



bar

## ALP1000

Low Pressure Transmitter

### FEATURES

- Low pressure measurement from 0-50 mbar
- Robust stainless steel construction for durability and reliability
- Low hysteresis and excellent longterm stability
- Ideal for low pressure fluid and gas applications



### SPECIFICATIONS

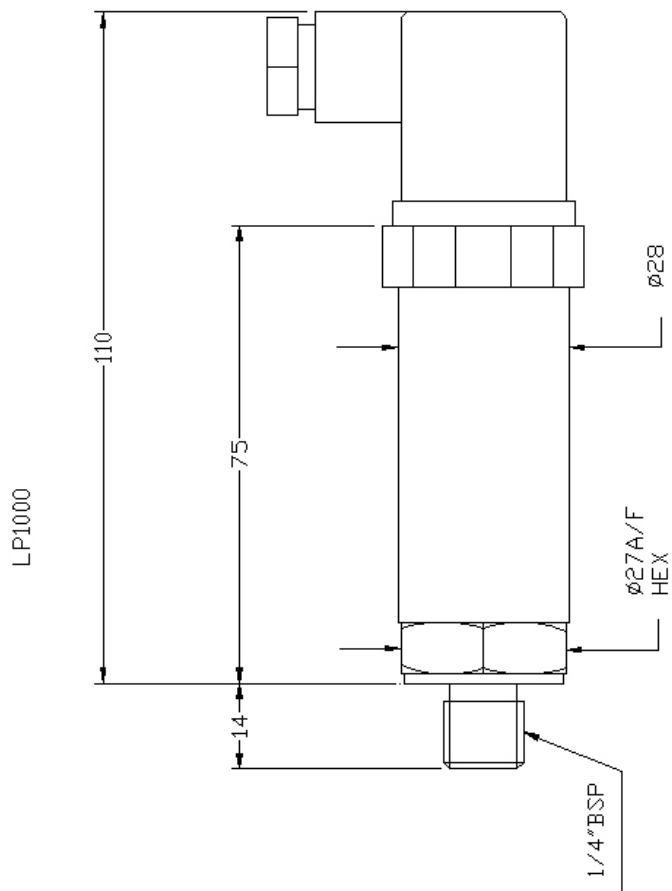
The ALP1000 series now extends pressure sensor technology into very low-pressure applications, with operating ranges down to 0-50 mbar whilst still maintaining high performance. Offering a low cost solution for accurate measurement at low pressures, the LP1000 is designed for use with a wide variety of liquids and gases compatible with 316L stainless steel and nitrile (NPR).

#### Typical applications include:

- Laboratory and test
- Air & gas pressure monitoring
- Leak detection
- Low pressure liquid & hydrostatic pressure measurement



**DIMENSIONS (in mm)**



**ELECTRICAL CONNECTIONS**

PIN No.	mA		VDC	
	2 wire	3 wire	3 wire	4 wire
1	+supply	common	common	-supply
2	4-20mA	+supply	+supply	+supply
3	N/C	+output	+output	+output
↓	to case	to case	to case	-output



**TECHNICAL DATA**

Type	ALP1000	ALP1001 / ALP1011	ALP1002 / ALP1012	ALP1003
Sensor Technology	Isolated Piezoresistive Silicon			
Output Signal:	10 MV/V (typical 4 wire)	0-5 V (4 or 3 wire)	0-10 V (4 or 3 wire)	4-20 mA (2 wire)
Supply Voltage:	10 VDC	13-30 VDC	13-30 VDC	13-36 VDC
Pressure Reference:	Gauge or Absolute (limited range)			
Protection of Supply Voltage:	Protected against supply voltage reversal up to 50 V (amplified version)			
Standard Pressure Ranges (bar):	0-50 mbar; 0-100 mbar; 0-250 mbar; 0-500 mbar; 0-1000 mbar (other ranges available); Absolute ranges from 0-500 mbar			
Standard Pressure Ranges (psi):	0-0.75 psi; 0-1.5 psi; 0-3 psi; 0-4 psi; 0-5 psi; 0-6 psi; 0-7 psi; 0-15 psi; 0-15 psi (other ranges available)			
Overpressure Safety:	4x ranges for 50 mbar to 250 mbar; 3x for ranges 500 mbar to 1000 mbar			
Load Driving Capability:	4-20 mA: $RL < [UB - 13V] / 20 \text{ mA}$ (e.g. with supply voltage (UB) of 36V, max. load (RL) is 1150); 10mV/V: n/a; 0-5V: max. load $RL > 5K$ ; 10 V: max. load $RL > 10K$			
Accuracy NLHR:	<+0.5 % of span BFLS			
Zero Offset and Span Tolerance:	+0.5 %FS at room temperature (LP1000:+5 %FS (approx.) adjustment with easy access trimming potentiometers on applied versions only)			
Operating Ambient Temperature:	-20C to +85C (-4F to +185F)			
Operating Media Temperature:	-20C to +85C (-4F to +185F)			
Temperature Effects:	+3% FS total error band for -20C to +70C. Typical thermal zero and span coefficients +0.05 % FS/C			
Storage Temperature:	+5C to +40C (+41F to + 104F) recommended Best Practice			
Electromagnetic Compatibility:	Emissions: EN6 1000-6-3: Immunity: EN6 1000-6-2: Certification: CE Marked			
Insulation Resistance:	> 100M @ 50 vdc			
Response time 10-90%:	1 mS			
Wetted Parts:	SAE 316 stainless steel and Nitrile NBR O-ring			
Pressure Media:	All fluids compatible with SAE 316 stainless steel and Nitrile NBR			
Pressure Connection:	1/4"BSP male (G1/4); 1/4" NPT male (G1/2); 1/2" NPT male (other options available)			
Electrical Connection:	Mating micro DIN socket EN175301-803 Form A (ex DIN43650) rated IP65 with PG9 cable entry (other options available)			
Net.wight (Kg):	0.3Kg			



**TECHNICAL DATA**

Output	Wires	Type	Electrical Connection/Options	Pressure Range	Process Connection
10 mV/V	4	ALP1000			
0-5 V	4	ALP1001			
	3	ALP1011			
0-10 V	4	ALP1002			
	3	ALP1012			
4-20 Ma	2	ALP1003			
<b>Electrical Connection</b>					
DIN EN175301 plug and socket			-		
Cable outlet 1m screened			A		
M12 connector			B		
Cable outlet 1m screened IP67 protection			C		
<b>Pressure Range in Bar</b>					
0-50 mbar (Gauge only)				0050	
0-100 mbar (Gauge only)				0100	
0-250 mbar (Gauge only)				0250	
0-500 mbar				0500	
0-500 mbar Absolute				500A	
0-1000 mbar				1000	
0-1000 mbar Absolute				01KA	
<b>Process Connection</b>					
1/4" BSP male (G1/4)					AB
1/2" BSP male (G1/2)					AC
1/4" NPT male					AM
1/2" NPT male					AN

**Order Number Example** **ALP1003-0050AC**

**For options not listed please contact the sales team**

DISCLAIMER: We reserve the right to change specifications without prior notice. specifications without prior notice. All manufactured products are calibrated with precision calibration equipment that is traceable to national measurement standards.