

DPW Differential Pressure Transducer

■ Features

- Measure by diffusion silicon sensor , advanced membrane isolation
- Wide range power supply
- Compact and easy to install
- Design for anti-interfere ,anti-lightning strike
- Connection reverse protect ,OVP 、 OCP
- 2mS response time ,high accuracy ,high stability

■ Application

- Suitable for measure indoor liquid or gas ,not for explosion-proof field



■ Ordering Information

DPW

Measure Range

CODE	Range	CODE	Range
010K	0~10Kpa	500K	0~500Kpa
020K	0~20Kpa	600K	0~600Kpa
050K	0~50Kpa	001M	0~1Mpa
100K	0~100Kpa	1D6M	0~1.6Mpa
200K	0~200Kpa	2D5M	0~2.5Mpa
400K	0~400Kpa	O	指定

Output

CODE	Output
D	4~20mA(2 Wire)

Connection

CODE	Connection
14	M20*1.5
17	G1/4
19	G1/2
35	Shell buckle(50.5)
36	KF16
37	Flange DN15
38	Flange DN20

Accuracy

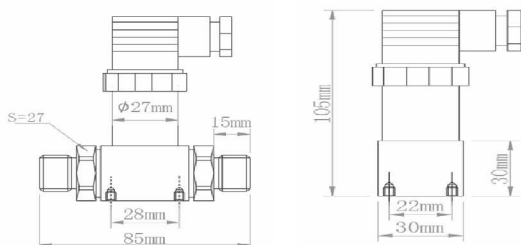
CODE	Accuracy
B	0.25%FS
C	0.5%FS

Note : Code No.under 35 need to purchase interface accessory

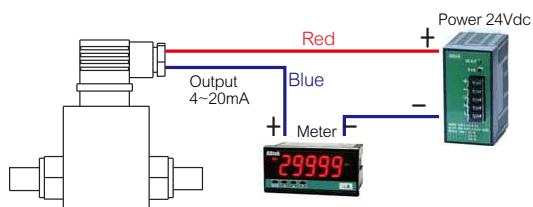
■ Technical Specification

Measure medium :	liquid 、 gas (Stainless steel compatible)
Material of body :	Stainless steel 316s of membrane ; stainless steel 304 of connector
Measure range:	0~2.5MPa
Max Pressure:	20Mpa
Overload capacity:	200%FS
Measure type:	Differential pressure
Output:	4~20mA
Power supply:	9~36VDC
Accuracy:	0.25%FS 、 0.5%FS
Medium Temperature:	-40~85℃
Operating Temperature:	-40~85℃
Vibration resistance:	25g(20.....2000Hz)
Overload ability:	200%FS
Response freq.:	≤500Hz
Performance stability:	±0.1%FS/year
Temperature drift:	±0.01%FS/℃
IP Enclosure:	IP65
Maximum power :	Current≤(Us*0.02)W Voltage≤(Us*0.008)W
Load impedance:	Current≤{(Us-7) /0.02 (Us=Voltage)}Ω Voltage≥100KΩ

■ Dimension



■ Connection Diagram



■ Installation Notice

- 1.To ensure safe and reliable operation of the transducer, it is recommended to install the Three-way valve between the measured point and transducer, ensure the measured medium slowly and evenly applied to the transducer positive and negative pressure chamber
- 2.When installed, it is recommended to make the pressure at both ends of the interface in a horizontal position so that the installation to minimize the impact on the product
- 3.The installation process should be used wrench tighten hex nut from both sides of the transducer, to avoid direct rotating transducer bottom

■ Notice

- 1.Prohibition measure incompatible with stainless steel medium
- 2.Power supply voltage must meet the power requirements and correct wiring. Ensure maximum pressure within the measurement range of the transducer
- 3.The pressure measurement process should be slow pressurization and pressure relief, To avoid instantly added to high or low pressure drops
- 4.When removing the transducer to ensure that the device is disconnected pressure source,to avoid the medium ejection accident. This transducer is not explosion-proof, explosion-proof area in use can cause serious personal injury and serious material damage
- 5.Sensor is a precision device, users do not disassemble ,and can not touch the membrane, so as to avoid damage to the product

■ Common failure analysis and troubleshooting

Failure phenomenon	Cause	Method of exclusion
No output signal	1.No power supply 2.Wiring error	According to the connection diagram properly supply power
At constant pressure the output irregular vary	1.Ungrounded transducer housing 2.Field RF interference strong 3.Not using shielded cables	1.Use shielded cables and ground the shield 2.Transducer housing grounding
When the transducer is not connected to the pressure corresponding to the output value is incorrect	Transducer is not working at the request of the environment	move to under the provisions of environment or to take measures to meet the requirements of the environment
Transducer output does not match the measured value	1.Supply voltage is incorrect 2.External load is overload	1. Make sure power supply voltage is 9 ~ 36VDC 2. Adjusting the external load

■ Storage

Transducer is a precision instrument, it should be stored at room temperature in a dry ventilated indoor environment