Water Quality Online Analysis Instruments

CIT-8800 Inductive Conductivity/
Concentration Online Controller

pH/ORP-8500A pH/ORP Meter

CCT-8301A Conductivity/
Resistivity /TDS Online Controller

pH/ORP-5500 pH/ORP Meter
pH/ORP-5520 pH/ORP Meter

FCT-8350 Flow Meter

CCT-5300 series Conductivity/
Resistivity /TDS Online Controller

CCT-3300 series Conductivity/
Resistivity/TDS Online Controller

ROC-2015
Single Stage RO Controller

pH/ORP-3500 pH/ORP Meter
pH/ORP-3520 pH/ORP Meter

Miniature Conductivity Sensor

pH Sensor

Conductivity Sensor

Sanitary grade
conductivity sersor

Free Chlorine Sensor

CREATEC

PRODUCT CATALOG

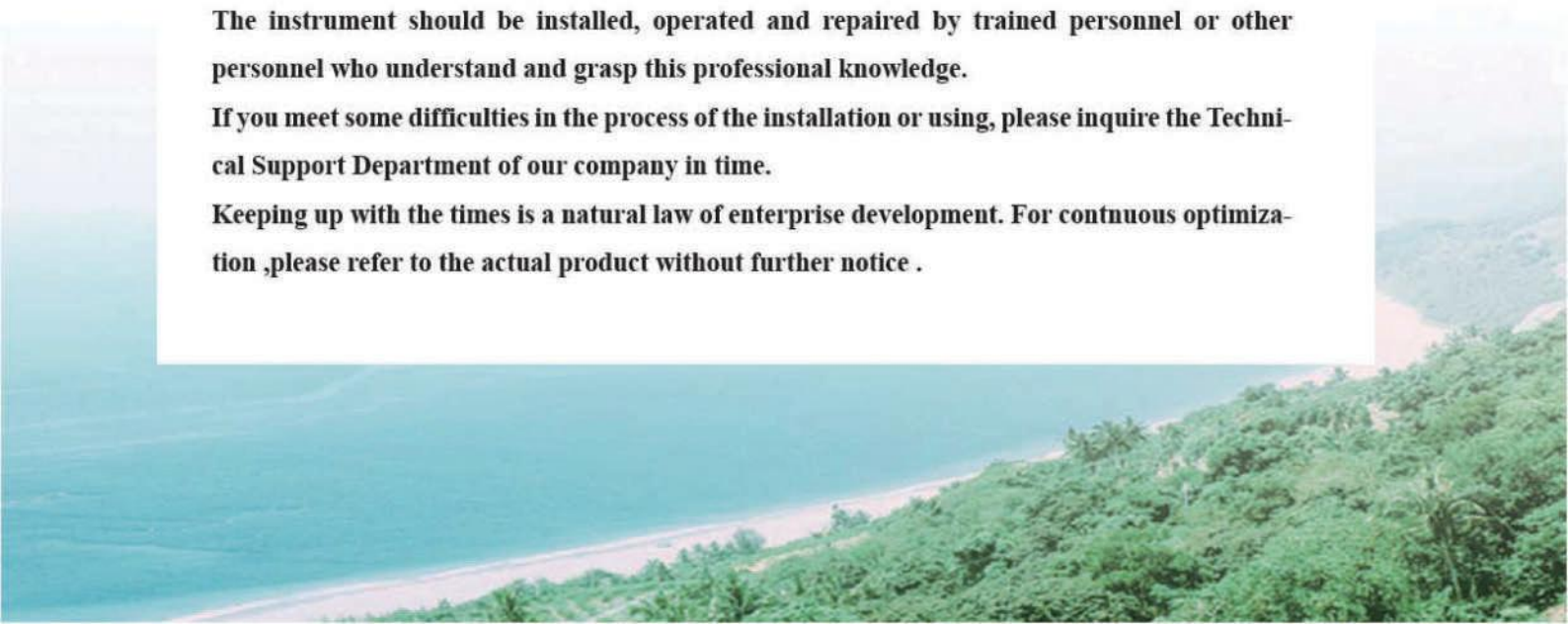
PRODUCT CATALOG

Please read introduction carefully before installation, correct sensor installation and parameter setting will maximize the performance and advantage of the product, bringing you a good using experience.

The instrument should be installed, operated and repaired by trained personnel or other personnel who understand and grasp this professional knowledge.

If you meet some difficulties in the process of the installation or using, please inquire the Technical Support Department of our company in time.

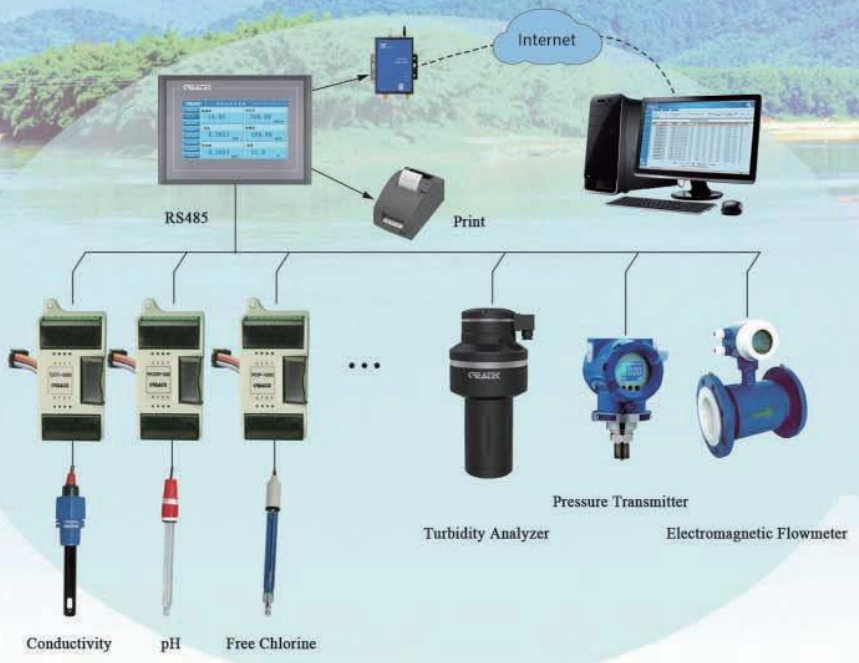
Keeping up with the times is a natural law of enterprise development. For contnuous optimization ,please refer to the actual product without further notice .



MWA-1400 Multi-parameter Online Analysis System Integration

■ Characteristics:

- The sampling water will be lead into the cycling system for multi-parameters measurement, which could avoid cumulative water consumption caused by multi-point monitoring network system and save water;
- 7" color touchscreen with 4-12 channels measurement parameters displayed at the same time;
- Build-in module instead of meters which makes system clean;stable running, low maintenance;
- Water quality parameters and external Physical quantities integration, with data logger function;
- Bus data acquisition (with high speed and high fidelity feature)for data transmission;
- Data module calibration software makes visible calibration;
- Mass data storage space for historical data record and curve playback of measurement parameters, U disk data transmission function;
- Master-slave communication port; mast port for receiving and handling of analyzer; slave port for remote communication, can connect GPRS/WIFI/Zigebe,also connect internet for real time remote monitoring and trouble shooting;
- With the function of sensor automatic maintenance ,ensure the long life of the sensor.



■ Main technical features:

Model	MWA-1400 Multi-parameter Online Analysis System Integration			
Configuration	Turbidity/Free Chlorine/pH/Temp.....			
Measurement Parameters	Free Chlorine/CLO_2	Turbidity	pH	Temp.
Measurement range	(0.01~2.00)mg/L	(0~100)NTU	2.00~12.00	(0.0~99.9)℃
Resolution	0.01mg/L	<10NTU, 0.0001NTU;	0.01	0.1℃
Accuracy	90% confidence intervals ≤±10%FS	<40NTU, ±2.5%FS;	0.1pH	±0.5℃
Communication	RS485	MODBUS RTU protocol		
Power supply	AC 220V±10%; 50/60Hz			
Working Environment	Temp: (0~50)℃; relative humidity: ≤85%RH (none condensation)			
Storage Environment	Temp: (0~60)℃; relative humidity: ≤85%RH (none condensation)			
Cabinet Size	1500mm×550mm×400mm (H×W×D)			

SDI-6000 series Automatic Water Pollution Index Analyzer

■ Application:

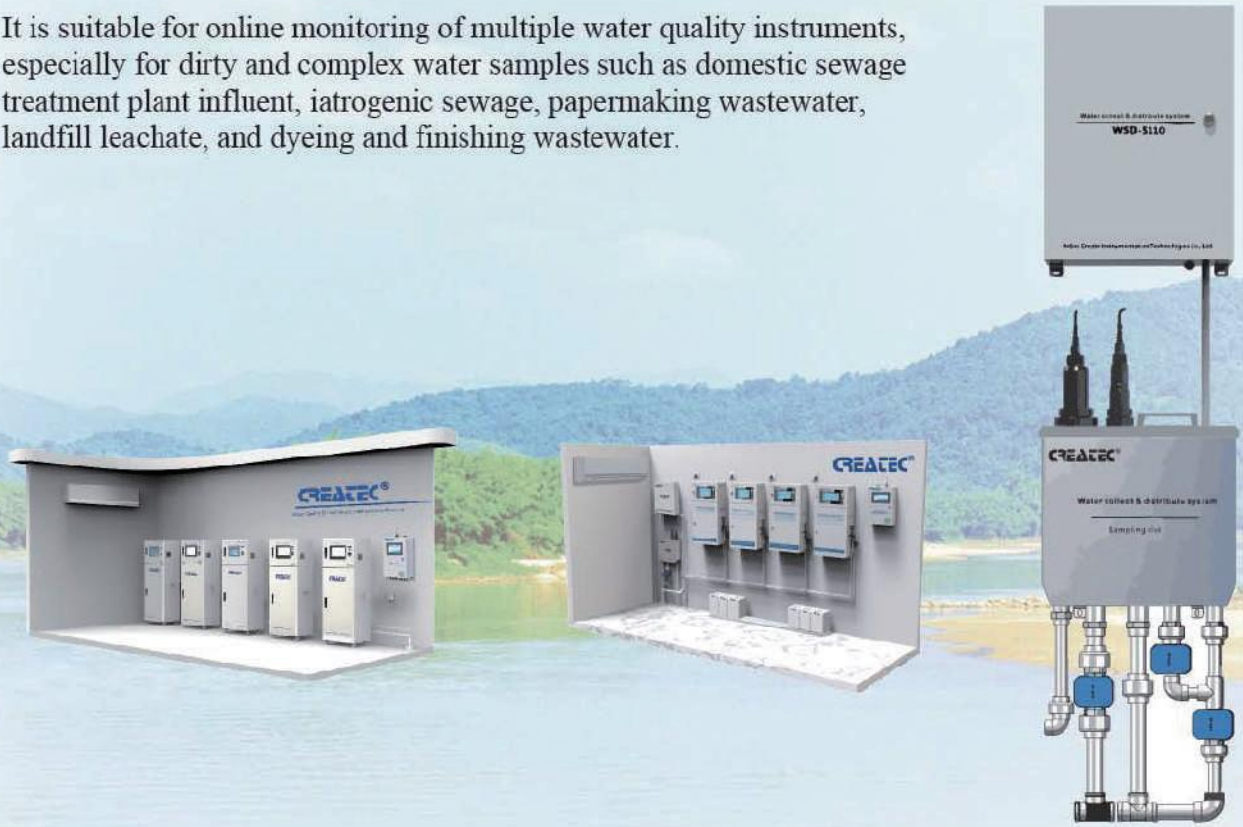
The SDI analyzer is a measurement and evaluation method to detect the fouling degree of the membrane by the tiny particles in the water sample, as a criterion to confirm whether the water quality is suitable for entering the RO system. The analyzer is based on the ASTM D4189-07 standard test method. The SDI system has Miniaturization, simple structure, separate water and electricity design, easy maintenance, long maintenance intervals, accurate test data, good stability, and meet the requirements of long-term automatic online monitoring.

■ Main technical features:

Parameter Type	Parameter Value
Executive standard	ASTM D4189-07
Measuring range	0.2-6.67（SDI15min）
Power supply	220VAC±10%，50-60Hz
Power consumption	≤100W
Signal output	RS485/Dry contact (alarm)
Millipore filter	Φ25mm
Water sample container	150mL
Pre-membrane pressure	2.07bar（0.207MPa）
Water sample condition	0.3-0.6MPa，＞1L/min
Input air pressure	≥0.5MPa
Measurement times	≥150 times/roll
Working temperature	5-45□
Working humidity	＜85%RH（no condensation）
Instrument size	800mm*400mm*200mm
Inlet	Water inlet 6mm pipe,
Outlet	Outlet 6/8mm pipe
Air intake	Intake 8mm pipe,
Membrane specification	Width 35mm, length 6m, filter aperture 0.45um

WSD-5000 series Water Collection & Distribution& Analysis System

It is suitable for online monitoring of multiple water quality instruments, especially for dirty and complex water samples such as domestic sewage treatment plant influent, iatrogenic sewage, papermaking wastewater, landfill leachate, and dyeing and finishing wastewater.



Performance characteristics:

♦. Buffer the water body to be tested, block obstructions, and have data acquisition functions such as TSS, conductivity, temperature, dissolved oxygen, pH, etc.;
♦.Suspended particle blocking, water sample distribution, automatic air elution, automatic operation with reduced maintenance;
♦.Intelligent automatic maintenance control module, which can be automatically triggered according to the measurement cycle when it is interlocked with the analytical instrument;
♦.Stainless steel liquid sampling end body, no dissolution, easy maintenance, repeated use, covering a variety of water samples;
♦. The automatic backwash function can effectively prevent the enrichment of water sample components, so that the measured water sample has no hysteresis effect;
♦. The equipment is compact, easy to install and construct, and has strong material resistance, so there is no need for frequent maintenance.

TPA-6330 Total Phosphorus Automatic Online Analyzer

■ Application:

This method is suitable for testing wastewater with total phosphorus range (0-50) mg/L, and can be customized according to the actual requirements of users. The total phosphorus online analyzer is mainly used for real-time monitoring of the total phosphorus concentration of municipal sewage, waste (dirty) water and surface water discharged by enterprises.

According to the complex and changing working conditions of the site, it is recommended to select a water sample collection/distribution system containing suspended matter to meet the needs of different industries and different users. This method is mainly used for on-line automatic monitoring of total phosphorus concentration of waste (sewage) water discharge point source and surface water.

■ Main technical features:

Measurement range	(0～50)mg/L（total phosphorus concentration）
Accuracy	total phosphorus concentration≤0.5mg/L:±0.05mg/L total phosphorus concentration ＞0.5mg/L:±10%
Repeatability	≤5.0%
Measurement period	Minimum period:50 minutes / time,According to water sample,The digestion time can be modified arbitrarily within (10-45) minutes.
Sampling interval	1.hourly mode; 2.circle mode:(1~999min)can be set
Calibration period	20~720 hours can be adjustable
Maintainance Period	Every month, each time 30 min(refer maintenance part)
Signal Output	RS232＆RS485＆4~20mA
Environment requirements	Suggested under room temperature:(5~40)□ Relative humidity:≤85%
Power supply	AC（100～240）V ,50/60Hz
Power	120W
Inlet flow rate	(400-700)ml/min（MAX 1000ml/min）
Maximum inlet pressure	0.3MPa
Protection level	IP20
Instrument size	H*W*D:（800*400*200）mm

TNA-6330 Total Nitrogen Automatic Online Analyzer

Application:

This method is suitable for testing wastewater with total nitrogen in the range of (0-100) mg/L, and can be customized according to the actual requirements of users. The total nitrogen online automatic analyzer is mainly used for real-time monitoring of municipal sewage, waste (pollution) water, surface water and other total nitrogen concentration online automatic monitoring.

According to the complex and ever-changing working conditions on site, it is recommended to select a water sample collection/distribution system for water samples containing suspended solids to meet the needs of different industries and users.This method is mainly used for online automatic monitoring of chemical oxygen demand concentrations in point sources of wastewater discharge and surface water.

