

SE 515 pH Sensor



pH Sensor for Simple Water Applications

The SE 515 Memosens pH sensor is ideal for use in water and wastewater treatment applications. The sensor is designed to withstand plugging media, low temperatures, and to maintain a reliable measurement in low-ionic media. An integrated NTC 30K temperature element assures that all pH measurements are accurately compensated for the temperature of the process media. The low price of this sensor, along

with the integration of Memosens technology, provide for a significant reduction in overall cost of ownership.

The SE 515 is suitable for use with any Memosens transmitter. However, when paired with the [MemoRail transmitter](#) it provides for one of the lowest priced digital pH measurement loops on the market.

QUICK SPECS

Range: 0 ... 14 pH

Temperature: 23 ... 176 °F (-5 ... 80 °C)

Pressure: 0 ... 58 psi (0 ... 4 bar)

Sensor Material: Sigma glass

Diaphragm/Junction: Ground sleeve

Electrolyte: Gel

Reference Electrode: Ag/Ag Cl

TYPICAL APPLICATIONS

- Raw water
- Chlorine pretreatment
- Coagulation optimization
- Flocculation
- Clarifier
- Effluent monitoring

SE 515 PH SENSOR ANATOMY

SENSOR HEAD

Memosens Digital Sensing Technology

Memosens sensors provide several benefits with regard to ease of use and reduction of operating costs:

- Submersible inductive connection removes measurement influence from moisture and humidity that are commonly present in water and wastewater applications.
- Galvanically isolated so there is no measurement influence from noise or ground loops. This is especially beneficial in open basins when using plastic holders.
- Calibration and diagnostics can be performed in the shop or lab. This reduces field maintenance time and process down time.

REFERENCE ELECTRODE

Ag/Ag Cl

SENSOR MATERIAL

Sigma glass

Sigma glass is a low-impedance, hydrogen sensitive glass designed for use in applications requiring fast response time in both low temperature and low ionic environments (> 50µS/cm).



ELECTROLYTE

Gel Electrolyte

Gel electrolyte does not require refilling, making this sensor a low cost and low maintenance option for the water and wastewater markets.

DIAPHRAGM/JUNCTION

Ground glass sleeve

Ground glass sleeve junctions provide a stable measurement in applications with suspended solids. The large surface area of the junction helps to prevent plugging caused by buildup on the sensor.