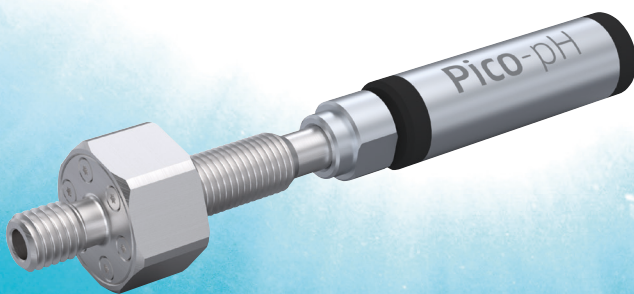


Underwater pH sensor solution (OEM)

PICO-pH-SUB



pH

Features

- OEM device for optical pH sensors
- Deep sea fiber-optic feed-through
- Compact dimensions
- Very low power consumption
- Precision temperature compensation
- UART interface
- pH sensors optimized for seawater

Potential Applications

- For custom integration in underwater equipment (e.g. in the lid of pressure cylinders)
- For underwater applications down to 4000 m (after custom pressure tests)
- Various sensor formats available for different applications

pH

Specifications Device

Max. hydrostatic pressure	400 bar
Material of fiber-optic feed-through	Titanium
Mounting Thread	7/16 x 20 UNF
Dimensions PICO-pH (WxDxH)	Ø17 mm, 59 mm in length
pH Sensor Connector	Proprietary PyroScience underwater connector
Compatible pH Sensors	pH Sensors with underwater connector (-SUB) (PyroScience)
Power Supply	Min. 3.3 V DC, max. 5.0 V DC (typ. 3-5mA)
Digital Interface	Serial interface (UART), ASCII communication protocol
Operating / Storage Temperature	0-50°C / -10-60°C
Max rel. Humidity	Non-condensing conditions

Variety of Underwater pH Sensors



pH Sensor Cap

with integrated optical pH sensor, Ø13mm, length 38.5mm



pH Robust Screw Cap Probe

screw cap probe with exchangeable sensor caps, cap adapter fiber with stainless steel tip



pH Sensor Spots

with contactless read-out through a transparent window (e.g. in incubation chambers)

Sensors for
pH total scale
available

Specifications pH Sensors

Specifications	PK7 Version	PK8(T) Version
Measuring Range	6.0 – 8.0	7.0 – 9.0
Precision	0.02	0.02
Resolution	0.003 at pH 7.0	0.003 at pH 8.0
Drift	<0.005/day at pH 7.0	<0.005/day at pH 8.0

for a 2-point calibrated sensor at 25°C