

Specifications		HI97762 Free Chlorine, ULR
Measurement	Range	0.000 to 0.500 mg/L (as Cl <sub>z</sub> )
	Resolution	0.001 mg/L
	Accuracy @25°C (77°F)	±0.020 mg/L ±3% of reading at 25°C
	Method	Adaptation of Standard Method for the Examination of Water and Wastewater, 18th Edition, 4500-Cl G, DPD colorimeteric method
Measurement System	Light Source	light emitting diode
	Bandpass filter	525 nm
	Bandpass filter bandwidth	8 nm
	Bandpass filter wavelength accuracy	±1.0 nm
	Light Detector	silicon photocell
	Cuvette type	round 24.6 mm diameter (22 mm inside)
Additional Specifications	Auto logging	50 readings
	Display	128 x 64 pixel B/W LCD with backlight
	Auto-off	after 15 minutes of inactivity (30 minutes before a READ measurement)
	Battery type / Life	alkaline 1.5 V AA (3) / > 800 measurements (without backlight)
	Environment	0 to 50°C (32 to 122°F); 0 to 100% RH, non-serviceable
	Dimensions	142.5 x 102.5 x 50.5 mm (5.6 x 4.0 x 2.0")
	Weight	380 g (13.4 oz.)
Ordering Information	HI97762 is supplied with sample cuvettes (2), sample caps (2), plastic stoppers (2), 1.5V AA batteries (3), instrument quality certificate, and instruction manual. CAL Check standards and testing reagents sold separately	
	HI97762C includes photometer, CAL Check cuvette A, CAL Check cuvette B for free chlorine ULR, sample cuvettes (2), sample caps (2), plastic stoppers (2), 1.5V AA batteries (3), cuvette wiping cloth, scissors, CAL Check standard certificate, instrument quality certificate, instruction manual, and HI7101412 rigid carrying case. Reagents sold separately	
Reagents and Standards	HI97762	HI97762-11 CAL Check standard cuvettes for free chlorine ULR
		HI95762-01 free chlorine ULR reagents for (100 tests)
		HI95762-03 free chlorine ULR reagents for (300 tests)

## HI97762

# Free Chlorine, Ultra Low Range Portable Photometer

### Advanced LED optical system

- Innovative optical design that utilizes a reference detector and focusing lens to eliminate errors from changes in the light source and from imperfections in the glass cuvette.
- LEDs have a much higher luminous efficiency, providing more light while using less power. They also produce little heat, which could otherwise affect electronic stability.

#### • CAL Check™

 Validate instrument performance at any time using CAL Check cuvettes made with NIST traceable standards. The CAL Check screen guides the user step-by-step through the validation process and user calibration.

#### • On-screen tutorial mode with animations

- Guides users step-by-step through the measurement process
- Waterproof and floating IP67 case
- Unit of measure is displayed along with reading

#### • Built-in timer

- Built-in reaction timer that ensures consistency between tests.
- Error messages on display
  - Alerts to problems including no cap, high zero, and standard too low

#### • GLP data

- Displays the last calibration date.
- Auto logging
- Battery status indicator
- Auto-shut off

# Significance of Use

As one of the most common forms of disinfectants used, chlorine improves water quality by destroying disease-producing microorganisms, and by reacting with other organic and inorganic substances. Chlorine levels must be actively monitored to ensure sufficient chlorine is present for disinfection, as well as to control adverse effects such as taste, odor, and potential reactions with organic matter to form harmful disinfection byproducts.

Photometers

