

Data World Solutions Limited

Expert in Business Management Solutions



Epicor Production Management

Inspiring business to optimize output: streamline process to reduce waste and maximize profitability.





Production Management

Whether you manufacture complex solutions or simple products, you need strong production control in order to build a competitive advantage. As the global marketplace continues to shrink profit margins and customers become more demanding, businesses are looking for agile solutions that can provide the infrastructure they need to respond quickly and efficiently. Epicor offers a comprehensive solution for make-to-order, mixed-mode, make-to-stock, engineer-to-order, and configure-to-order manufacturers; including light assembly features for distribution businesses. Modular in design, the production control suite of modules include Job Management, Lean Manufacturing, Manufacturing Execution System (MES), Quality Assurance, and Advanced Quality Management.

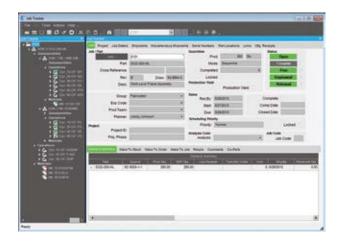


- Job Management
- ► Lean Production
- Manufacturing Execution System
- Quality Assurance

- Advanced Quality Management
- Advanced Manufacturing Execution System
- ► Enterprise Manufacturing Intelligence

Job Management

Job Management is a comprehensive production control solution designed specifically for the planning, routing, scheduling, costing, and tracking of products; including assembled, manufactured, and semi-finished products. It includes innovative tools for better planning and costing with historical run analysis that compares estimates to actuals on a run-by-run basis. With Epicor Job Management, users can more easily identify wasted processes and continuous improvement opportunities on the production floor for maximized profitability.



Provide detailed information to the plant floor about every aspect of a job.

Planning Workbench

Access all job related actions in a single view—the creation of new jobs, changing job requirements to match changing demand, and allocating and reallocating jobs to satisfy changing customer demand. The planning workbench allows seamless access to the scheduling board for more detailed job management.

Job Manager

Quickly review the relationship between production jobs and demand. Make changes to the production plan to accommodate new and changing demand.

Production Planners Workbench

The Production Planners Workbench is a dashboard that provides an overview of the material shortages of the selected

jobs. Although this information is already available in each job this overview gives the job planner a tool to quickly gather information for multiple jobs at once.

Job Costing

Compare actuals to estimates online, review job costing for materials, material burden, subcontracting, operations (labor/burden), and compare projected and actual billings for profitability analysis. Job costing can be performed on a job-by-job, customer, part product group, or overall company basis.

Order-to-Job Linking

Handle one job or one delivery, one job or multiple deliveries, blanket production runs, and internal work orders to build parts to finished goods inventory.

New/Change Order Notifications

Verify that orders or changes don't fall through the cracks for viewing and selecting new orders and change orders from job entry. Optionally track all job changes via user ID, date and description.

Drag-and-Drop Interface

Simplify the planning process. Use a tree interface to easily drag-and-drop components, operations or direct materials from another quote, BOM, or previously run job.

Planned Overproduction of Assemblies

Produce and auto-receive overproduction quantities to inventory.

Yield Scrap

Everyone has it. Yield Scrap. This functionality offers the ability for scrap reporting at an operation to affect the estimated production quantity of subsequent operations if the scrap exceeds a predetermined scrap allowance. Some users may just want a warning others may want automated predefined actions.

Assemblies

Produce routings, costing, and tracking of single or multiple-level parts.

Scheduling

Schedule jobs based on forward, backward, what-if, finite, and infinite capacity.

Backflush

Backflush labor and/or materials for a single assembly, branch, or an entire job.

Job Tracker

Review a specific job, and check the status of all assemblies, operations and materials, including subcontract status.

Productivity

Track and analyze efficiency and utilization figures by employee, operation, work center, and department.

Quality Control

Extensively track and analyze scrap, rework, and added operations.

Material Shortage Indicator

Query material availability at the time of job entry to determine whether jobs can be started within the scheduled time period.

Advanced Production

Advanced Production deploys batching technology that enables users to group multiple parts or operations together for key production processes. The result of this batching process is a single reporting entity or job for simplified scheduling, tracking, and reporting of labor and materials on the plant floor.

The functionality of Advanced Production is available in the job planning and resource scheduling functions within Epicor. Both planned and "on-the-fly" grouping provides powerful flexibility to end users. Additionally, users can select to plan sequentially—one operation after another or concurrently—operations to be complete at the same time for nested operations.

