PRHTEMP101A
PRESSURE, HUMIDITY & TEMPERATURE DATA LOGGER

MadgeTech
WE BUILD DATA LOGGERS

Features
- 10 Year Battery Life
- Multiple Start/Stop Function
- Ultra High Speed Download
- Memory Wrap
- Battery Life Indicator
- Optional Password Protection
- Programmable High and Low Alarms
- CE Compliant
- Field Upgradable

Benefits
- Simple Setup and Installation
- Minimal Long-Term Maintenance
- Long-Term Field Deployment
- Compact and Portable

Applications
- Museum, Archive and Gallery Artwork Preservation
- Warehouse Monitoring
- Measuring Barometric Pressure in High-Rise Buildings (Elevators)
- Shipping and Transportation
- HVAC
- Clean Rooms
- Clinical Laboratories
- Altitude Validation and Studies

The PRHTemp101A is a pressure, relative humidity and temperature data logger, specifically designed to be compact and portable for use in a variety of applications such as museum and archive preservation, shipping and transportation, warehouse monitoring, HVAC and more.

The PRHTemp101A is MadgeTech's latest addition to the 101A series of low cost, state-of-the-art data loggers. MadgeTech has taken the lead in offering the most advanced, affordable, battery powered data loggers in the world today.

The PRHTemp101A offers a 10 year battery life, 1 second reading rate, multiple start/stop functions, ultra-high speed download capability, optional memory wrap, battery life indicator, optional password protection, programmable high-low alarms and more.

Using the MadgeTech Software, starting, stopping and downloading from the PRHTemp101A is simple and easy for users. Graphical, tabular and summary data is provided for analysis and data can be viewed in °C, °F, °R, K, for the temperature channel, %RH, mg/mL, Dew Point, for the humidity channel and mbar, PSI, inHg, mmHg, atm, Torr, Pa, m, kPa, MPa for the pressure channel. The data can also be automatically exported to Excel® for further calculations.
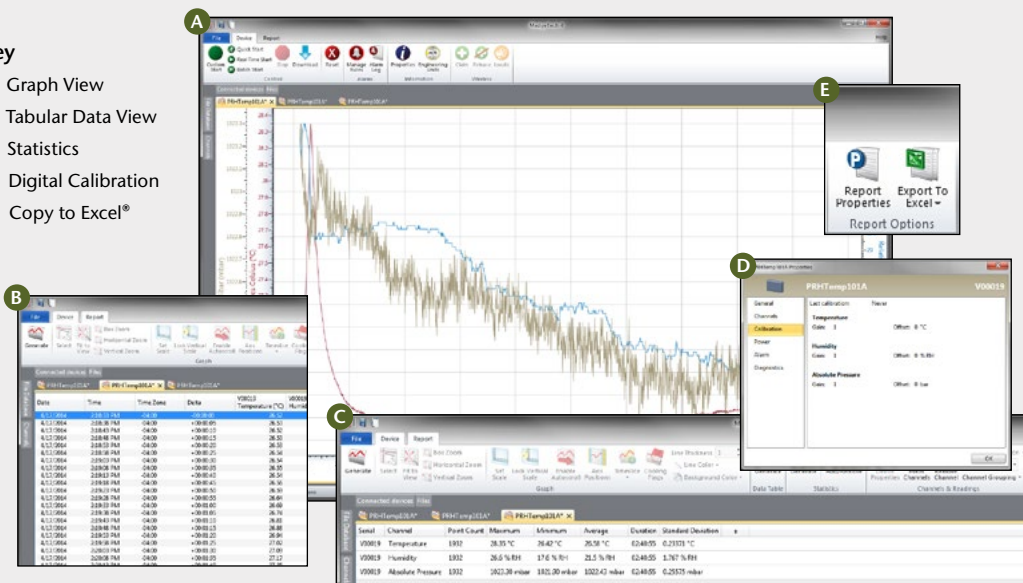
As the leader in low power data logger technology, MadgeTech continuously improves its products and develops solutions to meet ever-changing industry needs. The PRHTemp101A was designed with our customers in mind. MadgeTech offers free firmware upgrades for the life of the product so that data loggers already deployed in the field can grow with new technological developments. Units do not need to be returned to the factory for upgrades, this can be done automatically from any PC with the MadgeTech software.

