Supply Chain

Using Technology and IT to Rethink Your Supply Chain Management System

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What You Need to Know

Remain globally competitive by building a digital framework that supports complex products.
Supply chains can benefit from specific digital disruptions.
Adding data and analytics can lower internal costs and increase innovation.

Expert advice on how using the latest technology trends can result in increased profits, reduced expenses, customer appreciation and a smile on your face.

Staying competitive in today's global marketplace presents no shortage of challenges. Manufacturers are being asked to produce goods faster and cheaper while maintaining or boosting quality. The upshot? As organizations look to optimize production, manage employees and oversee materials to meet demands, there's one area where managers can gain control. In fact, the main reason for many companies' success is their approach to deploy advanced information technology (IT) designed to enhance supply chain management (SCM) capabilities.

"The right technology can serve as a significant competitive advantage," observes Douglas E. Jones, executive vice president and chief supply chain officer at MSC Industrial Supply Co.

Coping with Digital Disruption in SCM

How can a manufacturer enhance SCM? Today, it's critical to build a digital framework that supports speed, efficiency, agility and innovation. Richard Howells, vice president of solution management for supply chain at the software company SAP, says it's important to think broadly about IT. "Technological innovations are leading to more complex products. Individualization and accelerated delivery schedules are fueling rising customer expectations," he says.

Just as customers' desires have grown and become more personalized, so have the technological capabilities available to keep your company globally competitive. Here are four critical areas to consider

when reinventing your SCM goals:

- **Essential supply chain tasks.**

  Focus on supply chain technologies such as electronic invoicing, computerized shipping and tracking, and apps that allow teams to monitor performance, inventory and machinery, and more. These tools can deliver "improved customer service by simplifying processes from the ordering of goods through shipment and billing," says Howells. This, in turn, can generate reduced costs by eliminating and automating steps in the supply chain and order-to-cash processes.

- **SCM tools that extend your visibility.**

  Bar coding has become standard and widely used within SCM. Many organizations are now extending the reach through radio-frequency identification (RFID) chips and antenna devices, which deliver enhanced and automated capacities for tracking, tracing and monitoring items. The technology not only improves the "visibility" and movement of goods, Howells says, but it also helps a manufacturer understand usage and sales data in deeper and broader ways.

- **Mobile technology in the supply chain.**

  Many organizations are adopting a "mobile first" approach. This means, quite simply, that device mobility is the primary access point for data, information and communication channels. Of course, taking mobile to a digital level means building an IT foundation and deploying devices—tablets, smartphones, dedicated smart devices and apps—that can support an anytime, anywhere data framework.

- **On the cutting edge.**

  Drones, 3D printing, robotics and the Internet of Things are revolutionizing many sectors and industries. "Everything is becoming digitized, everything and everyone is becoming connected, and everything is being shared in the cloud and directly available," says Howells.

"Organizations can respond to today's challenges by gaining greater agility, visibility and scalability," says Howells. "The key to achieving success hinges on transforming your traditional supply chain into a digitized, extended supply chain that enables new business models based on 'live' data. This will allow your business to sense, respond, learn, adapt, and predict and create value in the moment."

Enhancing value through data and analytics is essential, adds Jones. "The technology can drive down internal costs as well as customer costs. But it also can increase agility, flexibility and innovation."

Key Takeaways

- Build a digital framework that supports speed, efficiency, agility and innovation.

- What to keep in mind when reinventing your supply chain management system.

- Lower your internal costs by adding the right analytics review.

Have you seen a difference in your supply chain management since implementing new technology?

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