Main technical features:

Measurement range	(0～100)mg/L（total nitrogen concentration）
Accuracy	total nitrogen concentration≤2.0mg/L,less than ±0.2mg/L
	total nitrogen concentration＞2.0mg/L,less than ±10%
Repeatability	≤5.0%
Measurement period	Minimum period:50 minutes / time,According to water sample,The digestion time can be modified arbitrarily within (10-45) minutes.
Sampling interval	1.hourly mode; 2.circle mode:(1~999min)can be set
Calibration period	20~720 hours can be adjustable
Maintenance Period	Every month, each time 30 min(refer maintenance part)
Signal Output	RS232＆RS485＆4~20mA
Environment requirements	Suggested under room temperature:(5~40)□ Relative humidity:≤85%
Power supply	AC（100～240）V ,50/60Hz
Power	120W
Inlet flow rate	(400-700)ml/min（MAX 1000ml/min）
Maximum inlet pressure	0.3MPa
Protection level	IP20
Instrument size	H*W*D:（800*400*200）mm

COD_{Cr}-6330 Chemical Oxygen Demand Automatic Online Analyzer

■ Application:

This method is suitable for testing wastewater with chemical oxygen demand in the range of (0-2000) mg/L. It can be customized according to the actual requirements of users. The online automatic analyzer for chemical oxygen demand is mainly used for real-time monitoring of CODCr concentration in municipal domestic sewage, enterprise discharge wastewater, surface water, etc.

According to the complex and ever-changing working conditions on site, it is recommended to select a water sample collection/distribution system for water samples containing suspended solids to meet the needs of different industries and users.This method is mainly used for online automatic monitoring of chemical oxygen demand concentrations in point sources of wastewater discharge and surface water.

■ Main technical features:

Measurement range	(0~2000)mg/L (CODCr concentration)
Accuracy	CODCr concentration≤40mg/L:≤±10%
	40mg/L<CODCr concentration≤100mg/L:≤±8%
	100mg/L<CODCr concentration≤160mg/L:≤±5%
	CODCr concentration>160mg/L:≤±3%
Measurement Low Limit	≤15mg/L(Indication error±30%)
Repeatability	≤5.0%
Measurement period	Minimum period:50 minutes / time,According to water sample,The digestion time can be modified arbitrarily within (10-45) minutes.
Sampling interval	1.hourly mode;
	2.circle mode:(1~999min)can be set
Calibration period	20~720 hours can be adjustable
Maintenance Period	Every month, each time 30 min(refer maintenance part)
Signal Output	RS232 & RS485 & 4~20mA
Environment requirements	Suggested under room temperature:(5~40)□
	Relative humidity≤85%
Power supply	AC（100～240）V ,50/60Hz
Power	120W
Inlet flow rate	(400-700)ml/min（MAX 1000ml/min）
Maximum inlet pressure	0.3MPa
Protection level	IP20
Instrument size	H*W*D:（800*400*200） mm

NH3-N-6330 Ammonia Nitrogen Online Automatic Analyzer

Application:

This method is suitable for testing wastewater with ammonia nitrogen in the range of (0-150) mg/L. It can be customized according to the actual requirements of users.The ammonia nitrogen online automatic analyzer is mainly used for real-time monitoring of ammonia nitrogen concentration in municipal domestic sewage, enterprise discharge wastewater, surface water, etc.

According to the complex and ever-changing working conditions on site, it is recommended to select a water sample collection/distribution system for water samples containing suspended solids to meet the needs of different industries and users.This method is mainly used for online automatic monitoring of ammonia nitrogen concentration in point sources of wastewater discharge and surface water.

Main technical features:

Measurement range	(0～150)mg/L
Indication error	Ammonia nitrogen concentration≤2mg/L:±8% 2mg/L< ammonia nitrogen concentration≤5mg/L:± 5% Ammonia nitrogen concentration>5mg/L:±3%
Measurement Low Limit	≤0.15mg/L (indication error ± 30%)
Repeatability	Ammonia nitrogen concentration≤10mg/L,≤2.0% Ammonia nitrogen concentration>10mg/L,≤5.0%
Measurement period	Minimum measurement cycle: 30 minutes/time.,According to water sample, the digestion time can be arbitrarily modified within (10-45) minutes.
Sampling interval	1.hourly mode; 2.circle mode:(1~999min)can be set
Calibration period	20~720 hours can be adjustable
Maintenance Period	Every month, each time 30 min(refer maintenance part)
Signal Output	RS232＆RS485＆4~20mA
Environment requirements	Suggested under room temperature:(5~40)□ Relative humidity:≤85%
Power supply	AC（100～240）V,50/60Hz
Power	120W
Inlet flow rate	(400-700)ml/min（MAX1000ml/min）
Maximum inlet pressure	0.3MPa
Protection level	IP20
Instrument size	H*W*D:（800*400*200） mm

MCC - 2321 Multi-Channel Controller

■ Application:

Widely used for waste water treatment ,environmental water quality monitoring,industrial field control,chemical process,easy for data collecting and controlling,transmitting and remote data transmission .

■ Characteristics:

- The display interface can freely configure the display window with 4/6/9/12 parameters;
- Physical port configuration for two Modbus RTU communication protocols of the master/slave (downlink/uplink) type;
- The mixture of downlink RS485 bus and 4 ~ 20mA receiving port can accept (1 ~ 12) measurement transmitter with arbitrary measurement attributes;
- Uplink serial port can connect any PLC, computer, and configure WIFI\Zigbee\3G\GPRS wireless remote module;
- A variety of engineering measurement units are stored in the controller to meet the calculation and configuration of engineering quantity of various attribute transmitters;
- 4 channels transformer output, can choose any one of the attributes of information (4 ~ 20) mA transformer output;
- 4 channels control relay can be configured with any parameter channel overlimit alarm control and DI correlation (three way mechanical contact, one way electronic contact);
- Fully sealed, wall-mounted shell, in line with IP65 protection level of on-site protection capability.

MFC-1200/MFC-1380 General Online Single / Multi-Channels Controller

■ Application:

Widely used for sewage water treatment, environmental water quality monitoring, industrial site control, chemical process and so on.

■ Technical Features:

- Display one parameter(MFC-1300)or 1-4 channels parameter (MCC-1300) ;
- Master-slave dual serial port, Modbus RTU communication procotol ;
- Downward RS548 bus and 4 -20 mA receiving port can accept one (MFC-1300) or less than four (MCC-1300) arbitrary measurement transmitter ;
- Uplink serial port can connect any PLC, computer, and configuration of WIFI, Zigbee, 3 g, GPRS wireless remote module ;
- Store a variety of measurement unit, can be selected from the screen ;
- Two channels transmitting output, each channel support 4-20mA output, metering mode and transmitting model for selection ;
- Three channels control output which could make each parameter over limit alarm control and DI relation (one channel mechanical contact, two channels electronic contact) ;
- Panel mounted shell with full-sealed, IP65 protection level ;

■ Main technical features:

Communication	Master RS485 interface connect with DCS or server; Slave RS48 interface connect with kinds of digital sensors/transmitter	
4 ~ 20mA receiving	Connect with two channels 4-20mA transmitter	
4 ~ 20mA output	Output two channels 4-20mA signals	
DI input (dry contact)	Two channels DI input, Pull on the potential, photo-electric isolating, receiving level, pressure, Temp, leakage signals	
Control output	Mechanical contact	SPST* One channel , AC 220V @3A (MAX)
	Electronic contact	Semiconductor photoelectric switch* two channels , load capacity : 50mA (max) AD/DC 30V
Power supply	DC24V±4V	
Working environment	Temp (0 ~ 50) ℃ ; relative humidity≤85%RH (none condensation)	
Storage environment	Temp (-10 ~ 60) ℃; relative humidity≤85%RH (none condensation)	
Protection level	IP65	
Dimension	144mm×144mm×142mm(L×W×H)	
Installation Method	Panel mounted	

■ Order Direction:

Sensor description	Model	Quantity	Unit
Digital inductive conductivity/concentration sensor	CID-3041	1	PC
Digital conductivity/TDS/Temp sensor	CRD-2000/6000	1	PC
Digital pH/ORP sensor	pHD/ORPD-6110	1	PC
Digital Optical dissolved oxygen sensor	DOF-6310	1	PC
Digital flow sensor	FLP-1600-LD	1	PC
Digital high range turbidity/TSS sensor	TUR/TSS-6000	1	PC
Digital low range turbidity sensor	TUR-6100	1	PC

MFC-8800 IoT Instrument

■ Working Principle:

With the rapid development of industrial Internet of Things technology, the existence of data acquisition terminal mode of IOT instrument has become a reality, it supports RS485 output or two-wire system (4-20) mA transmission, supporting 1-4 channels of data acquisition, and internal storage of the vast majority of engineering units. It has many functions such as digital output, PID output, proportional pulse and frequency output.

■ Application:

For complex industrial processes, sewage treatment, water reuse, environmental monitoring, industrial field control, chemical process, thermal detection and discrete control, data transmission control and remote data transmission.

■ Characteristics:

- Board - card module design, easy to select onboard acquisition parameters.
- 1-4 channels of arbitrary attribute data acquisition;
- 4 input parameters can be arbitrarily selected RS485/4-20mA;
- Internal integrated WiFi, download the APP and view the data on the phone and set the function.
- RS485 to Lora and RS485 to ZigBee modules are used to construct wireless data transmission of the Internet of Things;
- Uplink industrial RS485 interface can connect DTU to cloud data collection, view, monitoring and saving;
- Internal storage of multiple units of engineering volume;
- Two-way 4-20mA two-wire input;
- One of the quantities can be converted to standard 4-20mA output;
- The 3-way relay can be configured with any channel overrun alarm or DI associated output;
- 1 channel high speed photoelectric switch port, programmable logic/pulse/frequency operation mode.

■ Main technical features:

Communication port	The uplink slave channel Modbus RTU protocol RS485 port is connected with DTU and DCS Downlink master channel RS485 port of Modbus RTU protocol is connected with data acquisition terminal	
4~20mA output	1 channel two-wire type Maximum loop resistance 400Ω	
4~20mA Input	2 channel channel two-wire type（initiative feed）	
DI Input	2channels Photoelectric isolation logic switch	
DO Output	3 channels relay (only for drive signal)	1 SPDT AC220V; 3A(MAX)
		2 SPST AC220V; 3A(MAX)
	1channel Photoelectric switch	Proportional pulse/frequency Load capacity: 100mA/DC30V
Data acquisition	Data acquisition collection, with 3 channels DC24V sensor power supply	
Display mode	3.5"（or 4"）colorful LCD touch screen	
Power supply	Wide power range :（12-24）V	
Consumption	<5W	

IOT instrument with different Data Acquisition Terminal

CODuv-6000 Data Acquisition Terminal

■ Overview:

The CODUV-6000 data collection terminal is an online detection instrument that uses optical methods to detect COD content in water quality. The instrument is embedded with an intelligent core of measurement and calculation, and directly outputs the COD value through RS485 digital signal. It can also convert RS485 digital signal into RS232, 4-20mA, 4G, GPRS, Zigbee, LORA and other data formats through the data conversion module.

■ Application:

- Directly used as the data acquisition terminal of DCS and PLC system in the industrial field;
- Direct access to the cloud communication and big data platform through the DTU of the GPRS system;
- Directly use the WiFi module as a nearby wireless data collection terminal;
- Can use ZigBee/Lora module to remote wireless collection terminal;
- It can realize optical remote data collection through optical transceiver and far-infrared terminal;
- Supporting traditional 4-20mA industrial system (cable end RS485/4-20mA) module conversion;
- With a variety of 485/WiFi/USB tool converter, you can achieve calibration, address search, baud rate search and configuration by APP.

■ Characteristics:

- Using ultraviolet optical method to test water quality COD parameters, without sample pretreatment; Fast detection and analysis, and no secondary pollution;
- Support parameter conversion, which can be converted into BOD, TOC, SAC254 and other parameters;
- Increasing the reference optical channelso that can effectively eliminate the interference of water turbidity to ensure the accuracy of the test;
- Using xenon light source, long life and high stability of continuous operation;
- Sensor type, with a small appearance, convenient installation and convenient carrying;
- Multi-optical path options are available, which can be adapted to the needs of different ranges in different occasions;
- Real-time detection, with the meaning of online detection, low maintenance frequency;
- Easy to maintain, the sensor is equipped with compressed air cleaning function, suitable for complex waters and easy to maintain;

■ Main technical features:

Product Name	COD_{UV}-6000 Data Acquisition Terminal			
Model	COD_{UV}-6001	COD_{UV}-6002	COD_{UV}-6003	COD_{UV}-6004
Measurement range	0-1000mg/L	0-400mg/L	0-75mg/L	0-3000mg/L
Accuracy (based on KHP)	Less than ±5% of reading or 2mg/L	Less than ±5% of reading or 1mg/L	Less than ±5% of reading or 0.5mg/L	Less than ±5% of reading or 5mg/L
Repeatability	±5% of reading			
Working environment	Temperature:(0~45)℃;Humidity: ≤95%RH(none consideration)			
Pressure	0.4Mpa			
Storage environment	Temperature:(-10~60)℃ ;Humidity: ≤95%RH(none consideration)			
Cable length	Standard 10m(out of factory); support(1~300)m(book)			
Communication	RS485 communication Modbus-RTUstandard protocol			
Power supply	DC(9-28)V			
Power	<5W			
Weight	1.5Kg			
Protection level	IP68			

NH_3-N-1400-A01 Ammonia Nitrogen Sensor

■ Application:

It is suitable for online monitoring and portable monitoring in the fields of municipal sewage, domestic sewage, agricultural sewage, industrial wastewater, process control, nitrification and aeration tanks, and is convenient for monitoring buoys, monitoring floating rows, monitoring vessels and other integrated applications.

■ Characteristics:

- Combine with temperature, pH and K- compensation
- Sensor can be replaced independently, easy to operate and less maintenance
- Accurate measurement, low detection limit, long-term Small drift
- Fast response time and timely reflection
- PT1000 temperature compensation, accuracy up to ±0.1 °C
- Corrosion-resistant housing for long-term underwater operation and with compact structure
- RS485 communication , standard Modbus protocol
- Data analysis software with calibration, recording, analysis and diagnostic functions

■ Main technical features:

Product name	NH_3-N-1400-A01 Ammonia Nitrogen Sensor
working principle	ion selective electrode method
Measuring range	(0.2-1000) mg/L NH4-N
Detection limit	0.2 mg/L
Accuracy	5% or ±0.2mg/L
Communication	RS485，Standard Modbus protocol
Dimensions	D60mm，L458mm，Standard 2m (Can be customized)
working environment	(0-60)℃，(0-6)bar
Operating Voltage	12V/24V DC

DOP-6141 Dissolved Oxygen Data Acquisition Terminal

■ Product overview:

DOP-6141 is an environmental oxygen data acquisition terminal, which adopts high-performance oxygen permeable membrane, and the data responds to the change of dissolved oxygen in water in real time.

The product has a series of patented technologies such as split type, wireless transmission, no on-site APP calibration, no secondary wiring and so on.

As an ecological instrument of the Internet of Things, it is directly integrated into LC, DCS and other systems, and can realize wired, wireless and cloud transmission of wired, wireless, network and optical terminals with the help of more Internet of Things modules.

■ Application:

Widely used in electric power, petrochemical, industrial fields, chemical process, industrial water treatment, environmental monitoring, sewage treatment, aquaculture and other occasions involving online analysis, to meet the technical applications in various fields.

■ Characteristics:

- No on-site APP calibration;
- No secondary wiring, communication cable once wiring permanent use;
- Wide power supply range, ignoring the influence of circuit resistance voltage drop;
- Microencapsulation pass-through technology, The electrical meter and communication are embedded into the sensor connector;
- RS485 Digital communication, Modbus RTU standard protocol;
- Compatible with 4~20mA system (RS485/4~20mA+ WIFI module, setting the corresponding information of digital quantity and mA accurately by APP);
- Separate detachable structure, only replace the chemical acquisition unit;
- Wireless transmission technology, no metal exposed, no corrosion aging, no water vapor leakage effect;
- APP calibration, no difference type replacement, easy to use and replace, without professional knowledge;
- The product has the traceability of physical examination, history, life span, obstacle and so on.