The design of the PRHTemp101A is second to none when it comes to data logger price and performance. The PRHTemp101A now in stock. Contact one of our sale specialists at (603) 456-2011 or visit www.madgetech.com to order yours today.

MADGETECH DATA LOGGER SOFTWARE

Key
- **A** Graph View
- **B** Tabular Data View
- **C** Statistics
- **D** Digital Calibration
- **E** Copy to Excel®

Software Features:
- Multiple graph overlay
- Statistics
- Digital calibration
- Zoom in/ zoom out
- Lethality equations (F0, PU)
- Mean Kinetic Temperature
- Full time zone support
- Data annotation
- Min./Max./Average lines
- Data table view
- Automatic report generation
- Summary view
- Multilingual

PRHTEMP101A SPECIFICATIONS*

Pressure

Pressure Sensor:	Piezoresistive
Pressure Range:	250 mbar to 1300 mbar
Pressure Resolution:	0.02 mbar
Pressure Calibrated Accuracy:	10 mbar

Humidity

Humidity Sensor:	Capacitive Polymer
Humidity Range:	0 %RH to 95 %RH
Humidity Resolution:	0.1 %RH
Humidity Calibrated Accuracy:	3 %RH

Temperature

Temperature Sensor:	RTD
Temperature Range:	-40 °C to +80 °C (-40 °F to +176 °F)
Temperature Resolution:	0.01 °C
Calibrated Accuracy:	±0.5 °C

General

Reading Rate:	1 reading every second up to 1 reading every 24 hours.
Memory:	• 688,128 readings • 412,876 readings (manual or trigger mode)
Wrap Around:	Yes
Start Modes:	• Immediate start • Delay start up to 18 months • Multiple pushbutton start/stop
Stop Modes:	• Manual through software • Timed (specific date and time)
Real Time Recording:	The device may be used with a PC to monitor and record data in real time.

Alarm:	Programmable high and low limits; alarm is activated when recording environment reaches or exceeds set limits. *(Pressure channel only)*
LED Functionality:	Green LED blinks: • *10 second rate to indicate logging* • *15 second rate to indicate delay start mode/ Standby (Waiting to start)* Red LED blinks: • *10 second rate to indicate low battery and/or full memory* • *1 second to indicate alarm condition met*
Password Protection:	An optional password may be programmed into the device to restrict access to configuration options. Data may be read without the password.
Engineering Units:	Native measurement units can be changed to display measurement units of another type.
Calibration:	Digital calibration through software.
Calibration Date:	Automatically recorded within device.
Battery Type:	3.6V lithium battery included; **user replaceable**
Battery Life:	10 year battery life typical, at a 15 minute reading rate.
Data Format:	Date and time stamped °C, °F, °R, K, %RH, mg/mL, Dew Point, mbar, PSI, inHg, mmHg, atm, Torr, Pa, kPa, m, MPa units specified through software.
Time Accuracy:	±1 minute/month @ 25 °C
Computer Interface:	USB (interface cable required); 115,200 baud
Software:	XP SP3/Vista/Windows 7/Windows 8
Operating Environment:	-40 °C to +80 °C, 0 %RH to 95 %RH non-condensing, 0.002 PSIA to 100 PSIA
Dimensions:	1.4 in x 2.2 in x 0.6 in (36 mm x 56 mm x 16 mm)
Weight:	0.8 oz (24 g)
Materials:	ABS Plastic
Approvals:	CE

BATTERY WARNING: FIRE, EXPLOSION AND SEVERE BURN HAZARD. DO NOT RECHARGE, DISASSEMBLE, HEAT ABOVE 100 °C (212 °F), INCINERATE, CRUSH, OR EXPOSE CONTENTS TO WATER.

ORDERING INFORMATION

MODEL	DESCRIPTION
PRHTemp101A	Pressure, Humidity and Temperature Data Logger
IFC200	Software, manual and USB Interface cable
Calibration Certificate	Calibration Certificate available for data logger
LTC-7PN	Replacement battery for PRHTemp101A

ASK ABOUT OUR OTHER DATA LOGGERS

Temperature
Humidity
Pressure
pH
Level
Shock
LCD Display
Pulse/Event/State
Current
Voltage
Wireless
Intrinsically Safe
Spectral Vibration
Motion

For Quantity Discounts call (603) 456-2011 or email sales@madgetech.com