

### Features

- Large LCD Display
- User-friendly
- Automatic temperature compensation
- Programmable start time
- Real-time operation
- Programmable engineering units
- N.I.S.T. traceable

### Applications

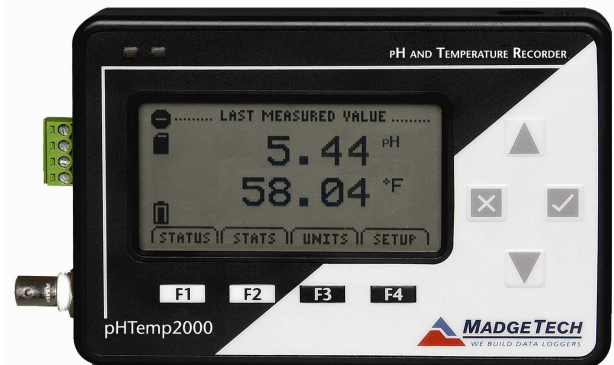
- Surface and ground water quality monitoring
- Environmental and wetlands monitoring
- Industrial influent and effluent
- Water districts and municipal water systems
- Process water quality
- Recreation and park management
- Pulp and paper industry
- Wastewater monitoring

The pHTemp2000 is a battery powered, stand alone pH and temperature logger with an LCD. This all-in-one compact, portable, easy to use device will measure and record up to 131,071

readings per channel. The pHTemp2000 will directly connect to many commonly used pH, ORP and ISE electrodes through a female BNC connector mounted on its side. Temperature is measured by directly connecting an RTD to the pHTemp2000. Temperature compensation is automatically done internally to the unit.

The storage medium is non-volatile solid state memory, providing maximum data security even if the battery becomes discharged. The device can be started and stopped directly from your computer.

The pHTemp2000 makes data retrieval quick and easy. Simply plug it into an empty com port and our user-friendly software does the rest.



### MadgeTech Data Recorder Software

displays pH and temperature data in an easy to use graph.

The Windows®-based software package allows the user to effortlessly collect, display and analyze data. A variety of powerful tools allow you to examine, export, and print professional looking data with just a click of the mouse.

Click [MadgeTech Software](#) for more information or to download the software.

# PHTEMP2000 SPECIFICATIONS\*

## Temperature\*\*

**Measurement Range:** -40 to +110°C (80 to +145Ω)  
**Resolution:** 0.01°C (0.001Ω)  
**Calibrated Accuracy:** ±0.15°C @ 25°C ambient (±0.015Ω)  
**Input Connection:** Removable screw terminal; 2,3 or 4-wire interface

## pH/ORP/ISE

**Input Connection:** Female BNC  
**Measurement Range:** -2.00 to 16.00  
**Resolution:** 0.01/0.001pH  
**pH Accuracy:** ±0.01pH  
**pH EMI Susceptibility:** <0.2pH@3V/M, 80MHz to 1GHz  
**ORP/ISE Accuracy:** ±0.1mV  
**ORP/ISE EMI Susceptibility:** <10mV@3V/M, 80MHz to 1GHz  
**Input Impedance:** 10<sup>12</sup> Ω typical  
**ORP/ISE Measurement Range:** ±1.25V

## DOT-MATRIX LCD

**Dimensions:** 2.5" x 1.375" (63mm x 35mm)  
**Text:** Configurable channel text size  
**Indicators:** Power, status, memory  
**Backlight:** Configurable w/auto shut-off and contrast adjustment

**Memory:** 131,071 readings per channel

**Reading Rate:** 1 reading every 2 seconds to 1 every 24 hours

**Calibration:** Digital calibration through software

**Calibration Date:** Automatically recorded within device

**Battery Type:** 9V lithium or alkaline battery included; user replaceable

**Battery Life:** 1 year battery life at 1 minute reading rate with display off. 30 days typical with continuous display use. Optional AC adapter available.

**Data Format:** Date and time stamped °C, °F, °K, °R, Ω; pH, V, mV, engineering units specified through software

**Time Accuracy:** ±1 minute/month (at 25 °C; RS232 cable not in use)

**Computer Interface:** PC serial or USB (interface cable required); 115,200 baud

**Software:** Windows 95/98/ME/NT/2000/XP/Vista based software

**Operating Environment:** -5 to +50°C, 0 to 95%RH (non-condensing)

**Dimensions:** 4.8" x 3.3" x 1.25" x (122mm x 84mm x 32mm)

**Weight:** 16 oz (440 g)

**Approvals:** CE

\*\*Temperature specifications based on ideal 100 Ω Pt RTD compliant with IEC 751 (1983) and ITS-90, 500 Ω FSR

For use in harsh environments, this device must be well protected from weather, steam and harsh chemicals  
**BATTERY WARNING:** DISCARD USED BATTERY PROMPTLY. KEEP OUT OF REACH OF CHILDREN. DO NOT DISPOSE OF IN FIRE, RECHARGE, PUT IN BACKWARDS, DISASSEMBLE, OR MIX WITH OTHER BATTERY TYPES. MAY EXPLODE, FLAME, OR LEAK AND CAUSE PERSONAL INJURY.

## SOFTWARE FEATURES

**Multiple Graphs:** Simultaneously analyze data from several units or deployments; easily switch to a single data series

**Real-Time Recording:** Collect and display data in real-time while continuing to log

**Graphical Cursor:** One click displays readings by time, value, parameter or sample number

**Data Table:** Instantly access tabular view for detailed dates, times, values, and annotations

**Scaling Options:** Autoscale function fits data to the screen, or allows user to manually enter their own values

**Formatting Options:** Change colors, line styles, plotting options, show or hide channels quickly

**Statistics:** Calculate averages, min, max, standard deviation, and mean kinetic temperature with the touch of a button

**Export Data:** Export data in a variety of common formats, or switch to Excel® with a single click

**Calibration:** Automatically calculate and store calibration parameters

**Logger Configuration:** Easy set up and launch of data loggers with immediate or delayed start, preferred sample rate, and device ID

**Communications:** Automatically sets up communications port, or lets user select configuration

**Printing:** Automatically print graphical or tabular data

\*SPECIFICATIONS ARE SUBJECT TO CHANGE WITHOUT NOTICE. SPECIFIC WARRANTY AND REMEDY LIMITATIONS APPLY. CALL 1-603-456-2011 OR GO TO WWW.MADGETECH.COM FOR DETAILS.

## ORDERING INFORMATION

Model	Description	Price (U.S.)
PHTEMP2000	pH and Temperature Recorder with LCD Display	Call for Pricing
IFC110	Software, manual and RS232 interface cable	
IFC200	Software, manual and USB interface cable	
NIST	N.I.S.T. Calibration Certificate	
U9VL-J	Replacement battery for pHTemp2000	
DC9V-NA	Wall Mounted 120VAC/9VDC power adapter. (North American Model)	
DC9V-EU	Wall Mounted 230VAC@50Hz/9VDC power adapter. (European Model)	

### ASK ABOUT OUR OTHER DATA RECORDERS

Temperature	Pulse/Event/State
Humidity	Low Level Current
Pressure	Low Level Voltage
pH	RF Transmitters
Level	Intrinsically Safe
Shock	Spectral Vibration
LCD Display	