

### Features

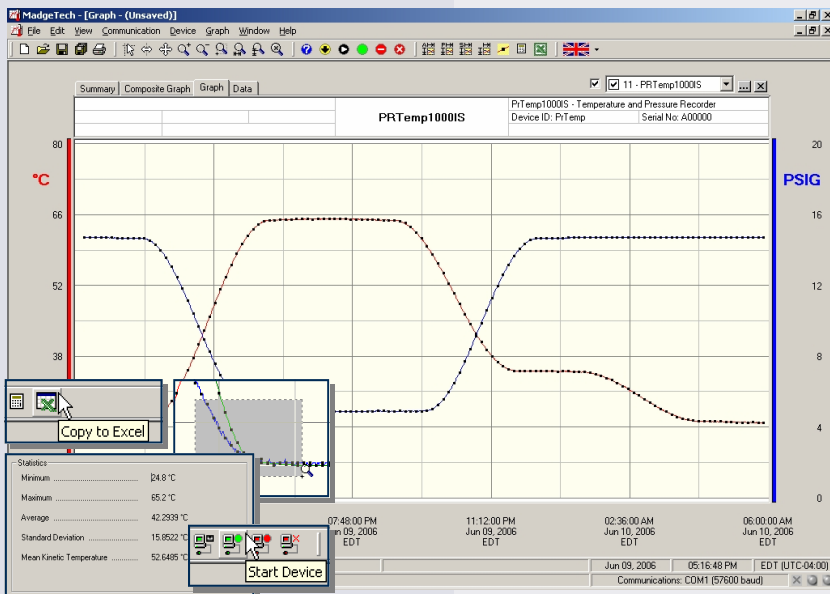
- Intrinsically safe
- Rugged
- Programmable start time
- Real-time operation
- User-friendly
- Low cost
- 1/4" NPT pressure port



### Applications

- Oil & gas industries
- Pneumatics
- Process control systems
- Gas compressors
- Natural gas production
- Lubrication systems
- Chemical processing
- Pulp and paper processing
- Medical instrumentation
- Environmental studies
- Waste water treatment
- HVAC
- Refrigeration

The PRTemp1000IS is a rugged pressure recorder that accurately monitors and records pressure and temperature at user programmable reading intervals. The PRTemp1000IS has been Factory Mutual certified as intrinsically safe for Class I, Division 1, groups A, B, C and D and non-incendive for Class I, Division 2, groups A, B, C and D. This certification makes the device ideal for uses in hostile environment applications such as air conditioning systems, chilled water, hot water, air, gas, oil and steam pressure systems. The internal temperature sensor provides accurate temperature measurements without the need of a separate temperature recorder. The logger can be started to take measurements as often as every two seconds, up to one reading every twelve hours. It will store up to 16,383 readings in its non-volatile memory. The PRTemp1000IS uses a rugged stainless steel pressure strain gauge to accurately measure the pressure. The device comes standard with a common 1/4" NPT fitting, which allows the logger to be adapted to almost any pressure fitting. There are many different pressure ranges available to suit most any application. The standard pressure ranges are 30 PSIA(G), 100 PSIA(G), 300 PSIA(G), 500 PSIA(G), 1000 PSIA and 5000 PSIA.



### MadgeTech Data Recorder Software

displays pressure 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.

