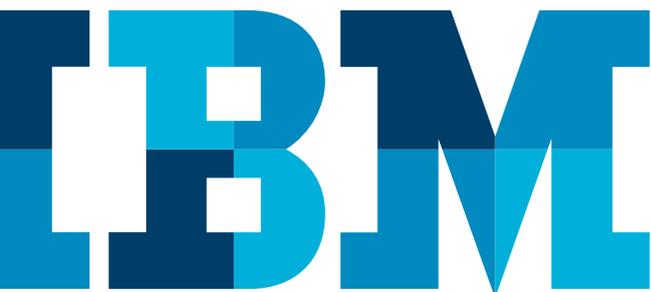# IBM Maximo MRO Inventory Optimization

Optimize critical MRO spares and materials

Asset-intensive operations are under constant pressure to keep MRO inventory levels under control, while maintaining or improving service levels. But achieving success is critical, as up to 50 percent of unscheduled downtime is due to a lack of spare parts or stockouts.[1]

IBM® Maximo® MRO Inventory Optimization is an award-winning[2], cloud-based software platform specifically designed for the distinct challenges of MRO asset-intensive environments. MRO Inventory Optimization helps to empower users with an accurate, detailed picture of their MRO inventory performance; and powerful capabilities to enable informed decisions that help improve margins, increase service levels and minimize unplanned downtime.

Asset-intensive organizations around the world—including the world's leading Oil & Gas, Mining, Transportation, Utilities and Process Manufacturing companies—rely upon MRO Inventory Optimization to help them achieve significant results[3] in months, not years, such as:

- *Up to 50 percent reduction in unplanned downtime related to parts*
- *Up to 40 percent reduction in inventory costs*
- *Up to 35 percent savings in maintenance budgets*
- *Up to 25 percent increase in service levels*

Specifically designed for the unique challenges of MRO environments, MRO Inventory Optimization provides users with an accurate, detailed picture of their MRO inventory performance; and powerful capabilities to make informed decisions that balance cost and risk to optimize MRO inventories.

Key capabilities of MRO Inventory Optimization

Optimize stock levels within acceptable risk tolerance thresholds using proprietary IBM Maximo MRO Inventory Optimization platform

Segment data from your ERP/EAM systems using key parameters like cost, criticality, usage and lead time

Move from a reactive to a prescriptive approach to avoid costly, unplanned events

Leverage built-for-purpose algorithms to improve intermittent and variable demand forecasting

Leverage the latest big data technologies to aggregate massive amounts of existing customer data

Combine urgency, value and risk-based factors to assign objective priority scores to combine urgency, value and risk-based factors to assign objective priority scores to tasks

Key features of MRO Inventory Optimization

Service level analysis
- Increase service levels by ensuring the right parts are available at the right time

Inventory optimization
- Align safety stock with business impact using an automated, analytics-based approach

Criticality analysis
- Segment your inventory by criticality and business impact of MRO spares and materials

Lead time analysis
- Determine more accurate lead times beyond supplier-provided information alone to reduce downtime

Quick reports
- Rapidly generate and display reports and KPIs across all your key metrics

Baseline analysis
- Analyze inventory value based on average price, inherited items and other criteria

Demand forecasting
- Minimize risk of overstocking consumables or stocking out of critical spares

What if analysis
- Test different scenarios and find your business' "sweet spots"

FROST & SULLIVAN

BEST PRACTICES AWARD

2017

NORTH AMERICAN ASSET PERFORMANCE MANAGEMENT SOLUTION OIL & GAS PRODUCT LEADERSHIP AWARD

"ERP and EAM systems that are built around material resource planning or other manufacturing processes are not sufficient to handle these MRO problems and are only good at performing transactions and reporting. Existing systems typically do not perform tasks such as prescriptive analytics, inventory forecasting, and exceptions management. For such circumstances (the use of ERP and EAM systems), companies that can provide an asset performance management solution with advanced analytics to optimize MRO spares and materials are expected to secure a leadership position in the market."

- Sankara Narayanan, Senior Analyst, Frost & Sullivan

MRO Inventory Optimization packs industry-leading features to deliver impressive results

Advanced demand forecasting analytics –
Overcome the difficulty in forecasting intermittent and variable demand that characterizes MRO environments. Leverage algorithms to improve forecasting accuracy and stocking level recommendations; enhance service levels; and reduce costs

Work queues –
Our distinct approach to work prioritization allows you to monitor review progress and remaining workload as well as view by organizational area and data sets

Custom layouts –
Lay out screens exactly the way you want and need them. Customize work queues to align with business processes

Advanced algorithms and analytics balance cost and risk –
MRO Inventory Optimization leverages advanced industry specific algorithms and analytics capabilities that help companies intelligently balance costs and risk across MRO materials management activities

Easy host system integration –
MRO Inventory Optimization can interoperate with one or many host systems—homogeneous or heterogeneous ERP, EAM, or data warehouses—to synchronize data. MRO Inventory Optimization integrates with all major ERP and EAM systems, including IBM Maximo, SAP, Oracle, ABB Ellipse and others

Big data –
MRO Inventory Optimization uses column-oriented databases, elastic search and aggregation/ summarization engines allowing you to interactive, filter, sort and update millions of records in seconds

Item Scoring –
Combines urgency, value and riskbased factors to assign objective priority scores to tasks, helping users align best practices globally and work on the best parts that deliver value the quickest

Analytics –
Our new dashboard and reporting capability provides users with a faster, smarter and easier way to build and generate reports for greater visibility and insight across MRO operations

MRO Inventory Optimization Support Center –
Support, documentation, and online training is accessible directly within MRO Inventory Optimization for seamless support and quicker support response and assistance

Interactive visualizations and actionable insight –
Visualizations and "what if" scenarios make complex data patterns, trends, and opportunities easy for users to identify and comprehend, enabling you to make better decisions and take effective action

Scalable for growth –
The MRO Inventory Optimization architecture is highly scalable, supporting small, single installs to large global enterprise clients

For additional information regarding IBM Maximo MRO Inventory Optimization, visit: www.ibm.com/ services/process/mro-inventory

IBM

[1] 2015 Aberdeen Group Report - The Importance of Inventory Optimization and MRO

[2] 2017 Frost & Sullivan - 2017 Asset Performance Management Product Leadership Award

[3] Based on IBM internal analysis of client data. Individual client results will vary.

14018314USEN-02