

"Your One Stop Service Provider on Environmental & Safety Consultation, Training and Instruments."











# **ABOUT US**



# **Environmental Competency Consultancy**

We are Environmental Competency Consultancy Sdn Bhd is a registered company under Malaysia and as well as a certified training provider by Human Resource Development Fund (HRDF).

We provide specialize consultancy services and project coordination that related to any environmental pollution control system which included Industrial Effluent Treatment System (IETS), Scheduled Waste Management (SWM) and Air Pollution Control System (APCS).

In order to assist industry to achieve the latest goal from Department Of Environment (DOE), we specialize in providing the specific training course which related to the environmental pollution control system. The training courses is specifically to assist the industry personnel in enhance their technical knowledge and skills while handling the environmental pollution control system.

We also provide industrial safety courses which provides workers and managers with a greater understanding of the safety and health program itself, so that they can contribute to its development and implementation. We assist them in identifying various hazard in their work places and coming up with the best countermeasure available in order to increase productivity and quality of work.

#### **Vision**

To be the creative, innovative, and value added training and service provider through the continuous improvement.

#### Mission

To be the preferable and reliable training and provider that achieve client expectation.

# **Objective**

- To provide valuable training in environmental aspect
- To provide effective guidance and solution in environmental management
- To provide extraordinary learning experience for industry personal in Environmental Management



## **FLOW METER SERIES**

Model ECC-EFM

Diameter Nominal DN10~DN1000

0.6~4.0MPa Nominal Pressure

> $\pm 0.5\%$ ,  $\pm 2$ mm/s(flow rate<1m/s) Accuracy PFA,F46,Neoprene,PTFE,FEP Liner material

Stainless steel SUS316, Hastelloy C, Titanium, Electrode material

Tantalum Platinum-iridium

**Medium Temperature** Integral type: -10°C~120°C

Split type: -25°C~120°C

-10°C~60°C **Ambient Temperature** 

**Electrical conductivity** Water 20µS/cm other medium 5µS/cm

IP65, IP68(optional) Structure type Protection Class

**Product Standard** JB/T 9248-1999 Electromagnetic



**Electromagnetic Flow Meter** (Flange type)



**Electromagnetic Flow Meter** (Split type)

Model ECC-EFM **Diameter Nominal** DN10~DN1000

Nominal Pressure | 0.6~4.0MPa

**Accuracy**  $\pm 0.5\%$ ,  $\pm 2$ mm/s(flow rate<1m/s) Liner material PFA,F46,Neoprene,PTFE,FEP **Electrode material** Stainless steel SUS316, Hastellov C.

Titanium, Tantalum Platinum-iridium

Medium Temperature | Integral type: -10°C~120°C

Split type: -25°C~120°C

Ambient Temperature |-10°C~60°C

Electrical conductivity Water 20µS/cm other medium 5µS/cm **Structure type** | Protection Class IP65, IP68(optional)

Product Standard | JB/T 9248-1999 Electromagnetic

ECC-2000H Model Pipe size DN32-DN6000

Accuracy ±1%

Totalizer 7-digit totals for net positive and negative flow respectively

Liquid types Virtually all liquids

Convertor: -20~60°C, Flow Transducer:-30~160°C Working temperature

Convertor:85%RH; Flow transducer; IP67 **Working humidity** 4×8 Chinese characters or 4×16 English letters Display

Power supply 3 AAA built-in Ni-H batteries

Date logger Built-in data logger can store over 2000 lines of data

Case material ABS

Dimension 200\*93\*32mm(Convertor)

