

Wireless Pool Pressure/Temperature Sensor





DESCRIPTION

Phoenix Sensors Wireless Pool pressure and temperature solution saves you time and money. Our blue-tooth wireless solution simply plugs into the top of your pool filter and the sensor does the rest. It is a self-powered sensor system that communicates via blue-tooth to your Smart Phone to notify you when your pool needs maintenance. It can be set up to notify you when there is a problem with your pool. If the pool filters need cleaning, the system is running dry, or if the system is running at a level that could damage your motor, pump, or filtration system.

Simply download the Phoenix Sensors application from our website and connect to the device. The sensor will wake-up with any kind of vibration and will shut down automatically when it is not in use to preserve the battery. This unit will last up to 2 years in continuous use. Please contact us for OEM Custom designs.

- 0-75 PSIA Range
- -20-80°C Operating Temperature
- Compact Size
- +- 1 PSI Accuracy
- **BLE** Wireless Communication (IOS)
- Absolute or Gage
- Media Liquid, Air, & Gas
- IP67
- Download Free Android/IOS application
- · Battery Powered
- 1 year warranty
- Auto-Shut off feature (Power Save Mode)

APPLICATIONS

Pool Filter Monitoring

Maximum Environmental Ratings

Operating Temperature -20°C to 80°C Storage Temperature Range-50°C to 80°C Proof pressure 2x full scale pressure Burst pressure 2.5x full scale pressure 1) Remove standard Pressure sensor from the top of your Pool Filter.





2) Insert the WPT202 Wireless Sensor.



Note: Confirm fitting is a ¼" NPT. Adapters available for purchase on <u>www.phoenixsensors.com</u>

3) Install Smartphone Application. Follow Software Instructions for set up.





Fig. 1 Example PentAir Filter





 $V_{+} = 5V, V_{-} = 0V, Temperature = 25^{\circ}C$

PARAMETER	SYMBOL	MIN	TYP	MAX	UNITS
Supply Voltage (note 1)	V _{DD}	2.3	3	5.5	V
Supply Current	I _{DD}	5	150	975	uA
Wireless Digital Output (BLE)	BLE				
Linearity (Note 2)		-0.25		0.25	%FS
Temperature Error (Null and Span) (Note 3)		-1		+1	%FS
Response Time	t _R		5	5	Sec
Total Error Band (Note 4)		5		.5	%FS
Compensated Temperature Range	С	0		50	С
Operating Temperature Range	С	-20		80	С

Notes:

1) 3V Coin Cell battery operation 2) Defined as best straight line 3) Measured from 0°C to 50°C 4) Measured over compensated temperature range -25-80C

Application Information

Package

The two piece body design is made of Aluminum, which allows for easy low-cost manufacturability and corrosion resistance. Vibration proof design for use in industrial applications. Plastic option is available for custom designs

Stability

The silicon MEMS pressure sensor element is mounted to a ceramic base and sealed into the Aluminum housing. The selection of themally capability materials reduce the mechanical stress on the sensor resulting in greater stability over time and temperature.

Additional stability is gained from factory stabilization of all sensors.

Pressure port

1/4" -18NPT and 1/8"-18NPT threads are standard SS fittings. Other port fittings such as 7/16-20UNF, and 1/4" BSP are available for OEM customers.

Media

The pressure port is tolerant to most media including but not limited to oil, air, gas, and non-corrosive media.

Wetted parts

When checking media capability, the wetted surface is composed of Aluminum and Silicon Gel.

Pressure ranges

Standard pressure ranges are 15, 30, 75, and 100 psi in absolute and gage. Custom pressure ranges are available for OEM customers.





Standard Part Numbers

Model	Pressure Range PSI	Туре	Max Over Pressure
WPTS2-0-50A1	50	Absolute	150
WPTS2-0-100A1	100	Absolute	200
WPTS2-0-300A1	300	Absolute	450

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