Support For Co Product Production

Offers simplified production of co or dependent products in the same production run.

Support for Nested Product Production

Offers simplified production of nested or products of the same material or process in the same production run.

Part and Operation Batching

Easily link multiple operations from the same part of different parts to be run either sequentially or concurrently.

Visibility of Production Batching

Single source production enables full visibility and tracking of source operations and parts.

Accurate Cost Control

Material and production costs are applied accurately to multiple jobs as production is complete. Simplified labor entry allows plant floor employees to enter quantities for multiple parts in a single step.

Simplified Plant Floor Interface

Single reporting entity enables multiple part quantities to be entered in a single plant floor interface while accurate labor and burden cost is accurately applied to each batched part and operation.

Concurrent or Subsequent Flexibility

Flexible to handle multiple production requirements, user can select to either link parts and operations concurrently—to be run one after another or concurrently—at the same time.

Single or Multiple Operations

Flexible to handle multiple production requirements, user can select either a single operation for linking or to link an entire job.

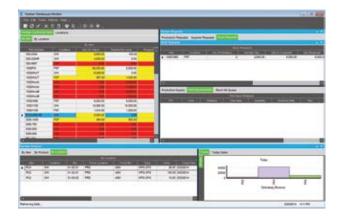
Lean Production

With increased global competition and the demands of an online supply chain, customers have more influence than ever before. Customers are, demanding greater product flexibility, smaller, more frequent deliveries and higher product quality, at a lower price.

Businesses are widening the scope and focus of lean principles to encompass all processes that contribute to the bottom line.

The true benefits of lean thinking will only be fully realized when the entire enterprise adopts the lean ideology.

Specific functionality has been developed in Epicor for plant floor operations that are adopting work order less Kanban manufacturing strategies in part or fully to pull rather than push products through the manufacturing process. Epicor Lean Manufacturing Kanban functionality supports this.



Manage electronic queues for Kanban control with the Kanban Monitor. Optionally display on the plant floor information about current Kanban records in a dashboard format.

Manufacturing Without Work Orders (Kanban Flow)

Epicor embedded Kanban functionality (i.e., a signal to manufacture or move product) offers the functionality required to manage several types of systems for Kanban control. As inventory levels or order demand require additional product, Kanbans, such as manufacturing real-time Kanbans, manufacturing flow Kanbans, purchase real-time Kanbans, and stock replenishment Kanbans, are automatically requested. The Kanban manages the stocking and order demand for parts flagged as needing Kanban control. User-defined rules enable parts to be flagged for Kanban control at the part, warehouse, or individual bin or cell location level.

Cell-based Inventory

Manage, plan, and replenish materials within a cell.

Real-time Manufacturing Kanban

Eliminate work orders and reduce on-hand inventories as parts are electronically triggered for replenishment as needed with real-time manufacturing Kanbans. Instead of planning for each order that is processed, parts are pulled through production as inventory or cell stocking levels fall below minimums. The cell is visually queued to produce based on the Kanban quantity for the part at its warehouse, bin or cell location.

Manufacturing Flow Kanban

View future demand to dynamically calculate future replenishment Kanbans with the manufacturing flow Kanban. This gives downstream cells and suppliers visibility of future demand (although the actual Kanban events may differ during execution). As Kanbans are acted on, the downstream demand requirement is dynamically updated. All cells and suppliers have up-to-date visibility of future demand.

Real-time Stock Replenishment Kanban

Move inventory as it is needed in a particular manufacturing cell, shipping area or customer consignment location with the real-time stock replenishment Kanban using automatic triggering of stocked inventory.

Real-time Purchase Kanban

Use the real-time purchase Kanban to replenish directly from the supplier and notify purchasing that a stock replenishment is required. Automatically send an e-mail to the supplier requesting additional inventory against an open purchase contract. Inventory can be received to the main stores, or directly to the production floor. Real-time purchase Kanban automates the replenishment of material from vendors and provides for visibility of current supply requests.

Automated Material Flow

Authorize supplying cells to make a predefined quantity of an item being "pulled" by using operations.

Measurement of Production Activity Against Lean Performance Metrics

Use the Production Activity function to capture production data automatically through manufacturing center transactions. The data you capture through this process can then be analyzed as needed against any lean performance metrics you define.

