

## 18.600 G

### OEM Pressure Transmitter Pneumatics

#### Applications

- ▶ compressed air network
- ▶ general mechanical engineering

#### Characteristics

- ▶ silicon sensor without media isolation
- ▶ accuracy 0.5 % FSO according to IEC 60770
- ▶ nominal pressure ranges from 0 ... 100 mbar up to 0 ... 6 bar



#### Technical Data



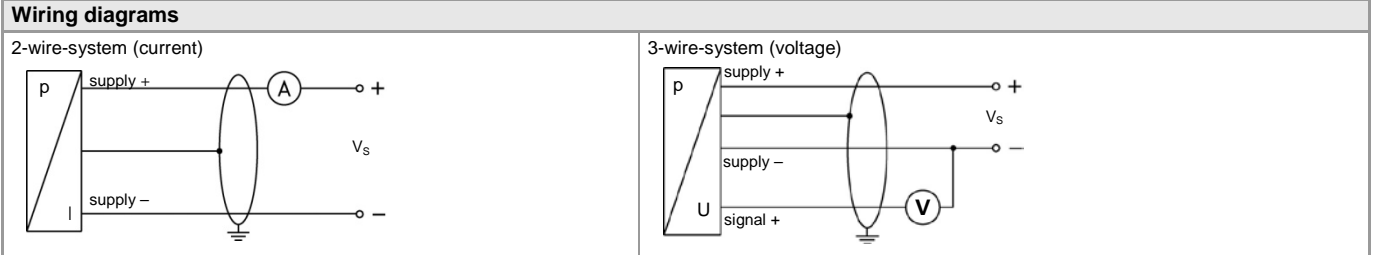
Input pressure range													
Nominal pressure gauge	[bar]	-1 ... 0	0,1	0,25	0,4	0,6	1	1,6	2,5	4	6		
Overpressure	[bar]	3	0,5	1	1	3	3	6	10	10	20		
Burst pressure	[bar]	5	1,5	3	3	3	7,5	7,5	15	25	25		
Output signal / Supply													
Standard	2-wire:	4 ... 20 mA / $V_S = 8 \dots 32 V_{DC}$											
Option	3-wire:	0 ... 10 V / $V_S = 14 \dots 30 V_{DC}$											
	3-wire ratiometric:	10 ... 90% of $V_S$ / $V_S = 2.7 \dots 5 V_{DC}$											
Performance													
Accuracy <sup>1</sup>		$\leq \pm 0.5 \% \text{ FSO}$											
Permissible load	2-wire:	$R_{max} = [(V_S - V_{Smin}) / 0.02 A] \Omega$											
	3-wire:	$R_{min} = 10 k\Omega$											
Influence effects	supply:	0.05 % FSO / 10 V					load: 0.05 % FSO / k $\Omega$						
Response time	2-wire:	$\leq 10 \text{ msec}$					3-wire: $\leq 3 \text{ msec}$						
Long term stability		$\leq \pm 0.2 \% \text{ FSO} / \text{year}$ at reference conditions											
Measuring rate		1 kHz											
<sup>1</sup> accuracy according to IEC 60770 – limit point adjustment (non-linearity, hysteresis, repeatability)													
Thermal effects (Offset and Span)													
Nominal pressure $P_N$	[bar]	-1 ... 0					$\leq 0.4$					$> 0.4$	
Tolerance band	[% FSO]	$\leq \pm 1$					$\leq \pm 1$					$\leq \pm 0.75$	
in compensated range	[°C]	0 ... 70										-20 ... 85	
Permissible temperatures													
Permissible temperatures		medium: -25 ... 125 °C				electronics / environment: -25 ... 85 °C				storage: -40 ... 85 °C			
Electrical protection													
Short-circuit protection		permanent											
Reverse polarity protection		no damage, but also no function											
Electromagnetic compatibility		emission and immunity according to EN 61326											
Mechanical stability													
Vibration		10 g, 25 Hz ... 2 kHz					according to DIN EN 60068-2-6						
Shock		100 g / 11 msec					according to DIN EN 60068-2-27						

