**TINYPTM-C2 PRESSURE SENSOR DATASHEET**

**output 4..20mA**

**Characteristics**

- Ideal as a dry run protection device for pumps and for process monitoring
- Pressure range from 0-0.5 up to 0-10 bar
- Robust design
- High accuracy
- Resistant to aggressive media
tinyPTM-C2

Signal - output
C2
Current: 2 wires, 1 x 4...20mA

Housing / Sensor

Measuring range
0...16 Bar
0...10 Bar
0...5 Bar
0...2 Bar
0...1 Bar
0...0,5 Bar

½" pressure gauge connection

1 Housing (not in contact with media): Stainless steel 1.4104 and PVDF

* Angle socket with screw contacts included in the scope of delivery

Available
not available

EPDM, FKM (FPM)
PTFE
PVDF
PP
PVC-U
tinyPTM-C2 Pressure sensor

Application - The tinyPTM C2 can be used as a transmitter for pressure determination for process monitoring, but also as dry-running protection for pumps.

Function - The process pressure is registered by a ceramic transducer made of AL2O3.


Interfaces - Signal output, current loop (C2): 4–20 mA, 2-wire

Measuring category - pressure

Device connection - ½” pressure gauge connection

output - 4..20mA

Type of protection - IP 67

Mounting position - any

Material Sensor (wetted parts) - AL2O3 96 %

Housing material (with medium contact) - PVDF
- PP
- PVC-U
- PTFE

Material sealing element (in contact with medium) - EPDM
- FPM

Material housing (not in contact with the medium) - 1.4571
- PVDF
- PP
- PVC-U

Sensordaten (Druck) - Messbereich: 0-0.5, 0-1, 0-2, 0-5, 0-10, 0-16 bar
- Maximum overpressure: 2 x nominal pressure
- Precision >= 0-2 bar: at 0–85°C: ±2.4 % FS
- Precision >= 0-2 bar: at 25 °C: ±1% FS
- Precision < 0-2 bar: at 0–85°C: ±2.5 % FS Precision < 0-2 bar: at 25 °C: ±1.5 % FS
- Precision < 0-2 bar: bei 25 °C: ±1,5 % FS

Approved process pressure range - -0.2 .. 2 x nominal pressure

Process temperature range - 1.4104: -10 .. 110 °C
- PVDF: -10 .. 100°C
- PP: 0 .. 70 °C
- PVC-U = 0 .. 50°C

Note - Freezing medium destroys the sensor!
tinyPTM-C2 Pressure sensor

**Voltage supply**
- U = 9–35 V DC

**Output behaviour**
- Power up: < 200 ms
- Step response (10–90%) 10 ms

**Umgebungsbedingungen**
- Ambient temperature: 0–50 °C
- Atmospheric ambient pressure: 0.8-1.1 bar
- Relative humidity: 20–85%

**Weight**
- 1.4104: 126g
- PVDF: 71g
- PVDF: 71g
- PVC-U: 63g
### tinyPTM-C2 Pressure sensor

<table>
<thead>
<tr>
<th>No.</th>
<th>Designation</th>
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<tbody>
<tr>
<td>1</td>
<td>Angle socket with screw contacts</td>
</tr>
<tr>
<td>2</td>
<td>4-pin M12 connector</td>
</tr>
<tr>
<td>3</td>
<td>Sensor housing SW22</td>
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<tr>
<td>4</td>
<td>½&quot; pressure gauge connection with EPDM or FKM seal</td>
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tinyPTM-C2 Pressure sensor

Circuit diagram, plug connector

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<tr>
<th>M12 Stecker (Steckseite)</th>
<th>Connection / function</th>
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<tr>
<td>1</td>
<td>4–20 mA signal (+)</td>
</tr>
<tr>
<td>2</td>
<td>4–20 mA signal (-)</td>
</tr>
<tr>
<td>3</td>
<td>-</td>
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tinyPTM-C2 Pressure sensor

Ohmic resistance

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<td>R</td>
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