

Have You Picked Your Low Hanging Fruit?

Wayne R. Haggstrom, President, Sympraxis LLC

When a business wants to begin the journey to becoming a more efficient and cost effective organization, the majority of the literature makes this appear as a daunting task. There is Six Sigma and Lean Manufacturing, statistics and data analysis, Black Belts and Green Belts, and cross functional teams. It doesn't have to be as complex as it seems. For the majority of businesses, there is ample opportunity for cost savings and increased revenue by taking advantage of "the low hanging fruit".

Two of the popular philosophies in use today are Six Sigma process improvement and Lean Manufacturing. When we talk of Six Sigma, we are generally referring to reducing variance in a process or manufacture of a product. The goal is to reduce the number of non-conforming items. Sound's good, but what does it mean. Simply, it means we want to reduce the number of errors, mistakes, goofs, bad products, slip-ups, and Oops'. Lean tends to refer to a reduction in cycle time and minimizing inventory on hand. Basically, getting it when we need it and not taking any longer than required to do it. While it does take time and resources to initiate a full fledged improvement program using the above methods, either one can be started on a simple level and still yield excellent results. For now, let's look at reducing variation. While we focused on "things", this works just as well for service industries.

Data Collection

Both of the methods mentioned above require data. Data helps you define the problem. Somewhere down the line they will require statistical methods, but for now, simple will do. Data is an important part of both programs since it determines where to look for improvements. Eventually, data should be collected specifically to identify areas of improvement, but for now let's look for areas where data already exists.

Often a good source of data can be found in the back corner of the warehouse or the "to do" file. These are areas where "stuff" tends to accumulate. Take a look, dig into the "stuff", sort it into like things. Ask yourself "Why are they here?"; "What's wrong with them?" and "What does this cost me?". The process of data collection and project identification has begun.

Where else to look? How about customer comments and complaints, your accounting system and asking your employees. The people that do a job day in and day out are an incredible source of ideas.

The Pareto Principle

The Pareto principle, also known as the 80/20 rule was named after Italian economist Vilfredo Pareto. In the eighteenth-century Pareto was studying how wealth was distributed in Europe. He discovered that 80% of the wealth was held by 20% of the people. Further study led him to find that the 80/20 rule works for many other items as well. Most companies will find that 80% of sales are generated by about 20% of the sales

force, 80% of revenue comes from about 20% of the customers, and so on. How does this work for us? Following the rule, 80% of the defects are the result of 20% of the causes. Eighty percent of the cost of bad products can be attributed to twenty percent of the causes. That should make the point.

The Next Step

You have your piles sorted out from the back corner of the warehouse. First figure out what each pile cost you: materials, labor, storing it in the back corner of the warehouse, lost sales, lost customers, the cost to rework the item and so on. Now we apply the 80/20 rule. Eighty percent of your cost of having that “nonconforming” product is attributable to twenty percent of the causes. At last, the discovery of some low hanging fruit. Typically, projects found early on are relatively easy and cost effective to fix.

Discovering the Causes

Working on the pile that cost us the most, we look at all the possible causes of the defect that got it there. Is it human error? Is it a piece of equipment that got out of tolerance and made bad product? Is it raw material that was not up to the normal standard? Are the majority of the ones with bad paint green? Don't worry about how you fix it yet, just keep working on all the possible causes. Brainstorm. And don't jump to conclusions.

Now take your list and start looking into each item on your list. You don't have to do this yourself, get the input of others. It can be from people involved with the process, people outside the process, or a combination of both. Make it clear that you are not trying to assign blame, just trying to find a way to reduce the number of a particular problem.

The Solution

Once you have identified the cause of the problem, brainstorm solutions. Again, use the same group that helped above. Encourage people not involved with creating that product to ask questions. When you have to explain something you do every day to someone that has no idea about it, it makes you think. Simple questions can lead to big revelations. When the group has a common understanding and a list of possible solutions, begin looking at the solutions one by one. Don't discount the simple ones – sometimes simple is best! If the end result is several solutions where each would solve the problem equally well; add other criteria to help select the best one. Which one has the lowest cost to implement? Which one has the least impact on the employees? Decide what criteria are important and use them to see which solution measures up.

Implementation

Once you have decided on a solution, implement it. If you did this with a group, one of the most exciting things for them is to see their work implemented. After the solution is implemented, watch to see if it solved the problem. Did it solve it completely or just the majority of it? Does the solution need to be tweaked a little bit? Adjustment is fine as long as it makes it better. Tweak one thing, see what happens. If you change several things at once, you can't really be sure which change made an improvement.

This Sounds Too Easy

I admit this is a simplification of a detailed process. Much of the literature talks of projects reaping savings of six figures. While this is possible on early projects, it is more important to have successful projects that don't drag on for a long time. If you want to develop a culture within your organization where continuous improvement becomes normal, the initial success is important. Success will encourage the people to try the process again. While everyone would like to have an initial project add 25% to their bottom line, would you be unhappy with two or five or ten percent? If you could reduce delivery time by 5 days, what would that do to your bottom line? Consider the possibilities. Use savings from initial efforts to fund a greater effort, provide training to your employees, or apply the tools to different areas of your organization.

So, in conclusion: Have you picked your low hanging fruit?