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Lascar Electronics is a leading manufacturer of data logging solutions, offering innovative products for monitoring and recording environmental conditions such as temperature and humidity. The EasyLog range of data loggers is trusted across industries like healthcare, pharmaceuticals, and food storage, where accurate environmental monitoring is critical.

EasyLog devices are user-friendly, featuring USB and Wi-Fi connectivity for simple data transfer and remote monitoring. Designed for applications such as vaccine storage, EasyLog loggers ensure regulatory compliance by providing reliable, real-time alerts and comprehensive data logging, making them essential for temperature-sensitive environments.

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### EasyLog and Our Solutions

EasyLog data loggers by Lascar Electronics provide precise monitoring solutions for a wide range of applications. Our reliable, easy-to-use devices ensure accurate tracking for critical environments, helping to maintain product integrity and comply with regulations.

EasyLog, by Lascar Electronics, has been a trusted name in the data-logging industry for over 45 years. With decades of experience, we have built a reputation for delivering high-quality, reliable products that meet the evolving needs of our customers across diverse sectors.

#### What is an EasyLog data logger?

EasyLog data loggers are electronic devices designed to record and store measurements over time. They are used in a wide variety of applications to monitor temperature, humidity, pressure, voltage, current and many other parameters.

#### What are EasyLog Data Loggers used for?

EasyLog data loggers are used to ensure quality, safety and compliance in a wide variety of applications, including:

- Pharmaceuticals
- Industrial
- Healthcare
- Food
- Cold-Chain Logistics
- Laboratory

#### What makes EasyLog data loggers different from other brands?

EasyLog data loggers offer easy-to-use, high-precision solutions with USB models for manual data retrieval, wireless options for real-time monitoring, and secure cloud access with custom alerts, ensuring exceptional accuracy and reliability across industries.





Real-time monitoring with EasyLog gives you instant access to temperature, humidity, and more, with immediate alerts via cloud-based systems or mobile apps.

#### **Secure Limitless Data Storage**

EasyLog data loggers store thousands of readings, and Wi-Fi-enabled models automatically send data to the cloud for easy access in one location.

#### **Easy Access to Audit Reports**

Access audit data in as little as three clicks, or schedule for automatic delivery to your inbox.

#### **Guaranteed Accuracy and Reliability**

EasyLog data loggers feature high-precision sensors and rigorous calibration for accurate readings. With automatic logging and threshold breach alarms, they ensure reliable data capture every time.

### EasyLog Cloud - A Complete Solution

EasyLog data loggers with EasyLog Cloud deliver a comprehensive solution for precise monitoring, making them essential for maintaining accurate environmental control. These devices offer real-time tracking, automated reporting, and cloud-based access, allowing you to stay informed and manage conditions remotely. With EasyLog Cloud, you can monitor conditions from anywhere, ensuring you're always informed and in control.

From compliance with regulatory standards to ensuring the safety and quality of products, EasyLog data loggers deliver precision, reliability, and peace of mind, even in extreme environments.

Find out more about EasyLog Cloud



#### Compliance and Regulatory Benefits

Maintaining compliance with industry regulations is critical, especially when it comes to monitoring temperature and humidity. These factors can directly impact product quality, safety, and operational efficiency in various sectors. Accurate and consistent monitoring ensures that businesses meet regulatory standards, protect assets, and maintain optimal conditions, reducing the risk of costly non-compliance penalties or product spoilage.

#### **Key Regulatory Bodies and Standards**

EasyLog data loggers improve compliance by automating the monitoring and recording of environmental conditions like temperature and humidity, ensuring that data is continuously collected according to industry standards. The system generates detailed, time-stamped reports that meet regulatory requirements such as:

- FDA (Food and Drug Administration)
- HACCP (Hazard Analysis Critical Control Points)
- ISO (International Organisation for Standards)

#### **Data Integrity and Traceability**

Ensuring data integrity and traceability is key to compliance. EasyLog data loggers provide secure storage for accurate records, along with traceable data origins, while robust backup and security measures prevent data loss or unauthorised access.

#### **Calibration and Validation**

Regular calibration and validation are crucial for accurate measurements and meeting compliance standards. EasyLog provides calibration services and designs data loggers for easy calibration, saving time and effort.

