1

Introduction

Why this Book?

Another book about Lean Six Sigma?

Ah but this is different, it's about leadership and it is definitely not a technical book about the dark arts of black belts or advanced statistics. We hope you'll find it helpful no matter what kind of role you are in. We hope it will make you think that maybe there is more to this than you had thought. We hope you can put some of the ideas into practice. Come and join the party!

Let's start by trying out one of our favourite Lean Six Sigma tools, 'negative brainstorming' on that very subject – leadership.

If you haven't discovered it yet, this 'tool' (as Lean Six Sigma practitioners like to call techniques which can be employed to help facilitate workshops and the like) is really good fun – and it works.

So how do you use negative brainstorming?

In our experience there are two main steps. Firstly, grab a flipchart and pen, and say to the group 'Okay, so describe what good leadership looks like.'

This is a tough question and is likely to stall quickly, so before they get bogged down, say 'Let's turn the question around, what are the characteristics of really **bad** leadership?'

This inevitably creates a few chuckles around the room and immediately engages everyone including the negative diehards. Everyone seems to know what BAD leadership is like and they will have no trouble describing examples of it.

Here are a few examples from workshops we have run with senior executives:

Being a poor communicator

Dictating everything from above

Not involving people in decision making

Saying one thing and doing another

Rubbishing a company programme

Not living the company values

Pushing blame down

Jumping to solutions without any real facts.

You can add more to this list as there are sure to be plenty of ideas.

You will have real difficulty writing down their ideas fast enough and keeping up with them, so the second approach is to use Post-it notes and ask them to write down each idea on a separate note. Then you put them all onto a wall or flip chart. Personally, we both like getting them to shout out ideas as it creates a real buzz and it's clear who is participating.

Once they have filled up at least one flip chart sheet, you say 'Okay well we seem to be pretty good at this! However, what we really want is "excellent leadership" so let's look at our collected notes and see if they can give us ideas by turning the negatives into positives.'

So, work down the list and literally change the negatives into positives.

Looking at the list above, this might become …

Being an excellent communicator

Not being a dictator

Involving people in decision making

Doing what you say you will do

Supporting company programmes

Living the company values

Not pushing the blame down!

Not jumping to solutions without getting the facts.

You can continue with your list of negative ideas, turning each one around.

The discussion as a team is helpful, engaging and we have found this one simple 'tool' can really make a difference in getting teams involved and opening up thinking. We probably all know somewhere deep in our minds what the characteristics of good leadership look like but simply reversing the question seems to help dig out that thinking and gets a serious discussion going in a way which is more enjoyable. Maybe it is because we're Brit and we are pretty expert at being negative about just about everything given half a chance; but underneath it we genuinely do want to be good leaders ourselves and we want to work with good leaders too.

Okay so negative brainstorming, it's a great tool, try it in your next team meeting on 'How can we run the worst team meeting ever!?'

Our experience with teams is that within 15 minutes you can run the negative idea generation and turn these ideas around into positive thoughts, create a 'guidelines for effective team meetings' flip chart which you can then use in future at YOUR team meetings. The team will buy into it too. After all, they were involved in its development.

I (Martin) wanted to start by illustrating that when you get under the somewhat weird and off-putting name, 'Lean Six Sigma', it may surprise you. If you can get beyond the odd name and any residual stigma or preconceived ideas you might have about Six Sigma being just about super high levels of quality, then there is a lot 'under the bonnet' of Lean Six Sigma which any manager or leader will find more than just useful.

With so many books written on the subject it may seem rather crazy to write another. However, from my experience working with many executive teams, what managers or leaders want to know is a little different from the rather technical descriptions that are covered in the traditional books on the subject.

I am often Asked the Question 'What Exactly is Lean Six Sigma?'

Over the last few years it's come to mean a number of things but, in reality, most organisations use it as a tried and tested approach to implement continuous improvement. In Catalyst, we use the name to encompass a wide range of methods, tools and techniques which have their origins in different histories and backgrounds. This range is developing and changing over time as more and more organisations build ever increasing experiences of using the approach in very different situations.

The latest most successful implementations of Lean Six Sigma – or whatever you want to call it (more on this later) – bring together thinking, principles, approaches, tools and techniques from the following:

- Lean thinking
- Six Sigma
- Change Management
- Agile and, most recently,
- 'Digital Transformation'.

Lean Thinking

Let's take a look at some of the background, starting with Lean. If you'd like a serious grounding in Lean and Six Sigma then pick up a copy of *Lean Six Sigma for Dummies*. When we wrote that book we wanted to 'demystify' the approach and make it accessible to everyone. We are going to paraphrase some of the basics here with the emphasis on the leadership aspects behind the approach.

When people talk about the roots of Lean thinking, the word 'Toyota' is often quoted. In fact, Toyota call their system 'The Toyota Production System'. The concept of the word 'Lean' goes back to 1987, when John Krafcik who is now the CEO of Waymo (including the Google driverless car project) worked as a researcher in his earlier career at MIT. He was looking for a label for the Toyota Production System (TPS) phenomenon that described what the system did. On a whiteboard, he wrote the performance attributes of the Toyota system compared with traditional mass production.

TPS:

- Needed less human effort to design products and services.
- Required less investment for a given amount of production capacity.
- Created products with fewer delivered defects.
- Used fewer suppliers.
- Went from concept to launch, order to delivery and problem to repair in less time and with less human effort.
- Needed less inventory at every process step.
- Caused fewer employee injuries.

Krafcik commented:

> It needs less of everything to create a given amount of value, so let's call it 'Lean'.

The Lean thinking world grew rapidly with the focus on reducing non-value-adding activities or waste. The Japanese word is *Muda*.

