

PHF-S-SA2

● Vibration Resistance: 490.3 m/s²
● 2 to 20 MPa

Small-sized High-temperature Pressure Transducer



Compact & Lightweight, Usable at up to 150°C

- High vibration resistance: 490.3 m/s² (50 G)
- Highly stable

PHF-S-SA2 series are small-sized strain-gage type pressure transducers which are usable in 150°C environment.

Specifications

Performance

| | |
|----------------|--|
| Rated Capacity | See table below. |
| Nonlinearity | Within ±0.4% RO for 2 MPa Within ±0.3% RO for 5 to 20 MPa |
| Hysteresis | Within ±0.2% RO |
| Rated Output | 2 mV/V |

Environmental Characteristics

| | |
|------------------------------|---|
| Safe Temperature | -40 to 170°C (Connector plug: -25 to 80°C) |
| Compensated Temperature | -40 to 150°C (Connector plug: -25 to 80°C) |
| Temperature Effect on Zero | Within ±0.008% RO/°C |
| Temperature Effect on Output | Within ±0.01%/°C |

Electrical Characteristics

| | |
|------------------------|--|
| Safe Excitation | 10 V AC or DC |
| Recommended Excitation | 1 to 5 V AC or DC |
| Input Resistance | 350 Ω±2% |
| Output Resistance | 350 Ω±2% |
| Cable | 4-conductor (0.09 mm ²) fluoroplastic shielded cable, 3.1 mm diameter by 4 m long, terminated with connector plug PRC03-12A10-7M |

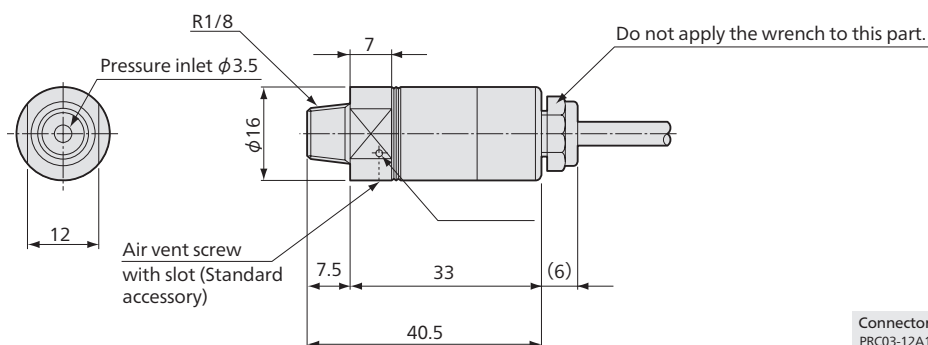
Mechanical Properties

| | |
|---------------------|---------------------------------|
| Safe Overloads | 150% |
| Natural Frequencies | See table below. |
| Material | Liquid-contacting part: SUS 630 |
| Weight | Approx. 50 g (Excluding cable) |
| Mounting Screw | R1/8, male |
| RoHS Directive | EN50581 |

Standard Accessories Hexagon wrench for air vent screw (M3)

| Models | Rated Capacity | Natural Frequencies |
|---------------|----------------|---------------------|
| PHF-S-2MPSA2 | 2 MPa | ≈ 25 kHz |
| PHF-S-5MPSA2 | 5 MPa | ≈ 50 kHz |
| PHF-S-10MPSA2 | 10 MPa | ≈ 70 kHz |
| PHF-S-20MPSA2 | 20 MPa | ≈ 100 kHz |

Dimensions



Connector plug
PRC03-12A10-7M



● Physical quantity indication ● Static measurement ● Dynamic measurement

PHF-S-SA2
Recommended
products for
combination

