

# IBM WebSphere Business Integration for Electronics

## Highlights

- Optimizes your processes within your design, build and support phases of manufacturing
- Achieves real-time demand planning and corresponding inventory management
- Provides an integration platform to help reduce overstocked inventories
- Helps accelerate your product's time to market and helps you stay competitive
- Assists in establishing customer relationship models to improve customer satisfaction
- Offers tools for forecasting market demand

With competition increasing and margins declining, the electronics industry craves a business model that will not only adapt to changes through financial improvements, but will also help gain market share. It's about offering the right product at the right time. Declining revenue, rising costs and increasing competition contribute to a difficult economic climate. Market dynamics are transforming the electronics industry into an environment with little differentiation among products, dwindling margins and stagnant market share. As a result, revenue gains come mainly from cost reductions, centered on operational improvements and business function efficiencies. But the business model must also reflect the ability to respond quickly to the needs of today's savvy customers. Adapting to the rapid churn of new technologies is almost impossible without a new business model. This new model requires the ability to harness and link the supply chain.

## The WebSphere solution

e-business—and the collaborative processes it supports—is changing the way the electronics industry does business. IBM is a major player in the electronics industry, providing leading solutions, services and technology.

## **Solution capabilities**

IBM WebSphere® Business Integration for Electronics provides the platform and connectors to integrate applications, data models and process workflows creating a moreefficient, uniform and responsive business environment. WebSphere Integration for Electronics can help:

- Automate manual steps within a process
- Streamline processes for competitive advantage
- Create a consistent, single view of critical business information (such as customer and product data) across different applications

- Link faster to partners and trading networks for business-to-business (B2B) transactions
- Eliminate the high costs of manual transactions

## The potential

Through our industry knowledge, our integration products are designed to work with your industry-specific applications, data standards and business processes. These capabilities translate into faster, easier and more-effective results from integration projects. WebSphere Business Integration for Electronics can help:

- Reduce supply chain costs by using prepackaged business process modules
- Achieve rapid return on investment (ROI) and reduce time to market for new product introduction
- Reduce the risks of new systemintegration projects by using prebuilt connectivity

## WebSphere: built on IBM expertise

WebSphere Business Integration for Electronics is built on IBM CrossWorlds® technology. This technology automates business processes that integrate across multiple applications, such as managing customer relationships and supply chains, and integrates business processes. Its prebuilt integration components allow companies in the Electronics industry to integrate swiftly and costefficiently.

This integration architecture offers many advantages, including:

- Logical, distributed hub-and-spoke architecture for rapidly scalable, Plug and Play integration
- Data and messaging format independence for integration flexibility and reduction of system implementation and management costs
- Easy-to-use, powerful tools for data mapping, relationship management and process design-for highly flexible integration management
- Enterprise scalability, reliability, availability and performance to meet mission-critical requirements

This comprehensive solution provides message transformation, message routing and guaranteed message delivery. In addition, WebSphere Integration for Electronics offers orchestrated workflows around closed-loop and secure businessprocess executions. For true business process management without changing existing data and applications—WebSphere Integration for Electronics offers back-end and legacy integration.

WebSphere Business Integration for Electronics is a packaging of several key components, each playing an important role in the electronics industry:

- IBM CrossWorlds InterChange Server (ICS)
- IBM WebSphere MQ Workflow
- IBM WebSphere MQ Integrator Broker
- IBM CrossWorlds Collaborations
- IBM CrossWorlds Connectors
- IBM CrossWorlds Tools

This solution is compatible with the complete IBM middleware portfolio, including WebSphere Application Server, WebSphere MQ and MQ Workflow.

#### IBM CrossWorlds InterChange Server

As the base of WebSphere Business Integration for Electronics, ICS is a scalable, reliable and secure environment for business integration. Simply stated, ICS offers mission-critical reliability and availability, enterpriselevel scalability and performance, and configuration management.

#### IBM WebSphere MQ Workflow

Through it, companies can align and integrate their resources and capabilities. MQ Workflow accelerates business-process management and enhances business agility, service-level management and the reuse of business services.

## IBM WebSphere MQ Integrator Broker

Coordinates the flow of information while enriching, reformatting and distributing information across a range of business integration needs. Its open architecture allows companies to scale from the smallest integration project to the largest enterprise project, all in a way that suits business' needs.

## **IBM CrossWorlds Collaborations**

These are the rules, or integration modules, that graphically define the end-to-end process—encapsulating basic integration and business rules for common processes.

Collaborations offer the industry-specific solutions for business-process automation. Based and leveraged upon the IBM Common Object Model, CrossWorlds Collaborations reduce initial and ongoing maintenance costs. WebSphere Business Integration for Electronics combines thirty-four industry-specific collaborations into prepackaged business process modules, such as:

- eSales
- eProcurement
- eCustomer service
- Demand planning
- Supply planning
- Sales processing
- Service support

- Human resources
- Procurement
- Inventory management
- Financial transactions

### IBM CrossWorlds Connectors

Connect packaged and legacy systems, databases, trading partners' systems and public information stores — allowing companies to pull information from any of these sources. This connection offers a wide range of support. The level of the support includes the following synchronous and asynchronous connections:

- Event-driven, real-time connections
- Loosely coupled trading partner connections
- On-demand customer connections
- Tightly coupled trading partner connections

The synchronous Common Object Request Broker Architecture (CORBA) based remote invocation mechanism (access interface) connects audiences to systems and applications through browser-based interactions. In addition, the sophisticated business object integration and management capabilities unite and extend business processes and IT resources—inside and outside the company.

## **IBM CrossWorlds Tools**

Are an extensive set of intuitive, visual and easy-to-use tools, providing customers with administrative and development support for system management, application connectivity and business-process modeling.

- IBM CrossWorlds System Manager The IBM CrossWorlds System Manager provides system administrators with an interface to monitor, control and analyze the entire system.
- IBM CrossWorlds Process Designer
   The IBM CrossWorlds Process
   Designer uses Unified Modeling
   Language (UML) compliant
   graphical notation to graphically
   sketch and refine the logical flow
   of business process, while processing
   pure Java<sup>™</sup> code automatically.
- IBM CrossWorlds Business
   Object Designer

The IBM CrossWorlds Business Object Designer is a graphical tool for generating and maintaining business objects.

IBM CrossWorlds Map Designer
 The IBM CrossWorlds Map Designer
 is a visual tool that helps customers
 build and extend transformation maps
 to convert data from application specific formats into the IBM
 CrossWorlds business objects or
 industry-specific objects.

# IBM CrossWorlds Relationship Designer

The IBM CrossWorlds Relationship Designer maintains the crossreferences between integrated data by defining the relationships between application objects and attributes.

 IBM CrossWorlds Relationship Manager

The IBM CrossWorlds Relationship Manager offers a single view of your enterprise information—helping companies to understand the information about each relationship and the nature of the relationships.

• IBM CrossWorlds Connector Development Kit (CDK)

The IBM CrossWorlds CDK provides a uniform framework for developing, building or enhancing connectors. A company can perform these functions to IBM-supplied connectors or those applications not directly supported by IBM.

## The full scope

IBM is dedicated to offering an integration architecture based on open standards. These standards fuel the WebSphere Business Integration solution. The solution features the technology of the WebSphere Application Server, WebSphere MQ and IBM CrossWorlds middleware — enabling faster and easier integration while reducing implementation and maintenance costs.

For more information, go to **ibm.com**/websphere/integration/ electronics or contact us at Worldwide Business Integration Sales, 1 888 685-0947, or send an e-mail to bisales@us.ibm.com.



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