

Data Logging Solutions for USDA Regulation
Compliance and HACCP Programs for

Food Processing





Data Logging Solutions for Temperature Critical Food Processing Applications

MadgeTech has been a key resource for the food and beverage industry for over 20 years, offering a wide range of temperature monitoring solutions. We have a deep commitment to facilitating regulatory compliance and promoting best practice in food safety. MadgeTech data loggers and monitoring systems have become synonymous with HACCP compliance and process verification throughout the food industry, both domestically and internationally.

Most importantly, the MadgeTech name is widely known for both quality and reliability.

As a provider of leading-edge technology, MadgeTech offers a diverse line of wireless data logging systems for environmental and facility monitoring. This allows FSQA personnel to see both product and process temperatures in real-time. From refrigerators to freezers and blast chillers, from the production floor to packaging and storage, MadgeTech provides an easily scalable temperature and humidity data monitoring solution for even the most challenging environments.

Our goal is to continue to provide the tools needed to help food safety professionals perform their jobs more effectively and efficiently.

When you think food safety, think MadgeTech.



Data Logging Solutions



Wireless Continuous Process Monitoring



Cooking & Cooling



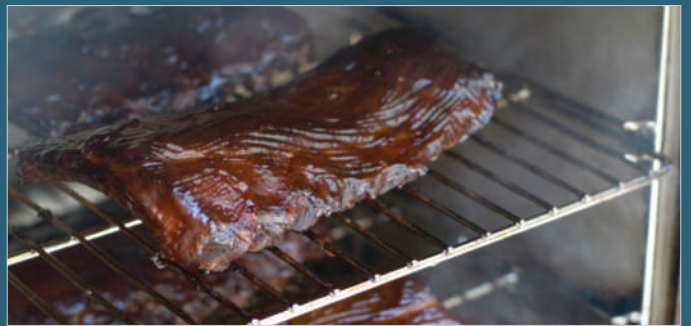
Food Storage



Food Shipping



Canning Processes



Oven Temperature Monitoring



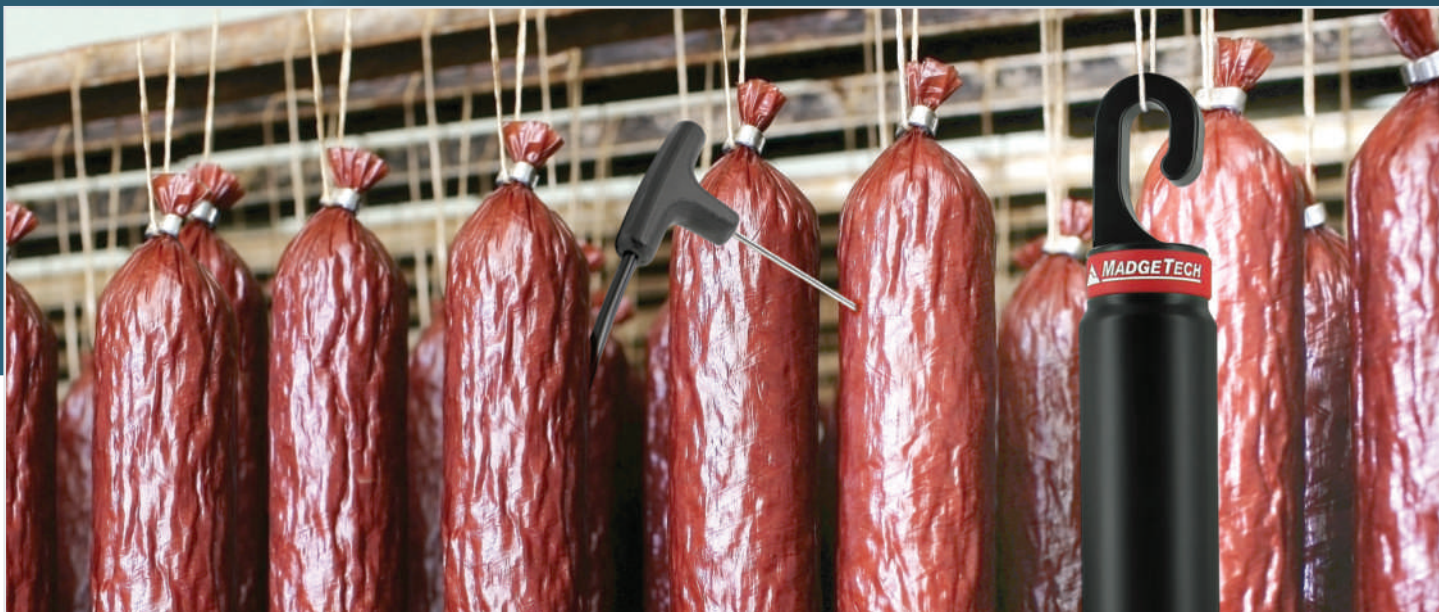
Egg Shipping & Storage and Incubation



Beverage Pasteurization

Wireless Continuous Process Monitoring

