



AMADAS Product Overview

Analyser Management and Data Acquisition System based on CalSys Software

Analytical performance

- Validation & calibration
- Statistical process control

Availability

- Operational state monitoring
- Time rated performance indicators

Maintainability

- Maintenance activities
- Resource planning and allocation

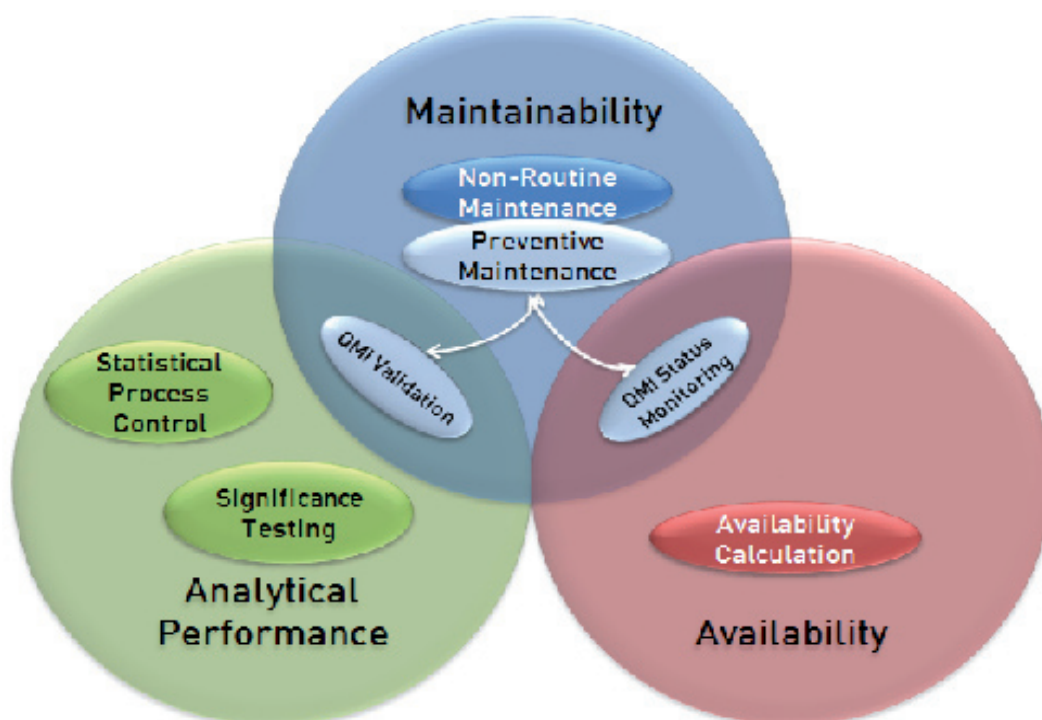
Why implement an Analyzer Management System?

In a world of cost reduction and a need for increased efficiency, people on all levels within an organisation focus on the plant wide performance of quality measurement instruments.

Operators and maintenance personnel need high quality data and detailed information on the performance of each individual instrument. Management needs high quality information on the plant wide performance of QMI's for better process control. .

The analyser management system monitors and controls each Quality Measurement Instrument (QMI) on

- Analytical Performance
- Availability
- Maintainability



The analyser management system provides:

- Registration of instrument performance data
- Consolidation of data into significant information
- Provide management reports on plant wide performance of QMI's and reports on individual instruments

Improve management reporting

The analyser management system reduces time required to gather reliable process data, perform statistical analyses of measurement data and to prepare management reports.

Validation Guidelines

The analyser management system provides guidance for operators or maintenance people working on the instruments, independent of their knowledge level, and allowing for exact duplication of procedures. The guidance is provided for in every mode of system operation from manual up to fully automatic validation of instruments.

Reduce costs ... and improve profits

- Reduce maintenance costs
- Instrument management based on statistical process control enables operators and maintenance personnel to focus on validation and trouble shooting and to avoid unnecessary, repetitive work.
- Increase availability
- The analyser management package minimizes interference on instrumentation, thereby increasing the availability of instruments and improving process control.
- Increase process quality
- Enhancement of plant or process control and operation based on statistical facts. This allows for fine tuning and increasing the quality of output.
- Reduce „give away“
- Better control of processes means less errors and therefore process limits can be improved, while avoiding unnecessary „give away“ or waste products.

Instrument Vendor Independent

The analyser management system operates on all quality measurement instruments independent of the manufacturer. It allows hook-up of all instruments including validation equipment. Furthermore, it eliminates problems coming with the wide variety of custom made software packages, client interfaces and reporting.

System requirements

- Open system with high functionality
 - Allows for easy integration (based on SQL Server and OPC)
 - User-based system security
 - Independent and standard software product
- Upgrades, training, helpdesk, and on-site support available on request

Flexible solution: from manual up to fully automated systems

The analyser management system is available in various configurations ranging from a completely manual system up to a completely automated system. In case of manual systems data can be entered using an Ethernet TCP/IP network. With completely automated systems automatic links to DCS, LIMs and ERP software are integrated. This flexibility allows for gradual upgrades to fully automated system.

KROHNE Oil & Gas Overview

- Liquid flowmetering systems
- Gas flowmetering systems
- Supervisory systems
- Flow computers



From the well head, through massive pipelines, onto tankers and into the terminals and refineries; the flow of oil and gas products needs to be measured accurately and reliably. That is the world of KROHNE Oil & Gas.

In 2001, the leader in flow metering KROHNE in Duisburg, grouped together all its experts and established a specialist company at their main manufacturing site in the Netherlands. The company has grown continuously since then. The need for more space while retaining access to a qualified workforce brought KROHNE Oil & Gas to custom-designed premises in Breda.

- Tank Management Systems
- Loading & Offloading systems
- Leak Detection Systems

The dynamic growth continues with the workforce having grown to over 160 persons solely dedicated to the oil and gas industry.

Through acquisitions and expansions KROHNE Oil & Gas now has 8 manufacturing facilities in the Netherlands, UK, India, Malaysia, USA, Brazil, South Africa headquarters in Breda servicing the world's oil industry through offices of the KROHNE group, in more than 60 countries worldwide.

The scope of KROHNE Oil and Gas starts with custody transfer flowmetering for oil, gas and liquefied gas and continues through tank management, loading and offloading and leak detection and localisation systems.

KROHNE Oil & Gas

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