

Water Monitoring System Benefits

REDUCE EXPOSURE TO RISK

Relying entirely on taking manual measurements of your organisation’s water assets exposes you to risk in the timeframe between measurements. Even when a measurement has been taken which is determined to be within a safe range, changes in ambient conditions

immediately following the measurement can affect temperatures to a point where bacterial build up takes place. The IoT Monitoring dashboard system identifies Waterfowls and alerts you to them as they occur.

This will limit risk of infection as Legionella can occur in a very short time frame.

MANAGE COMPLIANCE

Every organization is responsible for ensuring exposure to bacterial risk is properly assessed and controlled. Our Dashboard monitoring system helps your organisation meet this obligation by perpetually monitoring temperatures across your water assets.

INCREASE EFFICIENCY

Remote monitoring allows site visits to be dramatically decreased, creating significant efficiencies across your organisation including reducing time lost traveling to site, reducing carbon emissions and fuel costs.

REDUCE ERRORS

Manually recording water temperatures is a process which is prone to keying errors by its very nature. Automatically collecting sensor data reduces the chance of these errors which inevitably occur with any manual entry process.

REDUCE SITE VISITS AND DETECT OCCUPANCY

Automated recording frees your staff from the monotonous task of taking manual water readings, allowing them to be redeployed to carry out more interesting and productive work.

INFORMS WATER SYSTEM DESIGN

Collation of long-term data gives detailed insight into the water system performance and allows localized water system design flaws to be identified, allowing improvements to be made

NERO

Water Safety Monitoring System

OnlineSensors’ NERO remote water safety monitor, enables businesses to meet Compliance requirements needed to ensure a safe and healthy water supply.

The risk of Stagnant water is a real threat, and over the past several decades, outbreaks of Legionnaires’ disease have been traced to building water systems including hot water heaters, showers, spas, humidifiers, ventilation and cooling systems, as well as other structures and locations.

With the Nero & IoT dashboard water flow safety solution, you can reduce the incidence of any Stagnant water infection and ensure that all water safety requirements are met by monitoring the real-time and genuine status of your water.

Once installed, daily alerts from the IoT Dashboard portal will keep you informed and alerted to any parameters that you set that could cause hazardous developments. This will allow management of your water installations to be more dynamically monitored, therefore keeping maintenance to a minimum with reduced site visits.

Previously:

- 1000’S of visual inspections for each site throughout the year
- Time spent locating and measuring individual pipes, taps and tanks
- Recording all results on paper
- Entering relevant data into spreadsheets
- Submit reports at least once per month



SPECIFICATIONS

ENVIRONMENTAL

Operating temperature -10 to +60 C
Ingress protection IP65

PHYSICAL

Size 122mm x 75mm x 36mm
Weight 160g
Colour Grey
Material ABS plastic

POWER

Type Primary cell battery
Nominal 4 years operation

COMMS

Internal antenna
LPWAN (Low Power Wide Area Network) LoRa
868MHz EU
Sigfox 868MHz EU

SENSORS

Sensor Types 2, 3 or 4 Sensor cables
Pipe Mount
Range -10 to +100 C
Accuracy +/- 0.5 degrees C
Pipe Clips various to suit pipe diameter
Cable standard 1m length terminated with M8 connector

CERTIFICATION

UKCA

Now with NERO you can have:



