Digitalization is on the advance and the use of intelligent components is becoming more and more essential these days. A leakage can have many different causes: For example, the incorrect installation of a seal, faulty welds, or overflowing containers. Smart sensors can be used to detect critical operating conditions and thus reduce serious machine failures to a minimum.

LeaCo (Leakage Control System) from Freudenberg Sealing Technologies is capable of monitoring entire process plants with numerous pumps, pipe connections, valves and tanks. LeaCo can also be used in many other industrial sectors, where maximum reliability and fast action is essential in the event of leaks.

Watch our video and get more information about LeaCo!
LEACO SENSOR

FUNCTION
First, the sensor needs to be activated once by simply pressing a button and being connected to the display module. The distance between the sensors and the display module should not exceed approx. 100 m, depending on the surrounding conditions. If the fleece integrated on the back of the sensor comes into contact with leakage fluid, a wireless alarm signal will be sent to the display module. This information will then be transmitted to a mobile phone as a text message on request. The sensor automatically checks for leakage at two-minute intervals as the standard setting. The existing connection to the display module is verified every 30 minutes. In the event of a disturbance, such as an empty battery or if the sensor is destroyed by an aggressive medium, the sensor will stop sending signals and the display module will indicate the missing connection.

TECHNICAL DETAILS
• **Dimensions:** 42 x 48.5 x 14.2 mm
• **Temperature:** +5 °C to +45 °C
• **IP Protection Class:** IP66
• Wireless, button-cell powered sensor
• **Battery lifetime:** approx. 5 years
• The fleece can be replaced after an alarm
• **Range of signal transmission:** up to 100 m (depending on the surrounding conditions)
• **Installation:**
  – Screw-on
  – Magnetic (a small adhesive metal foil is included)

LEACO DISPLAY MODULE

FUNCTION
The display module has a touch display and is operated via a USB Micro-B input and a power plug. An additionally integrated rechargeable battery ensures that the display module sends an immediate message to connected mobile phones and reports the signal failure even in the event of a power failure. A SIM card can simply be inserted and activated in the existing nano-SIM card slot before use. Up to 40 sensors can be connected to the display module. It is recommended that you perform a signal reception check during commissioning. If the signal is too weak, the intermediate repeater can be used to extend the range. In the event of an alarm, the affected sensor will be shown on the display and forwarded to a mobile phone as a text message, stating the name of the sensor.

TECHNICAL DETAILS
• **Dimensions:** 140.6 x 97.2 x 21 mm
• **Temperature:** +5 °C to +45 °C
• **IP Protection Class:** IP20
• **Menu Languages:** English, French, German, Spanish, Italian
• Monitoring of up to **40 sensors** on each display module
• **Installation:**
  – Screw-on
  – Easy to set up on the table
The Components in Detail

Leaco Sensor
- Battery cover
- Battery
- Activation button
- Fleece

Leaco Display Module
- Start button
- Calibration button
- SIM card slot
- USB connection
- Touch display

Alarm Chain
- Sensor: The sensor reports a leakage to the repeater via radio signal.
- Repeater: The repeater transmits the message to the display module via radio signal.
- Display Module: The display module shows which sensor has reported a leakage.
- Mobile Device: In case of an alarm, a text message is sent to a stored mobile phone number.

Leaco – Leakage Control System