



# Implementing Lean

## During a Crisis

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**M**any of us have heard about “Lean.” The term can be used casually — and sometimes inaccurately — to describe a range of business-process improvement activities. But while many of us nod knowingly when we hear Lean discussed, we’re confused about what it is and how it can be applied. Is Lean about cell manufacturing or kanban systems? Is it about product flow or quality management? Can it be applied to all types of business, or is it only for manufacturing companies? Is it for healthy companies or can it be applied to companies in crisis as well?

Lean encompasses a broad range of techniques and applications. Companies that implement Lean employ many different improvement methodologies and recognize that both flow and quality are critical to business success. Lean is also applied to a range of organizations, from manufacturing and retail to services and government. And Lean has generated benefits for both profitable companies and some struggling with liquidity.

For an authoritative definition of Lean, there are perhaps no better thought leaders than James Womack and Daniel Jones. In their seminal book, *Lean Thinking*, they describe a process that starts with defining value, establishing the steps in the process that create value (i.e., the value stream), and eliminating activities that don’t contribute to that value stream (i.e., waste). While a number of specific techniques are frequently employed during Lean implementations (e.g., pull scheduling, batch size reduction and cell manufacturing), Womack and Jones do not limit Lean to those concepts. The focus is on increasing customer value and eliminating waste.

Despite its reputation for improving operations, companies are often reticent to apply Lean during crisis situations. The conventional wisdom is that Lean requires substantial financial and human resources and takes years, not months, to generate results. Lean practitioners

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frequently fuel this fallacy. They struggle with compromises that promise quick results at the expense of implementing Lean in a comprehensive and systematic manner. The thousands of books, articles and seminars based on the Lean concept reinforce the perception that it's complicated to implement.

Lean can work in a crisis. It focuses on basic process improvement, so solutions are often implemented without any capital expenditures. In fact, many companies turn to Lean after new equipment or technology fail to generate anticipated improvements. And while Lean can involve an entire company, it usually takes the form of small, focused exercises. Lean can tailor the human resource commitment and benefits to meet a company's specific requirements.



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### **Implementing Lean: A typical implementation**

Implementation starts by selecting a champion, building and training a team, and creating the plan. The first team deliverable is defining customer value, which can be a difficult process in companies that have become internally focused, and determining an improvement goal. For example, senior management may recognize that customers are taking business to a competitor that offers shorter lead times on new orders. Management then challenges the team to reduce order to delivery lead times by 50 percent.

The team starts with an analysis which includes mapping the steps in the order fulfillment process from order definition and order entry through engineering, manufacturing and shipping. The team determines which steps in the process contribute to filling the order to customer expectation (i.e., value added) and which are not contributing (i.e., waste). For example, time spent checking and correcting errors and processing orders in large batch quantities doesn't add value. The team then proposes changes such as mistake-proofing a process and moving from batch design efforts to completing projects sequentially. Of course, some nonvalue-added activity can't be avoided entirely, such as time spent moving product some distance on the manufacturing floor. In those instances the goal is to reduce cost and negative impact on the value stream.

Lean has an infectious quality. During Lean exercises, associates (the term Lean practitioners use for employees) eliminate the bottlenecks that keep them from being productive and that make their jobs frustrating. Controlling the work environment is empowering and

encourages Lean teams to identify and capitalize on new improvement opportunities. Visible performance tracking—a central element of Lean—reinforces the positive feedback loop by tying the work effort to results. Thus, Lean spreads through the organization, from traditional focus areas on the manufacturing floor and warehouse to other functions, such as engineering, customer service, and finance and ultimately to suppliers and customers.



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### **Implementing Lean in a crisis situation**

Many companies in crisis require more than balance-sheet restructuring. Underlying business process change is required to ensure a lasting turnaround. Lean is a proven approach for driving operational change. It does not require substantial financial investment and can be implemented by small teams in focused efforts. But is there a more compelling reason to implement Lean?

Lean is not only applicable to a crisis situation; it can actually augment the turnaround effort in the following ways:

- ▶ Jump-starting the turnaround through resident Lean experience and leadership.
- ▶ Balancing cost reduction and creating customer value.
- ▶ Building a foundation for lasting change and increased enterprise value.

The key is to remember that you're managing a crisis. The Lean effort can't become the turnaround; it must work in parallel with efforts to manage cash and reduce costs. Further, the focus of Lean must be on opportunities that will generate immediate, tangible results.