Handset weight 500g with batteries



**Handheld Ultrasonic Flowmeter** 

# ONLINE MONITORING INSTRUMENTATION





pH Meter, pH Controller

Model ECC-pH6.0

Measure range pH: 0-14 pH, ±0.02

ORP: -1000 ~1000mV, ±1mV

**Resolution** 0.01pH; 1mV

**Stability** pH:≤0.02pH/24h; ORP: ≤3mV/24h

Measuring medium Liquid
Input Resistance ≥10~12Ω

**Temp compensation** Manual/ Auto temperature compensation

**Temperature Range** □~100°C, NTC10K or PT1000

Communication | RS485, Modbus-RTU

**Signal output**  $\boxed{4-20\text{mA}}$ , maximum loop  $750\Omega$ , 0.01%FS

Power supply AC220V±10%, 50Hz

Relay output | 250V, 3A

Model

Relay output

ECC-pH8.0 Model Measure range pH: 0-14 pH, ±0.02 ORP: -1000 ~1000mV, ±1mV Resolution 0.01pH; 1mV pH:≤0.02pH/24h; ORP: ≤3mV/24h **Stability** Measuring medium Liquid ≥10~12Ω **Input Resistance** Temp compensation Manual/ Auto temperature compensation **Temperature Range** 0~100°C, NTC10K or PT1000 Communication RS485, Modbus-RTU Signal output 4-20mA, maximum loop 750Ω, 0.01%FS Power supply AC220V±10%, 50Hz

250V, 3A



#### pH Meter, pH Controller



Relay output

**TDS Meter, EC Controller** 

Measure range 0.01 electrode: 0.02~20.00us/cm 0.1 electrode: 0.2~200.0us/cm 1.0 electrode: 2~2000us/cm 10.0 electrode: 0.02~20ms/cm Resolution ±1%FS Stability ±1%FS/24H Measuring medium Liquid **Input Resistance** ≥10~12Ω Temp compensation Manual/ Auto temperature compensation -10-130°C, NTC10K or PT1000 **Temperature Range** Communication RS485, Modbus-RTU Signal output 4-20mA, maximum loop  $750\Omega$ , 0.1%FSAC220V±10%, 50Hz Power supply

ECC-TDS210

250V. 3A



# ONLINE MONITORING INSTRUMENTATION

Model ECC-DO700

Measure range 0-20mg/L,0-20ppm,0-45deg C

Resolution Resolution: ±3%, Temperature: ±0.5°C

Pressure range ≤0.3Mpa

**Calibration** Automatic air calibration, Sample calibration

Sensor material SUS316L+PVC (Ordinary Version),

Titanium Alloy (Seawater Version)
O-ring: Fluoro-rubber; Cable: PVC

Cable length Standard 10-Meter Cable, Max : 100m

Display 128 \* 64 dot matrix LCD with LED backlight

Output 4-20mA(Max three-way);

RS485 MODBUS; Re lay output(Max three-way);

Power supply AC220V, 50Hz,(optional 24V)



#### **Dissolved Oxygen Meter**

Model Main materials ECC-PPS200 Main Body:SUS316L (Ordinary Version),

Titanium Alloy (Seawater Version)

Upper and Lower Cover: PVC; Cable: PVC

Waterproof rate Measurement range

0.01-20000 mg/L、0.01-45000 mg/L、

0.01-120000 mg/L

Indication resolution

Less than ± 5% of the measured value ≤0.4Mpa

Pressure range Flow velocity

≤2.5m/s、8.2ft/s

Storage temperature Environment temperature

\_\_\_\_\_.511//5, 6.21//5 -15~65°C

Calibration

0~45°C

**IP68** 

Calibration
Cable length

Sample Calibration, Slope Calibration

Cable length Standard 10-Meter Cable, Max Length: 100 Meters
High voltage baffle Aviation Connector, Cable Connector

Sensor size Diameter 60mm\* Length 256mm

Sensor weight 1.65 KG



**Suspended Solids Meter** 

Model ECC-PTU200

**Display** 128 \* 64 dot matrix LCD with LED backlight,

which can be operated under the direct sunlight

Power supply AC:AC220V, 50Hz, 5W; DC:DC24V Output Three-way analog output 4-20mA,

Note: the maximum load is 500 ohms

Relay Three-way relay can be set up

**Digital communication** MODBUS RS485 communication function,

Material of which can transmit real-time measurements outside shell Lower casing: Aluminum with powder covering

cover:PA66+GF25+FR

Ingress protection IP65

**Size** 145\*125\*162mm L\*W\*H

Weight 1.3KG



**Turbidity Meter** 

# **ELECTRODE SELECTION**



Electrode Model	Designation	pH Range	Temperature Range
ECC -pH5019	Plastic pH Sensor	0-14pH	0-80℃
ECC -pH5041	Glass pH Electrode	0-14pH	0-90℃
ECC -pH5050	High Temperature Glass pH Probe	0-14pH	0-130℃
ECC -pH5022	Germany pH Electrode	0-14pH	-5-80°C
ECC-pH5013A	PTFE pH Electrode	0-14pH	0-90℃
ECC -pH5012	Desulfurization pH Electrode	0-14pH	0-60℃















