InStore

OXY-MWQM6900 and COD254x Series
COD, BOD, TOC, TSS, PH
ANALYZER SYSTEM for
Real time Monitoring

Measurement made easy more processing power, lower energy costs by Latest Uv254 Optical Sensors technology.

Cost effective

Reduced installation cost

• easy access terminations; reduced panel space

High functionality at minimum cost

• alarms and isolated current outputs

• 4-20Ma Output & RS485 communication Protocol (Optional)

• Digital Sensor, RS485 interface ,Modbus/RTU Protocol

On line assurance of reliability

• comprehensive sensor and instrument self-checking

High measurement accuracy

• Automatic temperature Compensation included

Energy saving

• high visibility, backlit display with auto switch-off function

• Monitoring system consist of HD Color touch screen

• Strong Practicability for expansions

COD Uv254 & 365 series

The OXY–COD254, 365,500 & 01 Series Sensors incorporate the latest optical technology providing highly reliable, flexible, feature-packeddevices that satisfy a diverse range of process monitoring and control applications in Water treatment Industry

The instrument used Uv254nm deep ultraviolet LED, which is small in size and long in life. The 254 nm deep ultraviolet beam is absorbed by the organic matter dissolved in the water during the transmission process, and the degree of absorptions is proportional to the concentration of organic matter, so that the content of organic pollutants in the sample can be evaluated by measuring the absorbance of the deep ultraviolet beam

The Built-in 365nm Wavelength light source is used for turbidity compensation, effectively eliminating turbidity interference

Features

- Optical measurement, no reagents, no pollution.
- Built in 254nm and 365nm dual optical paths, automatically compensate for turbidity interference
- Comes with wiper, with automatic cleaning function to prevent biological attachment
- Imported LED Light source, with small drift, fast response and, more accurate measurement.
- The size is small, the installation is more convenient, and the water quality can be monitored online without interruption.
- Digital sensors, RS485 interface Modbus/RTU protocol.

Figure 1- COD500, 01 –OXY UV254 Series Sensors

Figure 1- OXY COD254 Series Sensors

Scope/Applications

- Urban waste water treatment :detecting organic load variations in input & output process of treatment plants
- Treatment of Industrial effluents
- Surface water monitoring
- Fish farm , Aquaculture, freshwater
- Drinking water: Monitor organic matter in raw water, oxidation process, activated carbon filtration, coagulation

Significantly reduced maintenance costs

- The OXY–COD254Uv Series sensors does not need any Reagents & consumables
- Multi-parameter measurement : COD,BOD,TOC,Turbidity
- Alarm status is displayed ON the screen and can be accompanied by ON/OFF signaloutput
- Modbus RS485 digital communications
- Automatic turbidity Compensation

Measurement Principle

The sensor uses UV absorption at 254 nm to measure organic compounds dissolved in water .This absorbance is correlated with the concentration of TOC, COD and BOD to provide a high performance probe requiring no consumables.

A reference measurement at 365 nm is used to compensate for the presence pf partides in the sample that also absorbs UV light and to establish Turbidity parameter. The use of high Performance UV LED combined with rigorous ignition management, offers an optimal variance of the signal

Digital Communication

Easy access to any recorder, transmitter, remote management system or PLC using a Modbus RS485 input.

Interference-proofing: pre-amplification built into the sensor and digital signal processing. All calibration, history, user and measurement data are processed directly in the Sensor and transmitted by a Modbus RS-485 protocol.

Technical Specifications:

UV 254nm MODEL: OXY254	COD Range	0-600 mg/L equiv.KHP
	COD Accuracy	+/-5% F.S
	COD Resolution	0.1 mg/L
	TOC Range	0-240 mg/L equiv.KHP
	TOC Accuracy	+/-5% F.S
	TOC Resolution	0.1 mg/L
	Turbidity Range	0-300 NTU
	Turbidity Accuracy	+/-5% F.S
	Turbidity Resolution	0.1 NTU
	Operating	5-40°C
	Deepest Depth	10 meters underwater
	Digital Interface	MODBUS/RS485
	Analog Interface	4-20mA
	Powered By	12-24VDC
	Calibration	One or two point calibration
	Protection Level	IP68
	Installation method	Flow cell / Immersion installation
	Size	Dia 34*232mm
	Cable length	5 Meters (default)
	Material	316 SS

