

FRODE PEDERSEN

Application

- Measurement of exhaust temperature in ships- and stationary diesel engines
- The operating range is up to 800°C in gaseous media
- Fields of application
 - Diesel engines
 - Generators
 - Marine sector

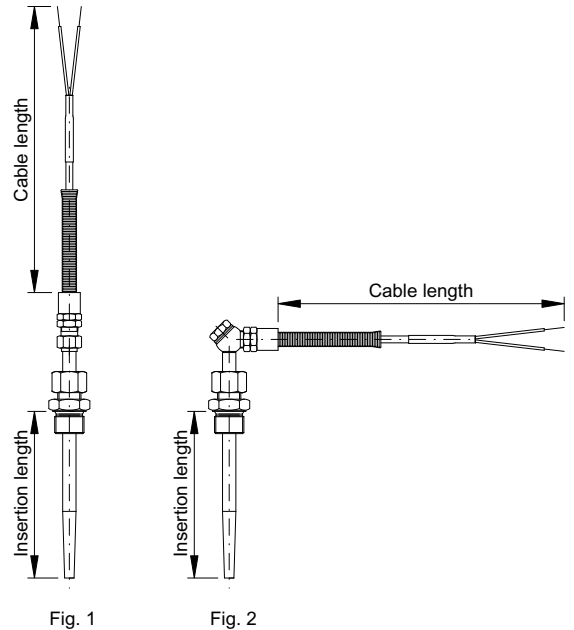
Technical features

- Thermocouple type K acc. to IEC 584-1
- Solid construction with high resistance against vibration acc. to IEC 68-2-6
- The thermocouple is electrical insulated from the protective tube
- Type approved by classification societies (see page 2)
- Connected to the process by adjustable compression fittings

Ordering

Please select the requested sensor from the table below
The colour code means:

- Standard: Built of standard modules (short delivery time)
- Variant: Modified standard modules
- Special: Special versions and material. We are specialists in temperature measurement. Please contact us and we shall do our utmost to solve your specific measuring tasks



Ordering information

Sensor

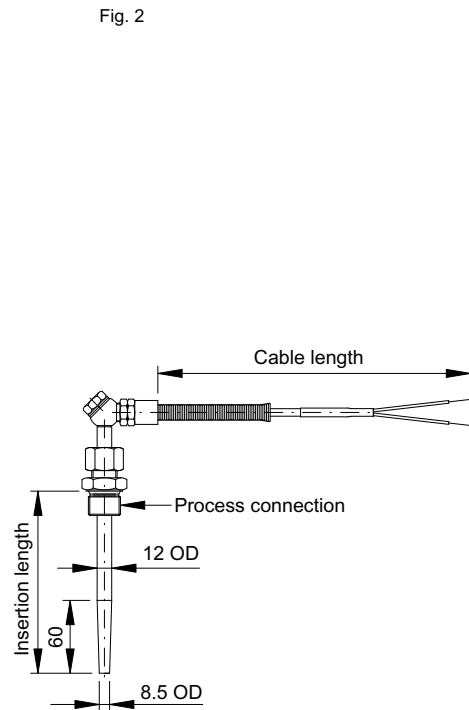
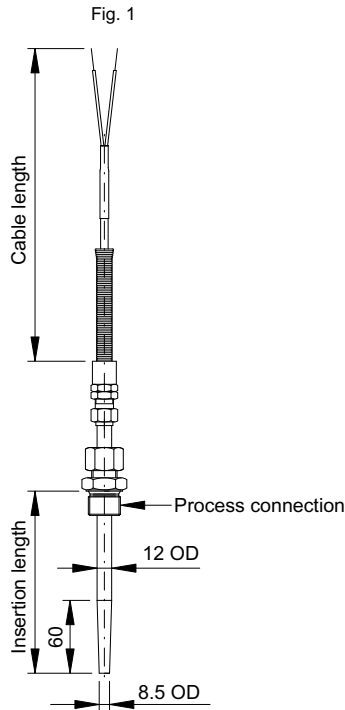
Specifications number	1801-										
Type											Cable length (meter)
Straight Fig. 1	0										0 2
90° Angle Fig. 2	1										0 4
											x 6
											x x.x
											Special (Min. 0.1m)
Protective tube											
SS, acidproof steel, W.no. 1.4571 (AISI 316Ti)											
Max. 800°C											
Conus 12.5 → 8.5mm OD	0										
Special:	s										
											Cable type
											0
											s
											XSGLO 2x1.5mm ² with silicone and steel braid insulation, 200°C
											Special:
Insertion length (mm)											
100-150 adjustable	0										
Special:	s										
											Tolerance acc. to IEC 584-2
											0
											s
											Class 2, for J, K and N, i.e. ±2.5°C or 0.0075 x t _{actual} (°C) 1)
											Special:
											Note 1: The highest value applies
Process connection (see page 2)											
None	0										
1/2" BSP compression fittings	1										
3/4" BSP compression fittings	2										
M18x1.5 compression fittings	3										
M22x1.5 compression fittings	4										
Special:	s										
											Number of thermocouples
											0
											s
											1
											Special:
Thermocouple											
Max. temperature											
Model	Type	Continuously									
NiCr-Ni	K	800°C	0								
Special:			s								

Accessories

Customer information

Name:
Tel.:

Dimensions



Compensating cable

XSGLO 2x1,5 mm², insulated with silicone, glass fiber and outer steel braid

Process connection

Fig. 3

Compression fitting in SS steel with steel fixing ferrule	
Protective tube	Thread
12 OD	1/2" BSP
12 OD	3/4" BSP
12 OD	M18x1.5
12 OD	M22x1.5

Response time

Protective tube	Response time acc. to representative measurement Temp. changed from 800°C to 20°C (immersed in water)	
	t _{0.5}	t _{0.9}
12 OD	15	45

Note:

The 0.5/0.9 time is the time that it takes the sensor to reach 50%/90% of the final value of a temperature change of a medium.

If media and velocity are different from the ones stated, the time can change significantly.

Type Approvals

- Lloyd's Register of Shipping
- Det Norske Veritas

Connection diagram

