

MEASURE pH, CONDUCTIVITY, TDS, & TEMPERATURE WITH A SINGLE WATERPROOF TESTER!

Combo

pH/EC/TDS/Temperature Waterproof Tester

- Waterproof, floating casing •
- Replaceable pH electrode cartridge
- Large, dual-level LCD •
- % battery power illumination •
- Stability indicator
- Automatic Temperature Compensation
- Adjustable TDS ratio •
- Adjustable β •
- Automatic calibration •
- Automatic shut-off •



pH • EC/TDS • Temperature!

The NEW *Combo* From Hanna Instruments

These highly accurate testers have an exposed temperature sensor which allows for Automatic Temperature Compensation (ATC) and faster response times for pH, EC/TDS and temperature. The easily replaceable pH electrode incorporates a cloth junction which can be pulled out to rejuvenate the electrode. The EC/TDS graphite electrode inhibits contamination from salts in solutions. Upon startup, the percentage of battery power remaining is displayed to avoid incorrect readings. Auto shut-off helps keep batteries

fresh. Adjustable TDS ratio and Temperature Coefficient Factor can be adjusted to match the requirements of the user. The waterproof casing keeps dust and moisture out and is 100% buoyant. The dual-level LCD shows Temperature and one other parameter at the same time. The user can then change from one reading to the next with one button and can also "hold" a current reading. A stability indicator displays a timer symbol so the user is assured of accurate readings.

Key Features:



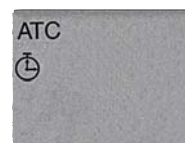
Battery life percentage illuminated

Once turned on, the LCD indicates the percentage of battery power remaining.



User adjustable TDS ratio

For Total Dissolved Solids (TDS) measurements, choose a conversion factor between 0.45 and 1.00 in increments of 0.01.



pH stability & ATC indicators

Stability of pH measurement is indicated by the timer symbol. The ATC symbol is shown when temperature compensation is active.



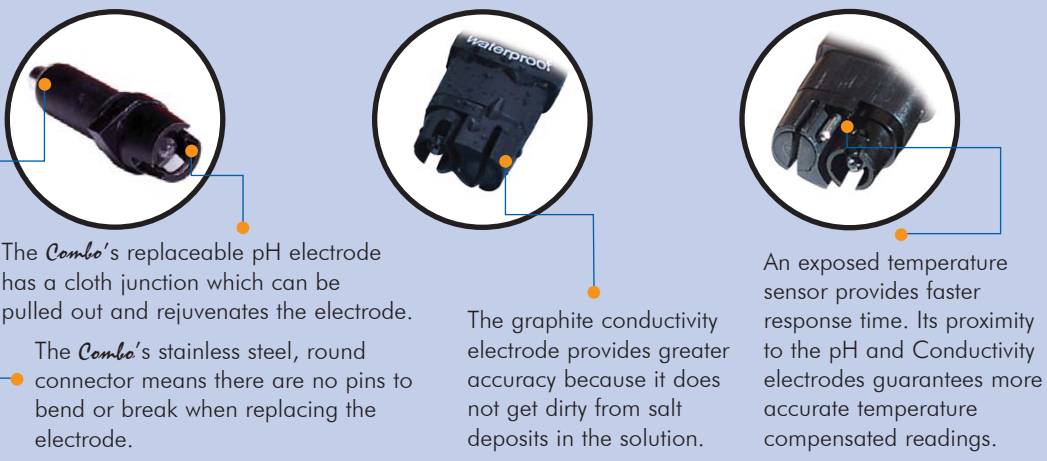
Adjustable temperature coefficient factor

Select any β (BETA) value between 0.0 and 2.4% per °C in increments of 0.1.



Calibrate to standard or N.I.S.T. buffers

Two sets of pH buffers for automatic calibration at 1 or 2 points:
4.01/7.01/10.01 or
4.01/6.86/9.18



The *Combo's* replaceable pH electrode has a cloth junction which can be pulled out and rejuvenates the electrode.

The *Combo's* stainless steel, round connector means there are no pins to bend or break when replacing the electrode.

The graphite conductivity electrode provides greater accuracy because it does not get dirty from salt deposits in the solution.

An exposed temperature sensor provides faster response time. Its proximity to the pH and Conductivity electrodes guarantees more accurate temperature compensated readings.

	<i>Combo</i> (HI 98129)	<i>Combo</i> (HI 98130)
pH Range	0.00 to 14.00	0.00 to 14.00
pH Accuracy	±0.05	±0.05
pH Resolution	0.1	0.01
EC Range	0 to 3999 $\mu\text{S}/\text{cm}$	0.00 to 20.00 mS/cm
EC Accuracy	±2% F.S.	±2% F.S.
EC Resolution	1 $\mu\text{S}/\text{cm}$	0.01 mS/cm
TDS Range	0 to 2000 ppm	0.00 to 10.00 ppt
TDS Accuracy	±2% F.S.	±2% F.S.
TDS Resolution	1 ppm	0.01 ppt
Temp Range	0.0 to 60.0°C or 32.0 to 140.0°F	
Temp Accuracy	±0.5°C or ±1°F	
Temp Resolution	0.1°C or 0.1°F	
Typical EMC Dev.	pH: ±0.02; EC/TDS: ±2% F.S.; Temp.: ±0.5°C or ±1°F	
pH Calibration	1 or 2 points with 2 sets of memorized buffers	
EC/TDS Calibration	Automatic 1 point	
EC/TDS Conv. Factor	Adjustable from 0.45 to 1.00	
Temp Comp	pH: automatic; EC/TDS: automatic, BETA (β) is adjustable from 0.0 to 2.4%/°C	
Battery Type	4 x 1.5V with BEPS (Battery Error Prevention System)	
Battery Life	Approx. 100 hours of continuous use; auto shut-off after 8 minutes of non-use	
Environment	0 to 50°C (32 to 122°F); 100% RH	
Dimensions/Weight	163 x 40 x 26 mm (6.4 x 1.6 x 1")/85 g (3.0 oz.)	

Authorized Distributor www.clarksonlab.com

Combo

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www.hannainst.com