



Type SDT 02

modular @ pressure

Modular pressure transducer

Basic features

- ▶ Wetting parts and case made of high-grade Steel
- ▶ High temperature range
- ▶ Nominal pressure ranges up to 40 bar
- ▶ Relative pressure
- ▶ PC-telecontrolled parametrizable
- ▶ Wetting parts made of high-grade steel 1.4435
- ▶ Case made of high-grade steel 1.4435
- ▶ Fourfold overload
- ▶ Totally front-flush membrane
- ▶ FDA, EHEDG-conformal



Technical features

- ▶ Accuracy according to IEC 60770: 0,5 % FSO
- ▶ Long-term stable
- ▶ Short-circuit-proof + reverse voltage protected
- ▶ Functional ranges (temperature):
Medium to be measured (permanent): -20 °C to 110 °C
Medium to be measured max. (1/2 h) up to 140 °C
- ▶ Response Time: 40...300 ms (dependently of the change of measurement; large jump = fast, small jump = slow)
- ▶ Protection class IP 67 according to EN 60529
- ▶ M12 connector made of high-grade steel
- ▶ Adjustable attenuation
- ▶ Offset, range modifiable within the dimensions ± 25% FS
- ▶ Characteristic curve decreasing - increasing
- ▶ Current limitation

Examples of modular process connections



Varivent Triclamp Milchrohr

See data sheet process connection technology

modular @ process

Favoured fields of application are:

- ▶ Food technology
- ▶ Chemical and pharmaceutical industry
- ▶ Process measurement

Design and mode of operation

The pressure transducer SDT02 represents the basis of our well-tried pressure transducers of the SDT series. It is available in the following mechanical Versions:

- Modular, aseptic G1"
- Process connection with polymer-free sealing system

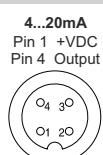
Stand 05/2023

**Technical data****Input variable (Measuring range)**

Basic measuring range bar	0...0,4	0...1	0...1,6	0...2,5	0...4	0...6	0...10	0...16	0...25	0...40
Allowable overload	1,6	4	6,4	10	16	24	40	64	100	160
Turn down: Offset, range adjustment ± 25% FS variable										

Housing materialHigh grade steel 1.4435
(316 L)**Sensor material (touched by media)**High grade steel 1.4435 (316 L) Advantages material of the food and Pharmaindustry
(corrosion resistance increased)**Filling medium**

AK 100, FDA conform

Filling volumeca. 0,11 cm³**Connection dimensional drawing****Output signal / auxiliary power**Standard 2-Leiter: 4 ... 20 mA / U_B = 12 ... 30 VDC**Electrical Connection**

M 12-connector made of high-grade steel

Torque

Torque 30 Nm

Signal behaviour

Accuracy	Standard: < ± 0,5 % of Meas. range FS (incl. hysteresis and reproducibility)
Allowable Load	450 Ohm
Measuring range not reached:	3,8 mA
	Current in case of error: 3,5 mA
	Meas. range exceeded 22,5 mA

Temperature errorTemperature drift zero-point: . ≤ ± 0,02 % FS/K, max. ≤ ± 0,04 % FS/K
Temperature drift meas. range: ≤ ± 0,02 % FS/K, max. ≤ ± 0,04 % FS/K**Temperature operating range**All. duration mediumtemp.: -20...110°C
Mediumtemp max.: (1/2 h) 140°C
Ambient temperature.: -20... 85°C**Ordercode**SDT02 - **0** - **B** - **M**

Measuring range	bar	0	B	M
0...0,4	preference type	0	1	
0...1	preference type	0	2	
0...1,6	preference type	0	3	
0...2,5	preference type	0	4	
0...4	preference type	0	5	
0...6	preference type	0	6	
0...10	preference type	0	7	
0...16		0	8	
0...25		0	9	
0...40		1	1	
- 0,6...0,0		3	0	
- 1...0,0		3	1	
- 1...0,6		3	2	
- 1...1,5		3	3	
- 1...3		3	4	
- 1...5		3	5	
- 1...9		3	6	
- 1...15		3	7	

Measuring value

Relative pressure

0**Output signal**

2-Leiter: 4 ... 20 mA / UB = 12 ... 30 VDC

B**Electrical Connection**

Without Connection Head with plug M12x1

M