# **ELECTRODE SELECTION**

Electrode Model	Designation	pH Range	Temperature Range
ECC-ORP5011	Industrial ORP Electrode	±2000mV	0-60℃
ECC-ORP5041	Glass ORP Electrode	±2000mV	0-90°C
ECC-TDS-6011	Conductivity Sensor (K=10.0)	(0.2~20)mS/cm	0-50°C
ECC-TDS-6011	Conductivity Sensor (K=1.0)	(2.0~2000)μS/cm	0-50°C
ECC-TDS-6011	Conductivity Sensor(K=0.1)	(0.2~200)μS/cm	0-50°C
ECC-TDS-6011	Conductivity Sensor(K=0.01)	(0.02~20.00)μS/cm	0-50°C













#### **INTELLIGENT RECORDER AND**



## **EXTERNAL DISPLAY**



**ECC-R9600** 

Number of Inputs	1~18channels				
Sampling period	1s,2s,3s1h				
Sampling speed	1s				
Power supply	176 to 264 VAC				
Rated power supply frequency	47-63 Hz (automatic switching				
Power consumption	20 VA (max., for 264 VAC pov	ver supply)			
Ambient temperature	0 to 50 °C				
Ambient humidity	10% to 85%				
Input	Range	Measurement	Display resolution		
		accuracy ( %FS )			
		, , , ,			
DCV	1-5 V	±0.1	1mv		
DCA	(4~20)mA	±0.2	1mv		
	(0~20)mV,(-20~20)mV ±0.2				
	,(0~100)mV 1mv				
In word		Management	Disalsons alofon		
Input	Range ( °C ) Measurement Display resolutio				
	<b>■</b>				
(Thermocoupletype)		accuracy (°C)			
	600 ~ 1800	accuracy (°C) ±2.4	0.1°C		
(Thermocoupletype)		±2.4			
(Thermocoupletype)  B  E	-200 ~ 1000	±2.4 ±2.4	0.1°C		
(Thermocoupletype)  B  E  J	-200 ~ 1000 -200 ~ 1200	±2.4 ±2.4 ±2.4	0.1°C		
(Thermocoupletype)  B  E	-200 ~ 1000 -200 ~ 1200 -200 ~ -100	±2.4 ±2.4 ±2.4 ±3.3	0.1°C 0.1°C 0.1°C		
(Thermocoupletype)  B  E  J	-200 ~ 1000 -200 ~ 1200 -200 ~ -100 -100 ~ 1300	±2.4 ±2.4 ±2.4 ±3.3 ±2.0	0.1°C		
(Thermocoupletype)  B  E  J  K	-200 ~ 1000 -200 ~ 1200 -200 ~ -100	±2.4 ±2.4 ±2.4 ±3.3	0.1°C 0.1°C 0.1°C 0.1°C		
(Thermocoupletype)  B  E  J  K	-200 ~ 1000 -200 ~ 1200 -200 ~ -100 -100 ~ 1300 -50 ~ 100	±2.4 ±2.4 ±2.4 ±3.3 ±2.0 ±3.7	0.1°C 0.1°C 0.1°C 0.1°C 0.1°C		
(Thermocoupletype)  B  E  J  K	-200 ~ 1000 -200 ~ 1200 -200 ~ -100 -100 ~ 1300 -50 ~ 100 100 ~ 300	±2.4 ±2.4 ±2.4 ±3.3 ±2.0 ±3.7 ±2.0	0.1°C 0.1°C 0.1°C 0.1°C 0.1°C 0.1°C		
(Thermocoupletype)  B  E  J  K	-200 ~ 1000 -200 ~ 1200 -200 ~ -100 -100 ~ 1300 -50 ~ 100 100 ~ 300 300 ~ 1600	±2.4 ±2.4 ±2.4 ±3.3 ±2.0 ±3.7 ±2.0 ±1.5	0.1°C 0.1°C 0.1°C 0.1°C 0.1°C 0.1°C 0.1°C		
(Thermocoupletype)  B  E  J  K	-200 ~ 1000 -200 ~ 1200 -200 ~ -100 -100 ~ 1300 -50 ~ 100 100 ~ 300 300 ~ 1600 -200 ~ -100	±2.4 ±2.4 ±2.4 ±3.3 ±2.0 ±3.7 ±2.0 ±1.5 ±1.9	0.1°C 0.1°C 0.1°C 0.1°C 0.1°C 0.1°C 0.1°C 0.1°C		
(Thermocoupletype)  B  E  J  K  S	-200 ~ 1000 -200 ~ 1200 -200 ~ -100 -100 ~ 1300 -50 ~ 100 100 ~ 300 300 ~ 1600 -200 ~ -100 -100 ~ 380	±2.4 ±2.4 ±2.4 ±3.3 ±2.0 ±3.7 ±2.0 ±1.5 ±1.9 ±1.6	0.1°C 0.1°C 0.1°C 0.1°C 0.1°C 0.1°C 0.1°C 0.1°C 0.1°C		