Lean Metrics

Indicate lean metrics by period, day, week, resource group, even free form parameters such as seasonal. Use the Production Activity tracker to dynamically evaluate the production activity for each resource group against the lean performance metrics you have established for your manufacturing processes.

Support for Hybrid Approaches to Lean

Employ a phased approach to implementing lean practices for tracking material, MRP and Kanban in a mixed environment. By offering manufacturers the choice, at the part location I evel, how the part will be managed, manufacturers can more easily migrate to lean, while synchronizing MRP and Kanban execution.

Manufacturing Execution System

The Manufacturing Execution System is an easy-to-use, online system for the plant floor that allows plant-based transactions real-time visibility throughout the Epicor solution. This easy to use interface is developed for end users and offers options of deployment that include touchscreen monitors as well as bar coded enablement to simplify data entry while reducing mistakes.

Epicor MES provides accurate labor reporting, a vital concern in job costing and job status. Online transaction tracking gives management a current picture of what is occurring on the plant floor by employee and job.

Integration with Epicor Job Management, Scheduling, Quality Assurance, and Advanced Material Management eliminates dual entry and provides online, real-time views of the latest plant floor scheduling priorities. In addition, integrated document management allows plant floor access to needed documentation including product drawings, process documents—even multimedia videos of difficult to explain processes.



Automatically collect and report the status of jobs on the plant floor in real time.

Flexible Data Entry Technology

Use touchscreen, mouse, bar code, or keyboard interface to update labor information from the plant floor. Eliminate data entry mistakes and increase transaction speed by simply scanning a bar code tag to complete a transaction.

Document Management

Incorporate employee pictures, product and process documents, including product CAD/CAM drawings or even video instructions on how to perform a process.

Work Queue

Provide employees with prioritized work schedules and make information directly available to the plant floor. Optimized for use on the plant floor with the ability to select multiple operations for work at the same time, full sheet views, views specific to current, available, or expected work, ability to target work based on TAKT, pieces, hours, and setup group designations, and advanced search capabilities.

Multiple Languages

Display the Manufacturing Execution System screens in the employee's primary language.

Distributed Hours

Automatically split labor hours across multiple jobs being worked on simultaneously by an employee. Likewise, split resource or machine hours when two or more employees work on the same resource.

Quality Reporting

Capture rework and scrap reason codes, along with miscellaneous employee comments from the plant floor. Use the Quality Assurance options to report setup inspection, first article, piece counts, and more.

Shop Warnings

Shop warnings appear in various locations throughout the system when certain conditions exist or certain events occur. They are intended to keep supervisors informed of a job's status or an employee's performance.

Grace Periods/Multiple Shifts

Manage clock-in and clock-out periods with adjustments made for user-defined grace periods. Accommodate split and staggered shifts.

Trackers in the Plant

Users can access online trackers on the plant floor from within MES. From Job Tracker, Order Tracker, Customer Tracker, Shipment Tracker, and more are available based on login and secure access.

Shop Tracker

Access who's here, who's not here, current work center activity, as well as user-defined alert conditions from the plant floor.

Shipping and Receiving

In combination with Advanced Material Management, maximize responsiveness in the warehouse with Shipping and Receiving functions from within MES.

Inventory Management

In combination with Advanced Material Management, maximize responsiveness in the warehouse with Inventory functions such

as adjustment, material issues, physical inventory counts from within MES.

Material Handling

In combination with Advanced Material Management, maximize responsiveness of material handlers with material move queues and give operators the ability to request in process WIP moves of product from one location to another, maximizing control of in process products while reducing delays. Additionally, move WIP products into inventory storage locations or stage WIP at the next resource based on available space and time. Quickly and accurately identify WIP and inventory containers with system generated bar codes.

Advanced MES

Epicor Mattec® Manufacturing System (MES) extends your Epicor system to provide automatic production monitoring and process monitoring, empowering manufacturers with production data and the ability to eliminate inaccurate and time-consuming manual data collection; so operators can stop measuring and monitoring, and focus on making quality products.

If you're ready to become more competitive with Lean and Six Sigma initiatives, advanced MES delivers the data, analysis and root-cause information automatically. You can achieve informed lights out manufacturing, and get the powerful metrics you need to improve performance—Overall Equipment Effectiveness (OEE), run rates, scrap, yield, energy consumption, material consumption, and much more. Accurate machine-related data, along with operator depth and dimension helps you pinpoint critical issues, reduce waste, and improve quality and customer service.

