PRTEMP1000IS
INTRINSICALLY SAFE RUGGED PRESSURE & TEMPERATURE DATA LOGGER

MADGETECH
WE BUILD DATA LOGGERS

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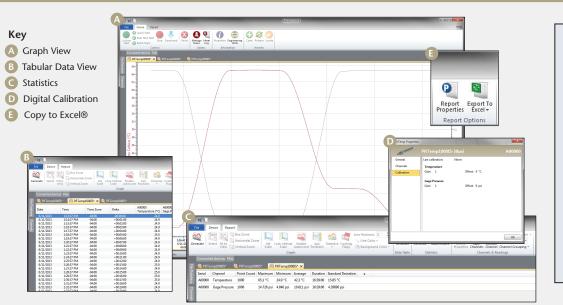- 1/4" NPT pressure port

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 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

PRTEMP1000IS SPECIFICATIONS*

Temperature Sensor:	Semiconductor
Temperature Range:	-40 °C to +80 °C (-40 °F to +176 °F)
Temperature Resolution:	0.1 °C (0.18 °F)
Calibrated Accuracy:	±0.5 °C (±0.9 °F)
Pressure Sensor:	Semiconductor strain gauge
Pressure Range:	0 to 30, 100, 300 and 500 PSIA/G; 0 to 1000 and 5000 PSIA
Pressure Resolution:	0.002, 0.005, 0.02, 0.05 PSIA/G; 0.05, 0.2 PSIA
Calibrated Accuracy:	2 %FSR, 0.25 % @ 25 °C typical
Pressure Response Time:	0.1 ms (10 to 90 %FSR)
Repeatability:	±0.5 %FSR; ±0.2 % typical
Adaptor:	1/4" male NPT
Start Modes:	Software programmable immediate start or delay start up to six months in advance
Real Time Recording:	May be used with PC to monitor and record data in real time

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

Memory:	16,383 readings per channel; 32,766 total readings
Reading Rate:	1 reading every 2 seconds up to 1 reading every 12 hours
Calibration:	Digital calibration through software
Calibration Date:	Automatically recorded within device
Battery Type:	3.6 V lithium battery included; **user replaceable**
Battery Life:	1 year typical (1 minute reading rate @ 25 °C)
Data Format:	Date and time stamped °C, °F, K, °R ; PSIA(g), inches, feet, mmHg, bar, Torr, kPa,
Time Accuracy:	±1 minute/month (at 20 °C, RS232 port not in use)
Computer Interface:	PC serial or USB (interface cable required); 2,400 baud
Software:	XP SP3/Vista/Windows 7/Windows 8
Operating Environment:	-40 °C to +80 °C (-40 °F to +176 °F), 0 %RH to 100 %RH
Dimensions:	6.4 in x 1.25 in dia. (163 mm x 32 mm dia.)
Weight:	12 oz (340 g)
Material:	Stainless Steel
Approvals:	CE FM Certified Intrinsically Safe for Class I, Division 1 groups A, B, C and D

ORDERING INFORMATION

MODEL	DESCRIPTION
PRTEMP1000IS-30	0-30PSIA(G) Intrinsically Safe Pressure and Temperature Recorder
PRTEMP1000IS-100	0-100PSIA(G) Intrinsically Safe Pressure and Temperature Recorder
PRTEMP1000IS-300	0-300PSIA(G) Intrinsically Safe Pressure and Temperature Recorder
PRTEMP1000IS-500	0-500PSIA(G) Intrinsically Safe Pressure and Temperature Recorder
PRTEMP1000IS-1000	0-1000PSIA Intrinsically Safe Pressure and Temperature Recorder
PRTEMP1000IS-5000	0-5000PSIA Intrinsically Safe Pressure and Temperature Recorder
IFC110	Software, manual and RS232 interface cable
IFC200	Software, manual and USB interface cable
Calibration Certificate	Calibration Certificate available for data logger
TL-2150	Replacement battery for PRTemp1000IS
MadgeTech 4 Secure Software License	License for MadgeTech Secure Software *(unlimited users, 1 license per computer, more licenses are available.)*

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