-200 ~ 1300

Model ECC-1100

**Display** Dua

Dual-screen LED display

Dimension

A. 160\*80\*110mm

B. 80\*160\*110mm

C. 96\*96\*110mm

D. 96\*48\*110mm

E. 48\*96\*110mm

F. 72\*72\*110mm

G. 48\*48\*110mm

Power supply

AC/DC100~240V (AC/50-60Hz)

DC 20~29V

Output

4-20mA (RL≤600Ω)

RS-485 communication interface(Modbus)

Relay output



0.1°C

±3.0

Digital Meter /
Digital Display Controller



#### **HORIBA PRODUCTS**

pH Range Resolution

**Accuracy** 

**Calibration Points Buffer Options** 

**ORP Range** Resolution

Accuracy **Temperature Range** 

Resolution Accuracy

**Electrode Status Diagnostic Messages** 

Display Inputs

**Power Requirement** Weight

**Dimensions** 

-2.00 to 20.00 pH

0.1, 0.01 pH

 $\pm 0.01 pH$ 

Up to 5

USA, NIST

± 2000 mV

0.1 mV

± 0.2 mV

-30.0 to 130.0°C

0.1°C

± 0.4°C

On screen display

Custom black and white static LCD BNC, phono, DC sockets

Output RS232

AC adaptor, 100-240V, 50/60Hz

170(L) x 174(D) x 73(H) mm



#### LAQUA PH1100 pH/ **ORP/Temperature**



**LAQUA DO210** DO/Temperature (°C/°F)

DO Range

0.0 to 20.00 mg/L

0.0 to 200.0%

0.0 to 40.0 ppt

0.01 mg/L, 0.1% Resolution Accuracy

± 0.1 mg/L

Up to 2

0.1 °C / °F

± 0.5 °C / ± 0.9 °C

Salinity Compensation **Temperature Compensation** 

Yes **DO Probe Type** Galvanic integrated with temperature sensor

**Calibration Points** 

**Temperature Range** 

Resolution

Accuracy **Calibration Option** 

Display

Housing

Power Requirement

**Battery Life** 

**Meter Dimensions Meter Weight** 

Custom LCD with backlight

Yes

IP67, shock & scratch resistant, non-slip 2 x AA batteries

-30.0 to 130.0 °C / -22.0 to 266.0 °F

> 500 hours

160 (L) x 80 (W) x 40.60 (H) mm

Approx. 260 g (with batteries) /

216 g (without batteries)

Conductivity Range Resolution

...µS/cm to 200.0 mS/cm (k=1.0) 0.05% full scale

Accuracy

±0.6% full scale; ±1.5% full scale > 18.0 mS/cm

Reference Temperature Temperature Coefficient

15 to 30 °C (adjustable) 0.00 to 10.00% (adjustable)

**Cell Constant** 

0.1, 1.0, 10.0 (adjustable)

**Calibration Points Measurement Unit** 

Up to 4 (Auto) / Up to 5 (Manual)

**TDS Range** 

S/cm, S/m (selectable / auto-ranging) ...ppm to 100 ppt (TDS factor=0.5)

Resolution

0.01 ppm (mg/L) / 0.1 ppt (g/L)

Accuracy

±0.1% full scale

**TDS Curves** Resistivity Range Linear (0.40 to 1.00), EN27888, 442, NaCl

0.000 Ω•cm to 20.0 MΩ•cm

Resolution

0.05% full scale

Accuracy Salinity Range

 $\pm 0.6\%$  full scale;  $\pm 1.5\%$  full scale > 18.0 M $\Omega$ •cm 0.0 to 100.0 ppt / 0.00 to 10.00 %