#### **Documentation and Audits**

Maintaining comprehensive documentation is crucial for compliance. EasyLog Cloud simplifies data management by automatically logging all data points, alerts, and audit checks. This well-organised record makes preparing for regulatory audits easier, ensuring that you have the necessary evidence to demonstrate compliance.



#### Real-Time Monitoring and Data Accuracy

EasyLog data loggers are designed to provide accurate and trustworthy monitoring. They are equipped with high-precision sensors and have been carefully calibrated to guarantee consistently accurate readings in a variety of circumstances. With automated recording and real-time warnings for threshold violations, you can be confident that your data is accurately collected without missing significant changes.













## Pharmaceutical Monitoring Solutions

The pharmaceutical industry operates under some of the strictest regulations to ensure the safety, efficacy, and quality of products. From the manufacturing process to transportation and storage, strict control of environmental conditions—particularly temperature and humidity—is critical to maintaining product integrity.

Regulatory bodies like the FDA, MHRA, and WHO impose stringent guidelines that must be adhered to in order to avoid product spoilage, maintain compliance, and prevent costly wastage. Ensuring that pharmaceutical products, vaccines, and other temperature-sensitive drugs are kept within the required conditions is not only a legal obligation but also a matter of public safety.



#### Challenges in Pharmaceutical Monitoring

The pharmaceutical sector faces numerous challenges in maintaining compliance.

**Strict temperature control:** Certain pharmaceuticals, including vaccines, must be kept within very specific temperature ranges to remain effective. For example, most liquid antibiotics need to be kept refrigerated between 2°C and 8°C.

**Continuous monitoring:** Maintaining a continuous, unbroken record of environmental conditions is necessary to ensure compliance and product integrity throughout the supply chain.

**Regulatory compliance:** Regulations like FDA and 21 CFR Part 11 mandate that pharmaceutical companies have reliable, accurate systems in place for data logging and reporting.

**Auditable records:** In the event of an audit or investigation, pharmaceutical companies need accurate and tamper-proof records of environmental conditions to prove compliance with regulations.

#### How EasyLog Data Loggers Can Help

EasyLog by Lascar Electronics provides a comprehensive range of data loggers tailored to the stringent requirements of the pharmaceutical industry. Our devices deliver high-precision monitoring solutions that simplify 21 CFR compliance and audit trail management. With EasyLog, you can ensure product safety throughout the supply chain by real-time monitoring and accurate data recording.

Our data loggers are equipped with advanced features such as secure data storage, authorised access only, and automatic data logging. These features help you maintain regulatory compliance and provide irrefutable evidence in case of audits or investigations.



Improve operational efficiency through real-time monitoring and automated data collection.

Key Benefits of

software.

EasyLog Data Loggers

for Pharmaceuticals

Streamline your compliance efforts with our easy-to-use data loggers and intuitive

Reduce the risk of product recalls by

and humidity requirements.

ensuring adherence to strict temperature

Enhance patient safety by maintaining the integrity of temperature-sensitive pharmaceuticals.

Strengthen your reputation as a reliable and compliant pharmaceutical manufacturer.



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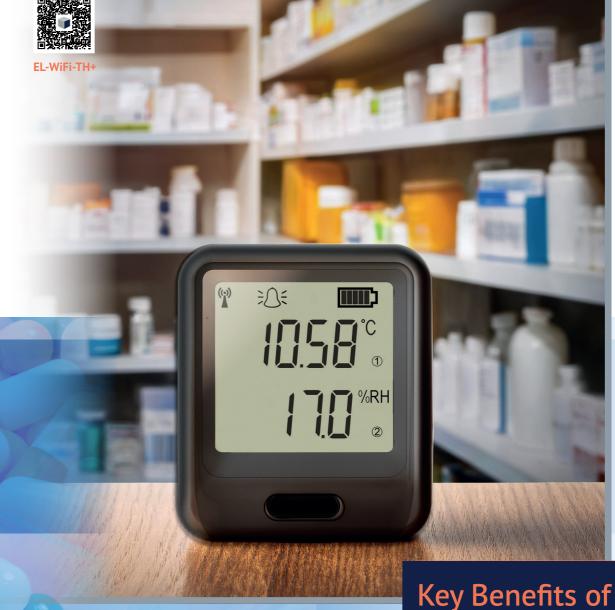
## Optimising Healthcare Environmental Monitoring

Maintaining oversight of critical environmental conditions – such as temperature, humidity, and air quality – is essential for ensuring patient safety and operational efficiency. Whether overseeing hospital settings or managing medical devices, healthcare professionals must adhere to strict standards to protect both patient care and medical supplies.