■ Main technical features:

Product name	DOP-6141 Dissolved Oxygen Data Acquisition Terminal
Measurement range	0-20mg/L
Resolution	0.01mg/L
Accuracy	±0.3mg/L
Measurement principle	Polarography
Size	φ45mm*220mm
Installation screw	NPT 3/4 front NPT 3/4 end
Temperature compensation	0-50.0℃ accuracy：±0.5℃
Pressure	0.2MPa
Protection level	IP68
Power supply	DC（9-28）V，Consumption：≤2W
Communication	RS485， MODBUS RTU
Medium temperature	5-50℃
Storage environment	Temp：-10-60℃，relative humidity：95%（non condensation）
Cable length	Conventional 10m，customizable by appointment

■ Installation Method:

DOF-6310 Fluorescence Dissolved Oxygen Data Acquisition Terminal

■ Performance and charateristics

- Fluorescence quenching principle, no need for internal filling, no oxygen consumption, and easy maintenance;
- The service life of the fluorescent membrane cap is more than one year (under ideal conditions);
- Original altitude, atmospheric oxygen partial pressure, temperature compensation, to improve the authenticity of the data;
- There is almost no flow rate requirement, which can meet most usage measurement scenarios;
- RS485 digital port directly sends Modbus RTU communication data;
- As the front terminal of any industrial computer, controller, PLC and communication protocol module;
- 9-28V wide power supply DC power supply, suitable for a wide range of application scenarios;
- Data acquisition terminal sends data directly, with long transmission distance, anti-interference and no distortion;
- More solutions for problems,and product ecological support.
- Good electromagnetic compatibility (EMC) design, calmly deal with the complex electromagnetic
- environment of the industrial site;

■ Technical specification

Product Model	DOF-6310
Product Name	Dissolved oxygen data collection terminal
Measuring Method	Fluorescence Method
Measurement range	0-20mg/L
Accuracy	±0.3mg/L
Resolution	0.01mg/L
Response time	90s
Repeatibility	5%RS
Temperature compensation	0-60.0℃ Accuracy：±0.5℃
Air pressure compensation	300-1100hPa
Stand pressure	0.3Mpa
Communication	RS485 MODBUS-RTU standard protocol
Power	DC（9-28）V
Power comsuption	<2W
Operational envrionment	Temperature：（0-50）℃
Storage Environment	Temperature：(-10-60)℃； Humidity：≤95%RH(None condensation)
Installation	Submerged
Protection Level	IP68
Weight	1.5Kg（with 10m cable）

CD/RD-220 & CT/RT-120 Series Conductivity/Resistivity Data Sensing Terminal & Transmitter

Main Characteristics

- Support 100-meter long-distance data collection, support data bus and two-wire transmission mode;
- With 25°C as the reference temperature compensation, it comes with temperature compensation components and algorithms;
- The data terminal only needs to set the address and baud rate, without considering other setting operations;

Main technical features

Product name	Data Sensing Terminal				Two-wire (4~20) mA data transmitter			
Model	RD-221	CD-222	CD-223	CD-224	RT-121	CT-122	CT-123	CT-124
Unit	MΩ·cm	μS/cm	μS/cm	μS/cm	MΩ·cm	μS/cm	μS/cm	μS/cm
Constant（cm-1）	0.01	0.10	1.0	10.0	0.01	0.10	1.0	10.0
Range	(0.05~18.25)	(0.1~200)	(0.5~2,000)	(50~20,000)	(0.05~18.25)	(0.1~200)	(0.5~2,000)	(50~20,000)
Accuracy	±2.0% FS	±1.5% FS	±1.5%FS	±1.5%FS	±2.5%FS	±2.0% FS	±2.0%FS	±2.0%FS
Liquid contact material	Titanium	316L	316L	Graphite	Titanium	316L	316L	Graphite
Communication	RS485（Modbus RTU protocol）				Two-wire（4~20）mA			
Power	DC （9~28）V				DC （18~26）V			
temperature range	(0~50) ℃							
Pressure tolerance	0.5MPa							
Connection thread	1/2"NPT							

CID-3041 Digital Inductive Conductivity Sensor

■ Application

◆ Landfill leachate, sewage treatment Water quality monitoring in petrochemical, power, pharmaceutical, chemical, water treatment, and semiconductor manufacturing industries

■ Technical Features:

Product name		CID-3041 Digital Inductive Conductivity sensor
Measure range	Conductivity	500μS/cm ～2000mS/cm
	Concentration	1.NaOH: （0-15）% or（25-50）%;
		2.HNO_3: （note the Corrosion resistance of the sensor）（0-25）% or（36-82）%;
		3.User-defined concentration curves.
	TDS	250.0ppm ～ 1000ppt
	Temp.	（0 ～ 120）℃
Resolution	Conductivity	0.01μS/cm
	Concentration	0.01%
	TDS	0.01ppm
	Temp.	0.1℃
Accuracy	Conductivity	（500～1999）μS/cm，±1.5%(FS)
		（2～19.9） mS/cm，±1.0% (FS)
		（20～199）mS/cm，±1.0% (FS)
		（200～2000）mS/cm，±1.0% (FS)
	TDS	1.5 level
	Temp.	±0.5℃
Temp.Compensation	element	Pt1000
	Range	（0～120）℃ linear compensation
Communication		RS485
Power supply		DC 24V±4V
Consumption		≤2W
Protection level		IP68
Working environment		Temperature: （0~50）℃ Relative Humidity: ≤ 85%RH(non- condensing)
Storage		Temperature: (-20~60)℃ Relative Humidity: ≤85%RH(non- condensing)
Installation		Pipeline/Flow device/immersion

CRD-6000 Conductivity Internet of Things Terminal

■ Overview:

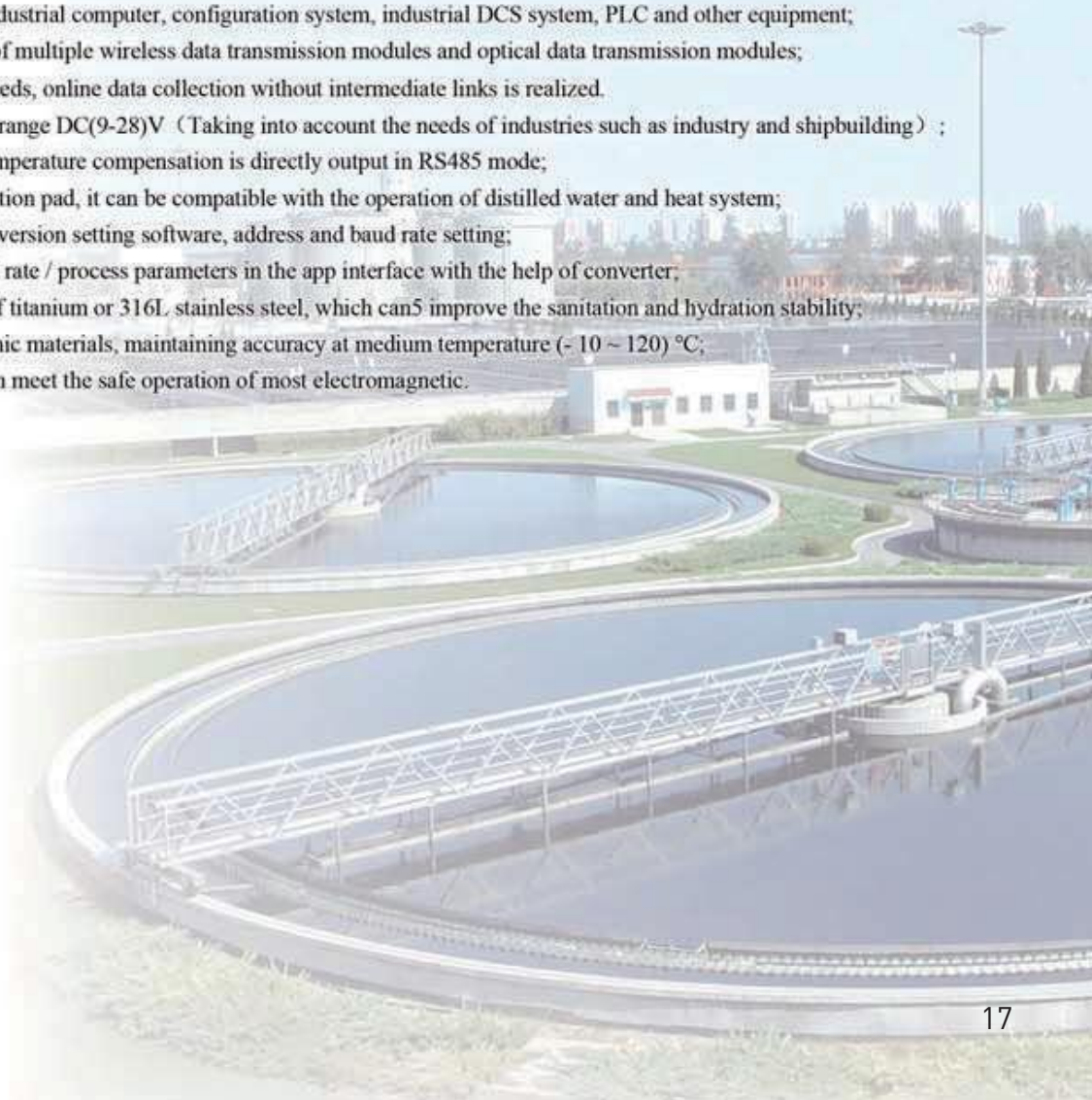
CRD-6000 series conductivity Internet of things terminal is a conductivity acquisition and test terminal with wide voltage input range.The conductivity data is output digitally through RS485.It can provide undistorted data for industrial control system such as industrial computer, PLC and configuration screen. Digital information will be directly integrated into the Internet plus big data system through various configurations.

■ Application:

- The products are widely used in power, boiler, heat exchanger and other thermal systems as well as heat washing and other industries;
- Sanitary conductivity digital terminal (clamp installation) can be used in distilled water, injection, biopharmaceutical, clinical medical equipment, food brewing, beverage and other industries;
- Conductivity terminal (wide temperature / high pressure) is suitable for multi effect distilled water system, steam condensate, high temperature distillation, heat exchange and other industries.

■ Characteristics:

- It is directly connected with industrial computer, configuration system, industrial DCS system, PLC and other equipment;
- Support information transfer of multiple wireless data transmission modules and optical data transmission modules;
- Facing the Internet plus era needs, online data collection without intermediate links is realized.
- DC power supply, wide input range DC(9-28)V（Taking into account the needs of industries such as industry and shipbuilding）;
- The conductivity data after temperature compensation is directly output in RS485 mode;
- With heat sink and heat insulation pad, it can be compatible with the operation of distilled water and heat system;
- Visual upper computer / APP version setting software, address and baud rate setting;
- Set and modify address / baud rate / process parameters in the app interface with the help of converter;
- The whole machine is made of titanium or 316L stainless steel, which can5 improve the sanitation and hydration stability;
- Selection of industrial electronic materials, maintaining accuracy at medium temperature (- 10 ~ 120) °C;
- The complete EMC design can meet the safe operation of most electromagnetic.



■ **Main technical features:**

Clamp type conductivity terminal (Sanitary type)

(1)Clamp installation (sanitary):

Product name	Conductivity Internet of things terminal (sanitary / wide temperature / high pressure)		
Product model	CRD-6201-HS	CRD-6102-HS	CRD-6103-HS
Constant level (cm^{-1})	0.01	0.10	1.0
Measuring range	(0.05~18.25)MΩ·cm	（0.05~200）μS/cm	（0.5~2000）μS/cm
TDS(ppm)	----	(0~100)	(0.25~1000)
Accuracy	±2.0%（FS）	±1.5%（FS）	±1.5%（FS）
Material	Titanium+316L	316L Stainless steel	316L Stainless steel
Medium temperature	（-10~120）℃		
Tolerance pressure（MPa）	1.0MPa（Max）		
Storage environent	Temperature：（-20~60）℃; Humidity：≤90%RH（Non-condensing）		
Data communication	RS485（Modbus RTU）		
Power supply	DC （9~28）V： Power ：≤2W		
Connection mode	Clamp：φ50.5mm		

(2)Thread installation(Industrial process type):

Threaded conductivity terminal (industrial process)

Product name	Conductivity Internet of things terminal（Threaded / wide temperature / high pressure）		
Product model	CRD-6201-HN	CRD-6102-HN	CRD-6103-HN
Constant level (cm^{-1})	0.01	0.10	1.0
Measuring range	(0.05~18.25)MΩ·cm	(0.05~200)μS/cm	(0.5~2000)μS/cm
TDS(ppm)	----	(0~100)	(0.25~1000)
Accuracy	±2.0%（FS）	±1.5%（FS）	±1.5%（FS）
Material	Titanium+ 316L	316L Stainless steel	316L Stainless steel
Medium temperature	(-10~120）℃		
Tolerance pressure（MPa）	1.0MPa（Max）		
Storage environment	Temperature:（-20~60）℃; Humidity:≤90%RH（Non-condensing）		
Data communication	RS485（Modbus RTU）		
Power supply	DC(9~28)V： Power：≤2W		
Connection mode	Thread：NPT3/4		

pHD/ORPD-6110 Series Data Acquisition Terminal

■ Application:

Widely used in power, petrochemical, industrial, chemical process, industrial water treatment, environmental monitoring, sewage treatment, aquaculture and other related to pH and ORP online analysis occasions, to meet the technical applications in various fields.

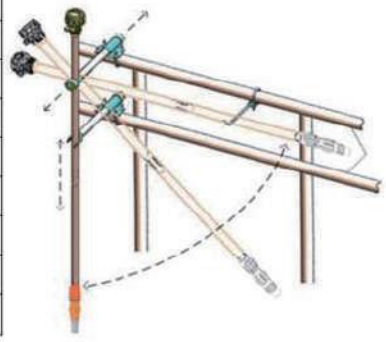
■ Characteristics:

- No on-site APP calibration;
- No secondary wiring, communication cable once wiring permanent use;
- Wide power supply range, ignoring the influence of circuit resistance voltage drop;
- Microencapsulation pass-through technology, The electrical meter and communication are embedded into the sensor connector;
- RS485 Digital communication, Modbus RTU standard protocol;
- Compatible with 4~20mA system (RS485/4~20mA+ WIFI module, setting the corresponding information of digital quantity and mA accurately by APP);
- Separate detachable structure, only replace the chemical acquisition unit;
- Wireless transmission technology, no metal exposed, no corrosion aging, no water vapor leakage effect;
- APP calibration, no difference type replacement, easy to use and replace, without professional knowledge;
- The product has the traceability of physical examination, history, life span, obstacle and so on.

■ Main technical features:

Model	pHD /ORPD-6110 Series Data Acquisition Terminal		
Designation	pHD/ORPD Data Acquisition Terminal		
Project	pH	ORP	Enclosed temperature
Measurement Range	2.00~12.00	(-1999~1999) mV	(0~50) ℃
Resolution	0.01	1mV	0.1℃
Accuracy	±0.1	±5mV	±0.5℃
Working Environment	Temperature: (0~50) ℃ ; Humidity: ≤95%RH(non condensation)		
Tolerance Pressure	0.4MPa		
Cable Length	10m (Original), Support to 200m (Reservation)		
Communicate	RS485 (Modbus-RTU protocol)		
Power Supply	DC (9~28) V		
Consumption	1.2W		
Weight	0.6kg		
Material	ABS		
Hole Size	φ45mm*220mm		
Piping Installation	NPT 3/4"Chemical Front-end		
Protection Support	NPT 3/4"Cable End		

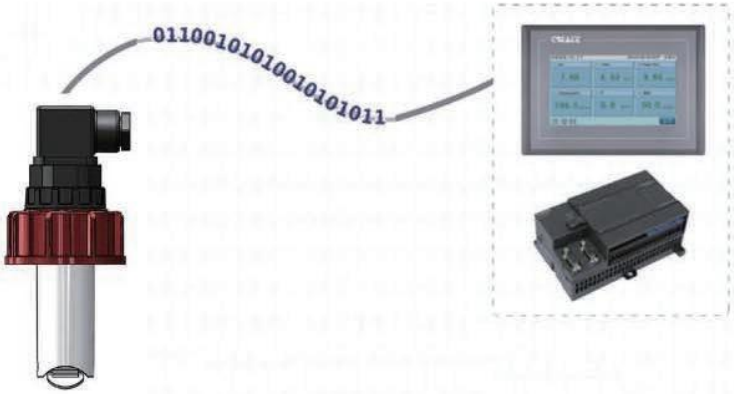
■ Installation Method:



FLP-1600-LD Digital Flow Sensor

■ Characteristics:

- Measurement/Communication Integrated Paddle Wheel flow sensor;
- Design the flow meter function inside the sensor directly;
- RS485 digital physical port(Modbus RTU protocol);
- Directly output the instantaneous and accumulated flow data, without any need for analog-digital conversion;
- Setting K factor,Address and the baud rate by PC software;
- Pre-measuring unit,high integrated design and high anti-interference ability;
- Pre-measuring unit,high integrated design and high anti-interference ability;
- Can connect with computer,configuration system,PLC,wireless modules;
- Meet the demand of system completing in Internet Age.



