

CRYOTEMP

ULTRA LOW TEMPERATURE

DATA LOGGER



Features

- Ultra low Operating Temperature (-86°C)
- May be place in Direct Contact with Dry Ice
- No External Probes or Wiring
- High Accuracy
- Programmable Alarm and Warn Ranges with Alarm Delay
- LED Status Indicators for Instant Alarm Notification
- Magnetic Start
- Optional Password Protection
- Splash Resistant (IP65)
- CE Compliant
- Approved for Delta® Mainline Flights

Benefits

- Simple Setup and Installation
- Minimal Long-Term Maintenance
- Long-Term Field Deployment

Applications

- Dry Ice Shipments
- Plasma and Red Cell Freezers
- Blood Banks/Frozen Tissue Storage
- Monitoring Frozen Vaccines
- Cold Chain Monitoring
- Medical and Pharmaceutical Shipping



MadgeTech's new ultra low temperature data recorder, records temperatures as low as -86°C . The Cryo-Temp can be used in a broad line of applications such as monitoring blood plasma, vaccines, pharmaceuticals, frozen foods and shipping containers. This stand-alone device does not require any additional probes. The enclosure is designed with a handle for easy attachment and is IP65 splash resistant. It utilizes a USB docking station (sold separately), to communicate with a personal computer or laptop.

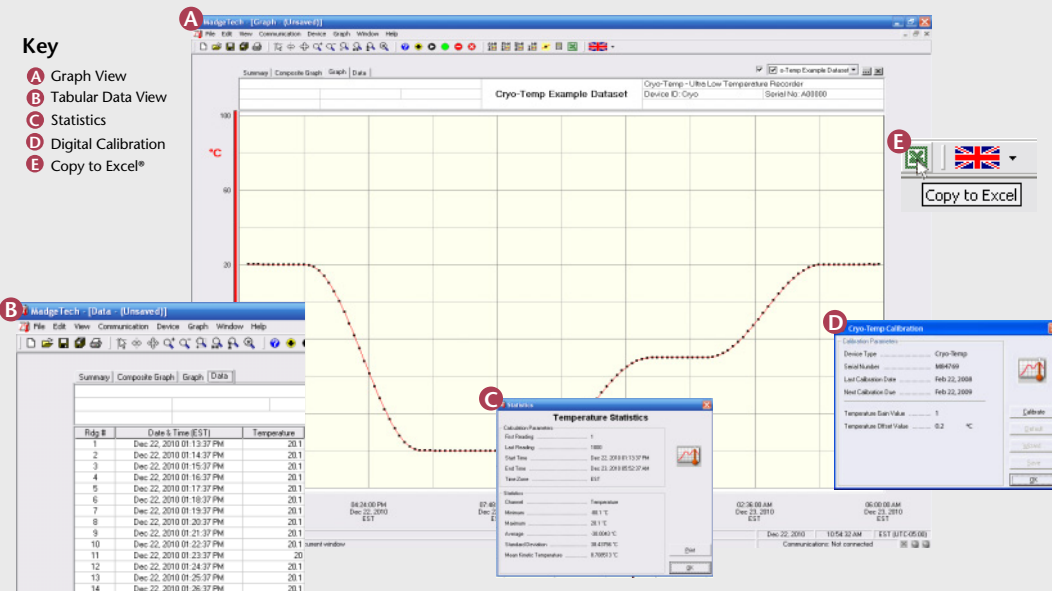
The Cryo-Temp provides date and time stamped temperature readings and uses the MadgeTech Data Logging Software. The user can view the data in graphical or tabular form. High and low alarm limits and high and low warning limits can be programmed through the software. The user can set the alarm limits in the range required for the goods to be maintained. The warning limits can be set to alert the user when the temperature is nearing a high or low alarm limit, so that proper action can be taken to ensure the integrity of the goods.

The Cryo-Temp is equipped with three LED's. The green LED will blink every 15 seconds while the recorder is logging data. The yellow LED will blink every 3 seconds when the temperature has breached the warning limits. The red LED will blink every 3 seconds when the temperature alarm limits have been exceeded. The Cryo-Temp is the ideal temperature monitoring solution for any application involving ultra low temperature recording.

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 (F_0 , PU)
- Mean Kinetic Temperature
- Full time zone support
- Data annotation
- Min./Max./Average lines
- Data table view
- Automatic report generation
- Summary view
- Multilingual

CRYO-TEMP SPECIFICATIONS*

Temperature Sensor: NTC Thermistor

Temperature Range: -86°C to +35°C recommended,
may be used up to +55°C

Temperature Resolution: 0.1°C

Calibrated Accuracy: ±1.0°C

Reading Rate: 5 seconds to 30 minutes, selectable in

Memory: 32,767 readings; software configurable
memory wrap

Start Modes: Software programmable immediate
start, delay start up to 30 days in
advance or manual start with magnetic

Temperature Alarm: Software programmable high and low
alarm limits, high and low warn limits
each setpoint may be individually
enabled or disabled

Alarm Delay: Software programmable time delay for
warn/alarm limits. Logger will not
indicate out of range status until the
temperature has been out of range for a

Status Indicators: Green: Blinks to indicate safe conditions
during logging
Yellow: Blinks to indicate warn limits
have been exceeded
Red: Blinks to indicate alarm criteria
(limits/delay) have been exceeded

Password Protection: An optional password may be programmed into
the device to restrict access to configuration options.
Data may be read out without the password.

Calibration: Digital calibration through software

Calibration Date: Automatically recorded within device

Battery Type: 3.6V lithium battery (LTC-7PN),
factory replaceable only

Battery Life: 2 years typical @ 25°C, 1 min. reading intervals
1 year typical @ -80°C, 1 min. reading intervals

Data Format: Date and time stamped °C, °F, K, °R

Time Accuracy: ±2 minutes/month max. at 20 to 30°C
±5 minutes/month max at -80°C

Computer Interface: USB docking station to PC (IFC300)
38,400 baud

Software: XP SP3/Vista/Windows 7

Operating -86°C to +35°C (may be used up to +55°C);
Environment: 0 to 100% RH

Dimensions: 3.3" x 2.1" x 0.4" (83 mm x 54 mm x 11 mm)

Ingress Protection/IP IP65 (splash resistant, not submersible)

Enclosure ABS plastic, white, polycarbonate labeling

Weight: 1.4 oz (40 g)

Compliance: CE, Approved for carriage on Delta® main-
line flights

BATTERY WARNING: WARNING: FIRE, EXPLOSION, AND SEVERE BURN HAZARD. DO NOT
SHORT CIRCUIT, CHARGE, FORCE OVER DISCHARGE, CRUSH, PENETRATE, OR INCINERATE.
BATTERY MAY LEAK OR EXPLODE IF HEATED ABOVE 80°C (176°F).

*SPECIFICATIONS ARE SUBJECT TO CHANGE WITHOUT NOTICE. SPECIFIC WARRANTY
REMEDY LIMITATIONS APPLY.

ORDERING INFORMATION

MODEL	DESCRIPTION
CRYO-TEMP	Ultra Low Temperature Recorder
IFC300	Software, manual, docking station and USB connection cable
SVP –Secure	Protocols for validating the 21 CFR Part 11 ready, secure logging system
SVP-Secure License	License for MadgeTech SVP-Secure Software (unlimited users, license per computer)
*NIST	N.I.S.T. Calibration Certificate

Whilst every effort has been made to ensure the accuracy of this specification, we cannot accept responsibility for damage, injury,
loss or expense from errors or omissions. In the interest of technical improvement, this specification may be altered without notice.

For pricing or any further information, please contact Omni Instruments Ltd.