Organisations like the FDA and CDC establish comprehensive protocols that healthcare institutions must follow to ensure that medical equipment, medications and biological materials remain effective and safe for use. These regulations are crucial for preventing product degradation, maintaining compliance and minimising risks that could compromise patient care.

Maintaining the proper conditions for storing vaccines, medication and other critical healthcare supplies is not just a regulatory requirement but also a critical responsibility in safeguarding patient health and upholding public health standards.





#### Challenges in Healthcare Monitoring

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Healthcare organisations encounter a variety of challenges when it comes to effective environmental monitoring:

Ensuring Patient Safety: Monitoring temperature and humidity levels in patient areas and operating theatres is essential to maintain safe and sterile conditions.

Protecting Sensitive Assets: Vaccines, medications and patient samples must be stored at precise temperatures to remain effective, requiring constant monitoring to avoid spoilage.

Minimising Waste: Effective monitoring helps reduce waste by ensuring that medical products are stored in optimal conditions, preserving their quality.

Meeting Regulation Standards: Healthcare providers must comply with NHS, MHRA and the Care Quality Commision standards, making reliable monitoring systems essential for audits and inspections.

Automated Alerts: Without automation, staff must manually check temperatures, taking time from other duties and risk missing fluctuations that can lead to wasted materials. Automated alerts reduce this risk and improve efficiency in hospitals and clinics.

## How EasyLog Data Loggers Can Help

Lascar Electronics' EasyLog range offers healthcare providers comprehensive data logging solutions that ensure precise, NHS-compliant temperature control. Our vaccine temperature loggers and Wi-Fi-enabled devices allow for fully automated, real-time monitoring through a cloud-based system. Staff can track temperature, humidity and air quality from a single platform, receiving instant alerts for critical changes, eliminating the need for manual physical checks.

EasyLog devices are designed to meet strict healthcare regulations with features like restricted access, audit trails and event logs. Our 21 CFR-compliant data loggers ensure data integrity and security, with unlimited cloud storage for easy access. EasyLog's data loggers provide accurate temperature readings to help healthcare facilities comply with NHS Green Book requirements.

## EasyLog Data Loggers for Healthcare

- Real-time monitoring and alerts
- Automated, cloud-based data management
- Restricted access and audit trails
- Supports NHS vaccine storage guidelines
- Precise temperature and humidity control

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Minimises risk of material waste

## Precision in Cold Chain Monitoring

Cold chain monitoring is essential for maintaining the integrity of temperature-sensitive products throughout their journey from production to delivery. Effective cold chain management ensures that items like pharmaceuticals, vaccines and perishable goods remain within required temperature ranges.

Modern technology allows for accurate monitoring and data logging, helping to track and address temperature deviations during transport or storage, minimising damage and ensuring compliance. Techniques such as temperature monitoring are critical in maintaining the steady conditions necessary to protect the integrity of items such as medicines, vaccines, and perishable foods.

#### Challenges in Cold Chain Monitoring

Cold chain monitoring presents several challenges that impact the efficiency and effectiveness of handling temperature-sensitive products.

**Condensation:** Rapid temperature changes can lead to excessive moisture build-up in coolers and freezers, causing slippery surfaces and potential product contamination.

**Temperature Fluctuations:** Inconsistent temperatures during transport can accelerate spoilage, reduce shelf life and cause mould growth, compromising both product safety and integrity.

**Inaccurate Temperature Readings:** Relying on manual temperature checks can lead to missed deviations, compromising cold chain reliability.

**Equipment Failure:** Malfunctions in refrigeration systems can disrupt temperature control, leading to potential product loss.

