Quick
Selection
Guide

Who's Minding the Planet?™

YSI Environmental 6-Series Products

www.YSI.com

NEW YSI 650 MDS Multiparameter Display System

YSI 650 MDS display and data logger is a rugged, waterproof, feature-packed replacement for YSI's 610 units. With longer battery life, more memory, and optional features such as barometer and GPS interface, the YSI 650 Multiparameter Display System is a cost-effective handheld computer for any 6-Series sonde. Log real-time data, calibrate instruments, set-up sondes for deployment, upload data to a PC, and more!

Premier Instrument

YSI 6600

Features: monitors up to 17 parameters simultaneously; two optical ports for self-cleaning chlorophyll and turbidity; eight C-cells.

Benefits: 90-day battery life; simultaneous logging of all YSI parameters at 15-minute sampling intervals. Submersible to 200 m.

Applications: primarily long-term, *in situ* monitoring.

Select Instruments

YSI 6920

YSI 6820

Features: simultaneous monitoring of up to 16 parameters.

Benefits: 3 ISE's and either self-cleaning chlorophyll or turbidity.

YSI 6920 Applications: long-term monitoring and profiling; eight AA-cells enable 90-day deployment; simultaneous logging of all parameters at 1-hour sampling intervals.

YSI 6820 Applications: cost-effective profiling.

Standard Instruments

YSI 600R

YSI 600XL

YSI 600XLM

Features: small profile (1.65" dia.); measure DO, pH, temperature, and conductivity; TDS, specific conductance, resistivity, and salinity are calculated values.

YSI 600R: monitors 8 parameters simultaneously.

YSI 600XL: monitors 11 parameters simultaneously; add ORP and either depth or vented level; interchangeable ammonia, nitrate, and chloride as special configuration.

YSI 600XLM: all the capabilities of the YSI 600XL, plus 4 AA-cells for up to 75-day battery life at a 1-hour sampling interval.

Benefits: ideal for down-hole monitoring.

Applications: YSI 600R and 600XL for profiling; YSI 600XLM for long-term, *in situ* monitoring.

YSI 6-Series Products —

Quality Instruments, Powerful Software, and Expandable Systems

Field-proven, accurate, and packed with features, YSI 6-Series Environmental Products are the industry standard for profiling, logging, and long-term monitoring applications. Measure up to 17 parameters simultaneously in fresh, sea, brackish, or polluted waters. Retrieve data on-site or remotely via RS-232, SDI-12, radio, phone, or satellite. Interface to plant SCADA systems. All sondes are rated to 61 m (200 feet) or above and have internal non-volatile flash memory that prevents data loss and stores up to 150,000 readings. Options include internal power, field-replaceable probes, and deep depth. Simply review the options and select a system that solves your specific needs!

Features/Parameters

	Premier	Select		Standard		
	YSI 6600	YSI 6920	YSI 6820	YSI 600XLM	YSI 600XL	YSI 600R
Stirring-independent oxygen measurement	●	●	●	●	●	●
RS-232 & SDI-12 standard	●	●	●	●	●	●
Fits 2" wells				●	●	●
Internal memory	●	●	●	●	●	●
Internal power	●	●		●		
Field-replaceable probes	●	●	●	●	●	
Dissolved oxygen	■	■	■	■	■	■
Conductivity	●	●	●	●	●	●
Temperature	●	●	●	●	●	●
pH	■	■	■	■	■	■
ORP	■	■	■	■	■	
Salinity	■	■	■	■	■	■
Depth	■	■	■	■	■	
Vented level	■	■	■	■	■	
Turbidity	■	■	■			
Chlorophyll	■	■	■			
Ammonium/ammonia*	■	■	■	▲	▲	
Nitrate*	■	■	■	▲	▲	
Chloride*	■	■	■	▲	▲	
Open channel flow	■	■		■		
Specific conductance	■	■	■	■	■	■
Resistivity	■	■	■	■	■	■
Total dissolved solids	■	■	■	■	■	■
Total dissolved gas**						

