

RopeQ Magnetic Rope Inspection



Inspecting what you cannot see

Wire ropes are one of the most critical parts of your wire rope hoists. Regular visual inspections which are important to conduct, detect defects such as outer wire breaks and corrosion but interior of the rope remains unseen.

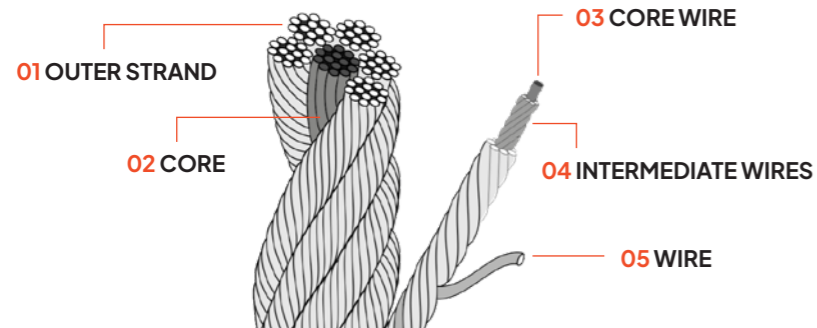
Safety from the inside out

To evaluate the safety of a wire rope, you need to know what's happening both on the outside and on the inside. That's why Konecranes offers the RopeQ Magnetic Rope Inspection.

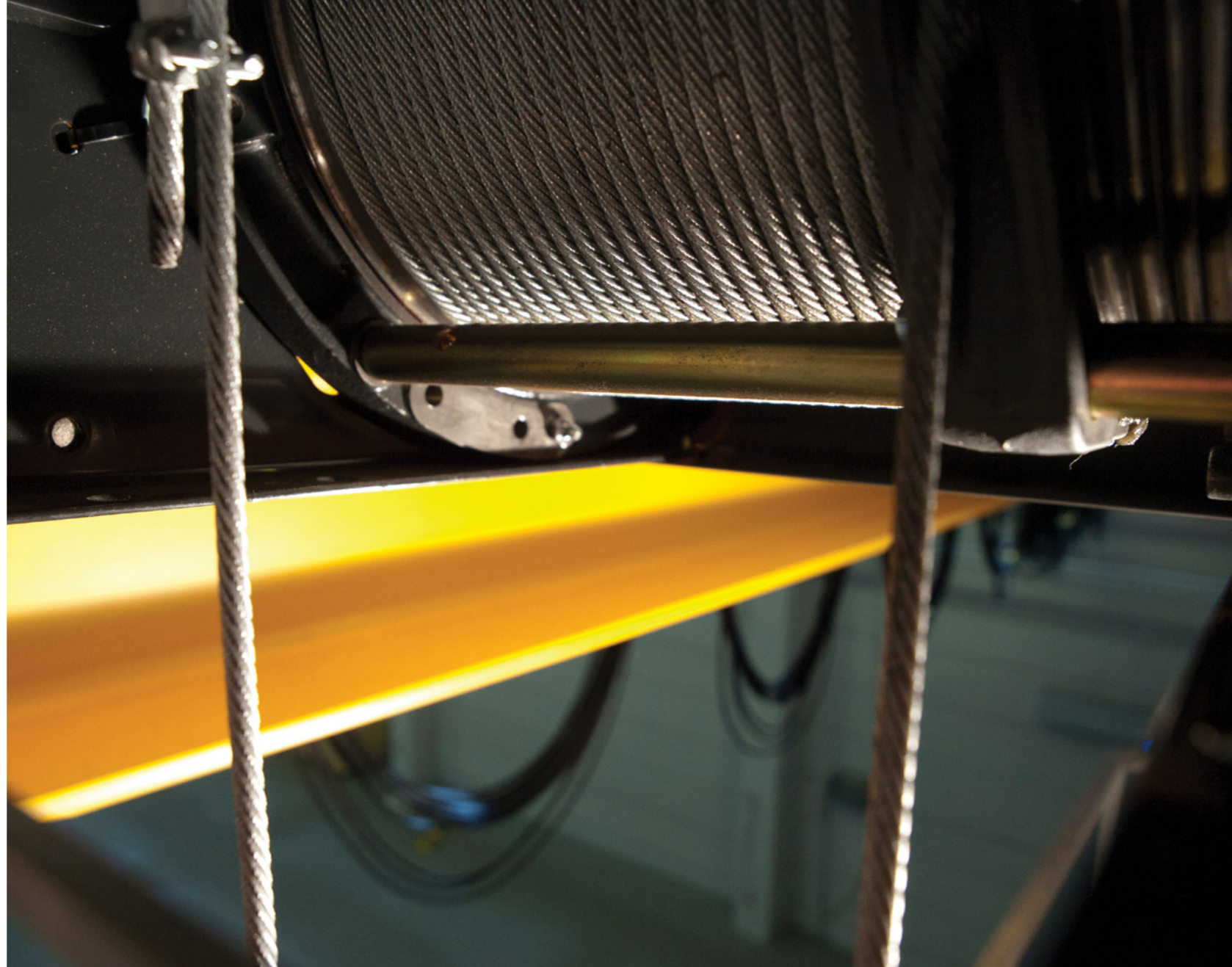
Many wire rope structures start to wear from the inside out. A worn wire rope can be a major safety hazard and cause production losses. Why wait for a scheduled change when you can make decisions based on the actual condition of the rope?

