



## laboratory pressure gauges

### class 0,1%

### DS 10" (250mm)



These instruments have been designed for use as in laboratories, instrument testing or recalibration facilities or in applications where accuracy and repeatability are of prime importance. They can be used with gaseous or liquid media which do not corrode copper alloy and which do not have high viscosity nor crystalize. Each instrument is delivered with a Nuova Fima calibration report, who guarantee traceability to the national and international primary master of pressure measurements. Upon request we can supply the calibration certificate issued by an Internationally recognized laboratory of ACCREDIA (Ex S.I.T. - Italian Calibration Service).

#### 1.27.1 - Standard Model

**Design:** EN837-1.

**Safety designation:** S1 as per EN 837-2.

**Accuracy class:**

0,1 as per EN837-1, for ranges  $\leq 8700$  psi (600 bar);

0,25 as per EN837-1, for ranges  $> 8700$  psi (600 bar).

**Ambient temperature:**  $+50...+140^{\circ}\text{F}$  ( $+10...+60^{\circ}\text{C}$ ).

**Process fluid temperature:**  $68^{\circ}\text{F}$  ( $+20^{\circ}\text{C}$ ).

**Calibration temperature:**  $68^{\circ}\text{F}$  ( $+20^{\circ}\text{C}$ ).

**Thermal drift:**  $\pm 0,04\%$  /10 K of range (starting from  $68^{\circ}\text{F} - 20^{\circ}\text{C}$ ).

**Working pressure:** max 75% of FSV

**Overpressure limit:** not suitable.

**Protection degree:** IP 44 as per EN 60529/IEC 529.

**Socket material:** AISI 316L st.st.

**Bourdon tube:** beryllium copper alloy.

**Case:** aluminium black painted.

**Ring:** aluminium black painted.

**Window:** plastic.

**Movement:** high precision.

**Dial:** aluminium, green with black markings and anti-parallax mirror band.

**Scale amplitude:**  $310^{\circ}$ .

**Zero calibration:** external, manual.

**Pointer:** balanced, knife-edge micrometer.

#### PRESSURE GAUGES

RANGES	Minor graduation	Figure interval	bar	kPa	MPa	PSI	bar ext.* kg/cm <sup>2</sup> psi int.
0...1	0,002	0,05	◆		◆		
0...1,6	0,005	0,1	◆		◆		
0...2,5	0,005	0,1	◆		◆		◆
0...4	0,01	0,2	◆		◆		◆
0...6	0,02	0,5	◆		◆		◆
0...10	0,02	1	◆		◆		◆
0...16	0,05	1	◆		◆	◆	◆
0...25	0,05	0,5	◆		◆	◆	◆
0...40	0,1	2	◆		◆	◆	◆
0...60	0,2	5	◆		◆	◆	◆
0...100	0,2	5	◆	◆	◆	◆	◆
0...160	0,5	10	◆	◆	◆	◆	◆
0...250	0,5	10	◆	◆		◆	◆
0...400	1	20	◆	◆		◆	◆
0...600	2	50	◆	◆		◆	◆
0...1000	2	50	◆	◆		◆	◆
0...1600	5	100	◆	◆		◆	◆

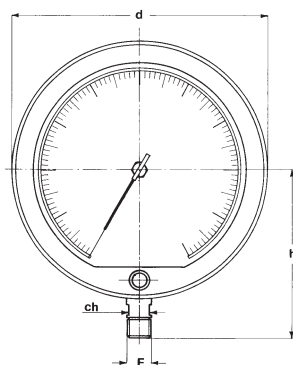
\* accuracy refers to the outer scale.

#### VACUUM

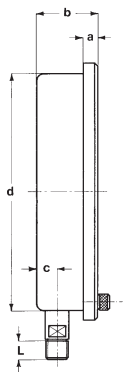
RANGES	Figure interval	Minor graduation	bar ext.* mm Hg inch Hg int.
-1÷0	0,002	0,02	F

\* accuracy refers to the outer scale.

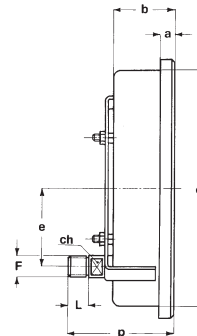
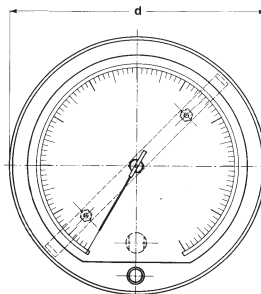




**A - LOWER CONNECTION**



**B - U" CLAMP,**  
**for back connection**  
**flush mounting**



Mounting	F	a	b	c	d	d <sub>1</sub>	e	h	L	ch	p	Weight
Lower	41M - G 1/2 A	0.59"	2.44"	0.76"	10.62"	9.72"		6.69"	0.78"	0.66"		6.83 lbs
	43M - 1/2-14 NPT	(15)	(63)	(19,5)	(270)	(247)		(170)	(20)	(17)		(3,1 kg)
Back	41M - G 1/2 A	0.59"	2.44"		10.62"	9.72"	3.14"		0.78"	0.66"	3,72"	1.47 lbs
	43M - 1/2-14 NPT	(15)	(63)		(270)	(247)	(80)		(20)	(17)	(111,5)	(3,25 kg)

dimensions : inches (mm)

**OPTIONS**

<b>B</b> - "U" Clamp (1)
<b>CE1</b> - ACCREDIA certificate (pressure gauges)
<b>CE3</b> - ACCREDIA certificate (vacuum gauges)
<b>K02</b> - Accuracy class 0,25% as per EN837-1, for ranges ≤ 600 bar

(1) to be ordered for mounting cod. "D"

**"HOW TO ORDER" SEQUENCE**

Section / Model / Case / Mounting / Diameter / Range / Process connection / Options

**1 27 1 A I 41M B...K02**  
**D 43M**