Resolution

0.1 ppt / 0.01%

Accuracy

±0.2% full scale

**Salinity Curves** 

NaCl / Seawater

**Calibration Option** Temperature Range

> Resolution 0.1 °C / °F Accuracy

-30.0 to 130.0 °C / -22.0 to 266.0 °F

± 0.5 °C / ± 0.9 °C



**LAQUA EC210** Conductivity/TDS/ Res/Sal/Temp (°C/°F)

# HORIBA PRODUCTS



Model	pH-11	pH-22	pH-33
Measurement Principle		Glass Electrode	
Minimum Sample Volume	0.1	ml (0.05 ml with Sampling Sh	neet B)
pH Range / Resolution	0.0 to 14.0 pH / 0.1 pH 0.00 to 14.00 pH / 0.01 pH		
Accuracy	± 0.1 pH	± 0.01 pH	
Maximum pH Calibration Points	2 3		5
pH Calibration Curves	USA: 1.68, 4.01, 7.00, 10.01 & 12.46 /NIST: 1.68, 4.01, 6.86, 9.18 & 12.46		
mV Range / Resolution	± 650 mV / 1 mV		
Temperature Display / Resolution	-		0 to 50.0 °C / 0.1 °C
Accessories Included	pH 7.00 & 4.01 pH Buffers (14 ml each) CR2032 Batteries (2) • Dropper • Instruction & Quick		





Model	EC-11	EC-22	EC-33	Salt-11
Measurement Principle	2 Electrode Bipolar AC			
Minimum Sample Volume		0.12 ml		
Measurement Range /Resolution	Conductivity 0 to 199 µS/cm (1 µS/cm) 200 to 1999 µS/cm (1 µS/cm) 2.00 to 19.99 mS/cm (0.01 mS/cm)	Conductivity 0 to 199 µS/cm (1 µ 200 to 1999 µS/cm (1 2.00 to 19.99 mS/cm (0. 20.0 to 199.9 mS/cm (0	μS/cm) 01 mS/cm)	Salt 0.0 to 100.0 g/L (0.1 g/L)
	_		TDS 0.0 to 99.9 ppm (0.1 ppm) 100 to 999 ppm (1 ppm) 1000 to 9990 ppm (10 ppm)	Salt 0.0 to 100.0 g/L (0.1 g/L)
Accuracy	± 2% full	scale (for each range)	,	± 10% of actual value
Maximum Calibration Points	2	3		2
Calibration Curves	1413 µS/cm, 12.88 mS/cm	1413 µS/cm, 12.88 mS mS/cm	/cm, 111.8	NaCl / Sea water
	-		TDS Factor (0.4 to 1.0) / EN 27888 / 442 / NaCl	
Temperature Display /Resolution	_		0 to 50.0 °C (0.	1 °C)
Accessories included	·	mS/cm Conductivity Standa ml each)	`	0.5% & 5.0% NaCl Standard Solutions (14 ml each)
	Conditioning Solution ( Storage Case	4 ml) • CR2032 Batteries (2	) • Dropper • Instru	ction & Quick Manual •

#### **GENERAL SPECIFICATIONS**

Function	Automatic Range • Automatic Standard Recognition • Temperature Compensation (2%/°C fixed) •  Temperature Calibration* • Auto Hold  / Auto Stable • Automatic Power Off (30 mins.) • Low Battery Indicator • IP67 Water / Dust Proof •  Replaceable Sensor
Display Custom (monochrome) digital LCD with backlight	
Operating Temperature & Humidity	5 to 40 °C, 85% or less in relative humidity (no condensation)
Battery Life	Approx. 400 hrs. continuous use without backlight
Material	ABS epoxy body / Titanium coated with platinum black sensor
Dimensions 164 x 29 x 20 mm(excluding projections)	
Mass Approx. 50g (including sensor and batteries)	



# **APERA PRODUCTS**



Model	Apera pH 850		
pH	Measuring Range		(0 to 14.00) pH
	Resolution		0.1/0.01 pH
	Accuracy		±0.01 pH ±1 digit
		Compensation Range	(0 to 100)°C (Auto. or Manual)
	Calibration poi		1 to 3 points
mV	Measuring Ra	nge	±1000mV
	Resolution		1mV
	Accuracy		±0.2% FS ±1 digit
Temp.	Measuring Range		0 to 100°C
	Resolution		0.1°C
	Accuracy		±0.5°C±1 digit
Power		3* AA alkaline batteries	
Dimension & Weight		Meter: (88*170*33)mm / 313g Case: (360*270*76)mm / 1.6kg	
Connector		BNC for pH and ORP; RCA for temperature	
Accesories		PH850 meter, 201T-F pH/temp. electrode, 50ml of pH buffers (4.00, 7.00), 50ml of conductivity standards (1413µS, 12.88mS), instruction manual, screwdriver (for battery replacement), carrying case	

