# Diaphragm pressure gauge Industrial series, grey cast iron Models 422.12, 423.12

WIKA data sheet PM 04.02



## **Applications**

- For measuring points with increased overpressure
- With liquid-filled case for applications with high dynamic pressure loads or vibrations ¹)
- For gaseous and liquid media, with the open connecting flange option also for particulates-containing and viscous media
- For mining, environmental technology, machine building and general plant construction

## **Special features**

- Compatible with switch contacts
- Process connection thread or open flange
- Scale ranges from 0 ... 16 mbar



Diaphragm pressure gauge model 422.12

# Description

## Design

EN 837-3

#### Nominal size in mm

100, 160

## **Accuracy class**

1.6

#### Scale ranges

0 ... 16 mbar to 0 ... 250 mbar (flange Ø 160 mm) 0 ... 400 mbar to 0 ... 40 bar (flange Ø 100 mm) or all other equivalent vacuum or combined pressure and vacuum ranges

#### **Pressure limitation**

Steady: full scale value Fluctuating: 0.9 x full scale value

#### Overpressure safety

3 x full scale value, however max. 40 bar

#### Permissible temperature

Ambient: -20 ... +60 °C Medium: +100 °C maximum

## Temperature effect

When the temperature of the measuring system deviates from the reference temperature ( $\pm$ 20 °C): max.  $\pm$ 0.8 %/10 K of full scale value

## Ingress protection

IP 54 per EN 60529 / IEC 529 (with liquid filling <sup>1)</sup> IP 65)

1) Model 423.12

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Part of your business

## Standard version

## Process connection with lower measuring flange

Steel, lower mount (LM), G 1/2 B (male), 27 mm flats

#### Pressure element

≤ 2.5 bar: Stainless steel 1.4571 > 2.5 bar: Stainless steel 1.4568

## Pressure chamber sealing

**NBR** 

#### Movement

Cu-alloy, wear parts argentan

#### Dial

Aluminium, white, black lettering

#### **Pointer**

Aluminium, black

## Case with upper measuring flange

Grey cast iron, black

#### Window

Instrument glass

#### **Bezel ring**

Cam ring (bayonet type), stainless steel, black

## Filling liquid <sup>2)</sup> (for model 423.12)

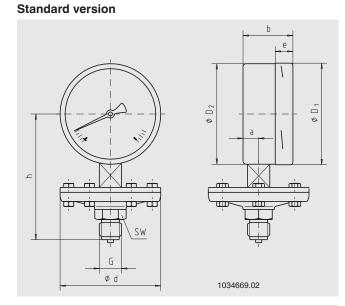
Glycerine 86.5 %

2) Accuracy class 2.5

# **Options**

- Other process connection
- Wetted parts made of stainless steel (model 432.12)
- Overpressure safety: 10 x full scale value, max. 40 bar
- Vacuum safe up to -1 bar
- Open connecting flanges per DIN/ASME from DN 15 to DN 80 (preferred nominal widths DN 25 and 50 or DN 1" and 2" per data sheet IN 00.10)
- Pressure element > 2.5 bar: NiCrCo-alloy (Duratherm)
- Switch contacts <sup>2)</sup> (see data sheet AC 08.01)

# Dimensions in mm



NS	Scale range	Dimensions in mm									Weight
	in bar	d	а	b	D1	$D_2$	е	G	h ± 2	SW	in kg
100	≤ 0.25	160	15.5	49.5	101	99	17.5	G ½ B	135	27	3.4
160	≤ 0.25	160	15.5	49.5	161	159	17.5	G ½ B	165	27	4.3
100	> 0.25	100	15.5	49.5	101	99	17.5	G ½ B	135	27	2.1
160	> 0.25	100	15.5	49.5	161	159	17.5	G ½ B	165	27	3.0

Process connection per EN 837-3 / 7.3.

## **Ordering information**

Model / Nominal size / Scale range / Connection size / Connection location / Options

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Page 2 of 2

WIKA data sheet PM 04.02 · 02/2011



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