- ▶ Digital and analog machine signals directly from sensors or PLCs, or via OPC-compliant PLCs
- ▶ Role-based displays and dashboards for operations, plant, and management

Deploy Your Way

Epicor makes it easy to get there—advanced MES runs on current Microsoft Windows Server® with SQL Server. Epicor Advanced MES has the industry know how to connect to or get a signal from any kind of machine, no matter how timeworn or modern, and the system uses machine interface units (MIUs),

open connectivity protocol (OPC), programmable logic control (PLC), and personal computer (PC) interfaces.

Usability

The advanced MES collects production data automatically—no more manual data collection to worry about. Operators use touch-screen technology to add depth and dimension to the automatic production data, so you get a clear picture of the what, why and when of downtime, cycle time, quality, and scrap. Operator help calls with automatic routing and notifications empower employees to respond quickly, improving productivity.

Plant Notification

The system also has real-time automated alerts, notifications, escalation and other communications, so the people who need to know are in the know when it matters the most—immediately, so they can take action to correct a problem, or improve performance on-the-spot. Automated alerts include machine conditions, cycle, process variations, efficiency, and scrap.

Office, Mobile, and Global

Take the power of Advanced MES with you on a Web-enabled mobile device or tablet with browser-based dashboards, information, and analysis. Plus, it doesn't matter if you have a single operation, or a distributed network of plants internationally, the system is currently available in more than 10 languages, and suitable for language customization.

Visibility, Reporting, and Analysis

From the "top floor to the shop floor", it's important to know the score, every minute of every shift, every day of the year. Epicor scoreboards and displays empower front-line professionals to take action and make improvements instantly. Maintenance, quality, and other operations stakeholders have facts in-hand to support recommendations, and management has what they need to understand tradeoffs from every angle.

- Plant floor viewer with real-time machine state and job monitoring
- Consistent, automated, OEE and other efficiency metrics

- ▶ Production metrics from machine to enterprise level
- ► Downtime and scrap analysis
- Operator labor and productivity
- Performance versus schedule, labor forecast, tool conflict, job and part history



Empower production managers with equipment driven analytics.

Schedule Optimization

Advanced MES helps the plant change instantly based on new requirements with a click-and-drag production schedule. Or, you can watch the schedule update and adjust automatically based on actual machine speeds, production counts, equipment status, conditions, or job specifications. The system makes it easy to plan by showing resource availability based on machine/part/tool compatibility, and optimal plans based on prior part performance. What-if analysis combines with built-in machine capacity planning and labor and material forecasting for better planning. Advanced MES supports Kanban scheduling.

Energy Monitoring

Tackle power consumption and the cost of energy with Energy Monitoring. Epicor helps you analyze load patterns, production requirements, and resource energy demands, giving you the power to reduce peak demand and capture energy savings. With Epicor, you can quickly and easily capture and analyze energy performance indicators (EPIs) to reduce consumption and cut costs.

- Monitor and analyze energy consumption by machine, job, shift, product
- ► Real-time scorecards
- Understand maintenance and quality in context of energy consumption

- ► Evaluate idle vs. shutdown-restart tradeoffs
- Analyze price accuracy with direct energy required to produce any item
- Monitor energy by asset, job leveling, and loading



Reduce operating energy cost with energy monitoring

Quality Management

Epicor extends accountability to the machine performing the work, and give operators time to respond before an event affects quality and performance. And, Epicor makes the job even easier with easy-to-digest quality trend information, to engage your production team and help them become proactive.

- Automatic part qualification/rejection
- Part and machine process data for traceability purposes
- Statistical quality control (SQC) and statistical process control (SPC)

Machine Maintenance

Epicor pays close attention, making it easy to stay on track with maintenance schedules, equipment performance, energy consumption, and statistical quality. Preventive maintenance capabilities help operators stay on track too, with information they need to affect quality or performance.

- ► Machine and tool preventive maintenance (PM)
- Cycle or run hour PM
- Automated alarms and notices for PM

Enterprise Manufacturing Intelligence

Track, measure and analyze downtime and plant performance—instantly and over time—to eliminate random and chronic losses—on the front line, throughout the plant, and across the production network. Automated data collection direct from your machines is the gold standard in performance improvement, and Epicor exceeds that standard with analysis, reporting and planning to help you achieve your goals. You decide which metrics will help you have the greatest impact on availability, performance and quality, while Epicor helps you collect and understand the root causes of loss.