REAL TIME MONITORING
of temperature and flow events



HISTORIC DATA
Point in Time Analysis



VISIBILITY FOR ALL STAKEHOLDERS



INCREASE EFFICIENCY
Fewer site visits,
Lower carbon emissions
– lower costs



IDENTIFICATION OF MAINTENANCE TASKS
and manage defect liabilities

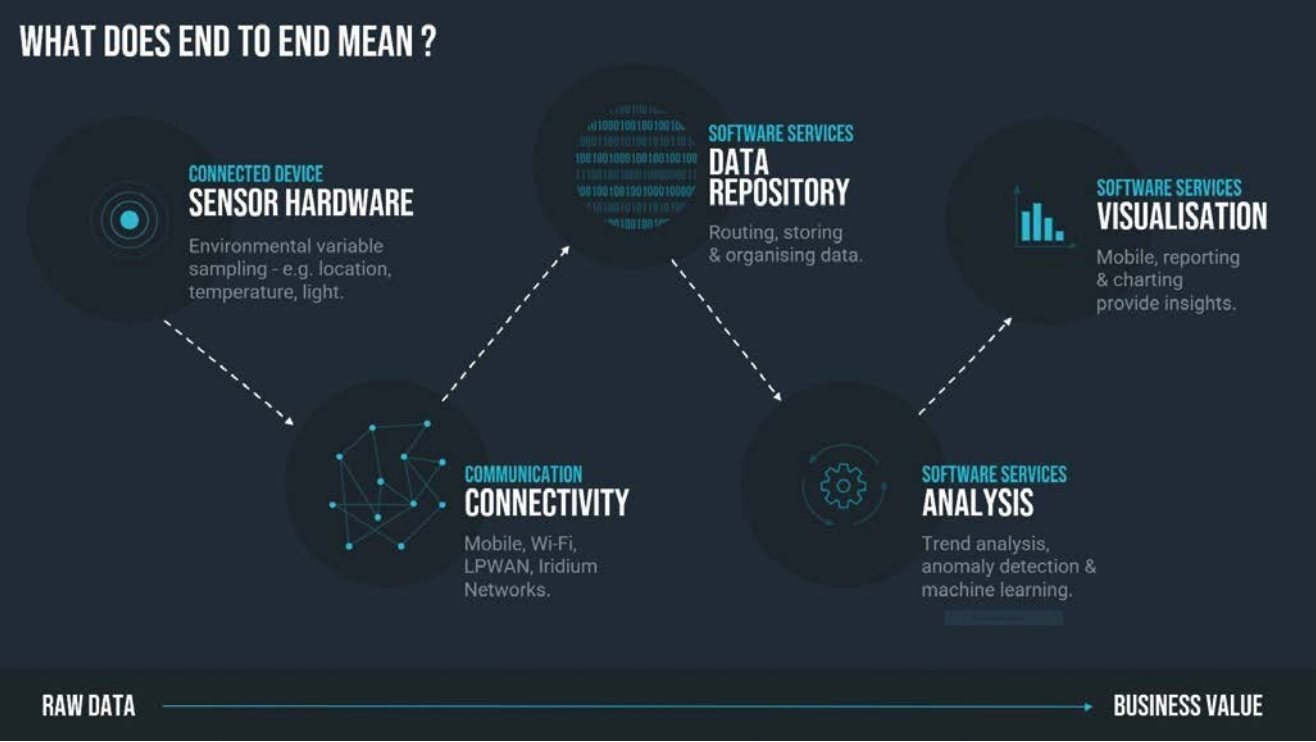


MANAGE HSE COMPLIANCE
Compliant to L8 Standards

Real-time, genuine readings.

NERO + OnlineSensors Dashboard

We can offer an end to end solution, or you can simply, take the data and import into your existing back office solution.



Non invasive Water Flow Detection

Proprietary non invasive methods have allowed the Nero and the Dashboard system to display detected flows and water temperature without any invasive methods.

Nero can retro fit into existing systems with ease and simplicity. The sophisticated design and firmware handle the flow detection and water temperature monitoring

During consultation particular instances can result in an alert for the the site, this is completely bespoke and can be set by the client.

System Features

- Waterflow detection (non invasive)
- water temperature logging
- History log
- Fit to standard pipes
- Graph of temperature extremes
- Secure user logins
- Potential to customize the dashboard features and appearance.
- Mobile friendly
- Occupancy detection

ALERT NOTIFICATION

On discovery of sub optimal conditions identified by the application ,such as those prone to encouraging bacterial growth, the system notifies users in order that they can take action to rectify the issue

RISK SCORE

During consultation code can be added to the dahsboard system to display a risk score if desired this is an add on feature that can .

LOW MAINTENANCE DEVICES

The devices uses LoRaWAN technology (Sigfox version also available) resulting in an average battery life of around 5 years. The device samples every

10 seconds and transmits every 15 minutes with summary data including highest, lowest, average and flow events. Devices can be fitted to pipework or installed behind panelling.

CURRENT READING & FULL HISTORY CHART

At any point the user can view the current reading for all 2 or 4 probes associated with the asset. In addition, history charts present up to 2 weeks of data for an asset.

FULL HISTORY DOWNLOAD

Both events and temperature levels data can be downloaded in CSV format. All historic data for every asset on the system is stored indefinitely. Organisations have an obligation to keep this data for compliance reasons.

MOBILE FRIENDLY

Our IoT has been developed with a mobile first approach meaning that all functionality is available on mobile, tablet and desktop form factor devices. Presentation is therefore optimised for the form factor of the device, allowing engineers to make full use of the software wherever they are.

CONSULTANCY & INSTALLATION SERVICE

Services are available to carry out a full site survey in order to advise on the best placement of devices and ensure they are within range of the LoRaWAN network. In addition, advice is available on set up of users as well as device configuration and notification setting to optimise system performance.

FROST WATCH

The system can detect when pipe temperatures fall below a specific level and send an alert to the maintenance team or individual so corrective action can be taken to avoid burst pipes.