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- Reliable temperature and humidity monitoring
- Pre-configured alarms for easy setup
- **Custom configurations available**
- Easy software download and logger set up
- Reduces product spoilage and waste
- Safeguarding the integrity of your perishable items during transport and storage



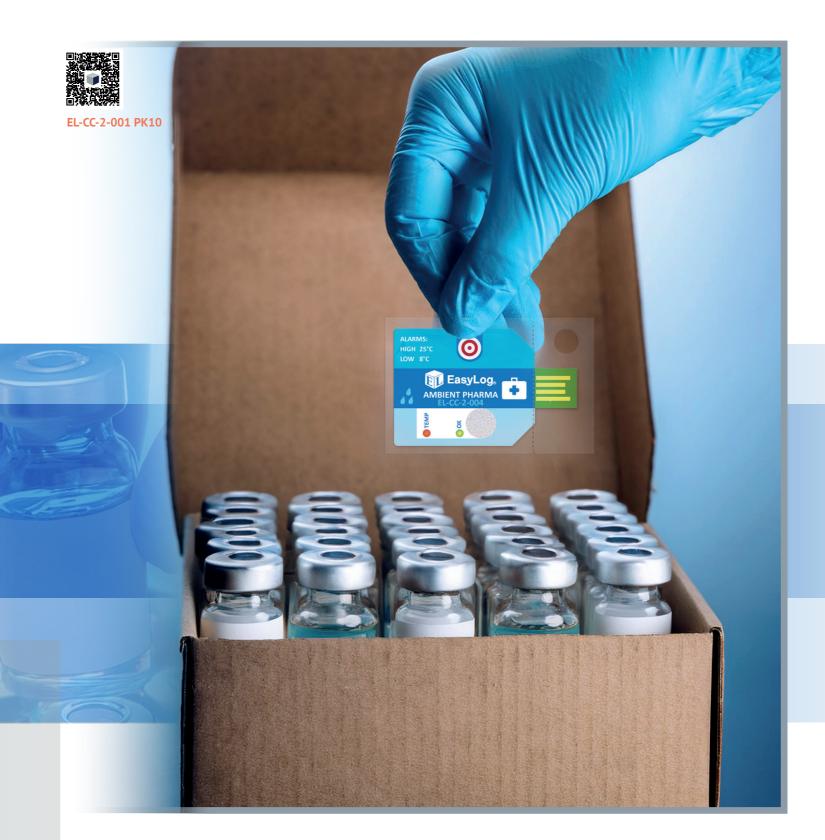
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#### How EasyLog Data loggers can Help

Lascar Electronics' EasyLog cold chain data loggers provide an efficient solution for monitoring temperature and humidity, enhancing maintenance, and ensuring compliance.

EasyLog USB devices accurately monitor temperature and humidity to help prevent condensation and mould growth. Their precise readings help eliminate inaccuracies. With EasyLog USB loggers, data can be reviewed after transport to quickly identify and address any temperature deviations, ensuring effective cold chain management.



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## Controlled Environments for Laboratories

In laboratory settings, maintaining precise control over environmental conditions is crucial for ensuring the accuracy and reliability of tests and experiments. Effective data logging and monitoring systems play a vital role in overseeing the performance of essential equipment, such as fridges, freezers, incubators and autoclaves.

stay compliant with FDA regulations without manual checks.

Lascar Electronics' EasyLog Cloud

monitoring with automated alerts and secure data logging, helping you

solutions ensure continuous real-time

Temperature and environmental monitoring systems help safeguard product integrity by maintaining the correct conditions during storage and handling. Adherence to regulations, including FDA and 21 CFR, is essential for compliance and quality control. Automated data logging not only enhances safety and working practices but also facilitates remote data access and report generation, streamlining laboratory operations and ensuring consistent performance.

# Key Benefits of EasyLog Data Loggers for Laboratories

- Accurate temperature and humidity monitoring
- 21CFR compliance for regulatory standards
- Cloud-enabled remote access to data
- Reliable calibration services ensuring precision
- Early alerts for temperature fluctuations
- Simplified data reporting and analysis in the EasyLog Cloud



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**FL-WiFi-T** 

#### Challenges in Laboratory Environmental Monitoring

Laboratory environmental monitoring presents several challenges that can impact the accuracy and reliability of tests and experiments.

