



### Main characteristics

Measuring range	0 ... 25 mbar up to 0 ... 600 bar (absolute or relative)
Long term stability	0.2% FS / Year
Accuracy (20 °C) (linearity, hysteresis and repeatability according Best Fit Straight Line)	≤ ± 0.3% FS (BFSL)

### Technical specifications

Measuring principle	Thick film on ceramic
Measuring ranges	0 ... 25 mbar up to 0 ... 600 bar
Type of pressure	Relative / Absolute
Accuracy (20 °C) (linearity, hysteresis and repeatability according Best Fit Straight Line)	≤ ± 0.3% FS (BFSL) ≤ ± 0.6% FS (BFSL) for P ≤ 60 mbar and P= 600 bar
Error of zero point	≤ ± 1% FS
Error of span	≤ ± 1% FS
Zero thermal drift	≤ ± 0.25% FS/10 K (P > 1 bar) ≤ ± 0.60% FS/10 K (P ≤ 1 bar)
Span thermal drift	≤ ± 0.15% FS/10 K (P > 1 bar) ≤ ± 0.25% FS/10 K (P ≤ 1 bar)
Long term stability	0.2% FS / Year
Response time (10 ... 90%)	≤ 3 ms

### Environment

Temperature	
Storage	-40 ... + 85°C
Compensated range	-10 ... + 55°C (option -10...+70°C)
Medium	-20 ... +100°C
Ambient	-20 ... + 90°C (T5 approval) -20 ... + 70°C (T6 approval)
Protection rating	IP65 (EN 60529)
Vibration IEC60068-2-6	1.5 mm p-p (10 – 55 Hz), 20 g (55 Hz – 2 KHz)
Shock IEC60068-2-27	25 falls from 1 m on concrete ground

### Main features

- Robust stainless steel housing
- Intrinsically safe version (LCIE 03 ATEX 6204 X)
- Hazardous areas : 11, 12, 21, 22

### Applications

- Chemical
- Pneumatic
- Energy
- Industrial gas

### Electrical specification

Output signal / Power supply	4 ... 20 mA / 11 ... 35 VDC (X913) 4 ... 20 mA / 8 ... 35 VDC (X913 low voltage option) 0 ... 20 mA / 8 ... 35 VDC (X916) 0...10 V / 14 ... 35 VDC (X912) 1,5 V / 11 ... 35 VDC (X914) 1,5 V / 8 ... 35 VDC (X914 low voltage option)
Load impedance	
Current output	$R(\Omega) \leq (U_{Supply} - 11 V) / 0.020$ (X913) $R(\Omega) \leq (U_{Supply} - 8) / 0.020$ (X913 low voltage option) $R(\Omega) \leq (U_{Supply} - 8) / 0.020$ (X916)
Voltage output	$R \geq 2,5 K\Omega$ (X912) $R \geq 1 K\Omega$ (X914)
Max current consumption	
Current output	≤ 25 mA
Voltage output	≤ 6 mA
Insulation resistance	>100 MΩ at 250 VDC
Electrical connections	See page 3

### Material

Process connection and housing	SS 1.4404 AISI 316L
Diaphragm	Ceramic (96% AL <sub>2</sub> O <sub>3</sub> )
Sealing	NBR (P ≥ 250 mbar) or FKM (Viton®) (P < 250 mbar)

## ATEX

Ex II 1 GD

Ex d IIC T5 ( $T_{amb} \leq +90^{\circ}\text{C}$ ) Gb

Ex d IIC T6 ( $T_{amb} \leq +70^{\circ}\text{C}$ ) Gb

Ex tb IIIC T90°C ( $T_{amb} \leq +90^{\circ}\text{C}$ ) Db

Ex tb IIIC T70°C ( $T_{amb} \leq +70^{\circ}\text{C}$ ) Db

LCIE 03 ATEX 6204X

**WARNING - DO NOT OPEN WHEN ENERGIZED**

	Dust IP6X	Gases
	T° surface	Class
$T_{amb} \leq +70^{\circ}\text{C}$	+80°C	T6
$T_{amb} \leq +90^{\circ}\text{C}$	+95°C	T5

For the application in Ex zone you have to respect the conditions mentioned in the type Examination Certificate (LCIE 03 ATEX 6204 X). You find the certificates and manuals under <http://www.baumer.com>

## Approvals

Conformité CE

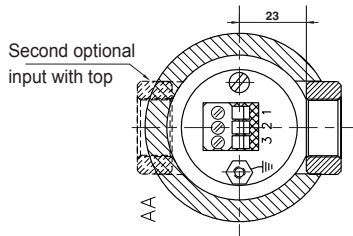
CEM Directive 2004/108/CE (with screened cable, screen connected at both ends).  
Pressure Directive PED 97/23/CE  
ATEX Directive 94/9/CE