■ Technical Features:

Sensor model		FLP-1600-LD
Measure range	Flow rate	(0.5~5)m/s
	instantaneous flow	(0~2000) m^3 /h
	accumulated flow	(0~99999999) m^3
Accuracy		0.001 m^3 /h
Accuracy level		2.0level
Repeatability		±0.5%
Sensor output		RS485 (Standard Modbus RTU protocol)
Power supply		DC24V ±4 VConsumption : <1.0W
Cable length		Standard 10m , optional : (1~1000) m
Storage environment		Temp.: (-20～60) °C;Humidity: ≤90%RH (Non-condensing)
Protect level		IP65
Dimension size		The out circle 57mm, length :130mm
Main body material		Industrial plastic
Flow rate range		(0.5~5)m/s
Max pressure		≤0.6MPa
Installation mode		Vertical mounting, tangential measurement

TUR-6200 Turbidity Data Acquisition Terminal

■ Application:

- Directly as data acquisition terminal of the industrial site DCS and PLC system ;
- Entering cloud communication and Big data platform through DTU of GPRS;
- Wifi module as nearby wireless data acquisition terminal ;
- Remote wireless data acquisition terminal by Zigbee / Lora
- Optical remote data acquisition can be realized y optical terminal and far infrared terminal ;
- Supporting traditional 4-20mA industrial system (cable end RS485/4-20mA) module conversion;
- With a variety of 485/WiFi/USB tool converter, you can achieve calibration, address search, baud rate search and configuration by APP

■ Characteristics:

- RS485 communication interface with Modbus RTU Procotol;
- workable with any IPC, digital interface, PLC and wireless data module system;
- With electronic zero and standard liquid calibration function;
- With such functions like optical maintenance scraping device, circular timing, appointment timing cleaning;
- Power supply DC9-28V, non - polarity connection, automatic default wiring anti-stalling function;
- Direct output digital signal, no transmission distortion, transmission distance, strong anti-interference ability;
- Good electromagnetic compatibility (EMC) design

■ Main technical features:

Model	TUR-6204	TUR-6214
Picture		
Measurement Range	(1-4000) NTU	(0.1-4000) NTU
Measurement Parameter	Turbidity	
Light source	850nm (infrared light)	
Solution	<10NTU, 0.001NTU	
	<100NTU, 0.01NTU	
	<1000NTU, 0.1NTU	
	<4000NTU, 1NTU	
Accuracy	(0-100) NTU: less than reading 5% or 0.5NTU	
	(100-1000) NTU: ±2.5%FS	
	(1000-4000) NTU±2.5%FS	
Repeatability	<3%	
Water sample Flow	<3m/s	
Maintenance	Auto wiper with cycle setting function	
Working Environment	Temp: (0~50) ℃ ; Humidity: ≤95%RH(none compensation)	
Storage environment	Temp: (-10~60) ℃ ; Humidity: ≤95%RH(None compensation)	
Cable length	Standard 10m (standard); can be customized 1~1000m (appointment)	
Communication protocol	RS485 communication (standard Modbus-RTU protocol)	
Power supply	DC (9-28) V	
Consumption	<2W	

TSS-6200 Total Suspended Solid Data Acquisition Terminal

■ Application:

- Directly as data acquisition terminal of the industrial site DCS and PLC system ;
- Entering cloud communication and Big data platform through DTU of GPRS;
- Wifi module as nearby wireless data acquisition terminal ;
- Remote wireless data acquisition terminal by Zigbee / Lora
- Optical remote data acquisition can be realized y optical terminal and far infrared terminal ;
- Supporting traditional 4-20mA industrial system (cable end RS485/4-20mA) module conversion;
- With a variety of 485/WiFi/USB tool converter, you can achieve calibration, address search, baud rate search and configuration by APP.

■ Characteristics:

- RS485 communication interface with Modbus RTU Procotol;
- workable with any IPC, digital interface, PLC and wireless data module system;
- With electronic zero and standard liquid calibration function;
- With such functions like optical maintenance scraping device, circular timing, appointment timing cleaning;
- Power supply DC9-28V, non - polarity connection, automatic default wiring anti-stalling function;
- Direct output digital signal, no transmission distortion, transmission distance, strong anti-interference ability;
- Good electromagnetic compatibility (EMC) design.

■ Main technical features:

Model	TSS-6201	TSS-6211	TSS-6202	TSS-6212
Picture	Engineer plastic	316L	Engineer plastic	316L
Measurement Range	(0.1-0.5) g/L	(0.01-0.5) g/L	(1-50) g/L	(0.1-50) g/L
Measurement Parameter	Suspended solid			
Light source	850nm (infrared)			
Resolution	0.1mg/L			
Accuracy	less than reading 5% or 0.1g/L			
Measurement Range	<3%			
Water sample Flow	<3m/s			
Maintenance	Auto wiper with cycle setting function			
Working Environment	Temp: (0~50) ℃ ; Humidity: ≤95%RH(none compensation)			
Pressure	0.4 MPa			
Storage environment	Temp: (-10~60) ℃ ; Humidity: ≤95%RH(None compensation)			
Cable length	Standard 10m (standard); can be customized 1~1000m (appointment)			
Communication protocol	RS485 communication (standard Modbus-RTU protocol)			
Power supply	DC (9-28) V			
Consumption	<2W			
Weight	1.5 kg		3 kg	
Installation method	Horizontal/Vertical installation			

TUR-6314 High Turbidity Data Acquisition Terminal

■ Working principle:

The TUR-6314 high turbidity data acquisition terminal adopts an infrared LED light source with a central wavelength of 850nm. The detection beam will scatter in a specific direction when it encounters particulate matter in the sample. The backscattered light signal is detected in the direction of the incident light and then the electron unit is processed to calculate the turbidity value of the sample.

■ Application:

- 1.Food, beverage, wine and other industrial first grade water treatment ;
- 2.Liquid turbidity in pipeline in industrial process;
- 3.Industrial process water quality, circulating cooling water, swimming pool water, reclaimed water, etc.

■ Characteristics:

- 1. High brightness LED light source, less divergence Angle, longer life and more stable;
- 2.DC 9-28V wide power supply range;
- 3.Small diameter, easy to be installed in pipelines and combined sensors;
- 4.With its own temperature measurement, temperature compensation can be carried out, which can adapt to more complex media environment;
- 5.RS485 output, in line with the standard Modbus-RTU protocol, can also increase the conversion module conversion to other forms.

■ Main technical features:

Product name	High turbidity data acquisition terminal
Model	TUR-6314
Measuring range	0-4000NTU
Resolution	<10NTU, 0.001NTU <100NTU, 0.01NTU <1000NTU, 0.1NTU <4000NTU, 1NTU
Accuracy	(0.001~100) NTU: ≤±5% (100~1000) NTU: ±2.5%FS (1000~4000) NTU: ±2.5%FS
Repeatabilit	3%
Average signal time	0, 6, 30, 60 and 90S; It can be selected by the user
Ambient temperature	5~45.0℃
Communication interface	RS485 MODBUS-RTUS tandard protocol
Power supply	DC 9~28V
Power consumption	<5W
Instrument size	(Φ16*225) mm
Total weight	1.5Kg
Protection level	IP67

TUR-6101 /6102 Laser Turbidity Data Acquistion Terminal

■ Application:

TUR-6101 /6102 Laser Turbidity Data Acquistion Terminal,It can be used for on-line monitoring of water quality in different water bodies such as waterworks and membrane filtrate,The sensor internally completes all measurement calculation compensation.Directly output RS485 digital signal package,Undistorted data transmission to computers, servers and other host systems through various data links.It can also go directly to the Internet system via wireless network (4G, GPRS, 433MHz, etc.).

Product integration design, accurate and reliable measurement, easy maintenance and easy operation.

■ Characteristics:

- The xenon source uses a laser source with a lower detection limit for tap water and membrane water.
- A unique light source compensation design is used to ensure the stability of the light source.
- Compared to incandescent bulb turbidity sensors, light sources have a longer life and low maintenance costs.
- A unique surround bubble removal device ensures the removal of air bubbles from the measurement.
- The unique trapping design on the bottom of the , ensures a small background light with minimal interference to the measurement.
- RS485 output, in line with the standard Modbus-RTU protocol. It can directly form an acquisition system with any communication device that conforms to Modbus-RTU format, such as industrial computer and PLC.
- Easy to install, it can be used alone or integrated into a multi-parameter water quality analysis system.
- The external leads are equipped with Hossmann connectors for easy removal and maintenance.

■ Main technical features:

Model		TUR-6101	TUR-6102
Measure range		0-5NTU	0-100NTU
Resolution		<10NTU:0.0001NTU	<10NTU: 0.0001NTU ≥10NTU: 0.001NTU
Accuracy		±3% of the reading or 0.05NTU (Accuracy take the large value)	0-5NTU:±3% of the reading or 0.05NTU (Accuracy take the large value)
Repeatability		3% of the reading	
Signal average time		0，6，30，60 and 90 seconds；for user selection	
working environment	Temp.	(5-50.0)℃	
	Humidity	≤85% RH	
Electromagnetic Compatibility	Electrostatic discharge	IEC61000-4-2 LEVEL2 Judge B	
	Electrical fast transient burst	IEC61000-4-4 LEVEL2 Judge B	
	surge	IEC61000-4-5 LEVEL2	
Sample water flow rate		(250-750)mL/min	
Sample water temperature		(0-50.0)℃	
communication		RS485 communication（integrated with the sensor part） MODBUS-RTU standard protocol	
Power supply		DC（10-28)V	
Power consumption		<10W	
Protection level		IP65	

MPS-1400 Digital Multi-parameter Integration Sensor

■ Characteristics

- Integration with pH,ORP,DO,conductivity,Turb/TDS,temperature and depth
- It has RS-485 output ,in line with the Modbus protocol.It Can be directly connected to industrial computer, PLC and any other i
- Communication equipments in accordance with Modbus RTU format
- Address and baud rate canbe set freely.
- pH,ORP and DO sensors are equipped with quick transfer connector for easy replace.
- Turbidity sensor is equipped with auto clean device and manual maintenance is no needed.
- Completely sealed and st.st. body in IP68 protection level
- Easy installation and it can be placed into the water. the mobile and rapid response can be achieved

■ Main technical features:

Parameter	Measurement range	resolution		accuracy
Turbidity	0.001-4000NTU	range	resolution	(0-100)NTU less than the reading data 5% (100-1000)NTU±2.5%FS (1000-4000)NTU±2.5%FS
		0.001-10NTU	0.001NTU	
		10-10NTU	0.01NTU	
		100-1000NTU	0.1NTU	
		1000-4000NTU	1NTU	
Suspended solid	0-50 g/L	range	resolution	less than the reading data 5%(depend on Homogeneity of the city active sludge)
		0-1.0g	0.0001g	
		1.0g-10.0g	0.001g	
		10.0g-50.0g	0.01g	
pH	2.00-12.00	0.01		±0.1
ORP	（-2000—2000）mV	1mV		±5mV
DO	（0-20）mg/L（ppm）	0.01 mg/L（ppm）		0.3mg/L（ppm）
conductivity	(0-2000)μS/cm (0-20)mS/cm	0.1μS/cm		1.5%（FS）
Temperature	（0.0-99.9）℃	0.1℃		±0.5℃
Depth	0-40m	0.1m		±1%
Communication port		RS485，MODBUS RTU		
Power supply	DC 9-28V			
Working environment	Temp：（0-50）℃；Humidity：≤85% RH（non-condensing）			
Storage enviornment	Temp：（0-60）℃；Humidity：≤85%RH（non-condensing）			
size	102mm×465mm（D×L）			
installation	Immersion			
Pressure	0.4MPa			

POP-8300 Free Chlorine Online Analyzer

Characteristics

- Wall mounted, integrated （HClO/ClO2）free chlorine online analyzer;
- The 7-inch touch display, more convenient operation and more powerful system function;
- With the function of historical data retrieve and dynamic display of parametric curve;
- With the function of flow rate measurement display and no water alarm;
- Switch the screen style in the main interface according to preference, the function of data dynamic display;
- Wide range support for global electric standard power supply, reserved power supply, communication waterproof interface;
- Constant flow rate is patented, and not subject to the pressure change from pipeline;
- Solidify the flow through sensor sensitive areas and the measurement is more stable
- Anti-siphon design, the sensor is automatically maintained after the system is down;
- Isolated,two-way （4-20） mA current loop output, instrument/transmitter dual-mode;
- Two relays of upper and lower limits set, one of photoelectric programmable switch/pulse
- Protective sealed case, pre-set installation backplane, convenient onsite installation;
- （HClO） Free chlorine differentially shows free residual chlorine, total residual chlorine, more convenient to guide the customer for dosage control;

Main technical specifications

System Model		POP-8300 free chlorine online analyzer
Measurement range	Free chlorine	（0.00-2.00）mg/L（ppm） （0.00-20.00）mg/L（ppm）
	pH	2.00-12.00
	Temperature	（0.0-99.9）°C
Resolution	Free chlorine	0.01mg/L（ppm）
	pH	0.01
	Temperature	0.1°C
Accuracy	Free chlorine	Indication error 10%
	pH	0.1pH
	Temperature	±0.5°C
Communication interface	RS485	MODBUS RTU communication protocol
（4-20）mA output	Number of channels	Double channel
	Technical feature	Isolated, reversible, completely adjustable, instrument/transmitter dual mode
	Channel configuration	Programmable point to Free chlorine, chlorine dioxide, Temperature, pH
	Loop resistance	400Ω(Max). DC 24V
	Transmission accuracy	±0.1mA
Control output	Number of channels	Double channels
	Contact mode	The first and second for photoelectric switch
	Load capacity	Load current 50mA（Max）, AC/DC 30V
	Control point	Programmable function（Free chlorine, chlorine dioxide, Temperature , pH, Timing ）
Power supply	Connected to electric supply AC80-260V;50/60Hz, compatible with all international market power standards(110V;220V;260V;50/60Hz).	
Cabinet weight	≤10kg	
Cabinet dimension	570*mm*380mm*130mm（H×W×D）	

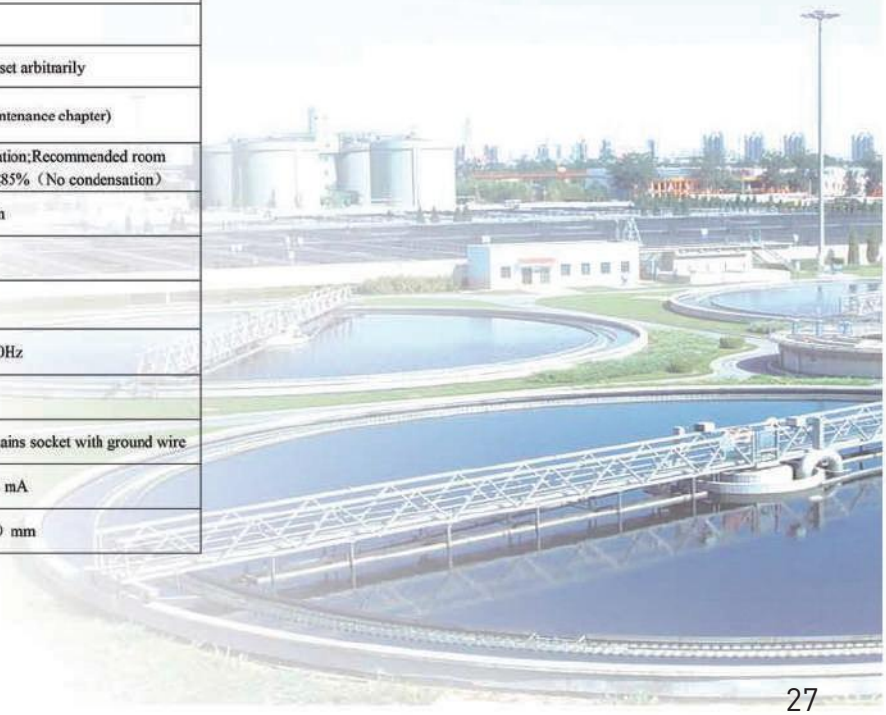
CLA-7000 Series Free Chlorine（DPD）online automatic analyzer

■ Characteristics

- Using the national standard method DPD photometric method test principle, and the same regulations as the national standard;
- Accurate quantification, less reagent consumption, easy maintenance, and short measurement cycle;
- Reagent remaining inventory query and three-level (yellow, orange, red) alarm;
- Can accept 2 channels of water samples, and select PID & proportional pulse board to realize continuous closed-loop adjustment of medical wastewater and corporate wastewater discharge;
- Optional pH measurement board to obtain the current pH and temperature of the water sample simultaneously;
- Electrical environment, the analysis environment is separated from dry and wet, and there is no worry about electrical corrosion;
- Frame module board, pH board, PID& proportional pulse board, communication board and more modules are optional;
- Support RS-232, RS-485 communication ports, (4-20) mA analog communication output;
- Perfect user authority management system to avoid errors in unnecessary parameter project modification;
- It can provide general users with big data platform hosting and open all kinds of analysis and query APP applications to users.

