

BARFLEX® 4Y Portable electronic pressure gauge, intrinsically safe version

Accuracy : $\pm 0.25\%$ (option $\pm 0.1\%$) of F.S. ± 1 display point
 Range of measurement from 1 to 400 bar gauge or absolute
 (up to 1000 bar on request)

Available units : bar, psi, kPa, kg/cm², mbar, MPa

Quick process connection

Conforms to CE requirements (89/336/CE and 97/23/CE Directives)

3 versions : portable, fixed unit, console only

Calibration of installed devices and checking their correct operation

Verification of the settings of pressure switches, transmitters, etc.

Leak test

Memorisation of MIN – MAX pressures

LCIE 02 ATEX 6220X

CE 0081



II 1 G
 EEx ia IIC T6

Hazardous area : Area 0, 1, 2

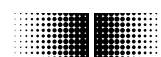
The BARFLEX®4Y portable electronic pressure gauge is a self-contained instrument which is ideal for measurements in the field : it has a very rugged case (epoxy-painted aluminium), is sealed against running water IP 55, and the sensor (TRANSBAR® 0.25 % - Thin film technology 0.1 %) is compatible with the majority of corrosive fluids.

The BARFLEX®4Y guarantees immunity to electromagnetic interference (walkie-talkies, portable telephones, power switching devices, etc.).

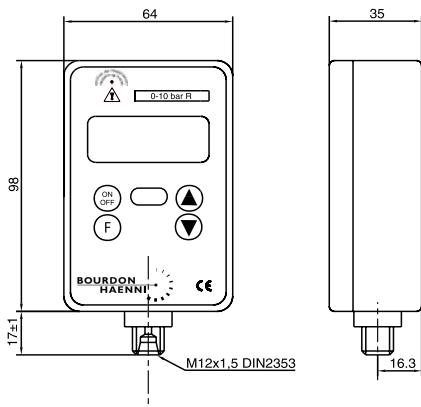


Technical Data (20°C)

Measurement ranges	0 ... 1 bar to 0 ... 400 bar A/R -1 ... 0.6 bar to -1 ... 24 bar R	Console : coupling M12x1,5 DIN 2353
Power supply	By standard 9 volt battery (type IEC 6LR61, not supplied) Autonomy greater than 200 hours at 20°C Indication of discharge by BATT Automatic switch off after 30 minutes	Degree of protection (EN 60529) IP 55
Total error at 20°C	$\pm 0.25\%$ of FS ± 1 display point (gauge version) $\pm 0.5\%$ of FS ± 1 display point (absolute version) (including non-linearity, hysteresis, non-repeatability, gain adjustment)	Definition of units and measurement range (preset in factory) On the front panel (indelible)
Zero reset (gauge version only)	Reset to zero is effected by a prolonged press on the ON/OFF key	0.1% Option
Leak measurement time	From 10 to 600 seconds	Total error
Operating temperature	- 10 ... + 40°C (T6)	$\pm 0.1\%$ of FS ± 1 display (including thermal and mechanical errors in the compensated temperature range -10...+60°C)
Thermal drifts	Gain : $\leq \pm 0.015\%$ /°C max. Zero : $\leq \pm 0.015\%$ F.S./°C max.	Zero reset
Storage temperature	- 20 ... + 70°C	Reset to zero is effected by a prolonged press on the ON/OFF key. Absolute pressure measurement with atmospheric referencing separated.
Process fluid temperature	- 20 ... + 85°C	Materials in contact with the fluid
Shock resistance (IEC 68-2-32)	25 impacts from 1 m onto concrete	Portable version : Stainless steel 1.4404 (316L), stainless steel 1.4542, flexible cable (polyamide), process connection (steel 1.0718)
Vibration resistance (IEC 68-2-6)	0.75 mm (10 - 55 Hz), 10 g (55 Hz - 2 kHz)	Fixed/console version : Stainless steel 1.4404 (316L), stainless steel 1.4542.
Materials in contact with the fluid	Portable version : ceramic (AL ₂ O ₃), NBR seal stainless steel 1.4404 (316 L), flexible cable (polyamide), process connection (steel 1.0718) Fixed/console version : ceramic (Al ₂ O ₃), NBR seal, stainless steel 1.4404 (AISI 316L).	Display
Display	Backlight liquid crystal display (LCD) as standard Display range : ± 9999 Overpressure indicated by "Pres" (110 % of F.S.)	Display range : ± 19999
Backlight	Press on the key on the front panel Switching off: press the same key and then release it Automatic switch off after 5 minutes	Other technical data identicals to the standard version
Pressure connection	Version portable : supplied with a 1 m cable fitted on the BARFLEX®4Y end with a nut which seals with hand tightening, and on the process end with a threaded end fitting (M16/2) Fixed unit version : supplied with a special intermediate coupling (G1/2 on the process end) compatible with the BARFLEX®4Y end fitting (M12 x 1,5)	Uncoded (have to be listed after the code number)
		Portable version: supplied with a different process connection at the end of the cable : M16x1.5 ; M12x1.5 ; G1/4 female ; G 1/2 female. Intermediate couplings incorporating a safety valve. Versions available : M16x2 for G1/4, 1/4 NPT, 7/16-20 UNF. Other versions : M16x1,5 and M12x1,5 for G1/4, 1/4 NPT, 7/16-20 UNF. Capillaire et raccord tout inox (please refer to us). Oxygen quality cleanliness except portable version with connector (M16x2, M16x1,5, M12x1,5). Protective case. G1/2 male connector for dead weight tester and pressure generator applications. Ref 70744-01-A01. G1/2 connection on the process end for fixed unit.



