



PK-01

Capsule Element Pressure Gauge



Features

- / Quality class 1.6
- / Millibar range
- / Anti-corrosive
- / Zero point correction

Description:

The PK-01 capsule element pressure gauges are intended for measuring small, negative and positive overpressures in gaseous media. The measuring element in such a device comprises two diaphragm halves that are joined by welding. These actuate an indicator when pressure is exerted on them inside which is then display the system pressure on a scale made of aluminium. The standard versions of the devices supplied are made of brass; however, optionally they can be fitted with a stainless steel movement. Also another version with 10x overpressure safety can be delivered. The available housing sizes are 2.5" (63 mm), 4" (100 mm) or 6" (160 mm) with stainless steel housing provided with connections radially at the bottom or centrally at the back. On request, other versions can be supplied.

Application:

Capsule element pressure gauges are optimally suited for measuring very small pressures in gaseous media. Typical applications are found in medical engineering, air-conditioning, in production of gas or in laboratories. For example, the applications are for leak detection, filter status measuring, emission measuring or, using the stainless steel version, for monitoring hostile and corrosive media.



Technical Specifications:

Accuracy class /	quality class 1.6
Zero point adjustment /	adjusting screw in dial
Protection class /	IP54 as per EN 60529 / ICE 529
max. Pressure /	< 25 mbar, 6 x full scale value ≥ 25 mbar, 10 x full scale value (the max. possible low pressure value for vacuum ranges is the specified value of the reading)
Sealing and plug /	EPDM and PUR
Options /	- restrictor screw in connector - vacuum safety < 25 mbar 3-times, > 25 mbar 10-times - red mark on dial

Temperature /

Temperature	max. Media temp.	Ambient temp.
PK-01.x..	+100°C	-25...+60°C

Temperature error /

Temperature error, T_{Ref} 20°C
Rising temperature: + 0,3% FS / 10K
Falling temperature: - 0,3% FS / 10K

Materials /

Material	Housing	Window
PK-01.1.1-2..	round case, stainless steel	acrylic glass
PK-01.1.3-6..	round case, stainless steel	instrument glass
PK-01.2.1-2..	round case, stainless steel	acrylic glass
PK-01.2.3-6..	round case, stainless steel	laminated safety glass

Material	Measuring element	Instrument dial
PK-01.1.x..	capsule, copper alloy	white aluminium, black scale and lettering as per EN 837-1
PK-01.2.x..	laser welded capsule, st. steel 1.4571	white aluminium, black scale and lettering as per EN 837-1

Material	Motion work	Pointer
PK-01.1.x..	Bottom and cover-parts from brass, moving parts argentan	black aluminium
PK-01.2.x..	stainless steel	black aluminium

Ordering Codes:

Order number PK-01. 2. 2. 0. 17

PK-01 Capsule Element Pressure Gauge

Version /

- 1 = brass
- 2 = chemical version completely st. steel

Nominal size /

- 1 = DN63, G 1/4" B radial, bottom
- 2 = DN63, G 1/4" B central, back
- 3 = DN100, G 1/2" B radial, bottom
- 4 = DN100, G 1/2" B central, back
- 5 = DN160, G 1/2" B radial, bottom
- 6 = DN160, G 1/2" B central, back

Fastening rim (see table for combinations) /

- 0 = none
- 1 = 3 hole front ring
- 2 = rear edge for wall-mounting
- 3 = 3 rimmed front ring with clamp

Operating ranges /

- 01 = -25...0...+15 mbar
- 02 = -20...0...+40 mbar
- 03 = -40...0...+20 mbar
- 04 = -6...0 mbar (only for nominal size 160)
- 05 = -10...0 mbar (only for nominal size 100 and 160)
- 06 = -16...0 mbar (only for nominal size 100 and 160)
- 07 = -25...0 mbar
- 08 = -40...0 mbar
- 09 = -60...0 mbar
- 10 = -100...0 mbar
- 11 = -160...0 mbar
- 12 = -250...0 mbar
- 13 = -400...0 mbar
- 14 = 0...6 mbar (only for nominal size 160)
- 15 = 0...10 mbar (only for nominal size 100 and 160)
- 16 = 0...16 mbar (only for nominal size 100 and 160)
- 17 = 0...25 mbar
- 18 = 0...40 mbar
- 19 = 0...60 mbar
- 20 = 0...100 mbar
- 21 = 0...160 mbar
- 22 = 0...250 mbar
- 23 = 0...400 mbar
- 24 = 0...600 mbar

Front ring /

	3-hole Front ring	rear edge	3-rimmed-Front ring
PK-01.x.1..	OK	OK	-
PK-01.x.2..	OK	OK	OK
PK-01.x.3..	OK	OK	-
PK-01.x.4..	OK	OK	OK
PK-01.x.5..	OK	OK	-
PK-01.x.6..	OK	OK	OK