Questions?
Check our website at:
www.YSI.com

● **Standard**
■ **Customer Selectable**
▲ **Special Order** **

* Freshwater only
** Available as special order through YSI Massachusetts: 508 748-0366

Typical performance specifications

		Premier Instrument	Select Instruments
		YSI 6600	YSI 6920
Dissolved oxygen % air saturation	Range Resolution Accuracy	0 to 500% 0.1% 0 to 200%: ±2% of reading or 2% air saturation, whichever is greater; 200 to 500%: ±6% of reading	0 to 500% 0.1% 0 to 200%: ±2% of reading or 2% air saturation, whichever is greater; 200 to 500%: ±6% of reading
Dissolved oxygen mg/L	Range Resolution Accuracy	0 to 50 mg/L 0.01 mg/L 0 to 20 mg/L: ±2% of reading or 0.2 mg/L, whichever is greater; 20 to 50 mg/L: ±6% of reading	0 to 50 mg/L 0.01 mg/L 0 to 20 mg/L: ±2% of reading or 0.2 mg/L, whichever is greater; 20 to 50 mg/L: ±6% of reading
Conductivity‡	Range Resolution Accuracy	0 to 100 mS/cm 0.001 or 0.1 mS/cm (range-dependent) ±0.5% of reading + 0.001 mS/cm	0 to 100 mS/cm 0.001 to 0.1 mS/cm (range-dependent) ±0.5% of reading + 0.001 mS/cm
Temperature	Range Resolution Accuracy	-5 to +45°C 0.01°C ±0.15°C	-5 to +45°C 0.01°C ±0.15°C
pH	Range Resolution Accuracy	0 to 14 units 0.01 unit ±0.2 unit	0 to 14 units 0.01 unit ±0.2 unit
Shallow depth	Range Resolution Accuracy	0 to 9 m (0 to 30 ft.) 0.001 m (0.001 ft.) ±0.02 m (±0.06 ft.)	0 to 9 m (0 to 30 ft.) 0.001 m (0.001 ft.) ±0.02 m (±0.06 ft.)
Medium depth	Range Resolution Accuracy	0 to 61 m (0 to 200 ft.) 0.001 m (0.001 ft.) ±0.12 m (±0.4 ft.)	0 to 61 m (0 to 200 ft.) 0.001 m (0.001 ft.) ±0.12 m (±0.4 ft.)
Deep depth	Range Resolution Accuracy	0 to 200 m (0 to 656 ft.) 0.001 m (0.001 ft.) ±0.3 m (±1 ft.)	Not available
Vented level with higher accuracy	Range Resolution Accuracy	0 to 9 m (0 to 30 ft.) 0.0003 m (0.001 ft.) ±0.003 m (±0.01 ft.)	0 to 9 m (0 to 30 ft.) 0.0003 m (0.001 ft.) ±0.003 m (±0.01 ft.)
Open-channel flow		Calculated measurement, requires vented level	Calculated measurement, requires vented level
ORP	Range Resolution Accuracy	-999 to +999 mV 0.1 mV ±20 mV	-999 to +999 mV 0.1 mV ±20 mV
Salinity	Range Resolution Accuracy	0 to 70 ppt 0.01 ppt ±1% of reading or 0.1 ppt, whichever is greater	0 to 70 ppt 0.01 ppt ±1% of reading or 0.1 ppt, whichever is greater
Nitrate-nitrogen*	Range Resolution Accuracy Depth Limit	0 to 200 mg/L-N 0.001 to 1 mg/L-N (range-dependent) ±10% of reading or 2 mg/L, whichever is greater 15.2 m (50 ft.)	0 to 200 mg/L-N 0.001 to 1 mg/L-N (range-dependent) ±10% of reading or 2 mg/L, whichever is greater 15.2 m (50 ft.)
Ammonium-ammonia nitrogen*	Range Resolution Accuracy Depth Limit	0 to 200 mg/L-N 0.001 to 1 mg/L-N (range-dependent) ±10% of reading or 2 mg/L, whichever is greater 15.2 m (50 ft.)	0 to 200 mg/L-N 0.001 to 1 mg/L-N (range-dependent) ±10% of reading or 2 mg/L, whichever is greater 15.2 m (50 ft.)
Chloride*	Range Resolution Accuracy Depth Limit	0 to 1000 mg/L 0.001 to 1 mg/L (range-dependent) ±15% of reading or 5 mg/L, whichever is greater 61 m (200 ft.)	0 to 1000 mg/L 0.001 to 1 mg/L (range-dependent) ±15% of reading or 5 mg/L, whichever is greater 61 m (200 ft.)
Turbidity	Range Resolution Accuracy Depth Limit	0 to 1000 NTU 0.1 NTU ±5% of reading or 2 NTU, whichever is greater 61 m (200 ft.)	0 to 1000 NTU 0.1 NTU ±5% of reading or 2 NTU, whichever is greater 61 m (200 ft.)
Chlorophyll	Range Resolution Depth Limit	0 to 400 µg/L; 0 to 100% FS 0.1 µg/L Chl; 0.1% FS 61 m (200 ft.)	0 to 400 µg/L; 0 to 100% FS 0.1 µg/L Chl; 0.1% FS 61 m (200 ft.)
Size	OD Length Weight**	3.5" (8.9 cm) 20.4" (52 cm) 6 lbs (2.7 kg)	2.85" (7.24 cm) 18" (45.7 cm) 4 lbs (1.8 kg)
Depth		200 m (656 ft.)	61 m (200 ft.)

