

Capsule Gauges for Low Pressure

Case With Bayonet Ring in Stainless Steel

Diaphragm Capsule in Brass or in Stainless steel AISI 316 L

Ø 63 mm (2½"), Ø 100 mm (4") and Ø 160 mm (6")

Models :

BIC 063 / 100 / 160 DB

BIC 063 / 100 / 160 DS

APPLICATIONS

Measurement of positive or negative overpressure of air or other gaseous media, pressure ranges 2.5 mbar to 600 mbar (25 to 6.000 mmH₂O)

NOMINAL HEAD DIAMETERS

Ø 63 mm (2½"), Ø 100 mm (4") and Ø 160 mm (6")

ACCURACY CLASS

1.6 (i.e. max. ± 1.6 % of full span)

PRESSURE RANGES (EN / ASME 837)

0 ... 2.5 mbar up to 0 ... 600 mbar according to EN 837-3 and 0/1 "WC to 0/250 "WC (Water Column), resp. in mmH₂O, also **all standard vacuum and compound ranges (see table on page 16)**

PRESSURE LIMITATIONS

Steady pressure: full scale value
Cyclic pressure: 90% of full scale value
Temporary: 130% of full scale value

TEMPERATURE LIMITATIONS

Ambient temperature: -20 / + 60 °C
Medium temperature: max. + 80 °C for version -B
max. +100 °C for version -S

PROTECTION TYPE (EN 60529 / IEC 529)

IP 54

STANDARD CONFIGURATION

CASE AND BAYONET RING

Stainless steel AISI 304

CONNECTION

Ø 63 mm (2½") : 1/4" NPT
Ø 100 mm (4") and Ø 160 (6") : 1/2" NPT
Version - B : Brass
Version - S : Stainless steel AISI 316 L

DIAPHRAGM CAPSULE

Version - B : Copper/beryllium CuBe2
Version - S : Stainless steel AISI 316 L

MOVEMENT

Version - B : Brass / German silver
Version - S : Stainless steel

DIAL PLATE

Aluminum alloy, black figures, white background

POINTER

Aluminum alloy black

ZERO ADJUSTMENT

From the frontside

WINDOW

Laminated safety glass



SPECIAL OPTIONS

- ⇒ Connection M 12x1,5, M 20x1,5, ½" BSP, ¼" NPT, or others upon request
- ⇒ Special scales like dual ranges or special units
- ⇒ 3-times overrange- or vacuum protection
- ⇒ 10-times overrange protection for ranges ≥ 40 mbar;
- ⇒ for vacuum and compound ranges upon request
- ⇒ Version for higher medium temperature upon request

HOW TO ORDER

Please select :

- | | | | | | |
|--|------------|------------|----------|----------|----------|
| | BIC | 100 | D | S | A |
| 1. Model code : BIC | _____ | _____ | _____ | _____ | _____ |
| 2. Nominal head diameter | _____ | _____ | _____ | _____ | _____ |
| 3. D = Dry / Standard | _____ | _____ | _____ | _____ | _____ |
| 4. Capsule and Socket material | _____ | _____ | _____ | _____ | _____ |
| B = Brass | | | | | |
| S = Stainless steel AISI 316 L | | | | | |
| 5. Code letter (see case configurations) | _____ | _____ | _____ | _____ | _____ |

EXAMPLE OF ORDER NUMBER

Pressure Gauges, Ø 100 mm	Pressure Gauges, Ø 63 mm
Material all stainless steel	Material all stainless steel
Range : 0- 600 mmH ₂ O	Range : -20/40 mbar
Bottom connection : ½" NPT	Back connection : ¼" NPT
Order Number : BIC 100 DSA	Order Number : BIC 063 DSE

Capsule Gauges for Low Pressure

Case With Bayonet Ring in Stainless Steel

Diaphragm Capsule in Brass or in Stainless steel AISI 316 L

Ø 63 mm (2½"), Ø 100 mm (4") and Ø 160 mm (6")

Models :