MadgeTech's RFOT wireless, continuous monitoring data logging system provides a streamlined solution for measuring and recording internal product temperatures throughout the cooking, smoking, cooling and storage of meat and food products. Users can configure email and text message notifications in the event a logger receives data outside of the desired range.



Wireless Meat Temperature Monitoring

RFOT

The **RFOT** monitors and records internal temperature of meat products during cooking, cooling and storage. It can be used inside smokers and other cooking processes up to 212 °F (100 °C) as well as coolers and freezers down to -4 °F (-20 °C). The RFOT is completely splash-proof and can withstand wash down cycles. Once deployed, loggers can be stopped and started remotely and real-time data can be viewed from a central PC or from a smartphone using MadgeTech Cloud Services.

Available Probe Lengths

- 1.75 in (70mm)
- 4.0 in (102 mm) RFOT-FR (Fast Resonse)
- 4.0 in (102 mm) RFOT-4-TD (Transitional Diameter)
- 7.0 in (177 mm) RFOT 7



MadgeTech wireless data loggers help users ensure that critical control limits are not exceeded by sending email or text notifications when temperature thresholds are met.

Wireless Ambient Data Loggers

Temperature and Humidity Monitoring

The MadgeTech 2000A series of wireless data loggers include models specifically designed to monitor ambient temperature and humidity in warehouses, coolers, freezers and other sensitive environments. Data from each 2000A logger can be viewed locally via LCD screen or remotely using MadgeTech 4 Data Logger Software or MadgeTech Cloud Services.

Programmable alarms can be set to alert users of undesirable temperature or humidity excursions. These alarms are audible and visible on the logger itself and users can also configure text message or email notifications.



RFRHTemp2000A

Wireless Temperature and Humidity Data Logger with LCD display on table mount.



RFTemp2000A

Wireless Ambient Temperature Data Logger with LCD on wall mount.