‡ Report outputs of specific conductance (conductivity corrected to 25° C), resistivity, and total dissolved solids are also provided. These values are automatically calculated from conductivity according to algorithms found in Standard Methods for the Examination of Water and Wastewater (ed 1989).

* Freshwater only

** For more information on these performance specifications, call YSI Massachusetts: 508 748-0366

	Standard Instruments		
YSI 6820	**YSI 600XLM**	**YSI 600XL**	**YSI 600R**
0 to 500% 0.1% 0 to 200%: ±2% of reading or 2% air saturation, whichever is greater; 200 to 500%: ±6% of reading	0 to 500% 0.1% 0 to 200%: ±2% of reading or 2% air saturation, whichever is greater; 200 to 500%: ±6% of reading	0 to 500% 0.1% 0 to 200%: ±2% of reading or 2% air saturation, whichever is greater; 200 to 500%: ±6% of reading	0 to 500% 0.1% 0 to 200%: ±2% of reading or 2% air saturation, whichever is greater; 200 to 500%: ±6% of reading
0 to 50 mg/L 0.01 mg/L 0 to 20 mg/L: ±2% of reading or 0.2 mg/L, whichever is greater; 20 to 50 mg/L: ±6% of reading	0 to 50 mg/L 0.01 mg/L 0 to 20 mg/L: ±2% of reading or 0.2 mg/L, whichever is greater; 20 to 50 mg/L: ±6% of reading	0 to 50 mg/L 0.01 mg/L 0 to 20 mg/L: ±2% of reading or 0.2 mg/L, whichever is greater; 20 to 50 mg/L: ±6% of reading	0 to 50 mg/L 0.01 mg/L 0 to 20 mg/L: ±2% of reading or 0.2 mg/L, whichever is greater; 20 to 50 mg/L: ±6% of reading
0 to 100 mS/cm 0.001 to 0.1 mS/cm (range-dependent) ±0.5% of reading + 0.001 mS/cm	0 to 100 mS/cm 0.001 to 0.1 mS/cm (range-dependent) ±0.5% of reading + 0.001 mS/cm	0 to 100 mS/cm 0.001 to 0.1 mS/cm (range-dependent) ±0.5% of reading + 0.001 mS/cm	0 to 100 mS/cm 0.001 to 0.1 mS/cm (range-dependent) ±0.5% of reading + 0.001 mS/cm
-5 to +45°C 0.01°C ±0.15°C	-5 to +45°C 0.01°C ±0.15°C	-5 to +45°C 0.01°C ±0.15°C	-5 to +45°C 0.01°C ±0.15°C
0 to 14 units 0.01 unit ±0.2 unit	0 to 14 units 0.01 unit ±0.2 unit	0 to 14 units 0.01 unit ±0.2 unit	0 to 14 units 0.01 unit ±0.2 unit