Dimensions (mm), measurement ranges, connections

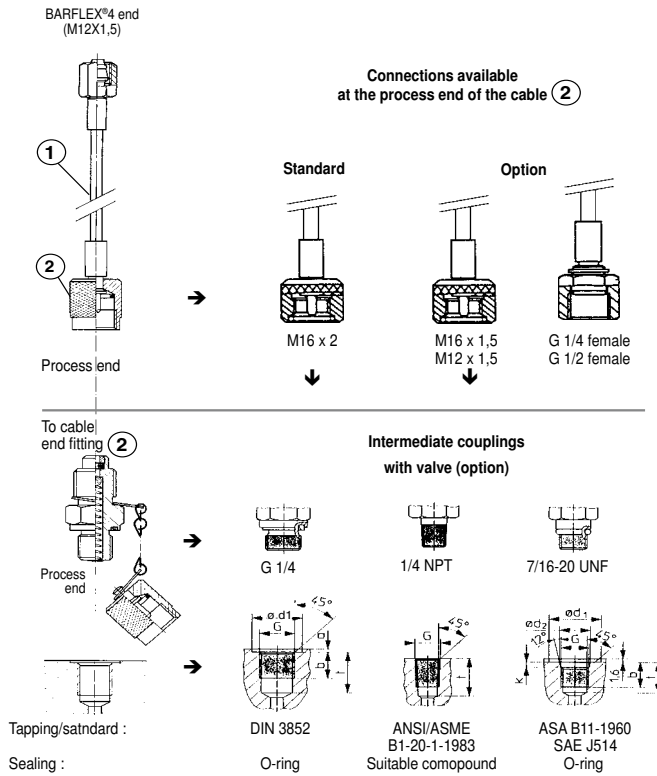


Standards versions

- PORTABLE (code P) :** supplied with 1 m cable (1) fitted with a screw coupling (M16x2) (2) on the process end and a carrying case. **Weight : 400 g**
- FIXED UNIT (code F) :** supplied with a special adapter coupling to the M12x1.5 DIN 2353 connector. Process end threaded G1/2. **Weight : 390 g**
- CONSOLE only (code C) :** coupling : M12x1,5 DIN 2353. **Weight : 300 g**

Tapping	a	b	d1	d2	k	t
G 1/4	1.5	12	20			18.5
1/4 NPT						16.5
7/16-20 UNF		11.5	21	12.4	2.4	14

Pressure connections portable version



BARFLEX®4Y														
Measurement ranges (bar)	-1+0.6	-1+1.6	-1+3	-1+10	-1+24	0+1	0+2	0+5	0+10	0+20	0+50	0+100	0+200	0+400
Permissible overrange (bar)	3	3	6	15	38	3	3	10	15	30	80	150	300	550
Burst pressure	7	7	12	30	75	7	7	18	30	75	180	300	600	600
Display at max. range	-1000/+600	-1000/+1600	-1.000/+3.000	-1.00/+10.00	-1.00/+24.00	1000	2000	5.000	10.00	20.00	50.00	100.0	200.0	400.0

0.1% OPTION								
Measurement ranges* (bar)	-1+10	-1+24	0+10	0+20	0+50	0+100	0+200	0+400
Permissible overrange (bar)	20	40	20	40	80	200	400	550
Permissible overrange	60	120	60	120	200	500	600	600
Display at max. range	-1.000/+10.000	-1.00/+24.00	10.000	20.00	50.00	100.00	200.0	400.0

* For 400 bar < Ranges ≤ 1000 bar : Please consult us.

Ordering Details - BARFLEX®4Y

Model	1' ... 2' digit	EAxxxxxxx
Electronic pressure gauge intrinsically safe	EA	
Version	3' digit	
0.25% gauge version (or 0.5% absolute version)	4	
0.1%	5	
Typ	4' digit	
Intrinsically safe	Y	
Presentation	5' digit	
Portable	P	
Fixed	F	
Console	C	
Capsule seal	6' digit	
NBR (Nitril) standard	3	
EPDM (P ≥ 250 mbar)	5	
Kalrez® (P ≥ 1 bar)	7	
FKM (Viton®)	9	
Without o'ring (0.1% version)	0	
Kalrez® and Viton® is registered trademark of DuPont Dow Elastomers BARFLEX® is registered trademark of BAUMER		
Units of measurement	7' digit	
bar	B	
kpa	D	
Mpa	E	
Kg/cm²	F	
psi	H	
mbar	N	
Measurement ranges	8' ... 9' digit	
See codes in table	xx	
Pressure mode	10' digit	
Absolute	A	
Gauge	R	

code	Measurement ranges	
	bar	psi
72	-1 + 0.6 R	
2V	-1 + 1.6 R	
76	-1 + 3 R	
2D	-1 + 10 R	
82	-1 + 24 R	
15	0 + 1 A/R	
1C		0 + 20 A/R
17	0 + 2 A/R	
98	0 + 5 A/R	
21		0 + 100 A/R
22	0 + 10 A/R	
23		0 + 200 A/R
25	0 + 20 A/R	
28	0 + 50 A/R	
30		0 + 1000 A/R
31	0 + 100 A/R	
32		0 + 2000 A/R
34	0 + 200 A/R	0 + 3000 A/R
38	0 + 400 A/R	0 + 6000 A/R