

# PT-SUB - LIQUID LEVEL TRANSMITTERS 4 TO 20 MA, LOOP POWERED TRANSMITTER





# PT-SUB - LIQUID LEVEL TRANSMITTERS

#### MAIN FEATURES

- 4:20 mA , Loop Powered pressure transmitter
- 1oK Ohm NTC Thermistor for Temperature measurement (optional)
- Hydrostatic Depth Measurement
- Sea Water, Oil and Chemical Resistant
- 2 points calibration
- Gauge Pressure
- 300% Overpressure safety limit
- Hygienic process connection
- 316 St. St. body with 316 St. St. Piezoresistive pressure sensor
- IP68 Certified .
- IEC60529 Certified.

#### **DESCRIPTION**

PT-SUB is an advanced pressure transmitter suitable for hydrostatic depth measurement which continuously outputs analogue (4...20mA) which can be used for Tank Gauging System.

PT-SUB is equipped with 10K Ohm NTC Thermistor for process Temperature measurement.

This transmitter offers a very high accuracy over a wide temperature range, an excellent repeatability and very long term stability.

The electronics are located within the ST. ST. hermetically sealed transmitter housing which gives the PT-SUB an excellent resistance to shock and vibration. The electronics is a state-of-the-art signal processing unit.

The mounting adaptability of the PT-SUB and its full St. St. body makes it ideally suited for use in tanks of all shapes and sizes onboard ships and in a wide range of industrial applications from water to stringent Chemical processes.

The pressure sensors is made with all 316L St. St. welded sealing with silicon oil filling St. St. diaphragm, with silicon piezoresistive chip. This gives an excellent chemical immunity for the sensor to be suitable for nearly all aggressive media.

Electronics provide offset and span correction when temperature changes. Aging detection is constantly performed. This new method guarantees good precision and long-term stability.

# ROCK

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#### TECHNICAL DATA

#### <u>Pressure range</u>

From 5 PSI up to 1500 PSI

#### **Overload Pressure**

200%F.S.

#### **Burst Pressure**

300%F.S

#### Pressure reference

Gauge pressure | Absolute pressure | Sealed gauge pressure

#### Output signal

- Signal span 4...20 mA, Loop powered
- 10Khom NTC. (optional)

#### **Output limits**

3.5...23 mA

#### **Input Power**

From 7.5 VDC up to 30VDC

#### **Characteristic**

Linear

#### **Accuracy**

< 0.25% f.s.

#### Response time

≤1ms(10% to 90%F.S.)

#### Isolation voltage

500 Vac

#### Operating temp.

-40-70 °C

#### Storage temp.

-40-70 °C

#### Insulation resistance

>200Mohm/250VDC



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#### **Vibration**

10g (20--5000HZ)

#### **Shock**

100g, 11ms

#### **Housing**

Stainless steel 316

#### Sensor type

Stainless steel 316L

#### **ELECTRICAL CONNECTIONS**

#### **Cable Connection**

RED – Input Power (7 – 30VDC)

GREEN – Ground , (4-20 mA output)

WHITE / BLACK – 10K NTC (optional)

#### **HOW TO ORDER**

#### PT-SUB-AA-BB-CC-DD-OPTIONS

AA – TYPE OF SENSOR CERAMIC ST. ST.

BB - Pressure Range, Please write directly

CC - Pressure Reference

A – ABSOLUTE

G-GAUGE

DD - TYPE OF OUTPUT

4 - 20 MA (TYPICAL)

0-5VDC

**OPTIONS** - PLEASE SPECIFY DIRECTLY.