0 to 9 m (0 to 30 ft.) 0.001 m (0.001 ft.) ±0.02 m (±0.06 ft.)	0 to 9 m (0 to 30 ft.) 0.001 m (0.001 ft.) ±0.02 m (±0.06 ft.)	0 to 9 m (0 to 30 ft.) 0.001 m (0.001 ft.) ±0.02 m (±0.06 ft.)	Not available
0 to 61 m (0 to 200 ft.) 0.001 m (0.001 ft.) ±0.12 m (±0.4 ft.)	0 to 61 m (0 to 200 ft.) 0.001 m (0.001 ft.) ±0.12 m (±0.4 ft.)	0 to 61 m (0 to 200 ft.) 0.001 m (0.001 ft.) ±0.12 m (±0.4 ft.)	Not available
Not available	Not available	Not available	Not available
0 to 9 m (0 to 30 ft.) 0.0003 m (0.001 ft.) ±0.003 m (±0.01 ft.)	0 to 9 m (0 to 30 ft.) 0.0003 m (0.001 ft.) ±0.003 m (±0.01 ft.)	0 to 9 m (0 to 30 ft.) 0.0003 m (0.001 ft.) ±0.003 m (±0.01 ft.)	Not available
Calculated measurement, requires vented level	Calculated measurement, requires vented level	Calculated measurement, requires vented level	Not available
-999 to +999 mV 0.1 mV ±20 mV	-999 to +999 mV 0.1 mV ±20 mV	-999 to +999 mV 0.1 mV ±20 mV	Not available
0 to 70 ppt 0.01 ppt ±1% of reading or 0.1 ppt, whichever is greater	0 to 70 ppt 0.01 ppt ±1% of reading or 0.1 ppt, whichever is greater	0 to 70 ppt 0.01 ppt ±1% of reading or 0.1 ppt, whichever is greater	0 to 70 ppt 0.01 ppt ±1% of reading or 0.1 ppt, whichever is greater
0 to 200 mg/L-N 0.001 to 1 mg/L-N (range-dependent) ±10% of reading or 2 mg/L, whichever is greater 15.2 m (50 ft.)	**	**	Not available
0 to 200 mg/L-N 0.001 to 1 mg/L-N (range-dependent) ±10% of reading or 2 mg/L, whichever is greater 15.2 m (50 ft.)	**	**	Not available
0 to 1000 mg/L 0.001 to 1 mg/L (range-dependent) ±15% of reading or 5 mg/L, whichever is greater 61 m (200 ft.)	**	**	Not available
0 to 1000 NTU 0.1 NTU ±5% of reading or 2 NTU, whichever is greater 61 m (200 ft.)	Not available	Not available	Not available
0 to 400 µg/L; 0 to 100% FS 0.1 µg/L Chl; 0.1% FS 61 m (200 t.)	Not available	Not available	Not available
2.85" (7.24 cm) 13.5" (34.3 cm) 3.4 lbs (1.5 kg)	1.65" (4.19cm) 21.3" (54.1 cm) 1.6 lbs (.72 kg)	1.65" (4.19 cm) 16" (40.6 cm) 1.3 lbs (0.6 kg)	1.65" (4.19 cm) 14" (35.6 cm) 1.1 lbs (0.49 kg)
61 m (200 ft.)	61 m (200 ft.)	61 m (200 ft.)	61 m (200 ft.)