	Measuring Range	Application Field
UV 254nm MODEL :OXY500 (6mm Gap)	COD : 0- 500 mg/L	Tap Water
	TSS : 0- 600 mg/L	
	BOD : 0- 300 mg/L	
	COD : 0- 2000 mg/L	Sewage treatment plant Natural water ETP
	TSS : 0- 1000 mg/L	
	BOD : 0- 1000 mg/L	
UV 254nm MODEL :OXY501 (1mm Gap)	COD : 6000- 10000 mg/L	Industrial Process control
	TSS : 0- 5000 mg/L	
	BOD : 0- 5000 mg/L	
	Power Supply	12VDC+/-5%
	Principle	UV 254
	Output signal	RS485/Modbus
	Accuracy	0.01mg/L
	Calibration	1 or 2 point calibration
	Housing material	SS316
	Self –Cleaning brush	Have/ No (When the COD range is >2000mg/L, no brush)

Digital Controller MWQM-6900 Series

The Online multi parameter digital intelligent Controller, which can select matching sensors to detect the various parameters according to different customers need, such as detection of dissolved Oxygen, pH, Conductivity, Suspended Solids, COD, turbidity and other parameters, it is widely used in agriculture, aquaculture & industrial waste water and environmental protection and other fields with different needs.

Features

- HD Color Touch screen
- Strong Practicability for expansions
- Multiple output modes
- IP65 Waterproof
- High & Low alarm
- English , German interface
- Remote Communications
- History record & Customized service

Applications

- Urban waste water treatment
- Industrial effluent treatment
- Surface water monitoring
- Sea water
- Drinking water

Measured Parameters

- pH, ORP, Temperature
- Redox , Dissolved Oxygen
- Conductivity, Salinity, Cl2
- TDS, TSS, Turbidity
- COD,BOD, TOC
    :

Technical Specifications:

SPECIFICATIONS	
Working Voltage	AC 90-220V , 50-60HZ
Maximum Power consumption	36W
IP grade	IP65/67 (Optional)
Connection Interface	12V output, RS485 communication
Data Output	RS 485 (Standard),Wireless transmission (standard),4-20Ma (optional),Relay output (optional)
Installation method	Wall mounted
Display	7" color touch screen
Password protection	Yes
Instrument working environment	Environment temperature :-10~60ºC
Size	266*173*75 mm
Weight	1.50 kg

Capability's & Characterisitics

➢ Digital intelligent sensor can be arbitrarily combined, plug and play, and the controller can be recognized automatically
➢ It can be customized for single-parameter, double-parameter and multi-parameter controllers, which can save costs better;
➢ Automatically read the internal calibration record of the sensor, and replace the sensor without calibration, thus saving more time;
➢ New circuit design and construction concept, low failure rate, strong anti-interference ability;
➢ Basic IP65 protection level, applicable to indoor and outdoor installation requirements
➢ Approvals :CE, ISO,FCC, RoHs Certifications

Ordering information – analyzers

Standard configuration For   OXY-
☐ MWQM6900Meter ×1

☐ Electrodes (Optional): TSS, DO, COD, TOC, Turbidity, PH, ORP, Conductivity, RCL etc...

☐ Locking bars ×2

☐ User manual ×1

Standard Installation method Procedures

1. Drop in installation

2. Need Accessories :Electrode mounting bracket

3. PVC material : STD 1 Meter; G3/4 & 1 " available

4. Electrode mounting bracket : PP material : STD 1 meter, matching PG13.5 Shape electrode

5: Stainless steel Bracket: Optional

Languages
Languages configurable
• English
• German
• Spanish
• Chinese

InStore=Dessernkern
Schäfers Gärten 14,
Sitz der Gesellschaft
Frankfurt Am Main, 60431
Fon: +49 8105 388 662
Germany