Accurate rope condition insights

RopeQ assesses the condition of a wire rope based on a visual and magnetic inspection. The inspection utilizes magnetic-inductive technology to provide accurate data of the interior of the rope and exterior condition. The thorough visual inspection can cover all rope reeving components and other elements that may affect rope life.



Typically, only 20% of the rope can be inspected visually, while the core remains complete inaccessible for such inspection.



RopeQ is particularly useful in the following situations:

- When cranes have experienced overloads.
- For cranes that have been out of commission.
- When ropes are difficult to inspect visually.
- Post-accident inspections.

→ Benefits of a RopeQ Magnetic Rope Inspection

- Enhances safety by identifying non-visible defects.
- Extends the lifespan of wire ropes with optimized change intervals.
- Delivers consistent and dependable results.
- Provides an easy-to-read report with actionable recommendations.
- Helps in meeting legal requirements for equipment that is used infrequently or has been idle.



RopeQ and predictive maintenance

Predictive maintenance utilizes condition monitoring, advanced inspections and data analytics to predict the need for maintenance due to component wear or fatigue. Incorporating predictive maintenance elements—like the RopeQ Magnetic Rope Inspection—as part of a Konecranes service program can further optimize maintenance activities, reduce unplanned downtime and improve equipment safety, productivity and lifecycle value.

Regular magnetic rope inspections can be a predictor of wire rope fatigue failure. In addition, equipment usage data from TRUCONNECT Remote Monitoring can be used as part of an overall rope life study, analyzing usage, designed duty class and rope reeving/sheave configuration.

Real-time condition monitoring of your wire rope

For critical process and production cranes, we recommend TRUCONNECT Wire Rope Monitoring to improve safety and uptime. This service measures ropes every hoist cycle, detecting both internal and external rope faults instantly.


Data is analyzed and displayed in the Konecranes Portal with a simple traffic light system for quick interpretation. You can choose to receive email alerts for proactive maintenance recommendations to prevent unexpected failures.

Learn more on predictive maintenance and our services konecranes.com/service





Konecranes is a global leader in material handling solutions, serving a broad range of customers across multiple industries. We consistently set the industry benchmark, from everyday improvements to the breakthroughs at moments that matter most, because we know we can always find a safer, more productive and sustainable way. That's why, with around 16,800 professionals in over 50 countries, Konecranes is trusted every day to lift, handle and move what the world needs. In 2024, Group sales totaled EUR 4.2 billion. Konecranes shares are listed on Nasdaq Helsinki (symbol: KCR).

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