



## Six Sigma

### What is Six Sigma ?

Six Sigma is a management approach using a structured methodology to strongly reduce mistakes and variations both in operational and administrative processes.

Worldwide, Six Sigma already proved that processes can be better streamlined, resulting in more value for the customer at a lower cost, a higher quality level and within reduced delivery times.

#### ***Six Sigma can have different meanings :***

- **SIX SIGMA AS MANAGEMENT APPROACH ON A STRATEGIC LEVEL**

Implementing Six Sigma yields dramatic reductions in cost, increases in customer service levels and improvements in product & process quality. All these are deemed to be very important in the realization of a company's strategy.

- **SIX SIGMA AS PROBLEM SOLVING METHODOLOGY**

To improve the selected company problems, the Six Sigma approach uses the structured DMAIC roadmap. DMAIC stands for Define, Measure, Analyse, Improve and Control. This roadmap contains a complete toolkit of managerial techniques going from decision matrices, over statistical analysing and control techniques to creative techniques.

- **SIX SIGMA AS STATISTICAL EXPRESSION FOR PERFECTION**

Six Sigma can also be defined as a statistical expression of near-perfection in meeting customer requirements. A Six Sigma level equals an overall process performance of only 3,4 defects per million opportunities.

### Issues that can be solved using the Six Sigma methodology:

Examples of some recently completed projects by Stanwick gives an idea about the effectiveness of the Six Sigma methodology :

- Increasing the yield in a chemical reactor for a major pharmaceutical company.
- Reduction of the rejects in an annealing process for a machine builder supplier.
- Root cause analysis of sporadic cracks and fractures in a metal transformation process for a second tier automotive supplier.

### How to implement Six Sigma ?

A key element in the successful implementation of Six Sigma is tailoring the methodology to the specific needs and characteristics of the business. Some businesses opt to use Six Sigma as a thorough problem solving methodology to tackle well selected major problems. Other companies opt to implement Six Sigma as a culture changing vehicle.

Either way, a successful implementation depends on many factors such as the commitment and conviction of its leadership. Additionally, the subject matter experts with the necessary technical expertise need to participate. Therefore, it is crucial to assign the following roles & responsibilities:

- Champions who facilitate and support the project teams in implementing Six Sigma.
- Master Black Belts, who are experts in the methodology and tools, give their practical support to Green and Black Belts. This Master Black Belt role is often taken up by a Stanwick consultant.
- Green and Black belts are both project leaders. Green Belts typically receive a two weeks training in the use of the DMAIC roadmap and tools. A Black Belt gets an additional training of two weeks with emphasis on advanced statistical tools.
- Yellow Belts are team members who participate in projects and have awareness of the different steps in the DMAIC roadmap.

### **Stanwick's role in the implementation of Six Sigma:**

Stanwick has more than 15 years of experience in assisting & coaching companies in different industries in implementing Six Sigma. We have a thorough knowledge of the different techniques available to tackle different kind of problems. Sporadic problems for example, require a completely different approach than chronic problems<sup>1</sup>. Our approach to Six Sigma is hence aimed at getting fast & lasting results by applying the correct problem solving tools and techniques for the different kind of problems your business might encounter. Stanwick can assist your company in:

- Helping to design a tailor made Six Sigma approach in line with your strategy and goals.
- Provide in-house training for Yellow Belts, Green Belts, Black Belts and management teams in the principles, roadmap, tools & techniques of Six Sigma.
- Certification of Green Belts, Black Belts and Master Black Belts.
- Assistance and coaching of the Green and Black Belt project leaders with methodological and statistical expertise in their first projects.
- Assistance of internal project leaders who want to use Six Sigma tools in their projects and daily business, on the job learning.

### **What results you can expect from Six Sigma ?**

The Six Sigma approach and tools, combined with user-friendly statistical software provide an incredibly powerful tool to achieve breakthrough results.

A typical Green Belt project results in yearly savings of about 20-50K€. Black Belt projects result in yearly savings ranging from 50-500K€/project. Most projects are performed in a timeframe from 3 months to 1 year, depending on the difficulty of the problem.

Some proven results from companies where Stanwick provided training & coaching:

- Reduction of rejects from 7% to less than 1% within 8 months in a major electronics company resulting in cost savings of more than 340k€.
- Increase of production yield from 87 to 92% within 6 months resulting in cost saving of more than 410k€ in a metallurgic company.
- Reduction of product contamination from 14% to 2% in a biomedical company resulting in 8,8 Mio € additional income during a 1 year project.

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<sup>1</sup> See leaflet 'Sporadic Problem Solving' for a detailed explanation.

## **Some recent client engagements in Six Sigma:**

Affinia Group, Aleris, Arcelor, Bekaert Group, Danone, Johnson & Johnson Group, Monsanto, Panasonic, Philips, Schneider Group, Umicore.

## **Stanwick Management Consultants, your partner in organisational & operational excellence.**

Stanwick is an independent management consulting firm that supports companies to achieve business excellence by improving their organisational and operational performance. We have offices in Belgium, the Netherlands, France and China.

The aim of our customers, active in industry, as well as in services and public sector, is to excel in bottom-line results, employee satisfaction, customer satisfaction and the impact on society. Stanwick's mission is to help them to achieve these goals through its in-depth expertise, by creating a close partnership and through continuous support to the organisation as a whole.

As a partner on the way to excellence, we develop a tailor-made approach with the appropriate tools together with the customer. We put a lot of emphasis on implementation, leading the process of change and getting sustainable results. We have in-depth knowledge in both organisational and operational excellence.

Our team consists of 35 full-time consultants with very different backgrounds ranging from engineers and psychologists to economists and sociologists.

## **Contact us to find out how we can support you in your way to excellence.**

Please do not hesitate to contact us for discussing how we can help you in your six sigma implementation. Sample cases and a select set of training modules are available upon request for your evaluation.

Tom Van Acker, Stanwick China  
Suite 4006, Block 4, 18 Huang Yang Road,  
Pu Dong, Shanghai, 201206, P.R. China  
☎ +86(0)21 6165 2792  
[tom.vanacker@stanwick.be](mailto:tom.vanacker@stanwick.be)  
[www.stanwickconsultants.com](http://www.stanwickconsultants.com)