GE
Intelligent Platforms

Proficy

OEE

Proficy OEE

Monitor, measure, and improve your manufacturing performance

Benefits

- Boost asset and process efficiency
- Reduce equipment downtime and maintenance costs
- Improve equipment life cycle management
- Increase labor efficiencies and productivity by improving visibility into operations and empowering operators
- Increase productivity of processes by identifying bottlenecks
- Increase rate of quality, reduce scrap

Features

- Leverage critical Key Performance Indicators to drive continuous improvement
- Deliver standard reports, ad-hoc reports and dashboards for real-time decision-making
- Summarize and analyze data by context (e.g., equipment, product, personnel, time (hour, shift, day))
- Automatically or manually associate events with causes and then analyze to identify root causes
- Enable rapid deployment with rotational historian tags
- Scale solution for Operational Excellence
- Integrate with full Proficy Software Suite

How can manufacturers drive operational excellence and do more with less?

With GE's Proficy OEE. It's an out-of-the-box software offering that helps you continuously monitor, measure, and improve your manufacturing performance. Honed by GE's world-class manufacturing processes, Proficy OEE is a simple tool with best-of-breed Efficiency Management capabilities.

It's easy to implement. Proven to deliver. And scalable to meet your continuous improvement initiatives.

Reduce Quality Costs

By tracking context-rich quality data using OEE, production managers can identify root causes and eliminate further costs associated with rework and scrap. Improving the focus on quality at every stage of production also reduces warranty costs.
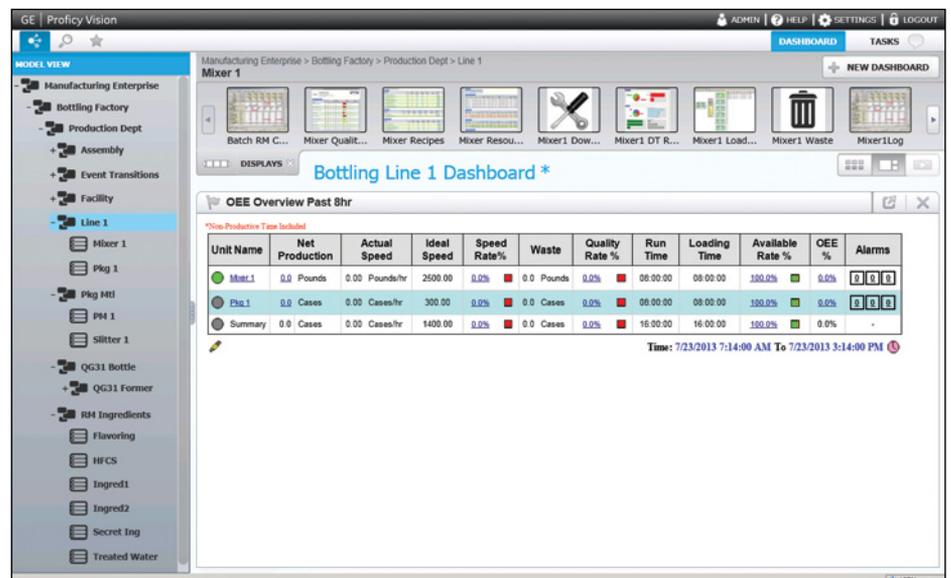
Increase Labor Efficiencies

To optimize the productivity of your existing workforce, Proficy OEE not only captures operator downtime reasons, but also productivity data. With this information, management can better judge the proper allocation of resources based on personnel productivity and identify additional capacity within the existing workforce instead of hiring new labor.

Reduce Downtime Costs

Proficy OEE enables predictive maintenance that can dramatically reduce repair costs by discerning trends that predict an impending failure. By interfacing to EAM (Enterprise Asset Management) systems, you can drive proactive steps.

Out-of-the-box reports and dashboards

Proficy OEE

For example, a maintenance department can order the necessary parts in advance and get better rates. It can allocate repair personnel from an existing pool of resources instead of hiring someone on an emergency basis, which can result in huge savings compared to repairing a machine after the breakdown has happened.

The Power of 1%

Reducing downtime by just 1% on critical equipment for a typical manufacturer can provide significant revenue opportunities and annual cost savings.

Increased Personnel Productivity

An OEE system enables the shop floor to go paperless. Typically, facility operators and supervisors spend an enormous amount of clerical time recording, analyzing and reporting downtime reasons and root causes on paper, then further explaining these reports to management. An OEE system captures and reports downtime and efficiency automatically. This saves time lost in non-value added reporting activities and allows personnel to focus on more valuable tasks. With OEE, everyone from the plant floor to the boardroom is more informed, more often, more easily.

Increased Production Capability

The net effect of reduced machine downtime, higher productivity of operators and reduced defects is the ability to achieve higher production levels with the same amount of resources.

Industry Examples

The following scenarios from different industries illustrate how Proficy OEE helps manufacturers improve productivity and leverage better visibility into their operations.

- **Automotive Manufacturer Uncovers Root Cause of Downtime**

One of GE's automotive customers was trying to extract additional productivity out of its assembly lines by improving equipment availability. It had already reduced all known causes of downtime through diligently applied process engineering steps. With implementation of Proficy OEE, it noticed that overall productivity was significantly affected by hundreds of brief line stoppages caused by a simple mechanical misalignment that was not recorded by operators. It determined that the cumulative effect of these brief unscheduled downtimes was the primary cause of downtime. After process engineers fixed the alignment problem, eight more vehicles per day could be produced by the plant without adding resources.

- **Food & Beverage Manufacturer Detects Tampered Settings**

At a food manufacturing facility, Proficy OEE helped supervisors detect that operators of a particular production line were deliberately and prematurely slowing down the bottleneck machine. This was done to keep the machine from automatically slowing when a fault was triggered by surge bins being filled whenever downstream machines were delayed. If proper settings had been maintained, the bottleneck machine would have operated at rated speed until the surge bin buffer zones filled with stock but tampering with the machine speed changed this process. With Proficy OEE, management was able to detect the tampered settings, view the

GE's Proficy OEE Enables Key Improvements:

- **39%** reduced downtime
- **2%** reduced waste
- **4%** reduced inventory
- **10%** improved production efficiency

production conditions, and understand what was happening without human intervention.

Scalable Implementations

Proficy OEE is scalable, so you can start by implementing a pilot system, encompassing a manufacturing cell or even part of a line, wherever you think an opportunity for improvement exists. You can choose the size of the pilot, and implement Proficy OEE for your high priority production equipment.

Typical Implementations are established quickly through internal engineering resources or contracted GE services or outside integrators. By utilizing the Proficy OEE "out-of-the-box" reports and dashboards, you can begin to accurately measure Production Efficiency and initiate continuous improvement activities.

See how the Power of 1% can improve your company's bottom line.
To learn more, visit www.ge-ip.com/mes