But, to sustain success, organisations need a lot more than knowledge about the tools and techniques. It all boils down to leadership. After all, it would not have taken root in Toyota if it hadn't had strong leadership commitment to create the environment needed to embed the principles and thinking into the **organisation as a system**. As Toyota chairperson Fujio Cho says:

> The key to the Toyota way is not any of the individual elements but all the elements together as a system. It must be practised every day in a very consistent manner – not in spurts. We place the highest value on taking action and implementation. By improvement based on action, one can rise to the higher level of practice and knowledge.

As we said in *Lean Six Sigma for Dummies*: the system focuses on training to develop exceptional people and teams that follow the company's philosophy to gain exceptional results. Consider the following:

- Toyota creates a strong and stable culture wherein values and beliefs are widely shared and lived out over many years.
- Toyota works constantly to reinforce that culture.

- Toyota involves cross-functional teams to solve problems.
- Toyota keeps teaching individuals how to work together.

Being Lean means involving people in the process, equipping them to be able, and feel able, to challenge and improve their processes and the way they work. Never waste the creative potential of people!

All of the above has implications for leadership. It won't just happen without commitment and 'commitment' alone isn't enough either – you will need to stir it into action.

There is a lot more to Lean thinking but these five principles underpin the approach:

1. Understand the customer and their perception of value.
2. Identify and understand the value stream for each process and the waste within it.
3. Enable the value to flow.
4. Let the customer pull the value through the processes, according to their needs.
5. Continuously pursue perfection (continuous improvement – or Kaizen in Japanese).

Introducing Six Sigma

Lean has its origins in Japan, while Six Sigma has its roots in the US from the 1980s, when we can trace the origins back to Motorola. The then CEO Bob Galvin was struggling to compete with foreign manufacturers and Motorola set a goal of tenfold improvement in five years, with a plan focused on global competitiveness, participative management, quality improvement and training. Quality engineer Bill Smith coined the name of the improvement measurements: Six Sigma. All Motorola employees underwent training, and Six Sigma became the standard for all Motorola business processes.

The word soon spread around US major businesses into Allied Signal, and in the 1990s it reached the ears of Jack Welch, the dynamic CEO of General Electric (GE). Jack Welch was initially sceptical as he viewed Six Sigma as a 'Quality' programme but he agreed to pilot test

the approach insisting that all Six Sigma projects should have a clear measure of success. The expression Return On Six Sigma or ROSS was born. Within a few months it was clear that Six Sigma projects could return attractive financial (and other) benefits and Welch dictated the use of Six Sigma across the entire group of GE businesses.

So once again, it was strong leadership, albeit a very different style of leadership compared with Toyota (Jack Welch was known in GE as 'Neutron Jack'), that drove the initial success; and through the experience in GE the world learned that Six Sigma was far from 'just a quality programme' and also that the approach was proven to work in all kinds of businesses not 'just manufacturing'.

When Jack Welch introduced Six Sigma, he said:

> We are going to shift the paradigm from fixing products to fixing and developing processes, so they produce nothing but perfection or close to it.

The recognition that it is the *process* that needs to be changed is central to both Lean and Six Sigma. We will come back to this!

Six Sigma enhances the Lean approach considerably.

For example, Six Sigma has strong roots – with measurement and data analysis extending an already great Lean toolkit by bringing a range of additional tools focused on how to measure, how much to measure and statistical tools, many of which are relevant for everyone in business or indeed leaders responsible for running any kind of organisation in whatever sector.

Six Sigma also brings a powerful problem-solving method which can easily be integrated with Lean tools. This method has now become the standard problem-solving approach for many organisations and has stood the test of time and application in all kinds of different sectors. The original thinkers in Motorola who devised the Six Sigma method must be astonished at how this approach has spread throughout the world and is still growing in popularity more than 30 years since it was first conceived.

We have occasionally heard leaders say that 'we are not ready for Six Sigma' and this is almost always down to confusion about the name.

When those statisticians in Motorola influenced the creation of the name 'Six Sigma' they had absolutely the right intentions with the aim of inventing a great aspirational goal for everyone to aim for – a very high level of quality. However, to understand exactly what they meant by Six Sigma requires a rather complicated, overly mathematical explanation which is likely to turn off many leaders before they reach a real understanding. To be honest it isn't technically that relevant to a lot of applications of continuous improvement which can benefit so much from the principles behind Six Sigma and the tools underpinning it. The name stuck though and has entered the business vocabulary whether we like it or not.

It has put a lot of leaders off the whole approach though! This is a real shame as there is so much which is relevant to leading and running organisations today, especially as we enter a new digital transformation era.

Don't get too worried about the name 'Six Sigma'! It is an issue, we agree. Some of our clients feel strongly enough to use a different 'brand' instead of Lean Six Sigma – here is a selection which we have seen over the years:

- Operational Excellence
- Business Excellence
- Think Process
- Continuous Improvement
- Continuous Innovation
- Relentless Simplification
- For a Better Life

There are also 'coded' expressions that mean something specific for a particular organisation – like 'e3'.

In all these cases when you look 'under the bonnet' you will find the same approaches, principles and tools which all come from the latest Lean Six Sigma stable. Make it work for you, adapt it for your organisation, make it fit so that people feel curious and want to join in.

One of the most powerful and common applications for Lean Six Sigma is to tackle business problems. We will look at this from a leadership perspective in the following chapters.

Lean Six Sigma Principles

Lean Six Sigma is based on a set of principles which are based on the roots mentioned above:

1. Focus on the customer
2. Identify and understand how the work gets done
3. Manage, improve and smooth the process flow
4. Remove non-value-add steps and waste
5. Manage by fact and reduce variation
6. Involve and equip people in the process
7. Undertake improvement activity in a systematic way

We will draw on these principles throughout this book.