

MAINTNODE

Diagnostic inspection and supervision
electromechanical installations





HOW ARPEDON'S MAINTNODE WORKS

Maintnode supports vibration, ultrasound, current, temperature, pressure, speed and any 0-10V/4-20mA sensor.

Monitor when the equipment operates and extract operating hours, measure vessel and tank level, monitor valve position, gather data from power analyzers or observe current waveforms. Maintnodes supports the needs of your production line.

Observe your installation 24/7. The only requirements are power and an internet connection.

ANALYSE HIGH SAMPLE RATE SIGNALS

Sample with up to 100K samples/sec. Analyze the data on our Mechbase software or download the files for processing on recognized software packages used by the asset diagnosis-prognosis specialists.

Vibration, ultrasound and current are some of the quantities you can analyze.

Extract values from the signal like RMS, Peak to Peak, Crest Factor, limit with frequency filters and windowing functions. Set alarms for those values that will automatically get calculated on any future measurement.

CONNECTS WITH PRODUCTION SYSTEMS

You can now have information from the production equipment along with the sensor measurements.

Use Maintnode's integration with the most popular protocols like Modbus, CANBUS & OPC-UA and take advantage of data from PLCs, power analyzers, automations and other production equipment.





FROM FACTORY FLOOR TO THE CMMS

Use the tools that serve you best.

Measurements from our systems are collected to Mechbase. The software has great interconnection capabilities with other systems like CMMS, ERP and Business Analytics.

Especially for the CMMS (Computerized Maintenance Management System) there is the option to synchronise measurements and also when a measurement surpasses the predefined limits, a work order is generated for further action.



INTEGRATION WITH OEE SYSTEMS

Measure and improve your OEE (Overall Equipment Effectiveness).

Visualize when the equipment operates and what limits the optimal operation. Using software like Evocon you have more information to act fast.

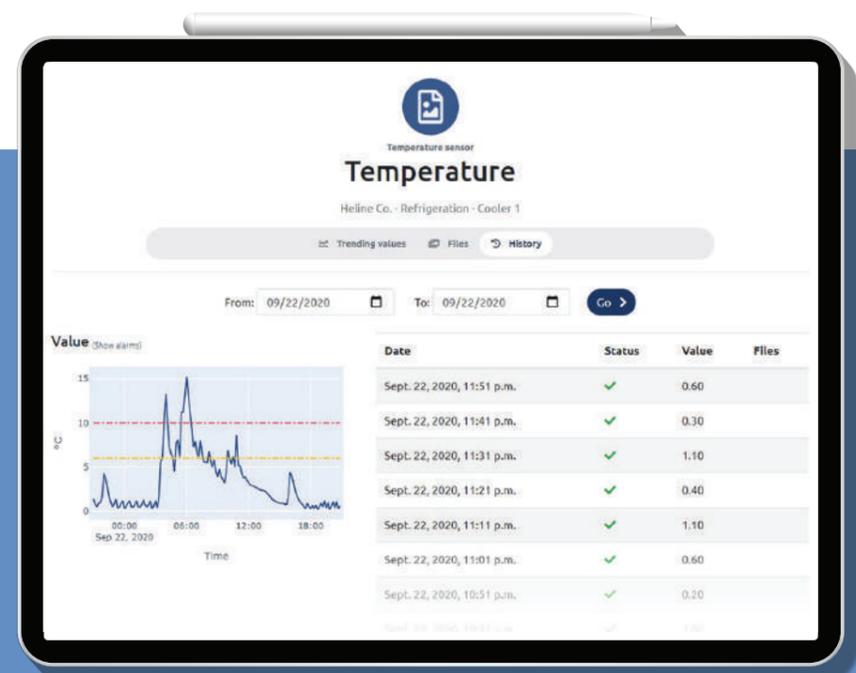
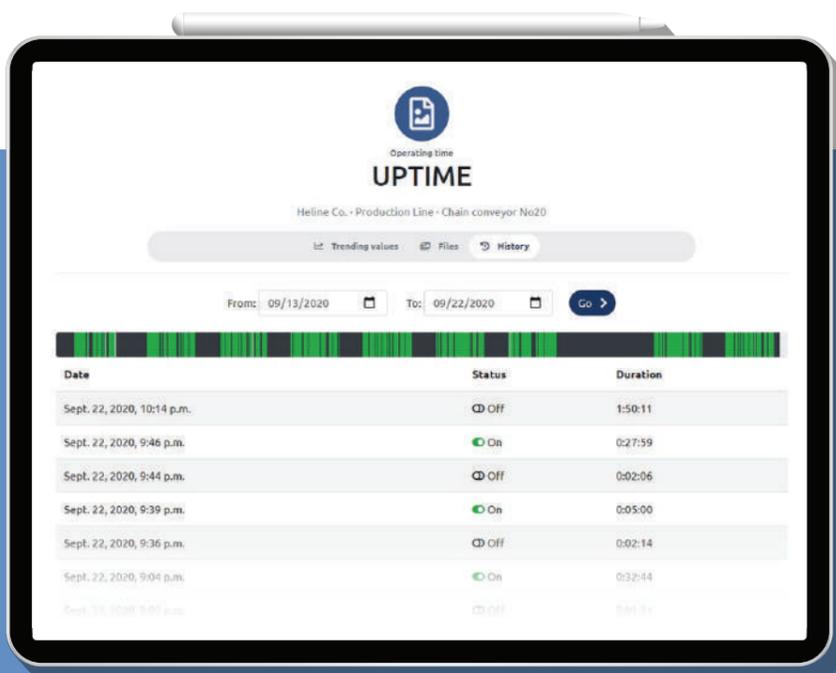


MAINTNODE HAS TRANSFORMED MAINTNANCE

Your most important machines need to be constantly monitored.

Maintnode does that and helps you detect faults early so you can keep your line running.

Power companies, factories, oil & gas miners, ships, facility management teams, non-profit organizations benefit from Maintnode for better monitoring of their equipment.



MECHBASE

Get to know your machines and the health of your equipment. Monitor your plant with Maintnode, analyze measurements from multiple sensors and make decisions quickly with the Mechbase software.

Collect all the information in one place, review them with one look and take action. Visualize all the measuring points of your equipment and keep track of multiple values per point. You can easily set which values are important to you and set alarms.

CHARACTERISTICS

Sampling rate	100 kHz (max)
Channels	Unlimited based on configuration
Event counter	Yes
Measurement range	±10V (max)
Input impedance	>1MΩ
Digital inputs	Yes
Industrial communication protocols	Modbus RTU, Modbus TCP, OPC-UA
Compatible sensors	Standard IEPE (IEEE 1451.4) industrial accelerometers Ultraprobes®/UE Systems Inc. ultrasound equipment Sensors 0–10V (revolution speed, static and dynamic pressure temperature, infrared radiation, humidity, voltage/current, force, torque, strain)
Computer subsystem characteristics	1.2GHz Quadcore ARM Cortex-A53, 2GB RAM, 16GB storage, IEEE 1588 Ethernet 10/100
Power	9–29VDC

COMPLIANCE

Regulatory compliance	EU Directives, RoHS, EN 61010–1:2010, EN61010–2–032:210 EN61010–2–033:2012, EN61010–031:2015, EN61326–1:2013 EN61326–2–2:2013, EN61326–2–3:2013
Classification & hierarchy standards	NACE Rev.2, ISO13373–2:2016 ISO14224:2006, MIMOSA™
Compatibility with CMMS software	AIMMS/Atlantis, Coswin 8i®/Siveco Group
Compatibility with OEE software	Evocon