MP SENSOR

P.Touch

Quickstart

MP-Sensor GmbH
Albstraße 13 D-73765
Neuhausen a.d.F. www.
mp-sensor.de

IO-Link

c UL US LISTED E511277 (2176 psi)

UK CA

This document is only valid in conjunction with the original operating instructions for the corresponding P.Touch. You can obtain the operating instructions at:

www.automationdirect.com.

Safety Notes

- Do not use the device in the area of personal and machine safety.
- The P.Touch is not a safety module according to the EU Machinery Directive.
- Connecting, mounting, and setting may only be performed by trained specialists.
- The maximum permitted overpressure must not be exceeded.
- Comply with the national safety and accident prevention regulations.
- Any intervention in or changes to the device are not permitted.
- Performing wiring tasks or connecting / disconnecting electrical circuits while the device is powered may cause malfunctions in your application, and should be avoided.
- Pressure sensors of the P.Touch series are intended for media of fluid group 2.

Maintenance

The P.Touch is maintenance-free. We recommend checking the screw connections and plug-in connections regularly.

Returns

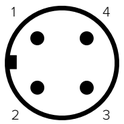
Clean removed devices before returning them in order to protect our employees and the environment from dangers posed by residue from measured media.

Disposal

Dispose of device components and packaging materials in accordance with the relevant national waste treatment and disposal regulations of the delivery area. The devices must be disposed of properly and do not belong in regular domestic waste.

Electrical connection

- Only operate the P.Touch via a supply with secure disconnection from the circuit (PELV according to DIN VDE 0100-410, IEC 60364-4-41, HD 60364.4.41, EN 60079-14).
- UL: Use with class 2 source only.
- Carefully mount the M12-plug connector, in order to ensure the enclosure rating IP65 / IP67 / IP68.
- Consider the pin assignment (see below).
- The pressure sensor has two signal outputs which can be wired according to the pin-assignment.



Contact	Identification	Wire Color	Description
1	Ub+	Brown	Power supply
2	OUT 2	White	Output 2 (configurable) digital: PNP / NPN / Push-Pull analog: V / mA, scalable
3	0V	Blue	Ground, reference ground for current output
4	OUT 1 / IO-Link	Black	Output 1 digital: PNP / NPN / Push-Pull or IO-Link communication

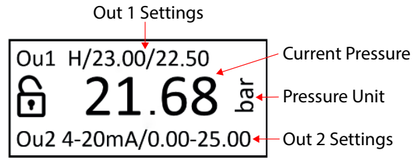
Installation conditions

When installing/uninstalling the sensor the system must be depressurized.

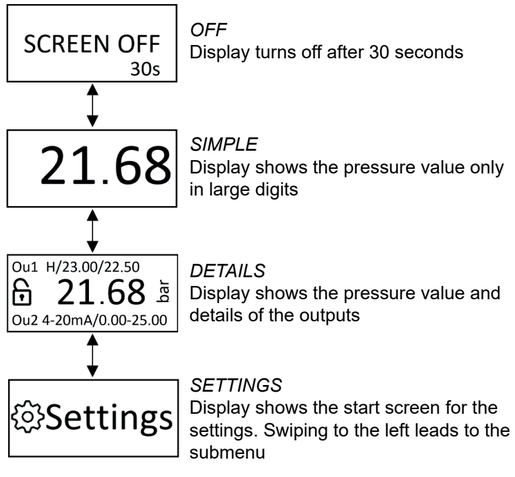
- The mounting location site shall be easily accessible and free of vibration.
- The sensors may be mounted in any orientation. The display can be rotated 180° within the menu.
- The ambient temperature shall not exceed the specified limits (“Technical Data”).
- Do not mount the devices at a location where high pressure peaks can occur. Pressure peaks can be additionally reduced with a snubber.
- The maximum tightening torque for mounting the sensor is 25 ft·lbs
- The housing can be rotated / aligned by 350° in mounted condition.

Start-Up

- After switching on the supply voltage, the device automatically starts operating.
- By default, the following home screen is displayed:

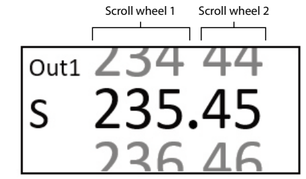


- The following 4 home screens can be set by swiping up or down (after unlocking):



Operation

- The P.Touch can be controlled solely using swipe gestures rather than the typical 3-button operation
- By swiping up / down or left / right, you can navigate through the menu and adjust parameters.
- No confirmation of adjusted parameters is required, swiping forward or backward automatically saves the changed settings.
- Various parameters such as the switching points or switching delays are adjusted by a virtual scroll wheel, which is implemented as follows:

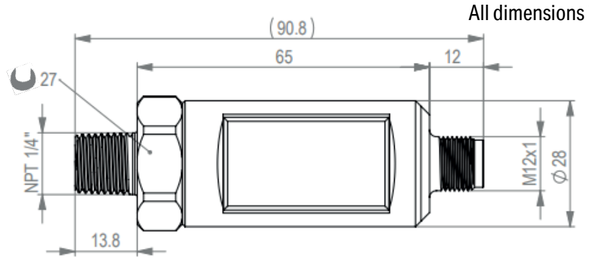


- A single swipe up / down changes the value by one digit or position.
- Swiping twice within a short time (approx. 0.5s) causes the scroll wheel to run. Each further swipe increases the speed of the wheel up until the maximum speed is reached.
- To stop the scroll wheel at the desired value, a simple tap is enough.
- Swiping left / right will save the changed value automatically.

Dimensional Drawings

NPT1/4" Male

All dimensions in mm



Technical Data

Measuring cell	Piezoresistive ceramic measuring cell (relative)
Measuring accuracy	±0.5% FSO (LP, at 73.4°F)
Operating voltage	9…30 VDC (13…30 VDC)
Output current	max. 200 mA per output
Operating temperature	-13°F…+176°F
Fluid temperature	-13°F…+212°F
Suitable fluids	Fluid group 2 media
Protection rating *	IP65 / IP67 / IP68
Wetted materials	1.4404; Al2O3 96%; FKM
Other housing materials	1.4301; glass (breakproof design); PE

*Protection rating is dependent on the protection rating of the M12 cable used