Monitor and Analyze Performance

Accurate data, instantly and on-the-fly, not minutes, hours, or shifts later, helps you find more capacity. When you make more without more assets, you improve profitability. Epicor Informance Enterprise Manufacturing Intelligence (EMI) collects data directly from equipment and operators on the shop floor in real time, eliminating inaccurate and time-consuming manual data collection. With information in your hands "right now" you can become proactive, so you anticipate and solve production problems immediately. You and the entire operations and production teams can work collaboratively to reduce downtime, and optimize equipment, capital, and worker resources, and drive performance gains.

- ▶ Over 1000 analysis choices available out-of-the-box
- ► One-click drill-down visual root-cause indicators
- ► Accurate, visual performance trend analysis
- Automated data collection to eliminate timeconsuming, error-prone manual intervention
- Role-based metrics, displays and dashboards for operations, plant, and management
- Metrics in standard and financial context, based on product types, size, brand (and many others)
- ▶ Single plant and multi-site performance analysis

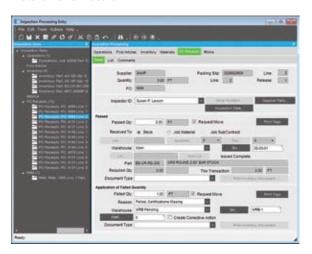
Leverage Big Data in Manufacturing

It's all about the little details, and responding at the right time. Operators don't have time to gather, organize, and analyze enough data to respond to problems, so they react. They certainly don't have enough data points to become proactive. Epicor Informance EMI lets you create a closed-loop process to eliminate production loss—downtime that can be used for more capacity. We'll help you use big data collected directly from equipment to assess and prioritize problems, and even determine if losses are random or chronic, so you can push them through the right process.

Quality Assurance

Extending your solution with Quality Assurance ensures that complete visibility of quality operations including visibility of items in the quality process. Accurate costing demands that products moved through quality accurately reflect their value and are removed from appropriate WIP. Additionally, this module includes processes for supplier returns with links to Accounts Payable for automated debit processing; closing the loop on traceability of products in and out of quality within the plant.

Tie together all quality functions, whether it's scrapping end parts, rejecting raw materials or tracking first article inspections. Inspectors have queues of items to inspect with full disposition and corrective action follow-up. Plant floor employees can flag parts as nonconformant, which moves them into an inspection queue. Parts that fail inspection may be flagged for review by a material review board.



Record and track quality data to fulfill customer requirements and promote continuous improvement.

Social Quality

Collaborating the right resources to improve quality often means redundant communication and events. Using social quality groups enables quality events to be resolved faster and long term quality improves as a result of this collaboration.

Quality no longer needs to be an isolated department, in collaboration with engineering, production, and sourcing, quality naturally improves. Cost of quality is also reduced dramatically.

Mobile Quality

Access to information at the point of checking and recording quality events reduces the inaccuracies and improves efficiency of quality professionals. Whether recording inspection results or responding with root cause analysis to a corrective action, information about quality that is inclusive and tied throughout the business improves overall business quality.

Inspection Workbench

Monitor WIP, review all inspections in priority and automatically take action on those requirements from the inspection workbench. Inspectors move passed parts back to jobs and failed parts into discrepant material report (DMR) processing, or they simply scrap them.

Nonconformant Records

Create a nonconformant record (NCR) for all nonconformant parts. From a job, shop floor employees automatically create an NCR when they scrap an end part or raw material. Inventory personnel create an NCR when they scrap parts from inventory.

Non-Netting Bins

Use non-nettable bins to keep parts undergoing inspection or on-hand quantities.

Discrepant Material Report Processing

After failing inspection, create a DMR to provide the MRB with an online queue of parts that need to be dispositioned.

Corrective Action

Create and track all preventive and corrective actions online. With due dates, audit sign-offs and unlimited comments,

corrective actions provide for follow-up of quality issues.

Material Review Board

Disposition parts by an MRB after failing inspection. Online documentation provides an audit trail of MRB actions.

Cost of Quality

Generate cost of quality reports to identify how much quality problems are costing you, whether parts are scrapped from inventory, a job or receipt inspection.

Packing Slips

Print a customizable packing slip for all parts returned.

Debit Memos

Create a debit memo in DMR processing and it is automatically tied to accounts payable.