Model	Apera DO 850		
Dissolved Oxygen	Dynamic Range	(0-20.00) mg/L (ppm), (0-200.0)%	
, ,	Resolution	0.01/0.1mg/L (ppm), 0.1/1%	
	Accuracy	±2% reading or ±2% saturation, whichever is greater ±2% reading or ±0.2 mg/L, whichever is greater	
	Response Time	≤30 s (25°C , 90% response)	
	Calibration Points	Saturation Point & Zero Oxygen	
	Temperature Compensation	Automatic, (0 to 50)°C	
	Pressure Compensation	Automatic, (60 to 120) kPa	
	Salinity Compensation	Manual, (0 to 45) ppt	
Temperature	Range	(0 to 50.0)°C	
	Resolution	0.1°C	
	Accuracy	±0.5°C	
Other	Batteries	AA x 3 (1.5V×3)	
	IP Rating	IP57	
	Dimensions and Weight	Meter: 88×170×33 mm/313g With case: 360×270×76 mm/1.3kg	
	Product Certificate	RoHs, CE	





Model	Apera TN400	
Measuring Range	0 to 1000 NTU, automatic range selection:	
	0.01 to 19.99 NTU	
	20.0 to 99.9 NTU	
	100 to 1000 NTU	
Resolution	0.01/0.1/1 NTU	
Reading Error	≤ ±2 % of reading± stray light	
Repeatability	≤ ±1% of reading or 0.02 NTU, whichever is greater	
Calibration Standards	0.02 NTU, 20.0 NTU, 100 NTU, 800 NTU(Polymer)	
Light Source	Infrared light emitting diode (850nm wavelength)	
Detector	Silicon photovoltaic	
Display	TFT Color screen	
Sample Vials	Φ25×60 mm, high borosilicate glass with screw cap	
Sample Volume	18 ml	
Operating Temp. Range	0 to 50°C (32 to 122°F)	
Power Supply	4× AA Alkaline Batteries	
IP Rating	IP67	
Dimension/Weight	Meter: (90×203×80)mm / 385 g	
	Portable Case: (310×295×110)mm / 1.5 kg	
Quality and Safety Certificate	ISO9001:2008 & CE	

# **SOUND LEVEL METER**



Range	30 to 130dB (3 ranges)		
Basic accuracy	±1.4dB		
Frequency Range	31.5 to 8000Hz		
Weighting	A and C		
Response Time	Fast (125ms) / Slow (1s)		
Memory	20M data records using 2G SD card		
Analog Output	AC		
Dimensions	9.8 x 2.9 x 1.9" (250 x 73 x 48mm)		
Weight	18.3oz (520g)		
Features			
Auto or Manual ranging			
Large backlit LCD display	Large backlit LCD display		
AC analog output for connection to an analyzer or record	AC analog output for connection to an analyzer or recorder		
Stores 99 readings manually and 20M readings via 2G SI	Stores 99 readings manually and 20M readings via 2G SD card		
Records readings with real date and time stamp			
	User programmable sampling rate: 1 to 3600 seconds		
Min/Max and Data Hold functions	Min/Max and Data Hold functions		
Auto power off with disable function	Auto power off with disable function		
Complete with 6 AA batteries, SD Card, wind screen, and	hard carrying case		