Applications

- Coolers
- Freezers
- Warehouses
- Thermal Mapping

Features

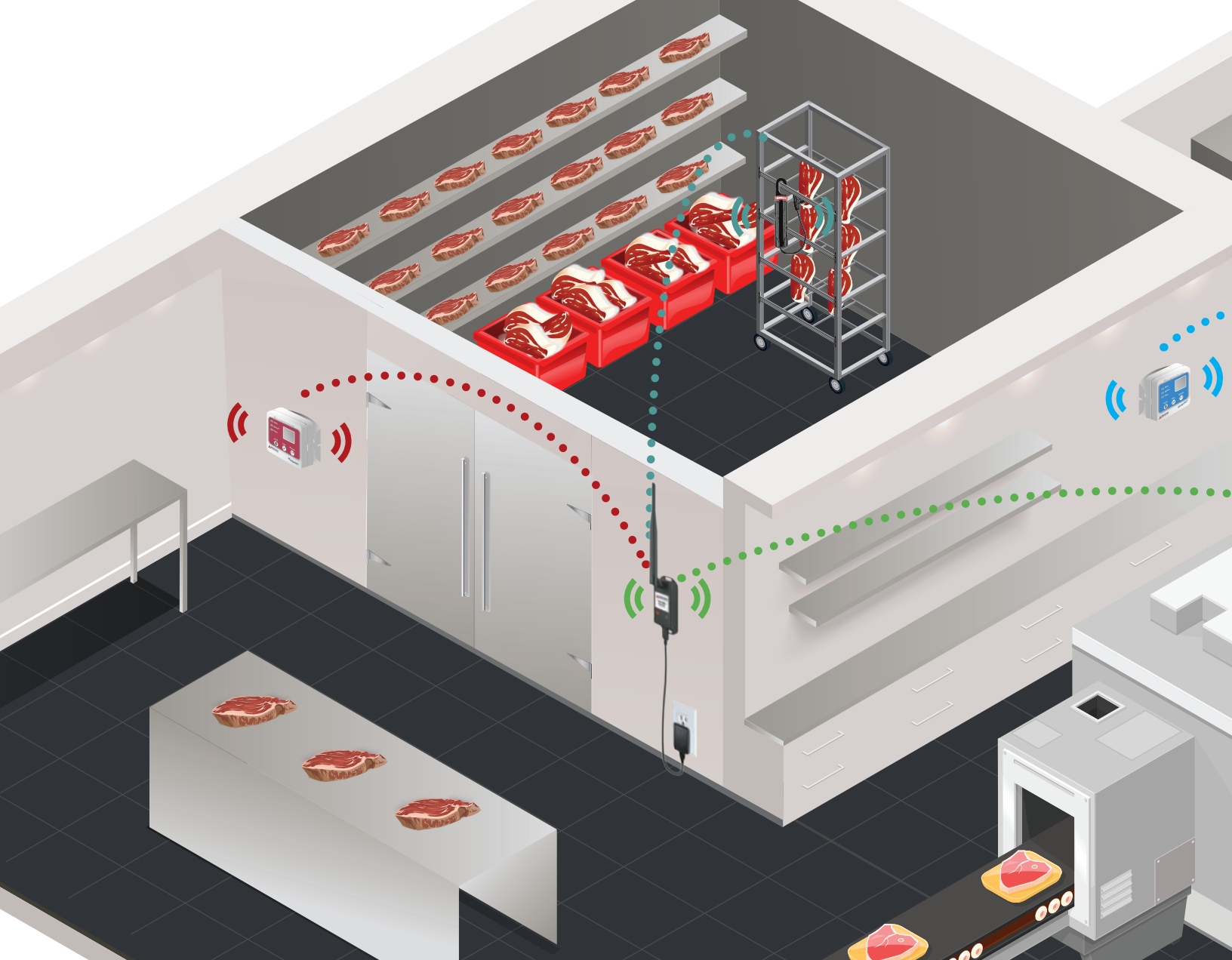
- LCD Screen
- Audible and LED Alarm Indicators
- Battery Life Indicator

Wireless Thermocouple-Based Data Logger

RFTCTemp2000A

The **RFTCTemp2000A** is a wireless thermocouple temperature data logger. This device can measure ambient temperature and be fitted with a thermocouple probe for targeted remote measurement. It accepts all thermocouple types, allowing the device to measure and record temperatures between -454 °F and +3308 °F (-270 °C to +1820 °C). The convenient LCD provides instant viewing of the current readings, as well as access to minimum, maximum and average statistics.





Wireless Diagram

It's Easy! Start Logging in 4 Steps...

- 1 Setup the RFC1000's
- 2 Deploy the data loggers
- 3 Wirelessly start the data loggers
- 4 Data is instantly transmitted to a computer or cloud for real-time monitoring