Audit Trails

View inventory transaction detail occurring in inspection and DMR processing with the material transaction detail report.

Certificate of Compliance

Businesses are increasingly requiring detailed compliance documentation. Depending upon the industry, this documentation is commonly referred to as Certificates of Analysis (COA), Certificates of Quality (COQ), or Certificates of Compliance. To help manage this documentation, Epicor includes the ability to check for Certificates of Compliance at receiving of materials from suppliers, receiving of in process parts from outside operation suppliers, and before shipping products to customers.

Enhanced Quality Assurance

Traceability and audit of quality data drives businesses to develop "systems", many times paper based, to support the collection and use of quality testing data. Enhanced Quality Assurance is designed to extend base Quality Assurance with support for the management of controlled test plans and the results for products, groups of products, processes, and other testing.

It offers the ability to define testing elements or attributes as well as lists of attributes to test which can be used to measure against testing results for pass/fail decision criteria. It includes the data used for Statistical Process Control (SPC) and is easily accessed to build SPC analysis. In essence, Enhance Quality Assurance gathers the data and makes it available to ensure that your next audit goes smoothly.

Enhanced Quality Assurance is a fully embedded component of the application and is configured to use serial and lot tracking for each sample, storing this data within the results database. Document management, a cornerstone function of the system is linked to inspections plans and individual specification lists and enables access to key documents during results collection. Finally, this module takes advantage of robust configuration tools to enable results entry forms to be configured to match unique business test plans layouts. Familiarity of layout of test plans and results entry ultimately reduces the training effort to bring the system online.

In addition to production and receiving inspections, when used in collaboration with Epicor Maintenance Management, calibration test plans are available for resources, equipment, and assets. This ensures not only the accuracy of quality data collected from these devices, but it can also be used to validate any equipment against business standards with auditable results.

For businesses looking to not only perform receiving inspections, but attach logic to the frequency of inspection, Enhanced Quality Assurance offers skip lot rules that define the frequency of inspection for each primary supplier at the part level.

Quality solutions today include not only tracking of quality events (such as inspections and non conformances) as they happen; they also include a proactive approach to quality by ensuring that the employees performing job functions are properly trained (ISO standards). Epicor Enhanced Quality includes a robust employee training feature set that supports the management of training courses and course schedules for certification programs and onsite/offsite events. Supporting your business objectives for cross training your workforce, employee training functions track employee attendance alongside performance and offer flexible employee training request features to enable employees to self request training or have training assigned to them.

Inspection Attributes

Define unique business inspection attributes or characteristics. Attributes can be numeric, character, date, check box, combo box, or comments.

Specification List

Sets of attributes define test plan inputs with additional criteria including minimum and maximum values expected as well as combo box choices and documents attachments. For optimum control, each specification list is revision controlled.

Inspection Plan

Build inspection plans that utilize specification lists for results collection and that inspect parts, operations or calibrations. inspection plans use embedded configuration capabilities to build input screens tailored to each unique test plan and lay out fields and data to match quality department expectations. Default documents can be tied to the inspection plan. For optimum control, each test plan is revision controlled.

Results Collection

Collect and store results data for each sample alongside appropriate job, part, inspection plan, serial number, lot number, purchase order data, and more. Results data can be used to produce compliance documentation and is available for audit purposes online through the Inspection Results Tracker.



Track inspection results data online.

Statistical Process Control (SPC)

Use results data in an online database for each access and to build SPC analysis.

Flexible Inspection Plan Configuration

In addition to the dynamic nature of the inspection plan (i.e. results entry form is dynamically built based on the tied specifications list), multiple inspection plan/specification lists sets can be tied to a part, operation, or equipment. This flexibility supports requirements for standardized test plans to sit alongside product or product group specific test plans with results entry and collection of data for both during inspection.

Return Material Authorization (RMA) Inspection

Inspect incoming returns and store results data with predefined Inspection Plan/Specification lists specific to the return of a specific part.

First Article Inspection

Make first article inspections and store results for audit ability and analysis.

In Process Inspection

Tie inspection plan/specification combinations to an operation to trigger results entry for the operation during collection of data on the plant floor.

Subcontracting Inspection

Perform receiving inspections on parts subcontracted to a specific supplier. Track results and generate supplier performance metrics with data from sample results.