# **AIRFLOW METER**



Specifications	Range	Max Resolution	Basic Accuracy
Pressure	-		·
psi	0.7252psi	0.0001psi	±0.3%FS
mbar	50.00mbar	0.01mbar	±0.3%FS
inH <sub>2</sub> O	20.07inH <sub>2</sub> O	0.01inH₂O	±0.3%FS
mmH <sub>2</sub> O	509.8mmH₂O	0.01mmH₂O	±0.3%FS
Pa	5000Pa	1Pa	±0.3%FS
Linearity/Hysteresis	±0.29FS		
Maximum Pressure	10psi		
Air Velocity/Flow			
ft/min	200 to 15733	1	±1% FS
m/s	1 to 80.00	0.01	±1% FS
km/h	3.5 to 288.0	0.1	±1% FS
MPH	2.25 to 178.66	0.01	±1% FS
knots	2.0 to 154.6	0.1	±1% FS
CFM/CMM	0 to 99,999	0.001	±1% FS
Temperature	32.0 to 122.0°F (0 to 50°C)	0.1°	±3°F/1.5°C
Dimensions/Weight	Meter: 8.2 x 2.9 x 1.9" (210 x 75 x 50mm) / 12oz (340g); Pitot Tube: 15.4 x 7.7" (390 x 195mm); Diameter 0.32" (8mm) / 7.2oz (204g)		

# **GAS DETECTOR**



Size	5.1 x 2.8 x 2.0 in. / 13.1 x 7.0 x 5.2 cm				
Weight	11.5 oz. / 328 g				
Operating Temperature	-4 to 122°F / -20 to 50°C				
Humidity	10 - 100% RH (no	n-condensing)			
Alarms and Type	Visual, vibrating, a Pump	audible (95 dB); Low, High, TWA, STE	EL, OL (over limit), Low Battery,		
Self-Test	Audible/visual ala	rms on activation, sensors, battery, pu	imp and circuitry (continuous)		
Typical Battery Life	13 hours @ 32°F	13 hours @ 32°F / 0°C 8 hours @ -4°F / -20°C Recharges in 6 hours			
Pump Draw	Sample from up to 75 ft. / 23 m Note: Do not attempt to calibrate a Honeywell BW™ Max XT with tubing longer than the standard calibration tubing supplied with the detector				
User Options	Confidence beep • Safety (sensor) lock • Latching alarms • Safe display mode • Calibration IR lock • Location selection • Force block test • Force bump test when overdue • Force calibration when overdue • Sensor configuration • Detector identification • Low alarm acknowledge • Language choices (five) • Set custom start-up message • Confidence interval • Datalog interval				
Sensor Specifications	s				
Gases		STANDARD MEASURING RANGE	RESOLUTION		
Hydrogen Sulfide (H2S)		0 - 200 ppm	1 / 0.1 ppm		
Carbon Monoxide (CO	D)	0 - 1,000 ppm	1 ppm		
Oxygen (O2)		0 - 30% vol	0.1% vol.		
Combustible Gases (					



# **PORTABLE ANALYSIS INSTRUMENTS**

# TOTAL STATE OF THE PARTY OF THE

Spectrophotometer (DR 3900)



Spectrophotometer (DR 6000)

# **HACH PRODUCTS**



HQD pH Meter



Reagent Set

#### **YSI PRODUCTS**





YSI ProSolo-Optical
Dissolved Oxygen Meter



#### **VELP PRODUCTS**







# **LOVIBOND PRODUCTS**



**Color Disc** 



Photometric and Reagent Set



**Multiple Test Strips** 



**Dipslides** 

# AIR POLLUTION CONTROL SET UP



# (SCRUBBER & BAG FILTER)



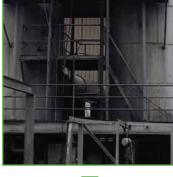




















Magnehelic Gauges





Biogas Scrubber Media



Teller Rosette Ring Packing Media



# **PERFORMANCE MONITORING**

#### **IETS (Physical Chemical Process)**

# **EQUIPMENT SET UP**







**COD Reactor** 

**COD Reagent** 



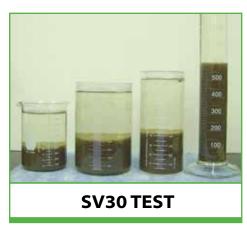


Micropipette

Benchtop pH and **Conductivity Meter** 

#### **IETS (Biological Process)**









# LABORATORY EQUIPMENTS



#### **AND CONSUMABLE ITEMS**



Weighing Balance



Oven



**Furnace** 



**Filtration Set** 



Laboratory Chemicals



**Filter Paper** 



Moisture Analyzer



Microscope



Vacuum Pump



Acid / Solvent
Cabinet /



Glassware



PPE / PHP

#### **On-Site Equipment (Pollution Control System)**



Air Operated
Diaphragm Pump



Storage Tank (Poly)