## PRTEMP1000IS SPECIFICATIONS\*

|  |   |
|--|---|
| <b>Temperature Sensor:</b> Semiconductor   | <b>Memory:</b> 16,383 readings per channel  |
| <b>Temperature Range:</b> -40 to +80°C   | <b>Reading Interval:</b> 1 reading every 2 seconds to 1 every 12 hours                                    |
| <b>Temperature Resolution:</b> 0.1°C   | <b>Calibration:</b> Digital calibration through software  |
| <b>Calibrated Accuracy:</b> ±0.5°C   | <b>Calibration Date:</b> Automatically recorded within device   |
| <b>Pressure Sensor:</b> Semiconductor strain gauge   | <b>Power:</b> 3.6V lithium battery included   |
| <b>Pressure Range:</b> 0 to 30, 100, 300 and 500 PSIA/G;<br>0 to 1000 and 5000 PSIA          | <b>Battery Life:</b> 1 year typical (1 minute reading rate @ 25°C)  |
| <b>Pressure Resolution:</b> 0.002, 0.005, 0.02, 0.05 PSIA/G;<br>0.05, 0.2 PSIA               | <b>Data Format:</b> Date and time stamped °C, °F, K, °R ; PSIA(g),<br>inches, feet, mmHg, bar, Torr, kPa, |
| <b>Calibrated Accuracy:</b> 2%FSR, 0.25% @ 25°C typical                                      | <b>Time Accuracy:</b> ±1 minute/month (at 20°C, RS232 port not in use )                                   |
| <b>Pressure Response Time:</b> 0.1ms (10 to 90%FSR)  | <b>Computer Interface:</b> PC serial or USB (interface cable required);<br>2,400 baud                     |
| <b>Repeatability:</b> ±0.5%FSR; ±0.2% typical  | <b>Software:</b> Windows 95/98/ME/NT/2000/XP based software   |
| <b>Adaptor:</b> 1/4" male NPT  | <b>Operating Environment:</b> -40 to +80°C, 0 to 100%RH   |
| <b>Start Time:</b> Software programmable start time and<br>date, up to six months in advance | <b>Dimensions:</b> 6.4" x 1.25" dia. (163mm x 32mm dia.)  |
| <b>Real Time Recording:</b> May be used with PC to monitor and<br>record data in real time   | <b>Weight:</b> 12 oz (340g)   |
|  | <b>Material:</b> Stainless Steel  |
|  | <b>Approvals:</b> CE<br>FM Certified Intrinsically Safe for Class I,<br>Division 1 groups A, B, C and D   |

BATTERY WARNING: RISK OF FIRE OR EXPLOSION. DO NOT RECHARGE, FORCE OPEN, HEAT OR DISPOSE OF IN FIRE.

## SOFTWARE FEATURES

|  |   |
|--|---|
| <b>Multiple Graphs:</b> Simultaneously analyze data from<br>several units or deployments; easily<br>switch to a single data series | <b>Statistics:</b> Calculate averages, min, max, standard<br>deviation, and mean kinetic temperature<br>with the touch of a button              |
| <b>Graphical Cursor:</b> One click displays readings by time,<br>value, parameter or sample number                                 | <b>Export Data:</b> Export data in a variety of common formats, or<br>switch to Excel® with a single click                                      |
| <b>Data Table:</b> Instantly access tabular view for<br>detailed dates, times, values, and<br>annotations                          | <b>Calibration:</b> Automatically calculate and store calibration<br>parameters   |
| <b>Scaling Options:</b> Autoscale function fits data to the<br>screen, or allows user to manually<br>enter their own values        | <b>Logger Configuration:</b> Easy set up and launch of data loggers with<br>immediate or delayed start, preferred sample<br>rate, and device ID |
| <b>Formatting Options:</b> Change colors, line styles, plotting<br>options, show or hide channels quickly                          | <b>Communications:</b> Automatically sets up communications port, or<br>lets user select configuration  |

\*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.)     |
|-------------------|---|------------------|
| PRTEMP1000IS-30   | 0-30PSIA(G) Intrinsically Safe Pressure and Temperature Recorder  | \$649.00         |
| PRTEMP1000IS-100  | 0-100PSIA(G) Intrinsically Safe Pressure and Temperature Recorder | \$649.00         |
| PRTEMP1000IS-300  | 0-300PSIA(G) Intrinsically Safe Pressure and Temperature Recorder | \$649.00         |
| PRTEMP1000IS-500  | 0-500PSIA(G) Intrinsically Safe Pressure and Temperature Recorder | \$649.00         |
| PRTEMP1000IS-1000 | 0-1000PSIA Intrinsically Safe Pressure and Temperature Recorder   | \$649.00         |
| PRTEMP1000IS-5000 | 0-5000PSIA Intrinsically Safe Pressure and Temperature Recorder   | \$649.00         |
| IFC110            | Software, manual and RS232 interface cable                        | \$ 99.00         |
| IFC200            | Software, manual and USB interface cable                          | \$119.00         |
| NIST              | N.I.S.T. Calibration Certificate                                  | Call for Pricing |
| TL-2150           | Replacement battery for PRTemp1000IS                              | \$ 10.00         |

### 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 |



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