■ Main technical features:

Measurement range	N,N-Diethyl-1,4-phenylenediamine (DPD) spectrophotometry			
Model	CLA-7112	CLA-7212	CLA-7113	CLA-7213
Inlet channel	Single channel	Double channel	Single channel	Double channel
Measurement range	Free chlorine：(0.0～2.0)mg/L ,Calculated as Cl2;		Free chlorine:(0.5～10.0)mg/L ,Calculated as Cl2;	
	pH：(0-14)；Temperature：(0-100) ℃			
Accuracy	Free chlorine:±10% or ±0.1mg/L (Accuracy take the large value) ,Calculated as Cl2;		Free chlorine:±10% or±0.25mg/L (Accuracy take the large value) ,Calculated as Cl2;	
	pH:±0.1pH；Temperature：±0.5℃			
Measurement Period	≤2.5min			
Sampling interval	The interval (1～999) min can be set arbitrarily			
Maintenance cycle	Recommended once a month (see maintenance chapter)			
Environmental requirements	A ventilated and dry room without strong vibration;Recommended room temperature：(15～28) ℃；Relative humidity：≤85%（No condensation）			
Water sample flow	(200-400) mL/min			
Inlet pressure	(0.1-0.3) bar			
Inlet water temperature range	(0-40) ℃			
Power supply	AC (100-240)V； 50/60Hz			
Power	120W			
Power connection	The 3-core power cord with plug is connected to the mains socket with ground wire			
Data output	RS232/RS485/（4～20）mA			
Size	H*W*D：(800*400*200) mm			



HDA-7000 series Online Hardness Analyzer

■ Characteristics

- Water sample management, titration injection, automatic mixing, photoelectric detection, automatic cleaning, reagent management integration;
- Quantitative accuracy, less reagent dosage, simple maintenance, short measurement;
- Reagent remaining inventory query and three-level (yellow, orange, red) alarm;
- Electrical environment, the analysis environment is separated from dry and wet, there is no worry about electrical corrosion;
- Card frame type module board, pH board, PID & proportional pulse board, communication board and more modules are optional;
- Support RS-232, RS-485 communication ports, (4-20) mA analog communication output ;
- Complete user authority management system to avoid errors in unnecessary parameter project modification;
- It can provide general users with big data platform hosting and open all kinds of analysis and query APP applications to users。

■ Main technical features:

Measuring Method		Titration colorimetric method			
Measurement cycle		(8-20) minutes depends on water sample concentration			
Sample water requirements		Clear, colorless, no solid particles, no bubbles			
Sample water flow		(200-400) mL/min			
inlet water pressure		（0.1-0.3） bar			
Inlet water temperature range		（0-40）℃			
Unit display		°dH、°fh、ppm、mmol/L			
Model		HDA-7101	HDA-7102	HDA-7103	HDA-7104
Measurement range	°dH	0.05-0.50	0.25-2.5	1.0-10.0	2.5-25.0
	°fh	0.09-0.89	0.45-4.48	1.79-17.9	4.48-44.8
	ppm CaCO3	0.89-8.93	4.48-44.8	17.9-179	44.8-448
	mmol/L	0.01-0.09	0.04-0.45	0.18-1.79	0.45-4.48
Indication Error		±10% of display value or ±0.3ppm,（take the large value ）	±10% of display value or ±0.3ppm,（take the large value ）	±10% of display value or ±5ppm,（take the large value ）	±10% of display value or ±15ppm,（take the large value ）
Repeatability		±5%			
Stability		±10%			
Power connection		The 3-core power cord with plug is connected to the mains socket with ground wire			
Digital Output		RS232/RS485/（4~20）mA			
Dimension		H*W*D:（800*400*200）mm			
Power supply		AC (100-240)V; 50/60Hz			

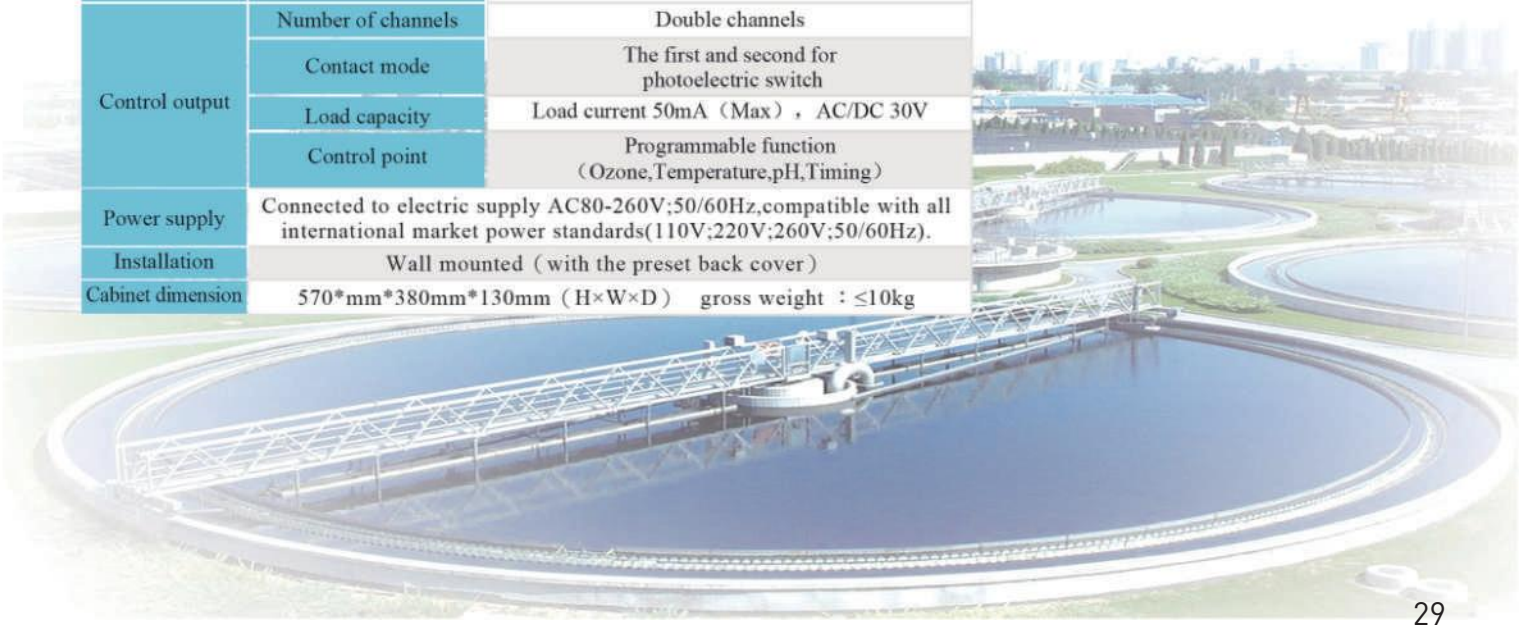
POZ-8300 Ozone Online Analyzer

■ Characteristics

- Wall mounted, integrated online ozone （O3）analyzer;
- The 7-inch touch display, more convenient operation and more powerful system function;
- With the function of historical data retrieve and dynamic display of parametric curve;
- With the function of flow rate measurement display and no water alarm;
- Switch the screen style in the main interface according to preference, the function of data dynamic display;
- Constant flow rate is patented, and not subject to the pressure change from pipeline;
- Solidify the flow through sensor sensitive areas and the measurement is more stable
- Anti-siphon design, the sensor is automatically maintained after the system is down;
- Protective sealed case, pre-set installation backplane, convenient onsite installation;

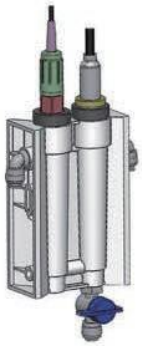
■ Main technical features:

System Model		POZ-8300 Online ozone analyzer
Measurement configuration		ozone（O3）/pH/temperature
Measurement	ozone	(0.00-2.00) mg/L (ppm) ; (0.00-20.00) mg/L (ppm)
	pH	2.00-12.00
	temperature	（0.0-99.9）℃
Accuracy	ozone	10% FS
	pH	0.1pH
	temperature	±0.5℃
Communicati on interface	RS485	MODBUS RTU communication protocol
（4-20）mA output	Number of channels	Double channels
	Technical feature	Isolated, reversible , completely adjustable, instrument/transmitter dual mode
	Channel configuration	Programmable point to ozone,Temperature,pH
	Loop resistance	400Ω(Max)，DC 24V
	Transmission	±0.1mA
Control output	Number of channels	Double channels
	Contact mode	The first and second for photoelectric switch
	Load capacity	Load current 50mA（Max），AC/DC 30V
	Control point	Programmable function （Ozone,Temperature,pH,Timing）
Power supply	Connected to electric supply AC80-260V;50/60Hz,compatible with all international market power standards(110V;220V;260V;50/60Hz).	
Installation	Wall mounted（with the preset back cover）	
Cabinet dimension	570*mm*380mm*130mm（H×W×D） gross weight ：≤10kg	



pH/ORP-8500A pH/ORP Online Meter



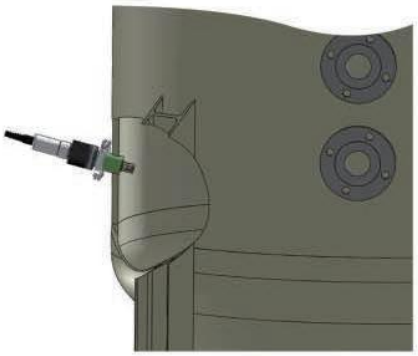



■ Characteristics:

- 3.5" 320×240 TFT color screen, Multi-parameter display;
- It has pointers, numbers and colors with space-time concept and can display forms;
- Be compatible for six kinds of buffer solution which suitable for international standard;
- Touch key, Chinese/English to select, guided operation;
- RS485, Modbus RTU protocol;
- Double channels/Isolated(4-20)mA, instrument/transmitter mode for selection;
- Three channels photoelectric switch control, arbitary combination for PH/ORP/temperature/timing;
- switch control, frequency pulse, frequency pulse for option, fit for more;
- EMC design with better ability on anti-interference;
- Calendar function which can set timing and reserved timing;
- With the CE Certification .

■ Application:

Widely used for online pH/ORP measurement in chemical process, oil refining, metallurgy, pharmacy,chemical synthesis industrial/sewage water treatment, environment monitoring, agricultural technology, biological fermentation, industrial coating and so on.


■ Main technical features:

Measurement Parameter	pH	ORP	Temperature
	Range: 0.00~14.00	Range: (-1999~+1999)mV	Range: (0.0~100.0)℃
	Resolution: 0.01	Resolution: 1mV	Resolution: 0.1℃
	Accuracy: ±0.1	Accuracy: ±5mV(Indicator)	Accuracy: ±0.5℃
Medium	(0~80)℃		
Temperature components	NTC10K Temperature compensation		
Analog Output	Double channels isolated、transportable(4~20)mA, instruments/ transmitter mode.		
Control Output	Triple channels semiconductor photoelectric switch, load current: AC/DC 30V, 50mA(max)		
Communication port	RS485, Modbus RTU protocol		
Powder supply	DC 24V		
Consumption	<5.5W		
Working Environment	Temperature (0~80)℃; Relative Humidity ≤85%RH(none condensation)		
Storage Environment	Temperature (-20~60)℃; Relative Humidity ≤85%RH(none condensation)		
Protection Level	IP65 (with rear cover)		
Dimension	96mm×96mm×94mm (H×W×D)		
Hole Size	91mm×91mm (H×W)		
Installation	Panel Mounted, Fast installation		

pH sensor pHW-1120 / ORP sensor ORP-1120

■ Technique features:

Measurement range: pH: 0-14; ORP -1500...1500mV
Max Pressure: 0.6MPa
Temp. Range: 0-60℃
Material: PC Plastic
Thread: Top & bottom 3/4 " NPT
Pole dimension: 28mm

■ Characteristics:

1.Large area of polytetrafluoroethylene liquid connection, not easy to plug and easy for maintenance.
2.The long distance reference diffusion path extends the service life of the electrode in harsh environments.
3.New design of glass bulb, increase surface area and prevent inner buffer solution from interfere of air bulb to gain reliable measurement.
4.3/4 "NPT thread installation, no jacket is required, saving installation costs.
5.Use high quality low noise cable, the distance of output signals is longer than 20 meters without disturbance.

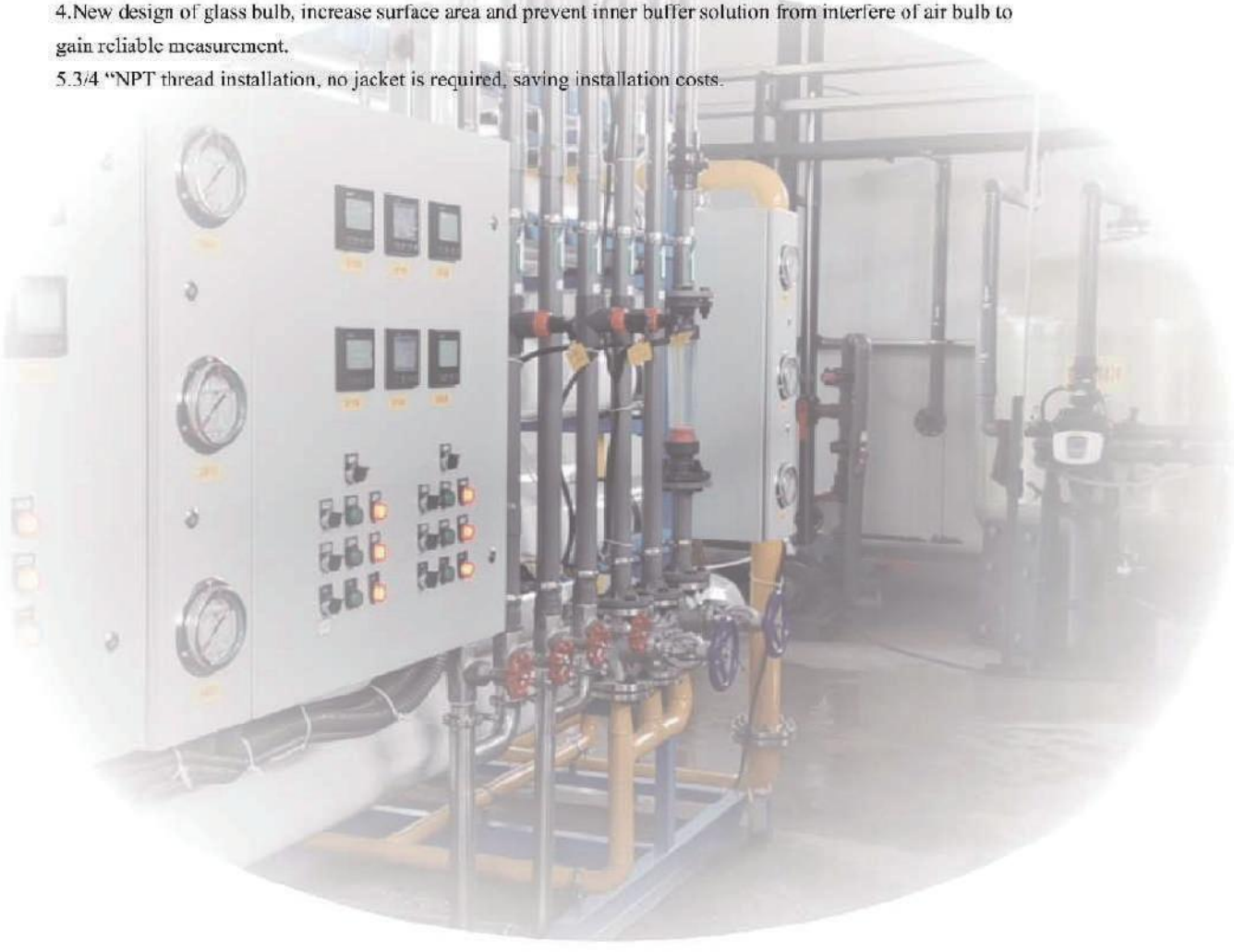
Tri-compound pH sensor pHW-1130N / ORP sensor PSORP

■ Technique features:

Measurement range: pH: 0-14; ORP -1500...1500mV
Max Pressure: 0.6MPa
Temp. Range: 0-80℃
Temp. Component: PT1000 / NTC10k
Material: PPS
Thread: Top & bottom 3/4 " NPT

■ Characteristics:

1.Tri-compound pH electrode with temperature compensation.
2.Large area of polytetrafluoroethylene liquid connection, not easy to plug and easy for maintenance.
3.The long distance reference diffusion path extends the service life of the electrode in harsh environments.
4.New design of glass bulb, increase surface area and prevent inner buffer solution from interfere of air bulb to gain reliable measurement.
5.3/4 "NPT thread installation, no jacket is required, saving installation costs.



pH/ORP-5500 pH/ORP Online Meter

■ Application:

Widely used in scientific experiments and flow detection of various pH solution, It is a panel seal type casing, cost-effective pH & ORP line analytical instruments.