RFOT

Wireless Meat Temperature Data Logger



RFRHTemp2000A

Wireless Temperature and Humidity Data Logger with LCD Display

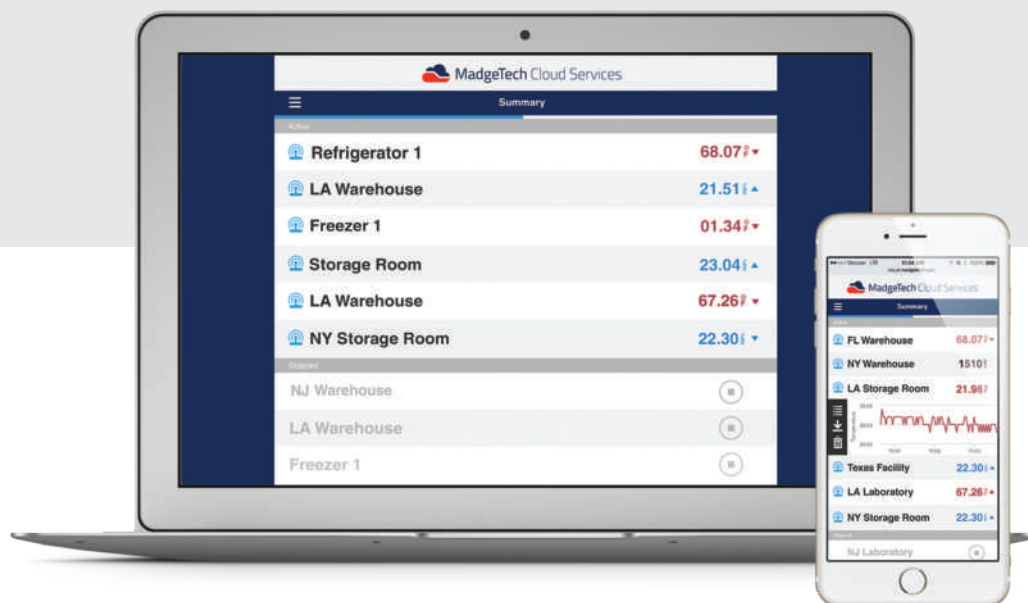


RFTCTemp2000A

Wireless Thermocouple Based Temperature Data Logger with LCD Display



MadgeTech Cloud Services



Access Data Instantly and Securely from Anywhere in the World

MadgeTech Cloud Services puts real-time data in the palm of your hand from anywhere in the world, giving users around the clock access from any internet enabled device. Users can view and manage an infinite number of wireless data loggers with a single MadgeTech Cloud account, empowering business owners and managers to view data for an entire production facility or a network of facilities around the world in one convenient view.

Users can also set alarms via the cloud to alert them in the event of an undesirable temperature or humidity excursion. These alarms can be configured as emails or text messages, allowing users to create the system that works best for them.

MadgeTech Cloud Services is available free of charge and compatible with all MadgeTech wireless data loggers, allowing users to create an account online and be up and running in minutes.



Real-Time Data

24/7 instant access to your temperature and humidity data.



Offering Peace of Mind

Be assured your equipment is running, whether you are in the building or on the road.



Text & Email Notifications

Get notified when temperature thresholds are met.



Multi-Facility Monitoring

Managing a single logger system or a network of facilities.

Transmit data directly to MadgeTech Cloud Services with the **RFC1000 Cloud Relay**



Data Logging Hub

RFC1000 Cloud Relay

The **RFC1000 Cloud Relay** is a data logging hub that transmits live data directly to MadgeTech Cloud Services. This allows users to remotely monitor and manage any number of data loggers without the need for a central PC. All Cloud data can be downloaded as a CSV file for record keeping or further analysis.



RFC1000 Cloud Relay

High Temperature Process Validation



Verify Wet or Dry Food Processing Applications

HiTemp140 Series

MadgeTech **HiTemp140** data loggers are designed for a wide range of food and meat processing applications to assist in compliance with HACCP guidelines and USDA regulations. HiTemp140 loggers are made from food-grade stainless steel and come in a variety of both rigid and flexible probes. These rugged loggers can indefinitely withstand temperatures of up to 284 °F (140 °C) and are completely submersible, making them perfect to validate cooking, smoking or pasteurization processes.

For applications above 284 °F (140 °C), a thermal shield is available for HiTemp140 series data loggers. Made of food-grade PTFE, the Thermal Shield extends the operating temperature range of the data logger for extreme temperature monitoring.



MadgeTech data loggers help users monitor and record the internal temperature of meat during a process.