Manufacturing Execution Systems Enabled

Perform plant floor inspections through Manufacturing Execution Systems (MES) terminals, simplifying effort to bring inspection processing online in the plant. Inspection Data function available via end activity, report quantity, and inspection processing features.

Serial and Lot Traceability

Record the serial and lot number for each sample during inspection results entry for reporting and audit purposes.

Inspection Collect Results Location

Inspect data from within Labor Entry, MES End Activity, MES Report Quantity, RMA Disposition, and Inspection Processing.

Inspection Data Tracker

The Inspection Data Tracker offers an online query of results data for each sample tested along with appropriate job, operation, part, purchase order record that is contextually related to the inspection event.

Skip Lot Cycle Definitions

Optionally categorize and setup cycles for receiving inspection with skip lot logic that follows optimum frequency of inspections for suppliers. Whether inspecting all lots or inspecting one and skipping the next ten lots, skip lot ensures that quality control manages the frequency of inspection.

Resource Calibration Test Plans

Used in conjunction with Epicor Maintenance Management, Enhanced Quality Assurance offers the ability to predefine inspection plans for resource (gauge) calibrations along with managing the last calibration date. This can be done for Resources, Maintenance Management Equipment, or Asset Management.

Training Course Management

Manage employee training events for both onsite and offsite training, including management of training costs. Assign instructors and set schedules for courses.

Employee Skills Management

Set up training courses and manage attendees with attendee performance measures. Online review through a Training Course Tracker of employee training for "proof" of skill maintenance and/or appropriate training to work performed.

Employee Course Request

Employees can be assigned appropriate courses to attend or can request training themselves.

Quality Analysis and Real-Time Response to Quality Data

Epicor offers a suite of tools for use of quality data. Whether responding to a bad test result immediately with Business Process Management (alerting a quality manager about a critical result), performing trends analysis or responding to an auditor request with data pulled from a Business Activity Query or reviewing supplier overall performance with Enterprise Performance Management analysis cubes and dashboards, the data you need is available with a robust toolset to support your unique business requirements.

Advanced Quality Management

Epicor Advanced Quality Management (AQM) provides the foundation for significant productivity improvements and cost reductions across your entire enterprise. This solution includes Product and Process Documentation, Customer and Supplier Management, Nonconformance and Corrective Action capability. These modules provide a complete framework for compliance with regulatory and industry standards, including ISO, automotive (TS), aerospace (AS), and FDA (21CFR 11) requirements.

AQM Core Solution Set

This solution includes Product and Process Documentation, Customer and Supplier Management, Nonconformance, and Corrective Action capability.

AQM Compliance and Audit

Industry and regulatory compliance requires three basic capabilities: process control, documentation and visibility. The Compliance & Audit solution, implemented in concert with Epicor AQM core capabilities, enables you to automate your

Epicor Production Management

business processes, share key information, provide process documentation, traceability, and track existing and potential issues through effective resolution.

AQM Data Collection

Epicor AQM Data Collection and statistical process control (SPC) enables you to gather all the key data required for receiving, in-process and final inspections. It provides automated management of inspection plans for each operation of business processes, with complete revision control and change history. Collect data against these operations and chart results for controlling these processes and achieving continuous improvement.

AQM Equipment Management

These integrated productivity tools strengthen the management of all preventative and reactive equipment maintenance

activities. This solution maintains accurate online records of all maintenance work order and calibration activities.

AQM Product Launch

Epicor AQM product launch defines, automates and documents the critical aspects of your product launch process to assure engineering design information is translated effectively throughout the pre-production process. Advanced product quality planning (APQP) management enables you to synchronize all key processes and activities through the creation of templates, project plans and checklists that manage all details of the launch process. The solution also manages the quality of parts through a series of highly controlled submission warrants, checklists and approval routings, as required by industry-specific quality methodologies, including production part approval process (PPAP), initial sample inspection report (ISIR), and First Article. All part specifications and modifications are documented and communicated to promote error-free production runs.



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About Epicor

Epicor Software Corporation drives business growth. We provide flexible, industry-specific software that is designed around the needs of our manufacturing, distribution, retail, and service industry customers. More than 40 years of experience with our customers' unique business processes and operational requirements is built into every solution—in the cloud, hosted, or on premises. With a deep understanding of your industry, Epicor solutions spur growth while managing complexity. The result is powerful solutions that free your resources so you can grow your business. For more information, <u>connect with Epicor</u> or visit <u>www.epicor.com</u>.



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