**Temperature Fluctuations:** Variations in temperature can compromise the integrity of sensitive samples and experiments, affecting results and product quality.

**Equipment Malfunction:** Failures or inaccuracies in laboratory equipment, such as fridges and incubators, can lead to deviations from optimal conditions, risking sample integrity.

**Data Accuracy:** Manual logging or poorly calibrated sensors can result in inaccurate data, potentially leading to non-compliance and unreliable test results.

**Compliance with Regulations:** Meeting stringent regulatory requirements, such as FDA 21 CFR, demands rigorous monitoring and accurate record-keeping.

**Remote Access and Data Management:** Ensuring that data is accessible remotely and securely can be challenging, particularly when integrating with existing systems and maintaining data integrity.

#### How EasyLog Data loggers can Help

Lascar Electronics' EasyLog devices provide reliable solutions to the key challenges of laboratory environmental monitoring. Our high-end temperature logging ensures precise and consistent data, protecting sample integrity from harmful fluctuations. With our 21 CFR-compliant products, we help laboratories meet stringent regulatory standards with ease.

Our cloud-enabled devices offer remote access, allowing real-time monitoring of environmental conditions from anywhere, at any time. Paired with Lascar's expert calibration services, which ensure instruments are calibrated to industry standards, our loggers provide the accuracy and dependability laboratories need to maintain safety and efficiency.

# Food Industry Quality and Temperature Monitoring

In the food industry, maintaining precise environmental conditions is vital to ensure the safety, quality and freshness of products. From production and storage to transportation and retail, controlling factors such as temperature and humidity is essential to prevent spoilage, contamination and foodborne illnesses. Continuous monitoring of these conditions ensures that perishable goods are kept within the correct parameters, preserving their integrity throughout the supply chain.

Regulatory standards require businesses to maintain accurate records of environmental conditions to verify compliance and avoid costly recalls. Effective monitoring not only helps meet these regulations but also reduces food waste and improves operational efficiency.



## Challenges in Environmental Monitoring for the Food Industry

Precise monitoring of temperature and humidity is essential for ensuring food safety and quality.

**Maintaining Specific Temperature Requirements:** Foods, such as sushi and raw fish, require precise temperature control to meet safety regulations and prevent health risks.

**Preventing Cross-Contamination:** Effective monitoring is essential to prevent cross-contamination, which can occur if temperature and humidity levels are not properly managed.

**Ensuring Consistent Oven Temperature:** Issues such as faulty sensors and inconsistent temperature readings can lead to uneven cooking, affecting both the safety and quality of the food.

**Managing Temperature Fluctuations:** Variations in temperature during storage or cooking can lead to spoilage and safety risks, making it crucial to monitor and control these fluctuations closely.

**HACCP Compliance and Record-Keeping:** Accurate, timely records are vital for meeting HACCP standards and ensuring adherence to food safety regulations during audits.

#### How EasyLog Data Loggers Can Help

EasyLog data loggers provide essential solutions for effective food temperature and humidity monitoring. Our USB loggers ensure precise temperature recording during storage and transport, critical for maintaining quality and safety, especially for sensitive foods like sushi. For real-time monitoring, our EasyLog Wi-Fi series detects temperature and humidity changes promptly, allowing for immediate action to prevent spoilage.

Additionally, EasyLog devices support accurate record-keeping, crucial for HACCP compliance, and help manage oven temperature consistency to avoid uneven cooking. With EasyLog, you gain reliable tools to uphold food safety, comply with regulations and maintain high standards in food quality.