Applications

- Cooking and Smoking
- Pasteurization Processes
- Roasting Ovens
- Lobster Boiling
- Equipment Validation/Profiling



Thermal Shield

HiTemp140X2

HiTemp140-1

HiTemp140-2

HiTemp140-5.25

HiTemp140-7

HiTemp140-PT-1

Canning & Beverage Applications



Canning

ThermaLock Pro Canning Fitting

The ThermaLock Pro Canning Fitting securely attaches to cans, jars or other rigid containers used in food processing applications. Compatible with the MadgeTech HiTemp140-FP and HiTemp140X2-FP data loggers. The ThermaLock Pro probe sheath extends into the container to allow users to monitor internal temperatures.

Available Probe Sheath Sizes

- 1.6 in (40.64 mm) probe sheath
- 2.4 in (60.69 mm) probe sheath
- 3.6 in (91.44 mm) probe sheath
- 4.5 in (114.30 mm) probe sheath
- 5.4 in (137.16 mm) probe sheath

Suitable Packaging Types

- Cans
- Jars
- Soft Pouches
- Rigid Plastic Containers
- Retort Packages



Beverage Pasteurization

MicroTemp

The **MicroTemp** is a miniature, submersible temperature data logger. At just 2.6 inches (66 mm) tall and 0.7 inches (18 mm) in diameter, this recorder can easily fit into beverage bottles to monitor and record temperatures during pasteurization.



Oven Temperature Monitoring



Rotary & Conveyor Oven Monitoring ThermoVault Max

The ThermoVault Max is an extreme, high temperature thermal barrier designed for use with MadgeTech's HiTemp140-PT data logger models. Built to endure extreme temperature monitoring environments, this durable enclosure can withstand temperatures up to 752 °F (400 °C) and provides a best-in-class solution for the harshest of applications.

- ✓ *No Wires or Thermocouples*
- ✓ *Temperatures up to 752 °F*
- ✓ *Food-Grade Stainless Steel*
- ✓ *Sleek Compact Design*



MadgeTech data loggers help verify your equipment is working properly and assist in your preventative maintenance program.



Shipping & Storage Data Loggers



Refrigerated Products

TransiTempII

The **TransiTempII** is a low cost, splash-proof temperature data logger ideal for shipping applications. It measures temperatures between -40 °F and +176 °F (-40 °C to +80 °C), making it a perfect fit for refrigerators and freezers. Built in LED lights visually warn users when programmed temperature thresholds are approaching or have been exceeded.



Freezer Foods & Shipping Containers

Cryo-Temp

The **Cryo-Temp** is a standalone ultra-low temperature logger that can measure as low as -122 °F (-86 °C). The enclosure is splash-proof and equipped with LED lights to inform users when programmed temperature limits have been approached or exceeded.

Validating Egg Processes



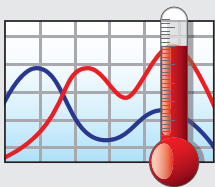
Egg Shipping, Storage & Incubation

EggTemp & EggTemp-RH Data Loggers

The EggTemp and EggTemp-RH are submersible data loggers that are designed to thermally respond to an environment the same way a real egg does. The EggTemp measures and records temperature, while the EggTemp-RH measures temperature and humidity, simulating the experience of the actual product.

These devices are commonly used in monitoring the shipping and storage of eggs as well as monitoring pasteurization cycles. They can record temperatures up to 140 °F (60 °C) and have a maximum memory capacity of 32,767 readings.

