+ DIGITAL SOLUTIONS



# **INSTRUCT Power** Analyzer 2.0

Increase ESP motor efficiency with voltage tuning



INTELLIGENT ACTION

## From intelligent insight to seamless operations

## Introducing our next generation INSTRUCT Power Analyzer 2.0

INSTRUCT Power Analyzer 2.0 provides an enriched and scalable system that seamlessly integrates with various power applications, offering intelligent insights to enhance your operational efficiency.

INSTRUCT Power Analyzer 2.0 provides more than 300 Edge Module Outputs, including:

- + Input power
- + Real-time shaft torque
- + Shaft speed
- + Motor and system efficiency
- + Power factor
- + And much more

These outputs enable you to perform crucial analyses such as Power Quality Monitoring, System Condition Monitoring, True Shaft Speed and Torque, Independent Backspin Monitoring, and many more.

### **Universal compatibility**

Works with every maker and model of VSD, MVD, or Switchboard and downhole motor\*\*

\*\* requires detailed motor parameters to enable shaft torque and motor efficiency calculations.





## **Drive efficiency with INSTRUCT Power Analyzer 2.0**

## **Optimize power and save energy**

Through intuitive visualization tools, INSTRUCT Power Stay ahead with prognostic health monitoring Analyzer 2.0 illuminates the potential efficiency gains achievable Stay ahead of maintenance needs and ensure continuous operations with the INSTRUCT Power Analyzer 2.0's by fine-tuning the V/Hz ratio. You can even observe motor efficiency plotted against motor voltage at a fixed load, revealing comprehensive capabilities. Monitor shaft vibration and the precise adjustments required to maximize energy savings. electrical currents in real time, leveraging early warning indicators to detect potential failures before they occur. INSTRUCT Power Analyzer 2.0 also provide insights into how Additionally, monitoring the electrical insulation conditions over you can optimize motor voltage dynamically to ensure peak time is crucial for effective prognostics. Components like cables, performance under varying load conditions, contributing to splices, motor windings, and connectors face constant electrical long-term sustainability goals. By delivering real-time data stress during operation. By observing these parameters insights, INSTRUCT Power Analyzer 2.0 empowers you to make throughout the ESP run life, you gain valuable insights into the informed decisions to maintain optimal efficiency as operating system's health, enabling early detection of potential issues and conditions evolve, aligning with sustainable initiatives. ensuring reliability.

### Prevent costly failures with proactive action

With the accurate data and insights provided by the INSTRUCT Redefine reliability and minimize risks with the proactive failure Power Analyzer 2.0, make informed decisions that drive prevention features made possible by INSTRUCT Power proactive maintenance strategies, maximizing equipment Analyzer 2.0. uptime and minimizing downtime. Deploy the INSTRUCT Power Analyzer 2.0 globally to consistently monitor and optimize Detect potential mechanical wear issues before they escalate, industrial operations, ensuring efficiency and reliability across thanks to the ability to identify anomalies such as shaft vibration diverse environments.

fluctuations. By addressing these issues early, the system helps you to extend equipment lifespan and reduce costly downtime.

INSTRUCT Power Analyzer 2.0 also allows you to mitigate electrical system risks by monitoring tri-phase electrical balance in real-time – ensuring timely intervention to avoid premature downhole gauge or motor failures caused by imbalance in load or supply. With its proactive approach to risk management, the INSTRUCT Power Analyzer 2.0 allows you to safeguard system integrity and prevents disruptions, ensuring uninterrupted operation while maximizing efficiency.



## Built for today. Ready for tomorrow. Powered by Avalon.

Powered by the robust foundation of HCC2 and Avalon, INSTRUCT Power Analyzer 2.0 capture more than 300 crucial data tags. This data becomes a valuable resource for optimizing current performance and future-proofing your power management strategies. Experience considerable whole-life cost savings as you expand from monitoring a few systems to covering your entire operation.

### Effortless integration with Avalon Lift Surveillance

Avalon Lift Surveillance unites a range of artificial lift applications to drive Sustainable Intelligent Action across your production operations.

By integrating seamlessly with Avalon Lift Surveillance, INSTRUCT Power Analyzer 2.0 brings the power of state-of-art visualization or analysis to your operation – in the cloud or on-premises. Avalon Lift Surveillance includes new screens and dashboards that help your team get the most cutting-edge data, quickly implement improvements to your operations, and detect concerning operations before they become a bigger problem.

Avalon Lift Surveillance enables you to leverage easy-touse tools to generate automated workflows and improve your operation's efficiency, speed, and security. Avalon Lift Surveillance has predefined workflows for artificial lift operations that empower you to effectively achieve your operational and financial objectives by taking proactive action for the continuously changing conditions throughout the life of your wells.













### **INSTRUCT Power Analyzer 2.0**

## Solving challenges from the reservoir to refinery. One challenge at a time.

We collaborate with all stakeholders to make the production, transportation and processing of oil & gas simpler, safer, more secure, more productive and better understood from end-to-end. Sensia is making the advantages of industrial-scale digitalization and seamless automation available to every oil & gas company.

Now every asset can operate more productively and more profitably.

Sensia LLC Energy Tower IV, 15th floor, 11750 Katy Freeway Houston, TX 77079

+1-866-7SENSIA (+1-866-773-6742)

## hello@sensiaglobal.com sensiaglobal.com



Sensia LLC 2024. All rights reserved. 321A-CP-0424-BR \* Mark of Sensia. Other company, product, and service names are the properties of their respective owners