■ Characteristics:

- Be compatible for six kinds of Buffer solution, international standard;
- Sealed、cost-effective pH/ORP online pH/ORP controller;
- Outlay temperature sensor design, Universal pH electrode;
- White back-light, overhead multi symbols, simple to set up, easy to use;
- Isolated (4~20)mA output, dual mode Instrument/Transmitter;
- Double relay control (one for high limit, one for the low limit) and the time-delay control;
- Two composite electrode, do not need to replace the cable;
- Isolated measurement/Transmitter /Controller; no mutual influence;
- Optimal electromagnetic compatibility design, good anti-jamming performance;
- With the CE certification.

■ Main technical features:

	pH	ORP	Temp.
Measurement Range	0.00~14.00	(-2000~+2000)mV	(0.0~99.9)℃(Temp.Compensation: NTC10K)
Resolution	0.01	1mV	0.1℃
Accuracy	±0.1	±5mV (electronic unit)	±0.5℃
Buffer solution	pH value 9.18; 6.86; 4.01; 10.00; 7.00; 4.00		
Temp.Compensation	(0~50)℃ (with 25℃ as standard) manual/automatic temp. compensation for selection		
Analog output	Isolated (4~20)mA, Instrument/Transmitter for selection		
Powder supply	pH/ORP-5500	pH/ORP-5510	pH/ORP-5520
	DC 24V	AC 110V	AC 220V
Control Output	Double relay output (ON/OFF); AC 240V/3A		
power consumption	<3W		
Working Environment	Working temp.(0~50)℃; Relative humidity ≤85%RH (none condensation)		
Storage Environment	Temp. (-20~60)℃; Relative humidity ≤85%RH (none condensation)		
Dimension	96mm×96mm×105mm (H×W×D)		
Hole Size	91mm×91mm (H×W)		
Protection level	IP65 (with back cover)		
Installation	Panel installation, Fast installation		

pH/ORP-3500 pH/ORP Online Meter

■ Application:

Widely used in scientific experiments and flow detection of various pH solution, It is a small, low-cost and high cost-effective on-line analysis instruments.

■ Characteristics:

- One kind of popular and cost-effective online pH/ORP controller;
- Be compatible for six kinds of Buffer solution (10.00, 9.18, 7.00, 6.86, 4.00, 4.01);
- Outlay temperature sensor design, Universal pH electrode;
- White back-light, overhead multi symbols, simple to set up, easy to use;
- Isolated (4~20)mA output, dual mode Instrument/Transmitter ;
- Double relay control (one for high limit ,one for the low limit) and the time-delay control;
- Optimal electromagnetic compatibility design, good anti-jamming performance;
- Multi power supply, DC/AC power input, no polarity connection;
- Compact Quick installation with the Short cabinet;
- With the CE certification.

■ Main technical features:

	pH	ORP	Temp.
Measurement Range	0.00~14.00	(-2000~+2000)mV	(0.0~99.9)℃(Temp.Compensation: NTC10K)
Resolution	0.01	1mV	0.1℃
Accuracy	±0.1	±5mV (electronic unit)	±0.5℃
Buffer Solution	9.18; 6.86; 4.01; 10.00; 7.00; 4.00		
Medium Temp.	(0~50)℃ (with 25℃ as standard) manual/automatic temp.compensation for selection		
Analog Output	Isolated one Channel (4~20)mA, Instrument/Transmitter for selection		
Control Output	Double relay output (single contact ON/OFF)		
Powder supply	pH/ORP-3500	pH/ORP-3510	pH/ORP-3520
	DC 24V	AC 110V	AC 220V
power consumption	<3W		
Working Environment	Working temp. (0~50)℃; Relative humidity ≤85%RH (none condensation)		
Storage Environment	Temp. (-20~60)℃; Relative humidity ≤85%RH (none condensation)		
Dimension	48mm×96mm×80mm (H×W×D)		
Hole Size	44mm×92mm (H×W)		
Installation	Panel mounted, fast installation		

CIT-8800 Inductive Conductivity / Concentration Online Controller

■ Application:

- Conductivity、TDS、Concentration Online Controller of Strong electrolyte aqueous solution;
- Acid and alkali regeneration process on-line concentration analysis of anionic, cationic exchange resin;
- Conductivity of low viscosity, multi-phase liquid online analysis;
- Chemical process, electroplating, coating, oil, metal processing and other industrial conductivity on-line analysis;
- CIP cleaning、sewage treatment and seawater desalination, circulating cooling water, environmental water quality monitoring.

■ Characteristics:

- Conductivity/Concentration/TDS/Temperature integration;
- Conductivity/TDS/concentration/temperature transmit;
- RS485 MODBUS-RTU protocol;
- Double channels/isolated (4~20)mA output, Instrument/Transmitter mode for selection;
- 3.5"320×240 TFT color screen, Chinese/English for optional;
- Touch keys, humanism operation interface、guided menu;
- Support conductivity measurement range (0.5~2000)mS/cm, Auto range;
- Application-oriented can be customized, designed accessory for a variety of use conditions;
- Built-in NaOH, HNO_3 concentration curve, Other newsolution can be calibrate;
- Sensor material for optional, for highly corrosive, health requirements;
- Electromagnetic compatibility, with strong ability of anti-interference;
- Calendar function which can set timing and reserved timing;
- Password protection function, strengthen system security.

Environment Sensor Bracket

Split pipeline installation

Tank installation

■ Main technical features:

Measurement range	Conductivity: (500~2,000,000)μS/cm Concentration: 1.NaOH: (0~15)% or (25~50)%; 2.HNO_3: (0~25)% or (36~82)%; 3.User-defined concentration curves TDS: (250~1,000,000)ppm Temp.: (0.0~120.0)℃	
Resolution	Conductivity: 0.01μS/cm; Concentration: 0.01%; TDS: 0.01ppm; Temp.: 0.1℃	
Accuracy	Conductivity: (500~1000)μS/cm ±10μS/cm (1~2000)mS/cm ±1.0% TDS: 1.5 level Temp.: ±0.5℃	
Temp. compensation	range: (0.0~120.0)℃	element: Pt1000
Analog output	Two channels isolated、transportable (4~20)mA, Instrument / Transmitter for selection	
Control output	Triple channels semiconductor photoelectric switch, ProgrammableSwitch, pulse and frequency	
Power supply	AC/DC 30V, 50mA(max)	
Data communication	RS485, Modbus RTU protocol	
Power supply	DC 24V±15%	
Consumption	<5.5W	
Working environment	Temperature (0～50)℃; Relative Humidity ≤85%RH (non-condensing)	
Storage	Temperature (-20～60)℃; Relative Humidity ≤85%RH (non-condensing)	
Protection level	IP65 (with rear cover)	
Outline dimension	96mm×96mm×94mm (H×W×D)	
Hole dimension	91mm×91mm (H×W)	
Installation	Panel mounted, fast installation	

CCT-8301A Conductivity/Resistivity/TDS/TEMP Online Controller

■ Application:

Multi-effect distilled water for medical systems, boiler bottom water, condensate, heat exchange systems, industrial thermal mechanical parts cleaning, industrial water recycling and conductivity online analysis at high temperature environments running water quality management and automated control over a wide temperature range.

■ Characteristics:

- Integrates conductivity/resistivity/temperature;
- 3.5" 320×240 TFT color screen, multiple parameter display in same screen;
- With the Conductivity constant 0.01; 0.1; 1.0; 10.0 (cm^{-1})
- Automatic range switch, arbitary setting for measurement unit;
- Double channel, Isolated (4~20)mA, Instrument/Transmitter for selection;
- Control、transmit, arbitary combination for conductivity/resistivity/TDS/temperature;
- Triple channels Photo-electrical switch control, Choose to conductivity/resistivity/temperature/time;
- Switching logic can be set, Static logic or pulse logic for optional;
- Calendar function, time setting, and making an appointment, provide time tags for recording data;
- Pt1000 temperature compensation, with the professionalization of temperature measurement/temperature control;
- Complete isolated channel for the Power, measurement, transmitter and control;
- RS485communication port, Standard Modbus RTU protocol;
- Optimal electromagnetic compatibility design, good anti-jamming performance;
- DC24V power supply, conform to the safety standards of high humidity site (Port polarity internal automatic identification);
- Password protection function, strengthen system security, With the CE Certification.

■ Main technical features:

Constant	10.00cm^{-1}	1.000cm^{-1}	0.100cm^{-1}	0.010cm^{-1}
Conductivity	(500~100,000)μS/cm	(1.0~10,000)μS/cm	(0.5~200)μS/cm	(0.05~18.25)MΩ·cm
TDS	(250~50,000)ppm	(0.5~5,000)ppm	(0.25~100)ppm	——
Temp.	(0~180)℃ (Temp.Compensation: Pt1000)			
Resolution	Conductivity: 0.01μS/cm, 0.01mS/cm; Resistivity: 0.01MΩ·cm; TDS: 0.01ppm; Temp.: 0.1℃			
Accuracy	Conductivity: 1.5% (FS); Resistivity: 2.0%(FS); TDS: 1.5% (FS); Temp: ±0.5℃			
Temperature compensation	With25℃ as standard under normal medium; With 90℃ as standard under high temp medium			
Analog Output	Double channel (4~20)mA, Instrument/Transmitter for selection			
Control Output	Triple channels photo-electronic semiconductor relay swith, Load capacity: AC/DC 30V,50mA(max)			
Communication port	RS485 Modbus RTU protocol			
Powder supply	DC 24V±15%			
Protection Level	IP65 (with the back cover)			
Working Environment	Temp. (0~50)℃; relative humidity ≤95%RH (non-condensing)			
Storage Environment	Temp. (-20~60)℃; relative humidity ≤85%RH (non-condensing)			
Dimension	96mm×96mm×94mm (H×W×D)			
Hole Size	91mm×91mm (H×W)			
Installation	Panel mounted, fast installation			

CCT-5300E series Conductivity/Resistivity/TDS Online Controller

■ Application:

High Cost-Effective, widely used for chemical industry, paper making industry, industrial coating, pharmaceutical, food, beverage, municipal water, Environmental and so on.

■ Characteristics:

- Integrated of Conductivity/Resistivity parameter measurement, support cell constant 0.01cm^{-1}, 0.1 cm^{-1}, 1.0cm^{-1}, 10.0 cm^{-1};
- Automatic range switch, Intelligent core;
- White Background LCD display,various of symbols to lead operation;
- Arbitrary selection of Conductivity, resistivity and TDS;
- Check the conductivity, temperature, mA current at any time;
- Isolated, transportable (4~20)mA output, Instrument / Transmitter mode for selection;
- DC 24V; AC 110V; AC 220V power supply for selection;
- Measuring, communication, control are completely isolated, more stable;
- With the CE Certification.

■ Main technical features:

Constant	10.00cm^{-1}	1.000cm^{-1}	0.100cm^{-1}	0.010cm^{-1}
Conductivity	(0.5~20,000)μS/cm	(0.5~2,000)μS/cm	(0.5~200)μS/cm	(0.05~18.25)MΩ·cm
TDS	(250~10,000)ppm	(0.5~1,000)ppm	(0.25~100)ppm	——
Medium Temp.	(0~50)℃ (Temp.Compensation: NTC10K)			
Accuracy	Conductivity	Resistivity	TDS	Temp.
	1.5% (FS)	2.0% (FS)	1.5% (FS)	±0.5℃
Cable length	≤20m(MAX)			
Temperature compensation	(0~50)℃ (with 25℃ as Standard)			
Transmitting Output	isolated、transportable (4~20)mA, Instrument / Transmitter for selection			
Control Output	relay contact: ON/OFF; Load capacity: AC 230V/5A(Max)			
Power Supply	CCT-5300E	CCT-5310E	CCT-5320E	
	DC 24V	AC 110V	AC 220V	
Working Environment	Temp. (0~50)℃; Relative Humidity ≤85%RH (none condensation)			
Storage Environment	Temp. (-20~60)℃; Relative Humidity ≤85%RH (none condensation)			
Dimension	96mm×96mm×105mm (H×W×D)			
Hole Size	91mm×91mm (H×W)			
Installation	Panel mounted, fast installation			

CCT-3300 Series Conductivity Online Controller

■ Application:

Widely used for chemical industry, pharmaceutical, food, beverage, industrial coating, municipal water, Environmental, etc. conductivity / resisitivity online measuring and control. It is a small-scale, industry leading and High Cost-Effective conductivity/resistivity integration online controller.

■ Characteristics:

- Integrated of Conductivity/Resistivity parameter measurement, support cell constant 0.01cm^{-1}, 0.1 cm^{-1}, 1.0cm^{-1}, 10.0 cm^{-1};
- intelligent automatic range, automatic conversion in full range;
- Arbitrary selection of Conductivity, Resistivity and TDS;
- Check the conductivity, temperature, (4~20)mA at any time;
- Single channel Isolated (4~20) mA output, instrument/transmitter mode for selection;
- DC 24V; AC 110V; AC 220V power supply for selection;
- Measuring, communication, control are completely isolated, more stable;
- With the CE Certification.

■ Main technical features:

Constant	10.00cm^{-1}	1.000cm^{-1}	0.100cm^{-1}	0.010cm^{-1}
Conductivity	(0.5~20)mS/cm	(0.5~2,000)μS/cm	(0.5~200)μS/cm	(0.05~18.25)MΩ·cm
TDS	(250~10,000)ppm	(0.5~1,000)ppm	(0.25~100)ppm	——
Medium Temp.	(0~50)℃			
Resolution	Conductivity	TDS	Temp.	
	0.01μS/cm	0.01ppm	0.1℃	
Accuracy	Conductivity	Resistivity	TDS	Temp.
	1.5% (FS)	2.0% (FS)	1.5% (FS)	±0.5℃
Temperature compensation	(0~50)℃ (with 25℃ as Standard)			
Cable length	≤5m(MAX)			
mA output	Isolated (4~20)mA, Instrument / Transmitter for selection			
Control Output	relay contact: ON/OFF, Load capacity: AC 230V/5A(Max)			
Working Environment	Temp. (0~50)℃; Relative Humidity ≤85%RH (none condensation)			
Storage Environment	Temp. (-20~60)℃; Relative Humidity ≤85%RH (none condensation)			
Power Supply	CCT-3300	CCT-3310	CCT-3320	
	DC 24V	AC 110V	AC 220V	
Dimension	48mm×96mm×80mm (H×W×D)			
Hole Size	44mm×92mm (H×W)			
Installation	Panel mounted, fast installation			

ROC-2015 Single Stage RO Controller

■ Application :

Small size and simple single stage
integration reverse osmosis control system.

■ Main Technical features :

Model	ROC-2015	
Single detection	Dry Contact input	Dry-run protection function
		Low-pressure protection function
		High-pressure protection function
		Water level limit
		High-pressure and low pressure flushing flushing function
Control port	Dry Contact output	Water feeding solenoid valve
		RO flushing solenoid valve
		Booster pump
		Low-pressure water pump
Power supply	AC220V (±10%) 50/60Hz	
Working environment	1) Temperature: (0～50) ℃; 2) Relative Humidity :≤85%RH (no condensation)	
Dimension	48×96×80mm(height ×width×depth)	
Hole size	44×92mm (height ×width)	
Installation	Panel mounted ,fast installtion	
Certification	CE	

ROC-2315 Single Stage Single Channel RO Controller

■ Application:

Single stage RO controller used for conductivity monitoring and process program control.

■ Main technical features:

Controller Model	ROC-2315		
Signal detection (six channels)	Dry contact input	Raw water no water protection	
		Low pressure protection	
		High pressure protection	
		Pure water tank high level	
		External control mode signal	
		Running reset	
Control port (five channels)	Dry contact output	Raw water pump	SPST-NO Load capacity: AC 220V/3A Max; AC 110V/5A Max
		Inlet valve	
		High pressure pump	
		Flush valve	
		Conductivity over-limit drainge valve	
Measurement detection point	Product water conductivity		
Measurement range (ROC-2315)	Product water conductivity: 0.1~200μS/cm, 1~2000μS/cm or 10~999μS/cm (with different sensor) Product water Temp.: 0~50℃		
Temp. compensation	Automatic compensation, with 25℃ as the reference temperature		
Accuracy	1.5% (FS)		
Working environment	Temp. (0~50)℃; Relative Humidity ≤85%RH (none condensation)		
Storage environment	Temp. (-20~60)℃; Relative Humidity ≤85%RH (none condensation)		
Power supply	AC 220V(±10%) 50/60Hz		
Dimension	96mm×96mm×130mm (H×W×D)		
Hole size	91mm×91mm (H×W)		
Installation	Panel mounted, fast installation		

■ Order direction:

Basic order units

ROC-2315 Single Stage RO Controller

Conductivity cell selection:

Conductivity cell constant	Part No.
0.1cm^{-1}	CON3133-13
1.0cm^{-1}	CON1134-13(standard)
10.0cm^{-1}	CON2136-13

Note: CON1134-13 can't be used for food, beverage, medical or sanitary industries.