## Measuring ranges and overpressure safety

X910	Pressure in mbar								Pressure in bar														
	—	—	—	—	—	—	—	—	-1+0	-1+0.6	-1+1.5	-1+3	-1+5	-1+9	-1+15	-1+24	1+39	—	—	—	—	—	—
Compound Pressure	—	—	—	—	—	—	—	—	-1+0	-1+0.6	-1+1.5	-1+3	-1+5	-1+9	-1+15	-1+24	1+39	—	—	—	—	—	—
Pressure	25	40	60	100	160	250	400	600	1	1.6	2.5	4	6	10	16	25	40	60	100	160	250	400	600
Measurement range	27.5	44	66	110	175	275	440	660	1.1	1.75	2.75	4.4	6.6	11	17.6	27.5	44	66	110	176	275	440	660
Max. over pressure	110	110	275	500	500	1000	1000	1000	3	3	4	8	12	20	32	50	80	120	200	320	500	600	800
Burst pressure	200	200	500	1000	1000	2000	2000	2000	6	6	7	12	18	30	48	75	120	180	300	480	600	800	1000

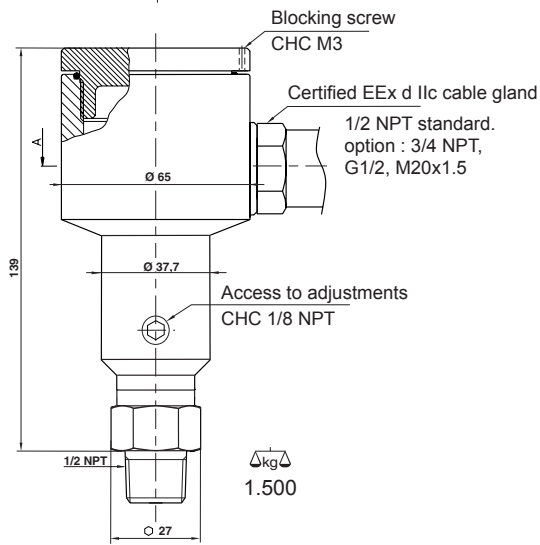
Dimensions (mm)

**Internal terminal strip with cable gland  
P ≥ 1 bar**

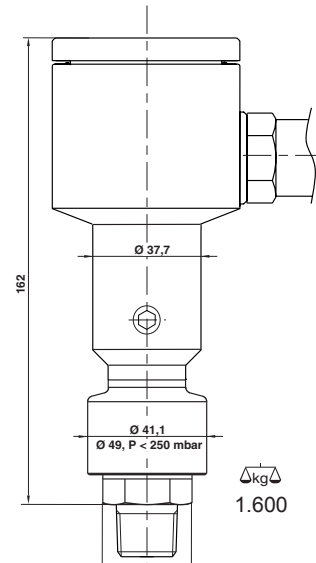


Connections

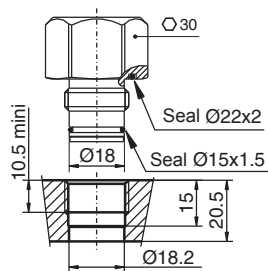
X913	X912
1 : +A	1 : +M
2 : -A	2 : -A / -M
3 :	3 : +A
⏏ : Ground	⏏ : Ground



**Internal terminal strip with cable gland  
P < 1 bar**

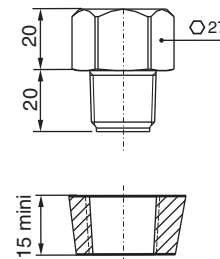


**Process connection flush diaphragm  
G1/2 (2 seals)**



**Code L**

**Process connection flush diaphragm  
1/2 NPT (without seal)**



**Code E**

**Ordering details X91x**

	X91	-	x	.	x	.	x	.	xxx	.	x	
<b>Model</b>												
Pressure transmitter	X91	-										
<b>Output signal</b>												
0...10 V											2	
4...20 mA											3	
1 ... 5 V											4	
0 ... 20 mA											6	
<b>Process connection</b>												
G½ EN 837											3	
½ NPT											6	
G½ flush diaphragm (2 seals)											L	
½ NPT flush diaphragm (without seal)											E	
<b>Sealing</b>												
NBR											P ≥ 250 mbar	3
FKM (Viton®)											P < 250 mbar	9
<b>Pressure range and unit in bar</b>												
0...0.025											Only pressure type relative	N05
0...0.04											Only pressure type relative	N06
0...0.06											Only pressure type relative	N07
0...0.1											Only pressure type relative	N08
0...0.16											Only pressure type relative	N09
0...0.25											Only pressure type relative	N10
0...0.4											Only pressure type relative	N11
0...0.6											Only pressure type relative	N12
-1...0											Only pressure type relative	B59
-1...0.6											Only pressure type relative	B72
-1...1.5											Only pressure type relative	B74
-1...3											Only pressure type relative	B76
-1...5											Only pressure type relative	B77
-1...9											Only pressure type relative	B79
-1...15											Only pressure type relative	B81
-1...24											Only pressure type relative	B82
-1...39											Only pressure type relative	B1L
0...1											Only pressure type relative	B15
0...1.6											Only pressure type relative	B16
0...2.5											Only pressure type relative	B18
0...4											Only pressure type relative	B19
0...6											Only pressure type relative	B20
0...10											Only pressure type relative	B22
0...16											Only pressure type relative	B24
0...25											Only pressure type relative	B26
0...40											Only pressure type relative	B27
0...100											Only pressure type relative	B31
0...160											Only pressure type relative	B33
0...250											Only pressure type relative	B35
0...400											Only pressure type relative	B38
0...600											Only pressure type relative	B39
<b>Kind of pressure</b>												
Relative												R
Absolute												A