# 18.600 G

OEM Pressure Transmitter

Technical Data

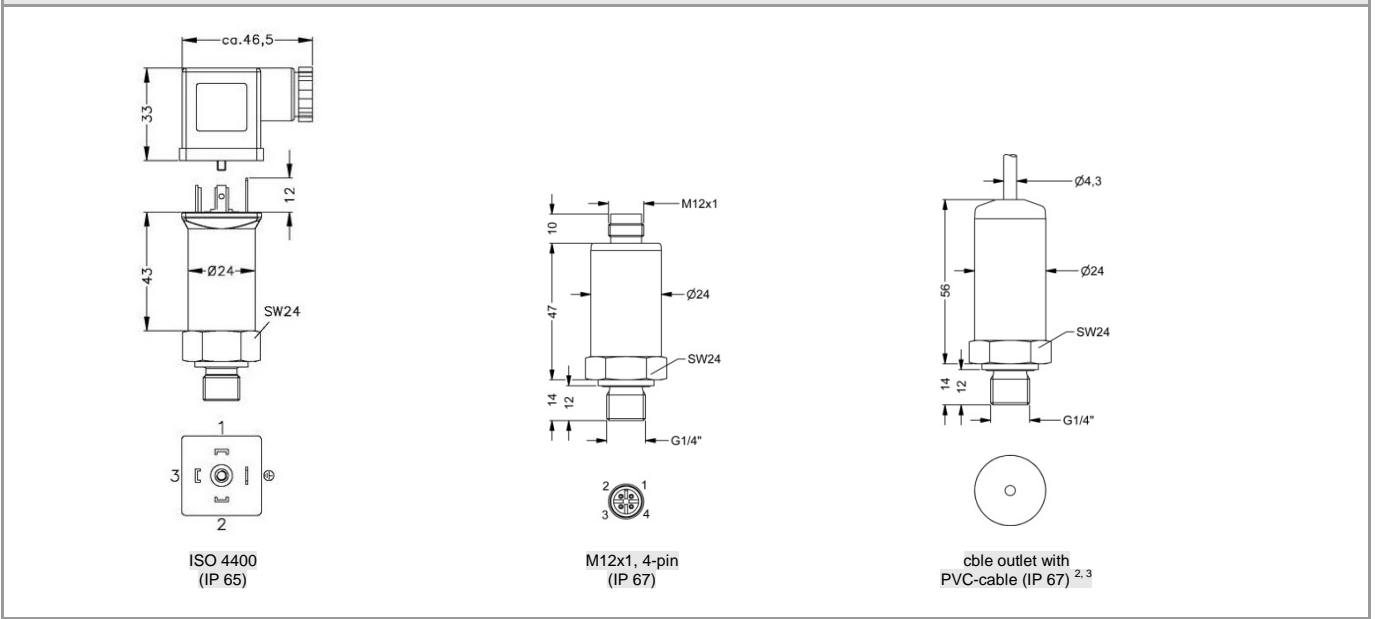
Materials	
Pressure port / housing	stainless steel 1.4301 (304)
Seals	FKM
Sensor	stainless steel 1.4404 (316L), silicon, glass, epoxy or RTV
Media wetted parts	pressure port, seals, sensor
Miscellaneous	
Permissible media	pressurized air, non-aggressive gases
Current consumption	2-wire: max. 25 mA 3-wire voltage: max. 7 mA (short circuit current: max. 20 mA)
CE-conformity	EMC Directive: 2014/30/EU



**Pin configuration**

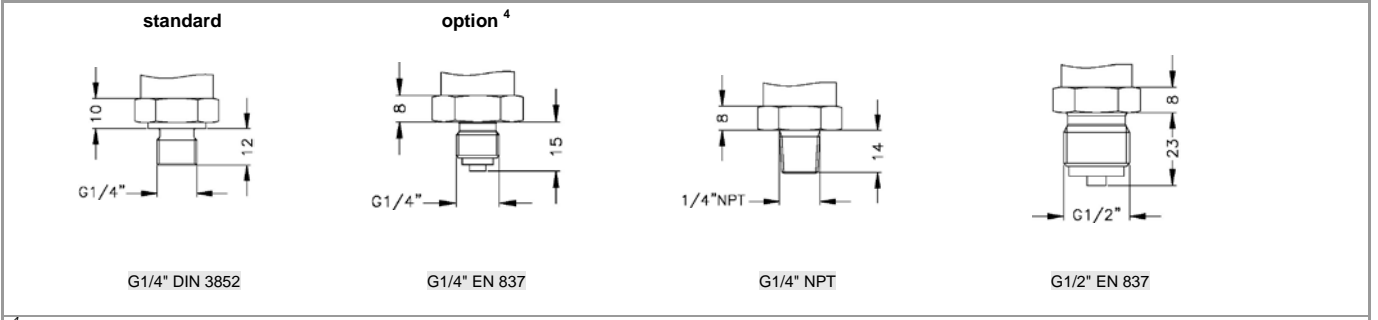
Electrical connections	ISO 4400	M12x1 (4-pin)	cable colour (IEC 60757)
Supply +	1	1	wh (white)
Supply -	2	2	bn (brown)
Signal + (for 3-wire)	3	3	gn (green)
Shield	ground pin	4	gnye (green-yellow)

**Electrical connections (dimensions in mm)**



<sup>2</sup> standard: 2 m PVC cable without ventilation tube (permissible temperatur: -5 ... 70 °C)  
<sup>3</sup> different cable types and lengths available, permissible temperatur depends on kind of cable

**Mechanical connection (dimensions in mm)**



<sup>4</sup> other mechanical connections on request

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## Ordering code 18.600 G

18.600 G   -     -  -  -  -     -     -

Input	[bar]	1	0	0	0	0	0	0	0	0	0	0	0
	0.10	1	0	0	0								
	0.25	2	5	0	0								
	0.40	4	0	0	0								
	0.60	6	0	0	0								
	1.0	1	0	0	1								
	1.6	1	6	0	1								
	2.5	2	5	0	1								
	4.0	4	0	0	1								
	6.0	6	0	0	1								
	-1 ... 0	X	1	0	2								
customer		9	9	9	9								consult
Pressure													
	gauge					R							
Output													
	4 ... 20 mA / 2-wire					1							
	0 ... 10 V / 3-wire					3							
	10 ... 90% of $V_S$ / 3-wire ratiometric					R							
customer						9							consult
Accuracy													
	0.5 % FSO					5							
customer						9							consult
Electrical connection													
	Male and female plug ISO 4400					1	0	0					
	Male plug M12x1 (4-pin), plastic					M	0	0					
	Cable outlet with PVC-cable <sup>1</sup>					T	M	0					
customer						9	9	9					consult
Mechanical connection													
	G1/4" DIN 3852					3	0	0					
	G1/4" EN 837					4	0	0					
	1/4" NPT					N	4	0					
customer						9	9	9					consult
Seals													
	FKM								1				
customer									9				consult
Special version													
	standard								0	0	0		
customer									9	9	9		consult

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<sup>1</sup> standard: 2 m PVC cable without ventilation tube (permissible temperature: -5 ... 70 °C)