

## Temperature Sensor TSA 01 in Stainless Steel 316Ti

### TSA 01 TSP 01

#### Characteristics

- ▶ Electronic temperature sensor in stainless steel 316Ti
- ▶ Measuring element: Pt100
- ▶ Output: 4-20mA (2-wire),  
or 0-10V DC (3-wire)
- ▶ Max. temperature range:  
-30°C up to +150°C
- ▶ Electrical connection:  
Coupler plug, plug M12 or cable
- ▶ Process connection: BSP $\frac{1}{2}$ "
- ▶ Protection: IP65
- ▶ Length of the sensor is variable
- ▶ Reasonable prices

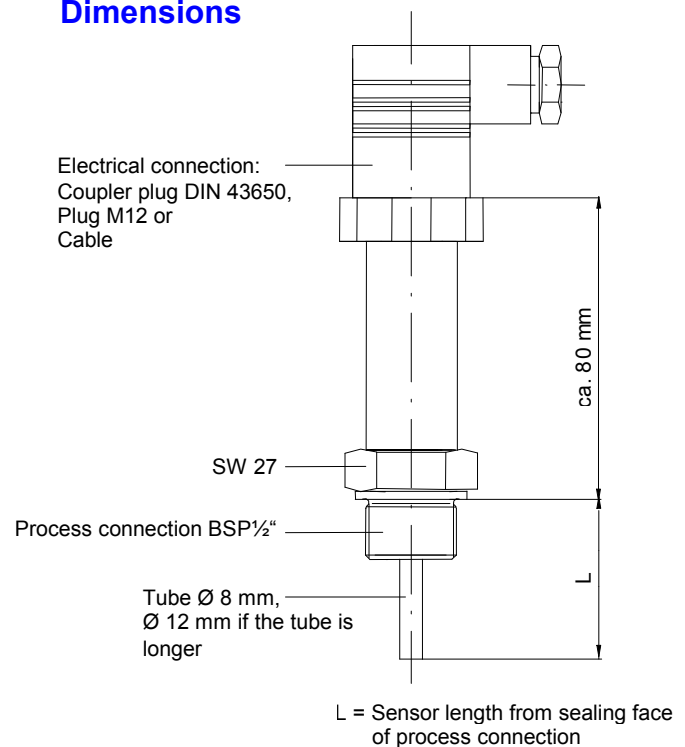


#### Areas of application

Temperature measuring in liquids and gases:

Hydraulics, Pneumatic,  
Plant construction, Machine construction,  
Process technology, etc.

#### Dimensions





## Technical Data

<b>Supply voltage</b>	12 – 32V DC	<b>Process connection</b>	BSP $\frac{1}{2}$ "
<b>Output</b>	4-20mA (2-wire), 0-10V DC (3-wire)		in stainless steel 316Ti
<b>Measuring element</b>	Pt 100 class B DIN IEC 751	<b>Electrical connection</b>	Coupler plug DIN 43650, plug M12, or cable
<b>Accuracy</b>	$\pm 0,5$ % of the measurement range	<b>Sensor length L</b>	max. 3000 mm, >3000 mm on request
<b>Temperature range</b>	-30°C up to +150°C	<b>Tube</b>	Ø 8 mm, Ø 12 mm in stainless steel 316Ti
<b>Supply current</b>	30mA		
<b>Protection</b>	IP 65		

## Electrical Connection:

Connection	Current Output 4-20mA (2-wire)			Voltage Output 0-10V DC (3-wire)		
	Plug M12	Cable	Coupler Plug	Plug M12	Cable	Coupler Plug
+ Supply	1	brown	1	1	brown	1
- Supply	4	white	2	3	white	2
+ Signal	-	-	-	4	green	3
- Signal	-	-	-	-	-	-

## Accessories: Circular plugs M12

Type		Order number	Design
Female plug M12 with	2 m PVC cable	K12PVC 2	
	5 m PVC cable	K12PVC 5	
	2 m PUR cable	K12PUR 2	
	5 m PUR cable	K12PUR 5	
Female plug M12, angle type with	2 m PVC cable	W12PVC 2	
	5 m PVC cable	W12PVC 5	
	2 m PUR cable	W12PUR 2	
	5 m PUR cable	W12PUR 5	

Colour			
Output 4-20mA		Output 0-10V DC	
1	brown	1	brown
3	-	3	blue
4	black	4	black

## Product overview / order table

### TSA 01 TSP01

#### Electrical connection

- A Coupler plug DIN 43650
- M12 Plug M12
- 2P Connection cable: 2 m PVC 0,25 mm<sup>2</sup>, Standard  
 └─ other cable length: dimensions in m
- 2U Connection cable: 2 m PUR 0,25 mm<sup>2</sup>, Standard  
 └─ other cable length: dimensions in m

#### Process connection

- A Fixing screw thread BSP½"
- X Other types on request

#### Sensor length L

Length from sealing face of process connection  
 $L \geq 25 \text{ mm}$  and  $L \leq 3000 \text{ mm}$   
 Dimensions in mm

#### Temperature ranges

- A 0°C up to +100°C
- B 0°C up to +150°C
- C -30°C up to +100°C
- D -30°C up to +150°C
- X other temperature range on request

#### Output:

- A 4-20mA (2-wire)
- V 0-10V DC (3-wire)