ROC-8221 Single Stage Double Channels RO Controller

■ Application:

Single stage double channels integration RO controller used for conductivity monitoring and process program control.

■ Main technical features:

Model	ROC-8221		
Signal detection (seven channels)	Dry contact input	Raw water tank level: double channels	Low level
			High level
		Pure water tank level: double channels	Low level
			High level
		Low pressure protection	
		High pressure protection	
		Pretreatment backwash signal	
Control port (five channels)	Dry contact output	Raw water pump	SPST-NO Load capacity: AC 220V/3A Max; AC 110V/5A Max; DC 24V/3A Max
		Inlet valve	
		High pressure pump	
		Flush valve	
		Conductivity over-limit drainge valve	
Measure detection points	Raw water conductivity, product water conductivity, raw water Temp.		
Conductivity Measurement Range	Raw water conductivity	Cell constant 10.0cm-1	(0-20000） μs/cm
		Cell constant 1.0cm-1	(0-2000)μS/cm
	Product water conductivity	Cell constant 1.0cm-1	(0-2000)μS/cm
		Cell constant 0.1cm-1	(0-200)μS/cm
Medium Temp.	0~50℃		
Accuracy	1.5% (FS)		
Communication	RS485 communication (Modbus protocol)		
Working environment	Temp. (0~50)℃; Relative Humidity ≤85%RH (none condensation)		
Storage environment	Temp. (-20~60)℃; Relative Humidity ≤85%RH (none condensation)		
Power supply	DC 24V±4V		
Protection level	IP65 (with back cover)		
Dimension	130mm×180mm×60mm (H×W×D)		
Hole size	122mm×172mm (H×W)		
Installation	Panel mounted, fast installation		

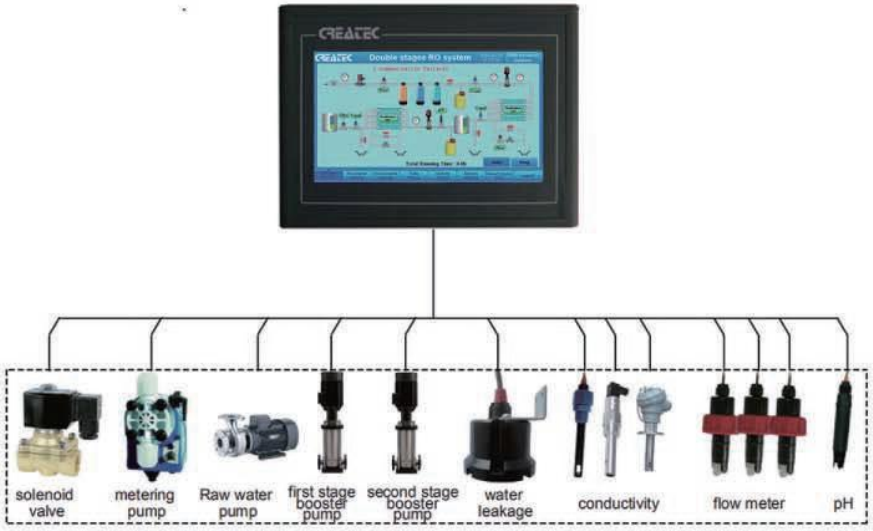
■ Order direction:

Basic order unit : ROC-8221 single stage RO controller

Conductivity cell selection :

Conductivity Cell Constant	Part No.	Remark
0.1cm^{-1}	CON3133-13	According to customer needs choose two pieces conductivity probe .
1.0cm^{-1}	CON1134-13	
1.0cm^{-1}	CON3134-14	
10.0cm^{-1}	CON2136-13	

ROC-7000 Reverse Osmosis Control Integrated System



■ Application Fields

Applicable to all kinds of small and medium-sized single-stage, double-stage reverse osmosis control system. With simple operation, complete measurement and configuration, highly integrated system .

■ Characteristics

- Human-Computer Interface, 7 inch colour touch screen, dynamic process display；
- Conductivity test，raw water, primary and secondary conductivity detection, with ultra-limit alarm and discharge drive；
- Human-computer interaction, pop-up soft keyboard, can set or modify the operating parameters, feature-rich, easy to operate;
- Automatic control, with built-in measurement analysis and DI/DO in control system, embedding the process running software, to achieve highly integration;
- Consumables management, consumables pre-processing capacity, the remaining processing capacity forecast makes the user know the
- operation of the consumables in time;
- Flush mode, the system flush for boot and shutdown, wash time can be free set;
- pH adjustment，Real-time detection of pH,drive ph adjustment pump to balance pH (two-stage) at any time;
- Set the antiscale metering pump control, and chain with the original pump control.
- Leakage detection, real-time detect the system leakage signal, immediately stop if leakage alarm, to prevent the expansion of the situation;
- Flow detection, record the instantaneous flow of raw water, producing water and concentrated water, to save the cumulative flow;
- Restricted function of concentrated water flow, to avoid illegal operation of membrane components premature fouling caused by the pursuit of high recovery rate;
- Data storage, operating data recalls in the form of historical curves and data queue, make the user easier to compare and record, and has a U disk export function, and for data backup;
- Remote communication, RS485 communication port can achieve remote transmission through GPRS/WIFI or Zigebee and other wireless modules, but also access to the Internet to achieve remote real-time monitoring and fault diagnosis and other functions.
- Extended redundancy, the manufacturer can extend on basis of this series for user needs.
- Panel installation, detection modules are all built-in, so that the external distribution lines are rare, with simple and beautiful installation;
- Good electromagnetic compatibility (EMC) design, calmly deal with complex industrial field electromagnetic environment.

ROC-7000 Reverse Osmosis Control Integrated System

■ Main technical features:

Controller type	Single-stage/Double-stage Reverse osmosis control integrated system			
Conductivity measurement parameters	Cell constant	0.1cm^{-1}	1.0 cm^{-1}	10.0cm^{-1}
	Raw water conductivity		（0～2000）μS/cm	（0～20000）μS/cm
	Primary conductivity	（0～200）μS/cm	（0～2000）μS/cm	
	Secondary conductivity	（0～200）μS/cm	（0～2000）μS/cm	
	Temperature compensation	Automatic compensation on the basis of 25 ℃ ,compensation range（0～50）℃		
	Accuracy	Matched precision：1.5 level		
Flow measurement range	Instantaneous flow	（0～999）m3/h		
	Accumulative flow	（0～9999999）m3		
pH measurement parameters	Measurement range	2-12		
	Accuracy	±0.1pH		
	Temperature compensation	Automatic compensation on the basis of 25 ℃ ,compensation range（0～50）℃		
DI acquisition	Input signal	Low pressure switch of Tap water,high level of pure water tank, low level of pure water tank, low pressure switch before the pump, high pressure switch after the primary booster pump,high level of secondary pure water tank, low level of secondary pure water tank,high pressure switch after the secondary booster pump		
	Signal Type	Passive switch contact		
DO Control	Control output	Inlet valve, primary flush valve, primary drain valve, antiscalant pump, raw water pump, primary booster pump, secondary booster pump, secondary flush valve, secondary drain valve, pH adjustment metering pump.		
	Electrical contact	Relay（ON/OFF）		
	Load capacity	3A(AC 250V)~ 3A(DC 30V)		
Display screen	Screen color:TFT；resolution:800×480			
Working power	Working power	DC 24V±4V		
	Power consumption	≤6.0W		
Working environment	Temperature:(0～50)℃；Relative humidity:≤85%RH（non condensation）			
Storage environment	Temperature:（-20～60）℃；Relative humidity:≤85%RH（non condensation）			
Installation	Panel mounted	Hole（Length×Width，192mm×137mm）		

■ Order direction :

ROC-7100 Singe Stage Reverse Osmosis Control Integrated System
ROC-7200 Double Stage Reverse Osmosis Control Integrated System

	ROC-7100 Single-stage reverse osmosis control integrated system	ROC-7200 Double-stage reverse osmosis control integrated system
Conductivity	Raw water conductivity; First stage produced water conductivity ;	Raw water conductivity; First stage produced water conductivity ; Second stage produced water conductivity ;
Flow meter	Raw water flow; First stage produced water flow ; First stage concentrated water Flow;	Raw water flow; First stage concentrated water Flow; Second stage produced water flow ;
Leakage protector	1 channel	1 channel
pH	Raw water pH measurement	First stage produced water pH measuremen

FCT-8350 Flow Meter

■ Application:

Widely used for online measurement of acid&alkali in low concentrations and the low viscosity single-phase fluid of non-trade settlement process.

■ Characteristics:

- K coefficient and standard diameter/non-standard of a variety of settings way, flexible and convenient;
- Different kinds of the engineer working load could be chosen, it can meet the measurement standards of different country and region;
- (instantaneous flow high/low limit alarm, instantaneous flow frequency) multiple alarm settings;
- the frequency pulse of instantaneous flow rate, direct sensor pulse integrating volume frequency division, integrating volume pulse and many kinds of control mode for selection;
- To start the polyline modification for the measurements to provide better precision correction;
- Compatible with tangential type/axial type pulse sensor;
- Small signal cutting and small signal correction function, to meet the operation compensation under low flow rate condition;
- 3.5 inch screen, Multi-parameter display and Chinese/English for selection, Heuristic operation;
- Semiconductor photoelectric relay (non contact), switch control/proportional pulse control;
- It can achieve the ratio of flow parameter pulse pharmacy dosing;
- Measurement/control/transmission each unit can complete electrical isolated, each other without any interference;
- Can program Current transmitting between any two points in whole flow range;
- Isolated (4~20)mA current loop, Instrument/Transmitter for selection;
- EMC design with better ability on anti-interference;
- Meeting High humidity site safety power supply regulation, DC 24V with standard.

Saddle mounting tee

316L st.st.saddle mounting fitting

Saddle seat mounting

DN25~DN100， Saddle mounting tee

DN65~DN300，Saddle seat mounting

saddle mounting fitting

st.st saddle mounting fitting

■ Main technical features:

Measurement Range	Instantaneous flow: (0~2000)m^3/h; Accumulated flow: (0~99999999)m^3
Flow Rate:	(0~5)m/s
Applicable Pipe Diameter	DN25~DN1000 for selection
Resolution	0.001m^3/h
Renew Interval	1S
Accuracy	2.0 level
Repeatability	±0.5%
Probe Input	Range: 0.5Hz~2KHz; Power supply: DC 12V (instrument supply)
Analog output	(4~20)mA, Instrument/Transmitter for selection;
Control Output	Semi-conductor photo electronic relay, Load current: 50mA(max) AC/DC 30V
Control Mode	Instantaneous flow high/low limit alarm, flow variable frequency conversion, probe pulse frequency division, integrating value pulse, control on/off function
Working Power	FCT-8350 DC24V
Power consumption	≤3.0W
Cable Length	5m as standard or (1~500)m for selection
Working Environment	Temp. (0~50)℃; relative humidity≤85%RH (non condensation)
Storage Environment	Temp. (-20~60)℃; relative humidity ≤85%RH (non condensation)
Protection level	IP65 (with back cover)
Dimension	96mm×96mm×94mm (H×W×D)
Hole size	91mm×91mm (H×W)
Installation	Panel mounted, fast installation

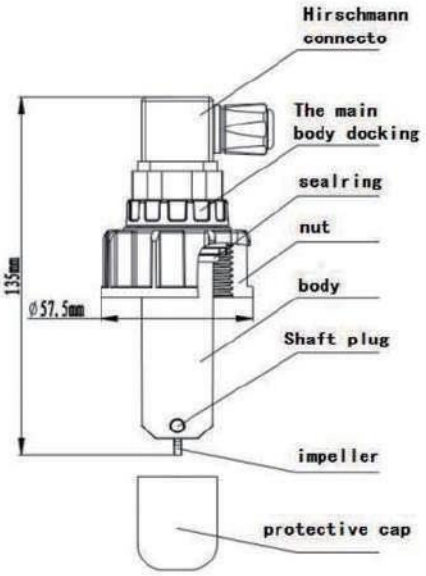
FLP-1600-L Paddle Wheel Flow Sensor

Application:

Windely used for measuring and calculating of flow volume and flow speed of municipal water ,cooling water, pure water, high-pure water, the no stringiness impurity wastewater, thelow-stickiness liquid...

Main technical parameters:

- Material:engineering plastic;
- Method of installation: input uprightly, fixed by screwing;
- Medium temperature: （0～60）℃
- Saved temperature: （-20～70）℃
- proof pressure: 0.6MPa
- Power supply: DC 12V
- Output impulse value: high level ≥8V(p-p)
- Transferring distance(the space between the sensor and the meter)：≤1000m
- Applied pipe diameter: DN25~DN350
- The material of the pipe(plastic, metal, glass fiber reinforced plastic,cement)
- Required circumstance: no strong disturbance of variation magnetic field around the sensor.
- Required water quality: a filter should be installed at the upward position if there are big granules and fiber in the pipe.



FLS-1700-HD Sanitary Digital Paddle Wheel Flow Sensor

Application:

Flow accumulation and control for production processes in the health, pharmaceutical, food, beverage, pure water and other industries;
Meet the online instantaneous flow and accumulated flow measurement of water treatment processes such as clear water, purified water, and distilled water;
Low viscosity liquid flow of beer, brewing, extraction of traditional Chinese medicine ingredients, and other high-end manufacturing;
It can withstand a wide temperature range, and can withstand CIP cleaning and high temperature sterilization and weak acid and alkali decontamination;
Suitable for process control of marine fresh water system and water cooling system;
Application of various clean water process control parameters, not used as a trade settlement flow meter.

Main technical features:

Instrument model	FLS-1700-HD	
Measurement range	Instantaneous flow	(0~2000)m^3/h
	Accumulative flow	(0~99999999)m^3
	Flow rate	(0.6~5)m/s
Accuracy	0.001m^3/h	
Accuracy level	2.5 level	
Output signal	RS485(MODBUS protocol)	
Power supply	DC7~28V; power consumption:<0.5W	
Cable length	10m as standard ,negotiable （1~1000)m	
Storage environment	Temperature:(-20~60) °C; Relative humidity: ≤85%RH(none condensation)	
Protection level	IP66	
Main body material	316L S.St	
Max pressure	≤1MPa	
Max standard temperature	120℃	
Installation mode	Tangential installation	
Pipeline size	1-1/4" 1-1/2" 2" (Can be customized)	
Measure material feature	Single phase (5~120℃)	

FOC-1015 Ultrasonic Open Channel Flow Meter

Application:

Ultrasonic open channel flowmeter is a high-precision flow meter that uses ultrasonic waves to measure Venturi or Parshall troughs.The flowmeter measures the time that the sound wave reflects back after touching the water surface of the channel, and then calculates the flow rate of the channel according to the formula,The flow meter can provide flow output, display flow rate, display total flow, and display water level. This instrument is used with the weir tank and is mainly used to measure the sewage flow in the channel with free flow conditions. When the instrument is working, the sensor is not in contact with the measured fluid, which avoids the contamination and corrosion of sewage in the channel. For measuring sewage flow, it can have higher reliability than other forms of meters.