Chemical Dosing Pump



/ Chemical Preparation Tank



Customised FRP Tank



Filter Press



## **SCHEDULED WASTE &**

## **CHEMICAL STORAGE SOLUTION**

#### **Spill Kits**



**Portable Oil Spill Kit** 



**Portable Universal Spill Kit** 



**Economical Oil Spill Kit** 



**Economical Universal Spill Kit** 

- Comes in different spill response capacity of 20 litres to 200 litres
- MacCompliance to ISO 14001, OSHA, DOSH and other Environmental Certifications.
- Able to facilitate from containment to total clean up
- Designed to be easily mobilised

#### **Spill Pallets**



#### **Drum Spill Pallet**

- 1280 x 1280 x 275
- 29 kg per pallet
- 230 Litre
- 1250 kg max load

#### **4-Drum Square Spill Deck**

- 1660X1260X150
- 38kg
- 300 Litre
- 2000kg max load



#### 4-way 4-Drum Spill Pallet

- - 1220 x 1220 x 388
  - 40 kg per pallet
  - 250 Litre
  - 3000 kg max load

#### 2-Drum Spill Deck

- 1260 X 860 X 150
- 20kg per pallet
- 150 Litre
- 1000kg max load



## **SERVICES PROVIDED**



#### **Safety and Health Monitoring Services**



Chemical Health Risk Assessment (CHRA)



Chemical Exposure Monitoring (CEM)



Noise Mapping & Noise Risk Assessment (NRA)



Indoor Air Quality Monitoring (IAQ)



**Audio-Metric Testing** 



**Drinking Water Analysis** 

#### **Environmental Monitoring Services**



Stack Monitoring For Chimney



**Ambient Air Monitoring** 



Boundary Noise Monitoring



Industrial Effluent Characteristic Study (IECS)



Compliance's Effluent Monitoring & Sampling



Waste Acceptance Criteria Analysis & Sampling (WAC)



# ENVIRONMENT TRAINING FOR POLLUTION CONTROL UNIT (IETS, SWM, APCS) OPERATION

We are Environmental Competency Consultancy Sdn Bhd, which is specializing in providing customization in house training for Industrial Effluent Treatment System Operation and Scheduled Wastes Management for the support staff.

#### **Benefits of The Program:**

- Enhancement of the knowledge and skills for Environmental Management support staff in daily operation handling.
- Enhancement specific skills towards the every pollution control unit operation and maintenance (included :IETS,SWM,APCS).
- MEnhancement on overall understanding towards legal framework and enforcement requirement.

#### **Type of Courses Provided:**

#### **Technical**

- Basic understanding towards Industrial Effluent Treatment System(IETS) operation and maintenance (Preliminary Treatment, Primary Treatment, Secondary Treatment and Tertiary Treatment).
- Principle knowledge on how to perform troubleshooting through the performance monitoring data evaluation.
- Skills enhancement on how to perform effective "JAR TEST" in determine the optimum chemical dosage.
- Overall understanding towards effective scheduled wastes management (Responsibility, Waste Identification & Classification, packaging & labeling, Transport and information).
- Overall understanding towards Air Pollution Control Unit (scrubber) operation and performance monitoring requirement.

#### Theory

- Understanding towards Industrial Effluent Regulation 2009
- Understanding towards Scheduled Waste Regulation 2005
- Understanding towards Clean Air Regulation 2014
- Record keeping and reporting towards internal and external requirement











#### **INDUSTRIAL SAFETY TRAINING**



We are Environmental Competency Consultancy Sdn Bhd, which is specializing in providing customization in house training for Industrial Safety Training courses. We educate the workers and managers about workplace hazards and controls so they can work more safely and be more productive.

#### **Benefits of The Program:**

- Understanding the skills to do their work safely and avoid creating hazards that could place themselves or others at risk.
- Make Awareness and understanding of workplace hazards and how to identify, report, and control them.
- Specialized training, when their work involves unique hazards.

#### **Type of Courses Provided:**

- Behavioral Based Safety
- Job Safety Analysis
- Occupational Safety, Health and Environment Management
- PPE Products Training
- Rigging & Slinging Awareness
- Safe Handling of Forklift Truck
- Safety and Health Committee
- Effective HIRARC at the Workplace
- 6S and Productivity
- First Aid and CPR
- Safe Chemical Handling and Spillage Management



















#### **Environmental Competency Consultancy Sdn. Bhd.**

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