure	0.5 bar for steel version 1.5 bar for aluminium version	
Measuring Range	G1.6	Qmin 0.016 m ³ /h Qmax 2.5 m ³ /h
	G2.5	Qmin 0.025 m ³ /h Qmax 4 m ³ /h
	G4	Qmin 0.04 m ³ /h Qmax 6 m ³ /h
Pulse Generator	Standard 0.01 m ³ /pulse Optional 0.1 m ³ /pulse	
Pulse Transmitter	Retrofittable LF-system, 12 Vdc max – 10 mA max. standard 0.01 m ³ /pulse wire fixation by jack plug or connecting block	
Colour	RAL 9002	

Dimensions

Meter case material	A mm	B mm	C mm	D mm	E mm	Weight kg	Connection threads according to ISO 228
Steel	Co-axial	230	67	190	152 ±4	1.45	DN 25
	100	212 ±2	67	190	156	1.45	DN 20 - G 1"1/4
	110	219 ±9	67	190	156	1.45	DN 20 - M20 x 1.5 - G 1" - G 3/4" - G 1"1/4 - G 7/8" - BS 1" - BS 3/4"
	130	225	80	240	156	1.6	G 1"1/4
	6"	240	80	240	156	1.6	BS 1"
Aluminium	160	225 ±2	80	240	156	1.6	DN 20 - G 1" - G 3/4" - G 7/8"
	220	270	72	283	170	2.6	G 3/4"
	250	259	78	331	178	2.65	G 1" 1/4
	110	219	77	196	177	2.20	G 3/4" - G 1" - G 1"1/4
	6"	232	72	219	167	2	G 3/4" - G 1" - G 1"1/4

Please consult us for any other requests.

Versions and Options

- > Aluminium version
- > LPG version
- > Prepayment version
- > Asia version
- > South America version
- > Retrofittable pulse transmitter
- > Automatic Meter Reading through radio or telephone reading systems

Accessories

Meter bars for two-pipe meters

Valves, pipe connections, installation cabinets

Domestic governors and safety shut-off valves



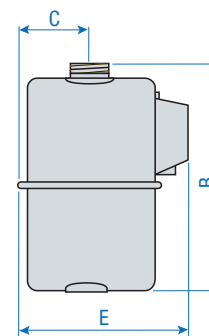
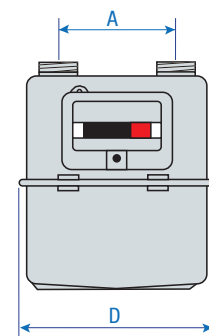
> GALLUS Aluminium version



> GALLUS Asia version



> GALLUS South America version



> GALLUS

Ordering Information

- Measuring Range
(G1.6, G2.5, G4)
- Maximum working pressure
(0.5-1-1.5 bar)
- Meter interaxis and connection type
- Specific marking
(serial number, logo, bar code)

About Itron Inc.

Itron Inc. is a leading technology provider to the global energy and water industries. Our company is the world's leading provider of metering, data collection and utility software solutions, with nearly 8,000 utilities worldwide relying on our technology to optimize the delivery and use of energy and water. Our products include electricity, gas and water meters, data collection and communication systems, including automated meter reading (AMR) and advanced metering infrastructure (AMI); meter data management and related software applications; as well as project management, installation, and consulting services. To know more, start here: www.itron.com

For more information, contact your local sales representative or agency.



Itron France

Rue Chrétien de Troyes
ZAC Val de Murigny - BP 327
51061 Reims - France
Phone: +33 (0)3 26 05 65 00
Fax: +33 (0)3 25 05 65 96
www.itron.com