Main Technical Features:

Flow measurement range	0 ~ 93m3/s (related to the specification of the weir and groove used to determine the range) Accumulated flow range: 99999999 Km3
Suitable weir and groove types	triangular weir, rectangular weir, equal-width weir, Parshall trough (Equipped with triangular weir: 1～2% Equipped with rectangular weir: 1～4% Equipped with Parshall trough: 3%)
Display	Chinese and English large-screen LCD, color TFT (optional)
Display screen	liquid level height, instantaneous flow, cumulative flow, hourly flow, daily flow, weekly flow, monthly flow, year, month, day, battery power (can be set arbitrarily)
Signal input	(Please selected when ordering) Digital signal: RS485 (support Modbus protocol) Current signal: 4-20mA;Transducer Signal: Voltage
Signal output	(Please selected when ordering) Voltage output: DC12V or 24V ;Analog output signal: 0～20mA; 4～20mA load>300Ω; 0～5V; 0～10V;Digital output: RS485 (support Modbus); USB, memory card 8G;
Switch output	two-way NPN/3 relay (AC: 5A 250V DC: 10A 24V)
Working voltage	DC12-24V or AC160V～250V

Characteristics:

- Water and sewage treatment;
- Electricity, mine;
- Food Industry;
- Petrochemical;
- Streams, lakes, rivers;
- Inlet canal, outlet canal, etc

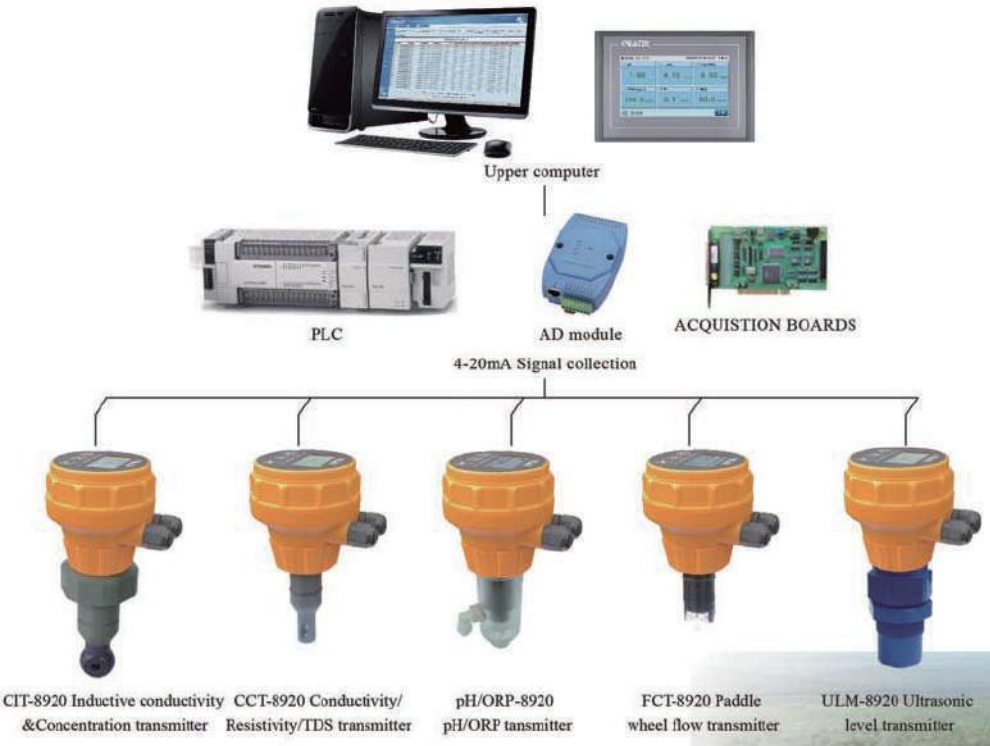
8920 Local display&Integrated transmitter series

■ Application:

- Component analysis data collection at various points in the industrial chemical process;
- Online analysis of various water quality parameters in large-scale water treatment systems;
- On-site data detection and analysis of large sewage treatment plants;
- Combined with DCS system and PLC system to form a distributed automatic control system.

■ Performance characteristics

- Integrated design of sensor and instrument, directly installed on the pipeline;
- The sealed plastic shell can meet the environment of dust, water droplets, rain and fog on site;
- Most of the measurement attributes can be used for two-phase power distribution, and the system failure rate is low;
- The on-site display function eliminates the interaction with the walkie-talkie in the central control room;
- With (4~20) mA and RS485 optional current and data communication modes;
- The built-in electronic switch meets the local servo control of metering pumps in multiple modes;
- Establish stable remote detection and control integration with PLC and DSC systems.



■ Order direction:

Item	Model	description
1	CIT-8920	Inductive conductivity &Concentration
2	CCT-8920	Conductivity/Resistivity/TDS
3	pH-8920	pH
4	ORP-8920	ORP
5	FCT-8920	Flow
6	FET-8920	Insert electromagnetic flow
7	ULM-8920	Ultrasonic level

CIT-8920 Inductive Conductivity/Concentration Transmitting Controller

■ Application:

CIP Pipeline Online Cleaning System for the Beverage, Brewing and Dairy Industry;
Online monitoring of conductivity of highly salty or acid-base corrosive concentrated electrolyte aqueous solutions;
Metal refining, metal surface treatment and mining industry
Monitoring of Water Quality in Petrochemical, Electric, Pharmaceutical, Chemical, Water Treatment, Semiconductor Manufacturing
Liquid connection part: Polytetrafluoroethylene

■ Characteristics:

♦Local display, conductivity measurement range (0.5 ~ 2000) mS/cm;
♦(4~20) mA analog signal and RS485 communication for selection;
♦The instrument module has built-in NaOH, HNO3 concentration curve, and the instrument module has self-learning function. For other unknown curve solutions, the user can calibrate through the custom function of the instrument module;
♦Realize high and low limit alarm control on site;
♦DC 24V centralized power supply, transmitter without polarity connection, internal automatic identification;
♦Good electromagnetic compatibility (EMC) design, easy to deal with complex industrial site electromagnetic environment

■ Main technical features:

Measurement	Conductivity	500μS/cm ~2000mS/cm
	Concentration	1.NaOH, (0-15) % or (25-50) %;
		2.HNO_3 (note the Corrosion resistance of the sensor)
		(0-25) % or (36-82) %;
		3.User-defined concentration curves.
	TDS	250.0ppm ~ 1000ppt
	Temperature	(0 ~ 120) ℃
Accuracy	Conductivity	(500~1999)μS/cm,±1.5%(FS)
		(2~19.9) mS/cm,±1.0% (FS)
		(20~199)mS/cm,±1.0% (FS)
		(200~2000)mS/cm,±1.0% (FS)
	TDS	1.5 level
	Temperature	±0.5℃
Temperature	Element	Pt1000
	Range	(0~120) ℃ linear compensation
Current output		Isolated (4 ~ 20) mA output, maximum loop resistance 500Ω
		Accuracy: ± 0.1mA
Control output		Semiconductor Photoelectric Relay,
		Load Current 50mA (Max), AC/DC 30V (Max)
Communication		RS485, (please check the protocol)
Power supply		DC 24V±4V

pH/ORP-8920 Two-wire pH/ORP Transmitter

■ Application:

Widely used in the solution pH/ORP online analysis in the industrial field, and provide pH/ORP remote measurement data to the PLC acquisition or DCS system acquisition.

■ Characteristics:

♦With the local display of pH/ORP/Temperature measurement in field;
♦With options of a variety of installation modes and accessories;
♦Support six kinds of buffer solution calibration options, compatible with solution standards in different regions;
♦With internal temperature sensor, you can complete the measurement and compensation on site;
♦You can set the pH range (4-20□ mA signal output;
♦DC24V centralized power supply, transmitter non-polar connection (internal automatic identification□;
♦IP65 protection level, to meet stable operation of electromagnetic environment in a variety of industry;

■ Main technical features:

Measurement range	pH	2.00～12.00
	ORP	(-1999～+1999） mV
	Temperature	(0.0～75.0）℃(Thermal element: Pt1000）
Resolution	pH	0.01;
	ORP	1mV
	Temperature	0.1℃
Accuracy	pH	0.1 level
	ORP	±5mV
	Temperature	±0.5℃
Stability	pH	±0.05 pH/24h
	ORP	±3 mV/24h
Buffer solution	Support 10.00;7.00;4.00;9.18;6.86;4.01pH buffer solution	
Working environment	Temperature(0～50）℃;Relative humidity≤85%RH(none condensation）	
Storage Environment	Temperature(-20～60）℃;Relative humidity≤85%RH(none condensation）	
External wire	Non-polar two-wire system	
Output signal	2 wire isolation(4～20）mA analog signal	
Temperature compensation	(0～50）℃	
Input voltage	DC 24V±15%	

CCT-8920 Two-wire conductivity/Resistivity Transmitter

■ Application:

The pipeline installation: conductivity data collection valve for water treatment process all the installation.
The open installation: all open channel, hydrology, water, ocean conductivity (salinity) monitoring open installation;
The wall installation : the conductivity cell using soft connection as a form of industrial field acquisition, the transmitter is installed on the wall.
The anchor drift installation: applied in hydrology, marine remote solar powered wireless data transmission;

■ Characteristics:

♦4~20mA analog signal can be selected;can be connected with DCS/PLC system freely;
♦DC 24Vpower supply,Non polarity connection and internal automatic identification;
♦Good electromagnetic compatibility (EMC) design to deal with complex industrial on-site electromagnetic environment;
♦International standard Two wire system, field installation, remote conductivity data acquisition;
♦The wireless WIFI module can be provided or GPRS module can build a remote wireless data acquisition;
♦Supporting the solar panel charging module, we can long-term drift collection.

■ Main technical features:

Transmitter name	CCT-8920 Series Two-wire conductivity/Resistivity transmitter			
Measurement range	(0.05~18.25) MΩ.cm	(0.5~100) μs/cm	(1.0~1000) μs/cm	(0.05~10) ms/cm
Constant	0.01 cm^{-1}	0.1 cm^{-1}	1.0 cm^{-1}	10.0 cm^{-1}
Material	Stainless steel	Stainless steel	Graphite	Graphite
Accuracy	2.0 level	1.5 level	1.5 level	1.5 level
Temperature	(0 ~50)℃			
Working environment	Temperature(0 ～ 50) ℃ ;Relative humidity ≤ 85%RH(none condensation)			
Storage Environment	Temperature(-20 ～ 60) ℃ ;Relative humidity ≤ 85%RH(none condensation)			
External wire	Non-polar two-wire system			
Output signal	2 wire isolation(4～20) mA analog signal			
Temperature compensation	(0～50) ℃			
Input voltage	DC 24V±15%			
Installation	Pipe installation /flow cell / immersion type			

ULM-8920 Ultrasonic Level Meter Transmitter

■ Application fields

It widely used in liquid-level measurement and material-level in the oil, paper, mining, power plants, chemical industry, water treatment plants, waste water purification, pharmaceutical, agricultural pumping, environmental monitoring, sewage treatment and other fields .

■ Performance characteristics

- voltage range wide, DC voltage (9-32) V;
- two-channel semiconductor photoelectric switch control output;
- can be set to any output starting and ending;
- manually set the digital filter ;
- set emission intensity according condition;
- a serial communication, better compatibility with different scene.

■ Technical specification

Model	ULM-8920	
Measurement range	3m（The longer can be customized ）	
Dead zone	0.3m（can be customized ）	
Resolution	0.001m	
Accuracy	±0.3%×FS or ±2mm(max)	
Display	4 LED	
Transmitting Output	No.of channel	Single channel (4~20)mA
	Loop resistance	RL＞600Ω
Commmunication port	RS-485（Modbus protol）	
Control output	No.of Channel	Double channels
	Electrical contact	Semiconductor photoelectric relay 50mA（Max），AC/DC 30V
Working power source	Power supply	DC (12~24)V
	Power Consumption	≤1.5W
Working environment	Temperature:(0~50) ℃; Relative humidity: ≤85%RH(none condensation)	
Storage environment	Temperature:(-40~85) ℃; Pressure: Normal ; Relative humidity: ≤85%RH(none condensation)	
Protection	IP65	
Dimension size	90mm×200mm×(M60)	
Installation method	Installation hole M60×2	

FET-8920 Insert Electromagnetic Flow Meter

Application:

It can be widely used in the measurement of fluid flow in industrial processes such as clean water pipeline, sewage treatment, petrochemical, metallurgy, papermaking and other industries.

Characteristics:

- Engineering units can be selected, standard pipe diameter / non-standard pipe diameter can be set;
- Internal optional (4~20) mA analog signal, meter/transmission dual mode/RS485 digital communication and pulse output, with perfect flow alarm control function;
- Integrated tangential measurement and installation accessories are abundant and easy to construct;
- DC 9-28V power supply、Non polarity connection and internal automatic identification;

Main Technical Features:

Instrument model	FET-8920	
Measurement range	Instantaneous flow	(0~2000)m^3/h
	Accumulative flow	(0~99999999)m^3
	Flow rate	(0.5~5)m/s
Resolution	0.001m^3/h	
Accuracy level	Less than 2.5% RS or 0.025m/s.whichever is the largest	
Conductivity	>20μS/cm	
(4~20)mA output	Number of channels	Single channel
	Technical features	Isolated,reversible,adjustable, meter/transmission dual mode
	Loop resistance	400Ω（Max）, DC 24V
	Transmission accuracy	±0.1mA
Control output	Number of channels	Single channel
	Electrical contact	Semiconductor photoelectric relay
	Load capacity	50mA（Max）, DC 30V
	Control mode	Instantaneous amount upper/lower limit alarm
Digital output	RS485(MODBUS protocol),Impulse output1KHz	
Working power source	Power supply	DC 9~28V
	Power Consumption	≤3.0W
	Diameter	DN40~DN300(can be customized)
Working environment	Temperature:(0~50) ℃; Relative humidity: ≤85%RH(none condensation)	
Storage environment	Temperature:(-20~60) ℃; Relative humidity: ≤85%RH(none condensation)	
Protection grade	IP65	
Installation method	Insertion pipeline installation	

The flow meter can be quickly installed on the pipe with a dedicated saddle mounting fitting.

The flow meter lug must be snapped into the mounting.

FCT-8920 Flow Transmitter

■ Application:

Widely use in Water pipeline in industrial process,Single-phase fluid with low viscosity,Acid and alkali liquid with low concentration,Non-trade settlement process measurement and control.

■ Performance characteristics:

- Various setting ways of coefficient K and standard pipe diameter/non-standard pipe diameter;
- A variety of engineering units can be chose to meet measurement standards of different countries and areas;
- Internal optional (4–20)mA analog signal, instrument/transmitting dual-mode/ RS485 digital communication;
- Programming current transmitting between any two points in the range of whole velocity;
- Flow alarm, flow frequency conversion, impeller pulse frequency division, integrating volume pulse, a variety of control mode selection;
- DC24V centralized power supply, transmitter non-polarity connection, internal automatic identification;
- Good electromagnetic compatibility(EMC) design, compatible with complex electromagnetic environment of industrial field.

■ Technical specification:

Instrument model	FCT-8920	
Measurement range	Instantaneous flow	(0~2000)m^3/h
	Accumulative flow	(0~99999999)m^3
	Flow rate	(0~5)m/s
Resolution	0.001m^3/h	
Refresh rate	1s	
Accuracy grade	Grade 2.0	
Repeatability	±0.5%	
(4~20)mA output	Number of channels	Single channel
	Technical features	Isolation, inversion, adjustable, instrument/transmitting dual mode
	Loop resistance	300Ω（Max）、DC 24V
	Transmission accuracy	±0.1mA
Control output	Number of channels	Single channel
	Electrical contact	Semiconductor photoelectric relay
	Load capacity	50mA（Max），AC/DC 30V
	Control mode	Upper/lower limit alarm of instantaneous flow, integrating amount/pulse, instantaneous flow frequency conversion, impeller pulse frequency division
Digital output	RS485(MODBUS protocol)	
Working power source	Power supply	DC 24V±4V
	Power Consumption	≤3.0W
	Applicable pipe diameter	DN25~DN350(otherwise agreed about large pipe diameter)
Working environment	Temperature:(0~50) °C; Relative humidity: ≤85%RH(none condensation)	
Storage environment	Temperature:(-20~60) °C; Relative humidity: ≤85%RH(none condensation)	
Protection grade	IP65	
Installation method	Plug-in pipeline installation	

Pressure Transmitter / Temperature Transmitter

■ Pressure Transmitter

Photo			
Sensor type	Piezoresistive	Diffusion Silicon	Ceramic Capacitor
Accuracy rating	0.50%	0.50%	0.50%
Relative Pressure (Range)	0-0.05-60MPa	0-0.01-40MPa	0-0.001-2MPa
Signal Output		4-20mA or 1-5V	
Power Supply	+24VDC±15%	24VDC±15%	24VDC±15%
Communication	None	Optional: Hart	Optional: RS485
Body Material		Stainless Steel	
Explosion Proof	None	ExdIIBT6 or ExiaIICT4	ExdIIBT6 or ExiaIICT4
Protection Rating	IP60	IP65	IP65
Connection		Thread or Flange	
Fluid Temperature	-20℃~85℃	-20℃~85℃	-20℃~85℃
Ambient Temperature	-30℃~60℃	-30℃~60℃	-30℃~60℃

■ Temperature Transmitter

■ Characteristics

- Thermal resistance measurement range: Pt100 -200 ~ 600 ℃, Cu50 -50 ~ 150 ℃
- Thermocouple Measurement Range: K indexing 0 ~ 1200 ℃; E indexing: 200 ~ 800 ℃; S Indexing: 0 ~ 1600 ℃
- Accuracy: RTD, ± 0.2% thermocouple, 1% to 2%, the cold junction compensation accuracy ± 2 ℃ / 60 ℃
- Temperature drift: ± 0.025% ℃, annual drift <± 0.5%
- Supply voltage: 24VDC ± 10% (4 ~ 20mA current-modules minimum operating voltage of 10V , remaining need for load)
- Load capacity: 0 to 600 ohms (at 24V voltage) line variation <± 0.015% V Voltage - Maximum output current: <3mA output voltage of 3V operating voltage up to work

Accessories

■ **Conductivity Sensor**

■ **Dissolved Oxygen Sensor**

■ **pH/ORP Sensor**

■ **Flow Sensor**

■ **Digital Sensor (4-20mA output or RS485 for selecting)**

■ **Accessories**

■ **Sensor Bracket**