



Pressure transducers DMU 02 Industrial version



Benefits

- Extremely resistant to shock, pulsation and vibration
- High overload safety
- Best dynamic pressure resistance at high load changes
- Wetted area without seals due to welding
- No transmission liquid

Application

For electronic pressure measurement in industrial applications, e.g. hydraulic, pneumatic, gas industry, refrigeration, automation, medical, as well as general mechanical and plant engineering applications.

Description

Pressure transducers convert physical pressure into an electrical signal proportional to the pressure. DMU 02 is equipped with a piezo-resistive polysilicon thin-film measuring cell.



Technical specifications

Measuring accuracy

Deviation from the characteristic curve according to IEC 60770 – limit point calibration (non-linearity, hysteresis, repeatability)
< ± 0.5 % FSO

Measuring range

See ordering table

Overpressure safety

≤ 250 bar: At least 2 x FS
> 250 bar: At least 1.5 x FS
≥ 1,000 bar: At least 1.2 x FS

Burst pressure

≤ 250 bar: At least 3 x FS
> 250 bar: At least 2 x FS
≥ 1,000 bar: At least 1.5 x FS

Operating temperature range

Medium: -40/+125 °C
Ambient: -40/+105 °C
Storage: -40/+125 °C

Temperature error band

≤ ± 0.15 % FSO/10 K In compensated range -25/+85 °C

Dynamic characteristics

Response time: < 1 ms

Process connection

G½B EN 837-1/7.3

Options

- Other connection threads
- Fixed cable connection
- Other connectors
- Other output signals
- Cleaned for oxygen
- EX version (II 1G Ex ia IIB T4)

Material

Housing: Stainless steel 304
Pressure connection: Stainless steel 630

Supply voltage

DC 10 – 32 V

Output signal

2-wire, 4–20 mA

Load

$R_{Max} = [(UB - UB_{Min})/0.02 A] \Omega$

Current input

< 25 mA

Electrical protection

Short circuit proof and protected against reverse polarity

Electrical connection

Connector and junction box as per ISO 4400 (DIN 43650-A)

Degree of protection

IP 65 (EN 60529)

