



SENSORS &
CONTROLLERS



ANALYZERS
& SAMPLERS



LEVEL, FLOW
& PRESSURE



WEB APP &
DATA LOGGING



ACCESSORIES

S480 UV/SAC 254 DATASHEET

UV SENSOR



MAIN FEATURES

Long-lasting UV-LED technology and a robust design are the outstanding features of S480 UV SAC 254. S480 UV SAC 254 uses the unique nanocoated windows combined with compressed air flushing to achieve long operating times without cleaning. The optical path length can be adapted to the application at any time by various adapters. An automatic turbidity compensation is carried out via a second measuring channel. Through application-specific correlation S480 UV SAC 254 can be configured for direct output of BODeq, CODEq, TOCeq and UVT.

- Without sampling and preparation of test samples
- Real-time sensor
- Without reagents
- Optical window with nano coating
- LED technology

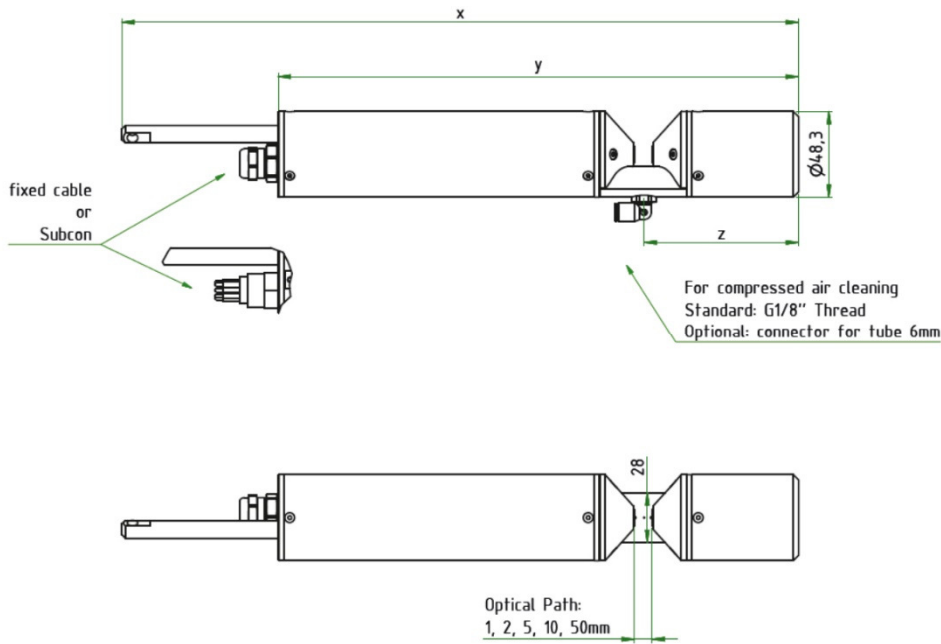
APPLICATIONS

- Sewage treatment plants
- Environmental monitoring
- Drinking water
- Monitoring of UV-disinfection systems

TECHNICAL DATA

Housing material	Stainless steel (1.4571/1.4404) or titanium (3.7035)
Measurement technology	Light source: 2 LED (254 nm, 530 nm) Detector: Photodiode
Measurement principle	Attenuation, transmission
Optical path	mm 0,3/1/2/5/10/50
Parameters	SAC254, CODeq, BODeq, TOCeq,
Measurement range	See table I
Repeatability	0.2%
Turbidity compensation	At 530nm
Reaction time T100	4 s
Power consumption	≤ 1 W
Power supply	12...24 VDC (± 10 %)
Interface	RS-485 (Modbus RTU)
Required supervision	≤ 0.5 h/month (typical)
Pressure/flow	3 Bar max – In flow cell 1 bar, 2...4 L/min
Protection type	IP68
Sample temperature	+2...+40 °C
Ambient temperature	+2...+40 °C
Storage temperature	-20...+80 °C
Inflow velocity	0,1...10 m/s

DIMENSIONS



product table			
name	x [mm]	y [mm]	z [mm]
S480 UV 10	381	293	87
S480 UV 50	421	333	107

MEASUREMENT RANGES

Parameter	Unit	Measurement range				
		1 mm	2 mm	5 mm	10 mm	50 mm
SAC 254	1/m	5...1500	2.5...750	1...300	0.5...150	0.1...30
CODeq**	mg/L	8...2200	4...1100	1.5...440	0.8...220	0.15...45
BODeq**	mg/L	2.5...700	1.25...350	0.5...140	0.25...70	0.05...15
TOCeq**	mg/L	3...880	1.5...440	0.6...175	0.3...90	0.06...20
Turb 530nm	FAU***	20...4000	10...1400	4...420	2...200	0.4...40
abs 254	1/m	5...1500	2.5...750	1...300	0.5...150	0.1...30
abs 530	1/m	5...500	2.5...250	1...100	0.5...50	0.1...10
Trans254	%	3...98.8	3...98.8	3...98.8	3...98.8	3...98.8
Trans530	%	3...98.8	3...98.8	3...98.8	3...98.8	3...98.8

ORDER CODES

9710950057	S480/UV/SAC254/P.O.1mm COD/BOD/TOCeq. sensor 10m cable
9710951057	S480/UV/SAC254/P.O.2mm COD/BOD/TOCeq. sensor 10m cable
9710952057	S480/UV/SAC254/P.O.5mm COD/BOD/TOCeq. sensor 10m cable
9710953057	S480/UV/SAC254/P.O.10mm COD/BOD/TOCeq. sensor 10m cable
9710954057	S480/UV/SAC254/P.O.50mm COD/BOD/TOCeq. sensor 10m cable