

The Hidden Perils of Supply Chain Innovation

Outsourcing, lean manufacturing and just-in-time inventory are proven cost cutters. But they can stretch global supply chains to a breaking point.

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Disruptions in the global **supply chain** can have a significant financial effect on any company. Outsourcing, **lean manufacturing** and **just-in-time inventory**, of course, have long been considered to be remarkable innovations in reducing an organization's production costs and allowing it to focus on its core competencies. While there are obvious benefits in reducing the production costs, these strategies can stretch a global supply chain to a breaking point at which a company's overall financial performance could suffer.

Paradoxically, when services are outsourced to offshore providers, a customer can face some increased costs and risks compared to solutions involving on-shore resources. Offshore outsourcing, though potentially more cost-effective, may involve hidden costs. They can, for instance, include an expensive and lengthy process of vendor selection; a three-to-12 month longer timeframe to complete work handover to the offshore partner; severance costs related to layoffs of local employees who will not be relocated internationally; turnover costs; and costs associated with addressing language and other cultural differences.

Lastly, managing the actual offshore relationship can involve a major additional and sometimes unforeseen cost. Overall, a company may end up paying up to 50 percent more in front-end costs than initially expected and only achieve a cost savings of as much as 15 percent to 25 percent in the first year. That could be well below the expected 35 percent to 40 percent in savings — which might only be achieved in the third year of the agreement.

An increase in front-end costs may cause the outsourcing organization to agree to lengthen the initial term of the agreement in order to generate the required financial benefits. But that ultimately involves making a larger commitment and therefore increases risk. Aside from costs, there are risks CFOs need to consider when their company outsources to **offshore companies**. They include: 1) data-security breaches; 2) lapses in process discipline; 3) loss of business knowledge; 4) vendor failures to deliver; 5) lack of compliance with government oversight and regulation; 6) cultural differences; and 7) productivity fluctuations.

There are also risks involved in lean manufacturing and just-in-time inventory. At many manufacturers, of course, since most of the cost is associated with purchasing goods and services, keeping stock levels low seems like a sensible thing to do. Both lean and just-in-time manufacturing focus on controlling the stock levels of the sourced materials. Finished goods and internal sub-assemblies are within the control of the manufacturer, after all. Unfortunately, this is also where the highest risk in the supply chain resides: Disruptions in the supply of raw materials can cause missed customer shipments or, worse, shut your customer down.

Further, relying on a single source for a critical part of a product can leave a company in a highly vulnerable position when the supply chain is interrupted. To be sure, risk diversification via multi-sourcing can help companies maintain a steady supply of critical parts. But risk diversification may not be achieved by simply lining up multiple suppliers. If the suppliers are all in the same region, a single catastrophic event can simultaneously degrade the capabilities of all the redundant suppliers.

In the assembly phase of supply-chain operations, the deliveries of subassemblies by dispersed assemblers must be highly balanced and coordinated to prevent the delay of the final assembly due to shortages of the subassemblies. While risk diversification is desirable at the component level, risk concentration (selecting suppliers located in the same geographical region, for instance) is preferable at the assembly stage.

Focused decision-making can help mitigate the risks of innovation. Supply-chain management decisions, for instance, have started overlapping with corporate financial strategy. CFOs are now working on ways to reduce cash-to-cash cycle times, achieving profitable growth, delivering predictable revenue and reducing the company's risk profile.

Companies without centralized governance can hinder procurement, manufacturing and time-to-market processes in the supply chain, which can impact a company's financial strategy. **Supply chain risk management** can be an essential part of that governance system, enabling finance chiefs to make sure that risks in the entire value chain are identified and mitigated so that financial goals can be met.

Supply chain risk assessment can be used to show the causes and consequences of a potential risk event by taking into account end-to-end cost, including inventory-carrying and capital costs. The chance to drive out inefficiencies and boost the bottom line make it worth the effort to undertake a supply chain risk assessment.

The beauty of the process is that it enables the company to pinpoint where and when the potential breakdowns can take place. Organizations then need to evaluate what are the risk triggers and where they could cause a negative outcome in the supply chain. That should be followed up with an action plan aimed at mitigating the severity of the disruption – or, conversely taking advantage of the disruption a competitor may suffer.

It is quite natural for companies to assume that supply chain disruptions only produce only downsides to their top and bottom lines – many companies with manufacturing operations in the path of the Japanese tsunami suffered tremendous disruption to normal operations. But there are some businesses that were able to cope with the resulting disruption better than their competition. GM is one example of an organization that clearly suffered a business disruption as a result of the tsunami, but in the aftermath was better positioned to resume production than its chief competitor, Toyota.

One way to set up an effective supply chain risk management operation within your company is by integrating the risk management, business continuity planning and crisis management function. This integrated approach provides a platform for the managers of those three functions to collaborate and consider a broader picture of issues that are obviously interlinked.

Using an **enterprise risk management** process (ERM) process across an integrated platform will promote a deeper understanding and assessment of critical threats and potential response to those threats from both a strategic and tactical perspective. Ideally, the data, qualitative information and recommendations developed via an integrated approach will be submitted to an internal senior executive or risk committee

for execution. The key is to set up the structure and have the plan ready for execution well ahead of any risk event. During the planning phase, insights about competitors should also emerge. When the time comes to put plans into action, leadership can act as a single unit.

Outsourcing, lean manufacturing and just-in-time inventory can bring significant savings to an organization if their risks are properly managed. By implementing a holistic, enterprise-wide supply chain risk management program, companies also can uphold their commitment to provide a strong corporate governance process on behalf of the shareholders, which ultimately boosts their shareholder value. Organizations that do not are in a real sense working without a safety net and, in today's high-risk climate, that is not a smart decision.

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