### **Jump-starting the turnaround**

It's difficult to find a manufacturing business that doesn't have associates with some experience implementing Lean. Experienced Lean practitioners provide a valuable jump-start for the implementation. They already understand the concepts and can help train the team. They will also help to rally the rest of the company. They may even be appropriate team leaders. And sometimes the company has existing Lean work product — work plans, process maps, and detailed analysis — that is still relevant and can be used during implementation.

Discovering existing Lean work product and associ-

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ates with Lean experience was a major boost to a furniture manufacturing client. The company's previous Lean effort hadn't been implemented, but the analysis on improvement opportunities was still valid. For example, the team had previously mapped out a 5S program (a five-step process for cleaning up and organizing the work environment). The company had also developed a detailed schematic for an alternative workflow that would substantially reduce the distance product had to travel through the plant. Finally, the team had outlined changes to workbenches that would reduce the risk of product damage during manufacture, and reduce scrap and time spent reworking damaged parts.

The consultant leveraged the 5S, flow and quality elements of the previous Lean work product. At the same time, the consultant focused the teams on schedule adherence and tapped many of the same players to take leadership roles in the new implementation. After the team had spent one weekend reviewing the former work product and laying out the implementation plan, the company pushed forward. As a result, schedule adherence improved from below 50 percent to over 90 percent in four weeks and labor productivity started to climb. Today, it has improved by over 25 percent.

### **Balancing cost reduction and creating customer value**

It's common for a company that has emerged from a crisis situation to ultimately return to crisis as a result of declining sales volume. Customers will work with a vendor in crisis to keep their stores stocked, warehouses full and plants utilized. It's often months after the crisis has abated that a company truly grasps the damage to customer loyalty and order levels. Lean is not only about productivity improvement or cost reduction. The focus is on the customer and driving out waste in support of increasing value. Lean's focus on customer value as the end game of improvement efforts is an important counterbalance to typical crisis management.

Understanding customer value was a key to success for a distributor of home décor products to large retail chains. In order to keep customer fill rates high, the company carried substantial inventory. Inventory targets were based on historic usage levels and purchased in large quantities, which resulted in substantial end-of-season inventory. The company considered inventory off-limits because of concerns about fill-rate issues and customer loss. As a result, the initial focus of the turnaround effort was expense reduction, primarily through personnel. But the consultant needed a solution that would also lower inventory levels.

After an assessment of the company's planning, inventory management and purchasing processes, the consultant told the company there was an opportunity to both maintain fill rates and reduce inventory investment (and consequent cash requirements and end-of-year write-offs). The team developed a formal planning process,

incorporated detailed customer forecast and point-of-purchase data, and pushed vendors to replenish in smaller quantities more frequently. The efforts resulted in a 50 percent reduction in average inventory, a 30 percent reduction in warehousing costs (a result of less inventory congestion), and no diminution in fill rates. Additionally, customers viewed the formal planning process as a tool to enhance in-store turnover.

### **Building a foundation for lasting change**

The typical crisis management focus is short-term. Lean supports this tactical orientation, but with a process that can drive ongoing change. Even in healthy companies, Lean takes the form of a series of short, focused exercises called Lean or *Kaizen* (a Japanese term that means continuous improvement) events. After associates achieve results in one area, the lens is turned on different business processes and functions. Ultimately, the Lean work implemented during the crisis spawns new improvement initiatives and ongoing value creation.

Focus on a lasting solution was an important element of a turnaround the consultant's work with a lighting fixtures manufacturer in crisis. The principal operating executive had prior experience implementing Lean. A regional, government-sponsored consulting firm was hired to implement Lean efforts, while the turnaround consultant focused on turnaround initiatives. While the firm brought specific Lean expertise to the situation, the real advantage was their proximity to the company and the continuity they would bring to the improvement efforts. The company would have access to their leadership and methodology long after the turnaround was complete.

The Lean consultants implemented two improvement events per month in the assembly area of the plant. The productivity improvements implemented contributed to a 30 percent reduction in plant workforce. The business was stabilized and today, because of the Lean efforts, continues to improve. In fact, the company is expanding Lean into additional functions and areas of the business.

### **Conclusion**

Not only can Lean be employed in a crisis situation, it can actually help make a turnaround more successful. Tapping Lean experience in the company reduces the time and investment required to get turnaround efforts started. By focusing on customer value, the efforts support and potentially increase the company's revenue base. Finally, Lean provides a foundation for continuous improvement and long-term value creation. But Lean will not succeed unless it is implemented effectively. It's essential to quickly identify, isolate, and prioritize the most important opportunity areas. The implementation must then be driven with a relentless focus on generating immediate, tangible results. ▲