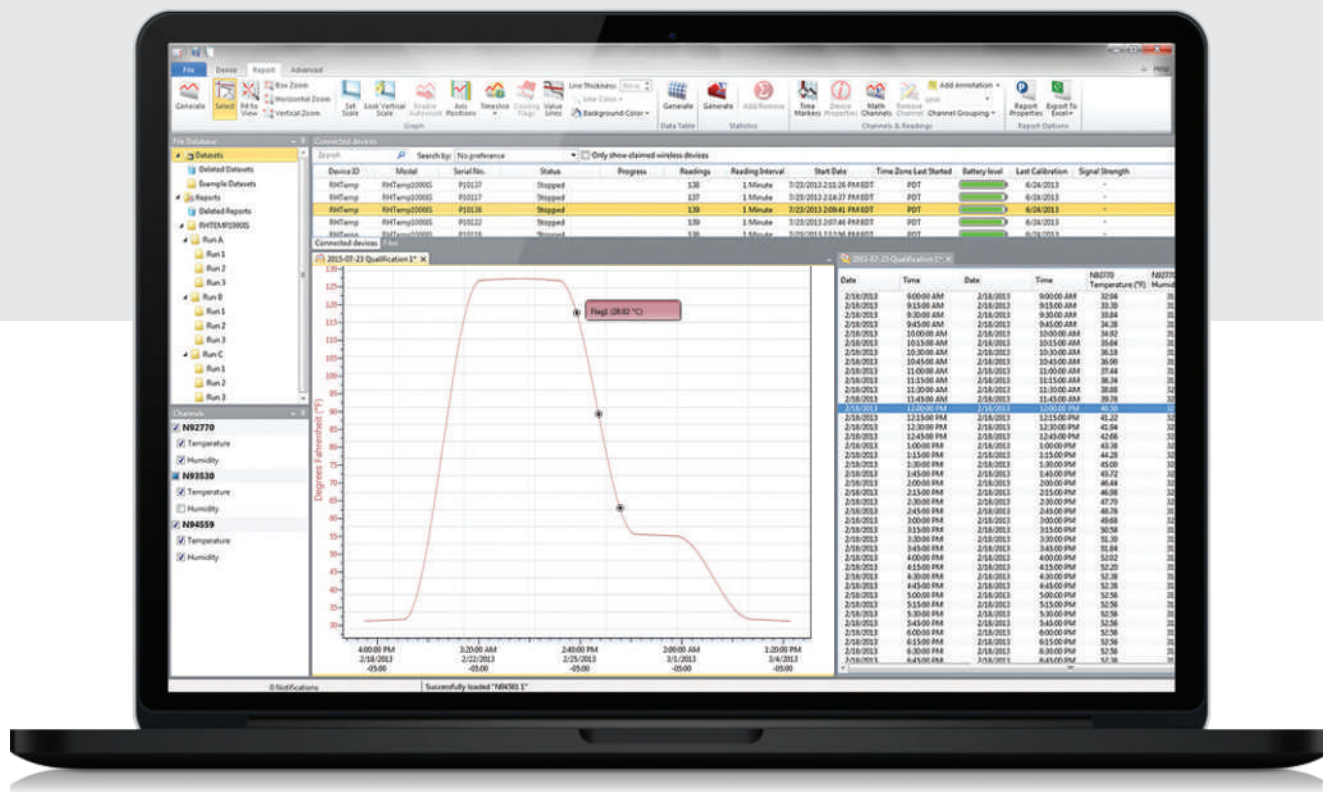




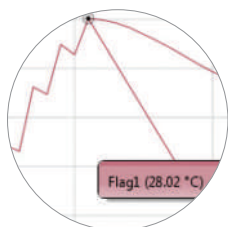
MadgeTech 4 Software

The simple, easy-to-use, Windows-based software enables the user to effortlessly collect, display and analyze data. A variety of powerful tools can be used to examine, export and print professional quality reports with just a click of the mouse. This software can be downloaded for free from the MadgeTech website.

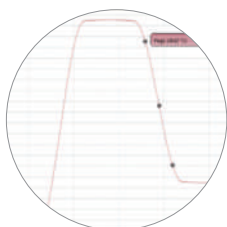
Easy-to-use, Windows-based Software



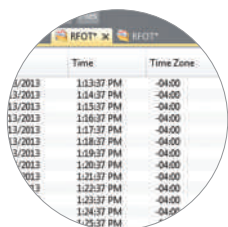
The MadgeTech Data Logging Software makes record keeping a simple task. Easily tailor graphs and create custom reports for the product being processed to help comply with federal guidelines and regulations.



Cooling Flags



Graph View



Tabular Data View



Alarm Notifications



Automation



Export to Excel



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