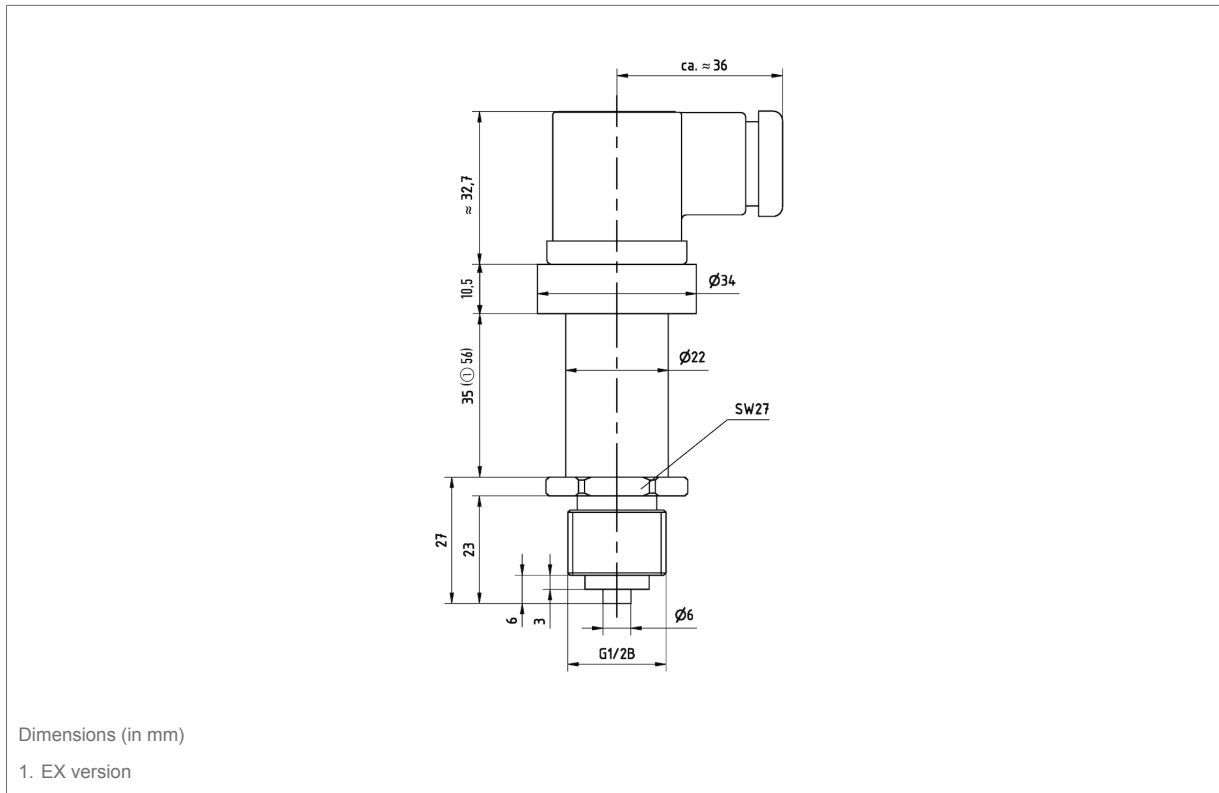
CE conformity

EMC Directive 2014/30/EU
RoHS Directive 2011/65/EU
Pressure Equipment Directive 2014/68/EU



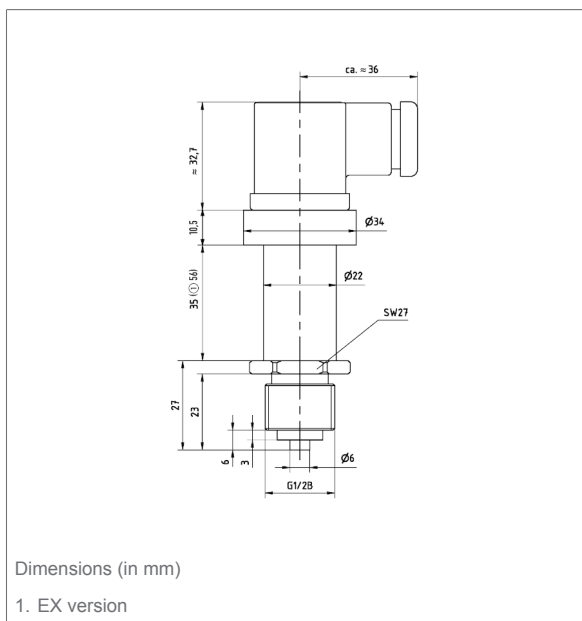
Detail views

DMU 02 - connector ISO 4400 (DIN 43650-A)



Technical drawings

DMU 02 - connector ISO 4400 (DIN 43650-A)





Versions

| Type | Connection | Measuring range | Part no. |
|--------|------------------|-----------------|----------|
| DMU 02 | G½B EN 837-1/7.3 | -1/0 bar | 32801 |
| DMU 02 | G½B EN 837-1/7.3 | -1/+1.5 bar | 32802 |
| DMU 02 | G½B EN 837-1/7.3 | -1/+3 bar | 32803 |
| DMU 02 | G½B EN 837-1/7.3 | -1/+5 bar | 32804 |
| DMU 02 | G½B EN 837-1/7.3 | -1/+9 bar | 32805 |
| DMU 02 | G½B EN 837-1/7.3 | -1/+24 bar | 32806 |
| DMU 02 | G½B EN 837-1/7.3 | 0/600 mbar | 32807 |
| DMU 02 | G½B EN 837-1/7.3 | 0/1 bar | 32808 |
| DMU 02 | G½B EN 837-1/7.3 | 0/1.6 bar | 32809 |
| DMU 02 | G½B EN 837-1/7.3 | 0/2.5 bar | 32810 |
| DMU 02 | G½B EN 837-1/7.3 | 0/4 bar | 32811 |
| DMU 02 | G½B EN 837-1/7.3 | 0/6 bar | 32812 |
| DMU 02 | G½B EN 837-1/7.3 | 0/10 bar | 32813 |
| DMU 02 | G½B EN 837-1/7.3 | 0/16 bar | 32814 |
| DMU 02 | G½B EN 837-1/7.3 | 0/25 bar | 32815 |
| DMU 02 | G½B EN 837-1/7.3 | 0/40 bar | 32816 |
| DMU 02 | G½B EN 837-1/7.3 | 0/60 bar | 32817 |
| DMU 02 | G½B EN 837-1/7.3 | 0/100 bar | 32818 |
| DMU 02 | G½B EN 837-1/7.3 | 0/160 bar | 32819 |
| DMU 02 | G½B EN 837-1/7.3 | 0/250 bar | 32820 |
| DMU 02 | G½B EN 837-1/7.3 | 0/400 bar | 32821 |
| DMU 02 | G½B EN 837-1/7.3 | 0/600 bar | 32822 |
| DMU 02 | G½B EN 837-1/7.3 | 0/1,000 bar | 32823 |



Blue part no. = in-stock items