



S480 UV PAH DATASHEET

UV SENSOR



MAIN FEATURES

The S480 UV PAH is the new generation of sensors for the measurement of Polycyclic Aromatic Hydrocarbons and oil in water. The measuring principle of UV fluorescence used is much more sensitive than the conventionally used infrared scattering or absorption method. This allows even the smallest traces to be determined, for example in drinking water and cooling water condensates. Areas of application include the petrochemical industry, leak detection in cooling and wastewater flows, as well as environmental monitoring. An innovative window coating reduces the risk of fouling of the optical surface and minimizes maintenance.

- High sensitivity and selectivity
- Without sampling and preparation of test samples
- Real-time sensor
- Without reagents
- Optical window with nano coating

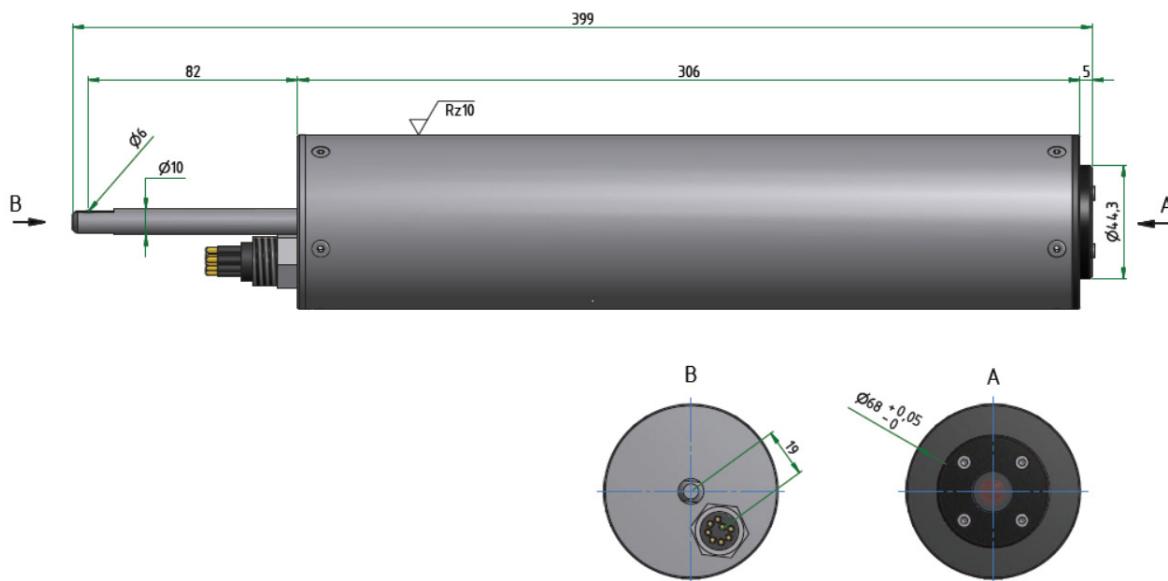
APPLICATIONS

- Wastewater
- Airports
- Cooling water
- Desalination plants
- Refineries
- Pipeline monitoring
- Bilge water monitoring

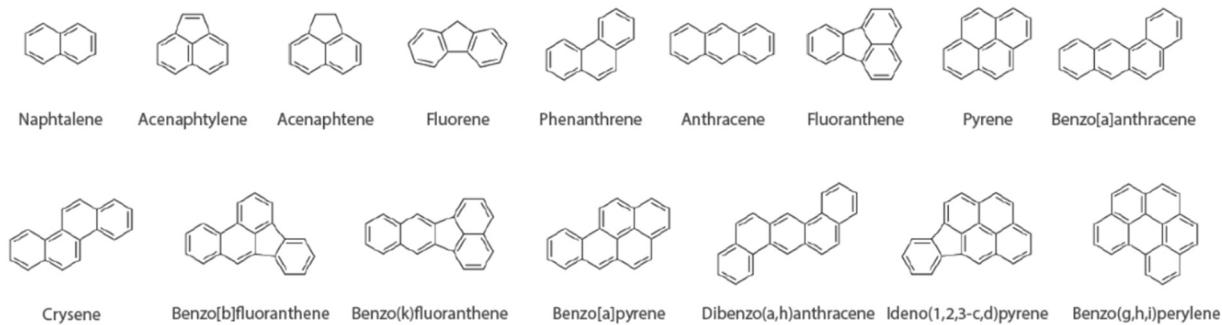
TECHNICAL DATA

Housing material	Stainless steel (1.4571/1.4404) or titanium (3.7035)
Measurement technology	Xenon flash lamp + filter (254 nm) Detector: Photo diode + filter (360 nm)
Measurement principle	Fluorescence
Parameters	PAH, oil
Measurement range	PAH: 0...50 ppb, 0...500 ppb / Oil: 0...1.5 ppm, 0...15 ppm typical PAH: 0...500 ppb, 0...5000 ppb / Oil: 0...15 ppm, 0...150 ppm typical
Detection limit	0.3 ppb/ 0.5 ppb
Accuracy	± 5 % FS
Turbidity compensation	no
Reaction time T100	≤ 10 s
Power consumption	≤ 3.5 W
Power supply	12...24 VDC (± 10 %)
Interface	4...20mA / RS 485
Required supervision	≤ 0.5 h/month (typical)
Calibration/maintenance interval	24 months
Pressure/flow	3 Bar max – In flow cell 1 bar, 2...4 L/min
Protection type	IP68
Sample temperature	+2...+40 °C
Ambient temperature	-5...+55 °C
Storage temperature	-20...+80 °C
Inflow velocity	0,1...10 m/s
Max. immersion depth	300 m with SubConn-8pin underwater plug 30 m with fixed cable

DIMENSIONS



PAH, OIL IN WATERS



ORDER CODES

9700950057	S480UV/PAH-500 PAH and Oil in Water Sensor 10m cable
9700951057	S480UV/PAH-500 PAH and Oil in Water Sensor w/o cable
9700952057	S480UV/PAH-5000 PAH and Oil in Water Sensor 10m cable