



**Industrial IoT Turnkey Solution
Manual Valve Position & Vibration Monitoring**

Manual valve position and vibration sensor



ROTIOT axial is a ruggedized **manual valve position sensor** integrating multiple independent sensors to reliably **detect and track the valve position and the number of turns.**

With additional integrated sensors can be used to **identify abnormal vibrations or noises** that **indicate** impending problems such as **bearing damage, imbalance or misalignment.**

Industry Applications



- Oil and Gas
- Petrochemicals and Chemicals
- Power Generation
- Water and Wastewater Treatment
- Pharmaceutical and Biotechnology
- Food and Beverage

Our connectivity, platform, supplier and distribution partners & References



Every challenge has a solution

- Environmentally harmful production
- Security risks of people and processes
- Malfunctions of the opening and closing status of the valve
- Wear or irregularities
- Leakages and energy consumption

Number of manual valves that can generate challenges

- 10000 per city or water/wastewater treatment department
- 5000 per flow control company
- 1000 per chemical company
- 1000 per food and beverage company

Benefits of the solution for water management



Cost savings through reduced manual inspections



Improved efficiency and reliability of the water supply network



Increased safety and **minimized outages**



Prevention of poor water quality through **low flow** can lead to **stagnant water and poor water quality**

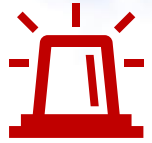


Improved **hygiene** and **water quality**



Conserve natural resources

Benefits of the solution for gas-&oil and other industries



By monitoring manual valves in real-time, **potential safety hazards** can be identified and addressed promptly



can lead to **leaks, spills**, or other accidents that can pose **risks to personnel and the environment**

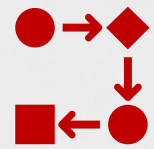


can detect abnormalities, such as **valve leaks or improper valve positions**, allowing **for timely intervention and preventing potential incidents**



Sustainable manufacturing
and improved safety

Benefits of the solution for gas-&oil and other industries



can be integrated with **centralized control systems** or **connected to the Industrial Internet of Things (IIoT) platforms**



remote monitoring and control of valve operations, providing operators with **real-time data** and the **ability to adjust valve settings** from a central location



reduces the **need for on-site personnel**, **improves response times**, and facilitates **more efficient** valve management across multiple locations



Remote Monitoring
and Control

Benefits of the solution for gas-&oil and other industries



The data collected can be analyzed using **advanced analytics techniques**



can provide valuable insights into **valve performance trends**, identify **patterns or anomalies**, and **support decision-making processes**



By leveraging data-driven insights, operators can **optimize valve configurations, maintenance schedules**, and **operational procedures**, leading to **improved performance and reduced costs**



Benefits of the solution for gas-&oil and other industries



help ensure compliance with **regulatory requirements** by providing accurate and up-to-date information on **valve performance and maintenance activities**



reducing the risk of compliance violations and associated penalties



Regulatory Compliance

Rotiot Industrial IoT Architecture



Rotiot Axial

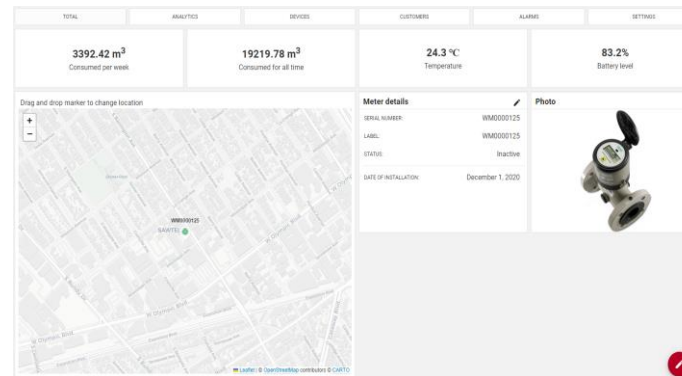


Third Party Sensors



Indoor/Outdoor Gateway

As a **qualified service provider**, we accompany you throughout the entire Internet of Things applications development process and **support** you **in all project phases** from a **single source**.

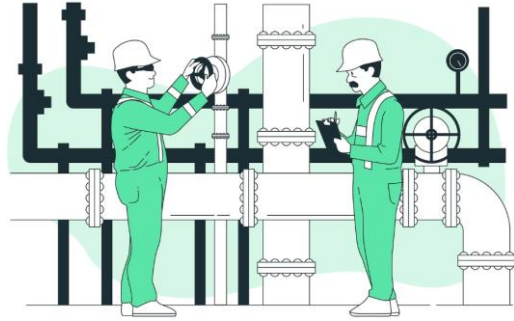


Rotiot Cloud / Dashboard
Public / Private / On premise



Data Integration to
HISTORIAN, SCADA, DCS

5 steps to benefits



On site inspection
1-2 days



Installation



Initial monitoring
~ 4-8 Weeks

Benefits

Agreement on the number of valves and sensors



Contacts



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