## Key Benefits of EasyLog Data Loggers for the Food Industry

- Precise temperature and humidity monitoring
- Real-time alerts and remote access
- Accurate data for HACCP compliance
- Reliable cold chain management
- Customisable for various food needs
- Easy-to-use USB and Wi-Fi options

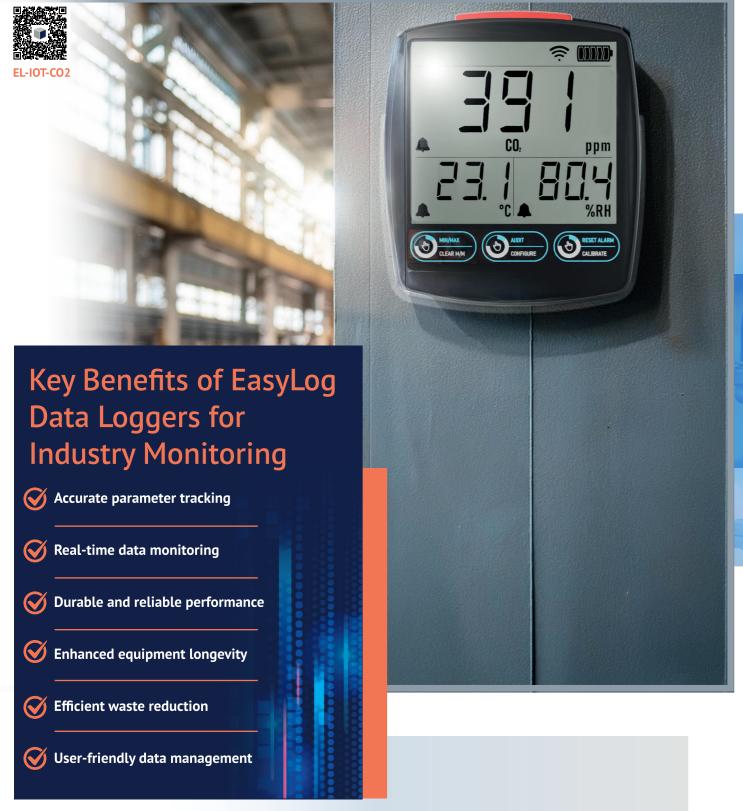
#### Stay HACCP-Compliant with EasyLog

Meeting HACCP standards is critical for ensuring food safety. EasyLog data loggers automatically track and log temperature and humidity data, helping food businesses comply with strict regulations and providing accurate records for audits.

## Industrial Monitoring and Management

In the busy world of manufacturing and industrial operations, keeping things running smoothly is key. Monitoring equipment performance and environmental conditions helps ensure everything operates efficiently, reduces downtime and prolongs the life of machinery.

Reliable data logging provides real-time insights and quick alerts if something goes off track. By staying on top of environmental conditions and equipment performance, businesses can improve their operations, meet industry standards and reduce waste. This ensures high-quality products while optimising resource use and minimising losses.



#### Challenges in Industrial Environmental Monitoring

Effective monitoring in industrial settings is crucial to maintaining smooth operations and compliance. However, various challenges can arise.

**Temperature Control:** Managing extreme temperatures is essential to ensure worker safety, equipment functionality and product integrity. Inaccurate temperature control can impact both operations and safety.

**Regulation Compliance:** Ensuring compliance with environmental regulations requires accurate data logging of air quality, temperature and humidity. Failure to monitor these parameters can result in non-compliance and legal repercussions.

**Pollution and Contamination:** Managing pollution and contaminants is a significant challenge, as industries must monitor and control emissions and pollutants to protect the environment and comply with regulations.

**Waste Management:** Efficiently managing and reducing waste during the production process is a major concern, impacting both operational efficiency and environmental sustainability.

**Operating Conditions:** Industrial sites often have harsh conditions that can affect monitoring equipment's performance and reliability, making accurate data collection challenging.







## How EasyLog Data Loggers Can Help

**EL-USB-1-PRO** 

In the demanding industrial sector, EasyLog data loggers are designed to address key operational challenges with precision and efficiency. Our loggers provide accurate and reliable monitoring of temperature, humidity and other critical parameters, ensuring that machinery operates within optimal conditions. This helps in reducing downtime, extending equipment lifespan and maintaining product integrity.

For environments where air quality and pollution control are crucial, our advanced devices deliver real-time insights into indoor conditions, aiding in the prevention of contamination and compliance with environmental standards. Additionally, EasyLog's wireless data loggers, paired with the EasyLog Cloud, enable continuous monitoring and instant alerts, allowing for swift response to any deviations and reducing waste.

EasyLog data loggers are user-friendly and come with robust data management tools. They make monitoring straightforward and help you maintain smooth, efficient operations with ease.





