

## Introduction Changing Your Focal Plane

For years now we have loved to "take a walk" along the entire value stream for a given product, looking for value and waste. We've done this for dozens of products in many industries and followed streams across the world. We presented our first example in *Lean Thinking* (1996) when we drew the path of a humble cola can. This simple product with only three parts (barrel, top, and "pop-top") traveled 319 days through nine facilities owned by six companies in four countries to progress from ore in the ground into the hands of the customer. Yet during this long march only three hours of value-creating activities were performed and the great majority of the steps—storing, picking, packing, shipping, unpacking, binning, checking, reworking, and endless movements of information to manage the system's complexity—created no value at all.

Looking at the whole has always seemed natural to us and doing so will always suggest ways to slash costs while dramatically improving responsiveness and quality. Yet most managers we have encountered on our value-stream walks want to stand in one place and look at only one point—their machine, their department, their plant, their firm. Often, the machine, the department, the plant, and the firm are performing well on traditional measures—high labor and machine utilization, low defects, on-time shipments—and the managers are pleased with their achievements.

However, when we get managers to change their focal plane from their assets and their organization to look at the product itself and what is actually happening on its long journey, they immediately realize that the performance of the entire value stream is abysmally sub-optimal. Indeed, most wonder how they have worked for years in traditionally compartmentalized operations and somehow failed to notice the waste everywhere. Then they wonder what they can do about the mess.

And this is the big challenge. Managers find it exhilarating to take a walk along the extended value stream, creating a map of its current state. And this is the critical first step because it raises consciousness. But moving to agreement on what to do together to improve the value stream, and then actually doing it, is much harder. Departments and firms usually have no prior experience with thinking together about the whole flow of value and changes in one part of the value stream that are often needed to improve performance in other parts. How can many managers in many firms learn to do this together?

In fact the best method to use for each value stream will need to be discovered through experiments. In this breakthrough guide, we propose one method based on our own experience in order to spur your thinking. We show how our example value-stream team begins by creating a first future state for the value stream that introduces all of the lean improvements within each facility that were described in this workbook's companion volume, *Learning to See*. Doing this produces a remarkable improvement in the performance of the entire value stream and creates a shared sense of success to spur the next step.

This step is a second future state that introduces pull systems and frequent replenishment loops between each facility and firm along the stream. Doing this produces a second remarkable leap in performance by eliminating many steps, reducing inventories, shrinking lead times, minimizing defects, and getting the right amount of the desired product to the customer at the right time. Success with this step in turn sets the stage for the next step.

We call this step the ideal state (although it is only ideal in terms of current technologies and product designs.) The objective is to rethink the geographic location of each step along the stream to compress and speed the flow of value while further improving quality and customer response.

The precise steps and the sequence to follow in improving your value streams can only be discovered by you and your partner organizations through experimentation. However, with some creative thinking about shared management of the stream and the appropriate process and information technologies, we believe that most value streams can be compressed and smoothed to a point where a large fraction of the original steps and practically all of the throughput time are eliminated.



This will be a true revolution and the team of firms getting there first will have an overwhelming competitive advantage. More important in most cases, the firms starting first and making the quickest progress along the path will have a *continuing* competitive advantage.

The key is to summon your courage, form your cross-department and cross-company teams, and change your focal plane to focus on the flow of the product rather than the performance of the individual points. Then learn to see the whole value stream and ... get going to take out the waste in the provider firms while creating new value for the customer. We will be urging you on and waiting to hear about your problems and successes.

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