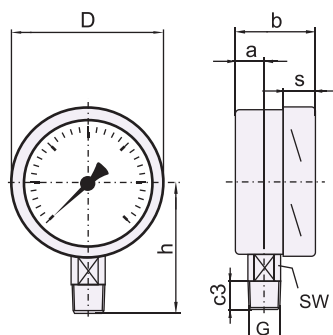
BIC 063 / 100 / 160 DB

BIC 063 / 100 / 160 DS

CASE CONFIGURATIONS AND DIMENSIONAL DATA

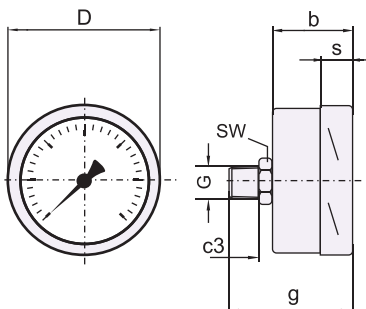
Bottom Connection

Code Letter : **A**



Center Back Connection

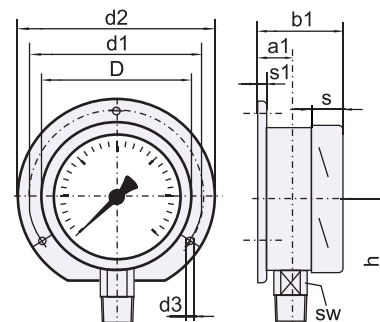
Code Letter : **E**



Bottom Connection

Rear Flange for Panel Mounting

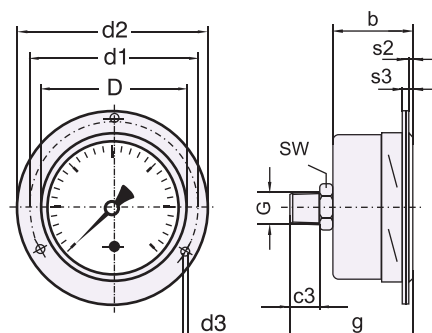
Code Letter : **B**



Center Back Connection front flange for Panel Mounting

(front flange with longholes attached to the case and a separate cover front ring)

Code Letter : **G**

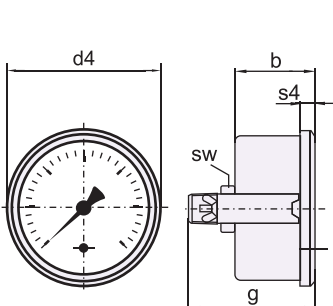


NG Ø 63 mm and Ø 100 mm

Center Back Connection
U-Clamp for Panel Mounting

crimped-on ring stainless steel,

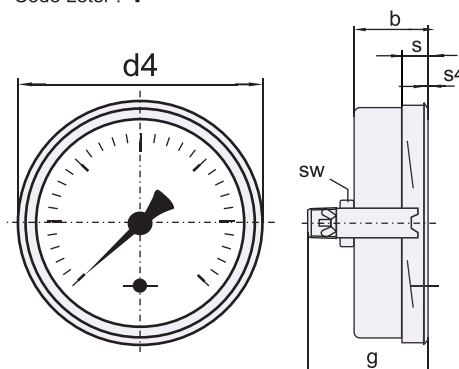
Code Letter : **I**



NG 160 mm

Center Back Connection
U-Clamp for Panel Mounting

Code Letter : **I**



Dimensional Data (mm) and Weight (kg)

Nominal Case Size	a	a1	b	b1	D	c3	d1	d2	d3	d4	g	h±1	s	s1	s2	G	Weight kg
63 mm (2½")	10	-	34	-	62	13	75	85	3.6	67	56	55	-	-	-	¼" NPT	0.2
100 mm (4")	20	23.5	55	58.5	101	19	116	132	4.8	106	84	84	21	6	2	½" NPT	0.5
160 mm (6")	15.5	19	51.5	55	161		178	196	5.8	168	81	114					0.9

Standard Pressure Ranges

Vacuum	Compound	Pressure	Vacuum	Compound	Pressure
in mbar			in mbar		
- 2.5 / 0	- 1 / + 1.5 - 1.5 / + 1	0 / 2.5	- 60 / 0	- 20 / + 40 - 40 / + 20	0 / 60
- 4 / 0	- 1.5 / + 2.5 - 2.5 / + 1.5	0 / 4	- 100 / 0	- 40 / + 60 - 60 / + 40	0 / 100
- 6 / 0	- 2 / + 4 - 4 / + 2	0 / 6	- 160 / 0	- 60 / + 100 - 100 / + 60	0 / 160
- 10 / 0	- 4 / + 6 - 6 / + 4	0 / 10	- 250 / 0	- 100 / + 150 - 150 / + 100	0 / 250
- 16 / 0	- 6 / + 10 - 10 / + 6	0 / 16	- 400 / 0	- 150 / + 250 - 250 / + 150	0 / 400
- 25 / 0	- 10 / + 15 - 15 / + 10	0 / 25	- 600 / 0	- 200 / + 400 - 400 / + 200	0 / 600
- 40 / 0	- 15 / + 25 - 25 / + 15	0 / 40			

Recommended panel cut-out:

NG 100, I : Ø 101 + 1mm

NG 160, I : Ø 162 + 1mm

NG 100, G : Ø 103 + 1mm

NG 160, G : Ø 162 + 1mm