



The Large Engines Competence Center



LEC for short, is one of the world's leading research institutions for large engine technologies and develops innovative solutions for sustainable energy and transport systems. Since 2015 we have been a funded COMET K1 Center (LEC EvoLET). With our research, our unique infrastructure and our international network of partners, we make a significant contribution to massive emission reductions and efficiency improvements. The focus is on the use of renewable energies, digital technologies and the optimization of the overall system.

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Evolutionary Engine Technologies for a Sustainable Tomorrow

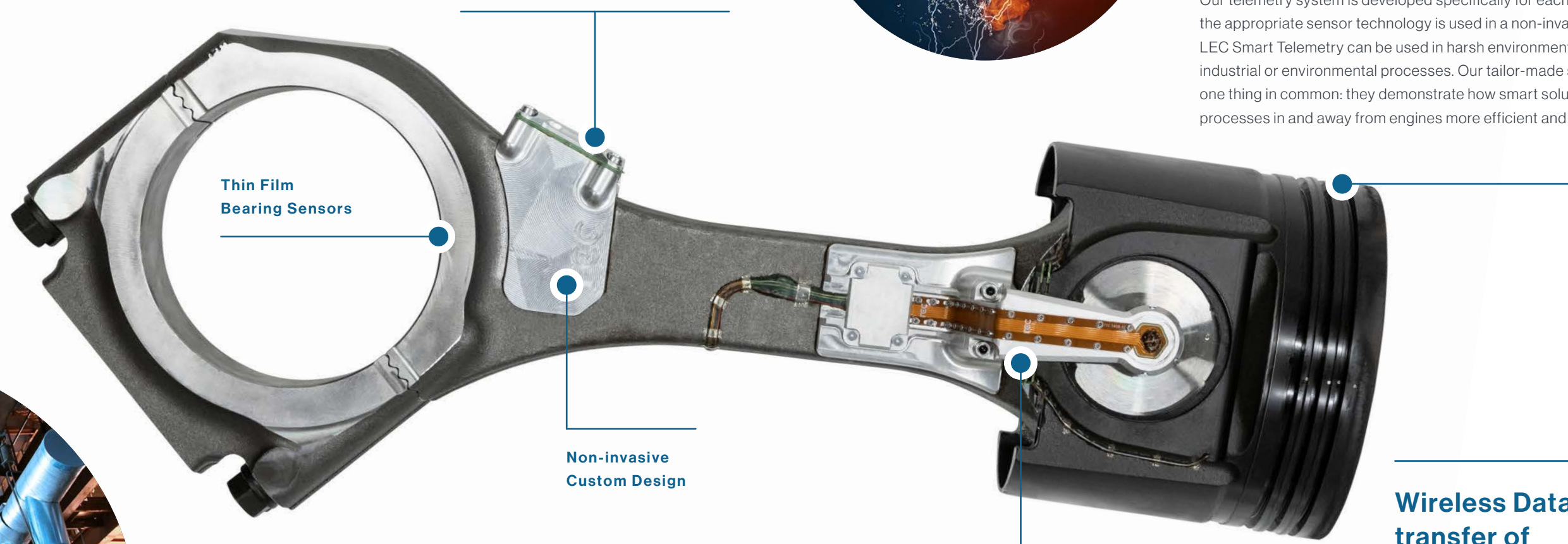


SENSOR TELEMETRY FOR HARSH ENVIRONMENTS



Smart Telemetry - the innovative sensor technology of the LEC makes it possible to record measurement variables that are difficult to access and to transmit the measurement data wirelessly.

Our telemetry system is developed specifically for each customer and the appropriate sensor technology is used in a non-invasive design. LEC Smart Telemetry can be used in harsh environments of engines, industrial or environmental processes. Our tailor-made solutions have one thing in common: they demonstrate how smart solutions make processes in and away from engines more efficient and sustainable.



- Telemetry unit housing**
- CPU, BLE (Bluetooth Low Energy) transceiver
 - Battery

Thin Film Bearing Sensors

Non-invasive Custom Design

Sensor Electronics

Wireless Data transfer of

- 📶 Temperature
- 📶 Pressure
- 📶 Acceleration
- 📶 Component Deformation
- 📶 Piston ring dynamics

Capabilities

- ☁️ Dust
- 💧 Water
- 🔥 Hot oil
- ⚡ high G-forces
- ⚡ powered by battery, energy harvesting or inductive charging

