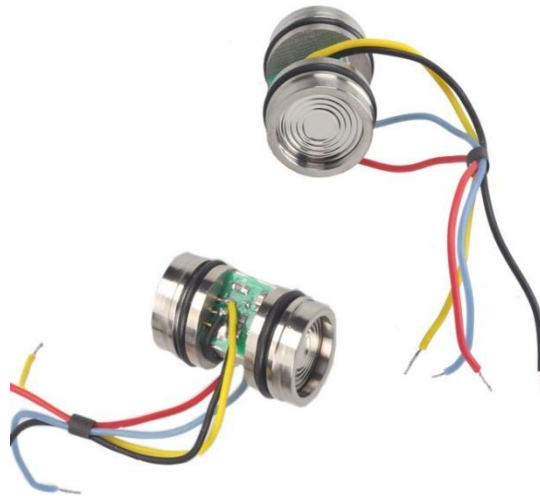


Products Overview

Holykell CYX20 Piezoresistive differential pressure sensor is OEM differential pressure sensor with stainless steel isolated diaphragm. It has integrated construction, high static pressure, high stability and good reliability. The high and low pressure sides are protected by isolated diaphragm. It can be used for measuring corrosive and conductive flow media. The measured differential pressure is transmitted onto the die through the diaphragm and filling silicon oil, so that the sensor could measure differential pressure precisely. The sensor is tested on the advanced production line, with the popular dimension, CYX20 differential pressure sensor are widely used for industrial process control and differential pressure measure fields, etc.



Product Features

- Pressure range ,0~35Kpa,10kPa~3.5MPa
- Constant current power supply
- Isolated construction, enable to measure various media
- OEM differential pressure sensor
- Full stainless steel 316L
- High static pressure 20MPa
- Long-term stability 0.1%FS/year
- 18 Months warranty

Application

- Industrial process control
- Gas, liquid pressure measure
- Pressure checking meter
- Pressure calibrator
- Differential pressure measure
- Ventura and eddy-current flow meter

Technical Specification

Specification	Min	Typ	Max
FS output (mV)	--	100	--
Zero output (mV)		±1	±2
Non Linearity (%FS)		0.2	0.5
Hysteresis (%FS)		0.05	0.1
Repeatability (%FS)		0.05	0.1
Zero Temperature drift (%FS@25°C)	10kPa		±1.6
	≥35kPa		±0.8
Temperature Error Sensitivity (%FS @25°C)	10kPa		±1.6
	≥35kPa		±0.7
Long-term stability (%FS/Year)		0.1	
Compensated temp. range (°C)	0~50; -10~80		
Working temp. range (°C)	-40~+125		
Storage temp. range (°C)	-40~+125		
Lifetime (25°C) (times)	>1×10 ⁸ Pressure cycle (FS)		

Electric Specification

Input impedance (KΩ)	3~8	Insulation Resistance (MΩ)	100 (100VDC)
Output impedance(KΩ)	3.5~6	Response time (ms)	<1ms
Excitation Current (mA)	1.5 (DC Max10V)	Overpressure	1.5 times FS
Power Supply	1.5±0.0015 mADC	Excitation Connection(mA)	100mm silicon rubber flexible wires
Max. static pressure	20MPa	Zero drift/static pressure	≤0.5mV/MPa

Material

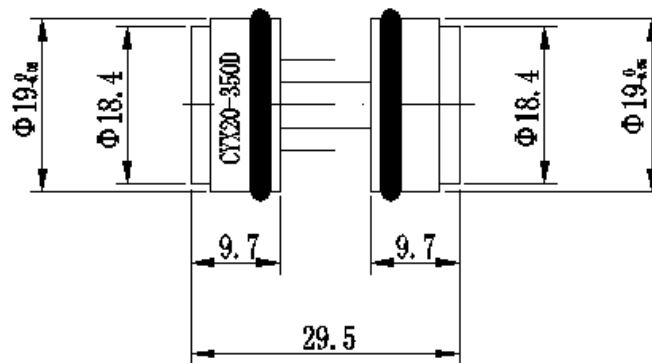
Filled Medium	silicone oil	O-ring	Φ29.5×19mm (BUNA or VITON)
Housing	stainless steel 316L	Pin	silicon rubber flexible wire
Diaphragm	stainless steel 316L	Weight (g)	36g

Environment Condition

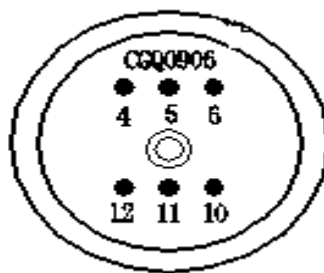
Position effect	deviate 90° from any orientation, zero change ≤0.05%FS	Compensated temp. range (°C)	0~50; -10~80
Shock (20~500Hz) (G)	20	Working temp. range (°C)	-40~+125
Media Compatibility	the gas or liquid which is compatible with stainless steel and viton	Relative Humidity	45%~80%RH;
Ambient temperature	22°C±5°C	Atmosphere pressure	86kPa~106kPa

Outline Structure

(unit:mm)



Electrical Connection



Wire Code	Electric Connection
4 Yellow	-OUT
5 Red	+IN
6 Black	-IN
10 Green/Blue	+OUT

Part Number Selection Table:

CYX20	Piezoresistive OEM Differential Pressure Sensor					
	Range code	Pressure range	Ref.	Range code	Pressure range	Ref.
	01	0~10KPa	D	07	0~400KPa	D
	02	0~20KPa	D	08	0~600KPa	D
	03	0~35KPa	D	09	0~1.0MPa	D
	04	0~70KPa	D	10	0~2.0MPa	D
	05	0~100KPa	D	11	0~3.5MPa	D
	06	0~200KPa	D	XX	By Customized	D
		Code	Temperature Compensation			
		M	Outer compensated resistor			
			Code	Electric connection		
			2	4-color 100mm Flexible rubber wire		
CYX20	03	M	2	Remarks		

Order Note:

1. Please notice that one side of the leading wire is High Pressure Side, the other is Low Pressure Side. Or identify High Pressure Side by mark "+", and identify Low Pressure Side by mark "-carefully;
2. During application, please pay attention that the pressure of high pressure side should be higher than that of low pressure side;
3. Please pay attention to protect the diaphragm, prevent it damaging;
4. Please do not pull the 6 leading wires.