

GB01: Six Sigma Green Belt Training



SAQI Six Sigma Green Belt Program is focused on rapid engagement driving execution and sustainable results, whilst enabling the Green Belt practitioner.

Course outline

Green Belts are critical to every successful operational excellence and quality focused initiative. The SAQI Six Sigma Green Belt program has been designed with "speed to efficiency" in mind aid benefits for the organisation faster. By applying the proven and robust DMAIC methodology, we give the practitioners and business the core skills and competencies to drive processes to higher level of performance to deliver world class quality and services.

With the SAQI green belt program practitioners will master the problem DMAIC problem solving skill over a period of 8 days and get up to speed to start introducing and effecting positive change within their project and working environments. The methodology and DMAIC toolbox will permit the practitioners no navigate the problems solving approach effectively. The practical and experiential training approach followed by SAQI will enable the Green Belt practitioners acquire the skills to effectively lead projects inside their own departments and actively partake in larger organizational improvement projects.

The SAQI Six Sigma Green Belt training is comprised of 8 days of training over a two a month period. These sessions are separated by approximately four to six weeks to allow the practitioners the chance to apply the methods and concepts learned in class on their selected projects. This in turns drives the improvements and benefits as part of the training.

The content of the Green Belt course not only focuses on the DMAIC problem solving methodology, but also touches on the critical elements of change management, as this is one of the core drives that will ultimately ensure a successful and sustainable implementation of proposed solutions.

KEY LEARNING OUTCOMES

Six Sigma at a glance

- ◆ Course duration: 8 classroom days over 2-month period
- ◆ Course requirements: Laptop with Microsoft office
- ◆ Trail version of SigmaXL will be provided for a period of 30 days to complete the statically exercises
- ◆ Certification Requirements: include full class attendance over the 8 days, completing all of the quizzes and exercise during the training, successful completion and a training project to be assessed by a certified SAQI assessor, completion and pass of the Green Belt Exam
- ◆ Course outcomes: On completion of this course the participants will be able to:
 - ✓ Understand their role in the Six Sigma in the organisation
 - ✓ Apply Six Sigma and statistical concepts to analyse and solve problems
 - ✓ Map and interrogate processes and measure process capability
 - ✓ Mapping re-designing and mistake proofing processes
 - ✓ Do robust root cause analysis in a systematic and effective way via the DMAIC methodology
 - ✓ identify, scope and define projects
 - ✓ Apply statistical analysis to determine the relationship between key inputs and process outputs providing the bases for effective root cause analysis
 - ✓ Manage teams and change as well as apply the basics of project management
 - ✓ Design controls and set SPC / SPM in place to track and monitor process and product performance and capability.
 - ✓ Upskill smaller project teams in the basics of problem solving
 - ✓ Effectively engage with various levels of leadership to help remove barriers and achieve project success
 - ✓ Close projects and hand over control to process owners and line management
 - ✓ Present projects to instructors, peers and managers.

Course overview

Week One:

- ◆ Introduction to Six Sigma
- ◆ Roles and Responsibilities in a Six Sigma operating environment
- ◆ The Six Sigma Methodology - DMAIC
- ◆ Process Mapping
- ◆ Vital Data Analysis and project scoping tools
- ◆ VOC (Voice of the Customer) and critical to X
- ◆ The Project Charter
- ◆ Stakeholder Analysis
- ◆ Change Management Fundamentals and overcome resistance
- ◆ Data Collection Planning and Operational Definition
- ◆ Plan for effective meetings and project sessions
- ◆ Introduction to SigmaX

Week Two:

- ◆ Basic Statistical and Graphical Analysis (introduction to $y=f(x)$)
- ◆ Measurement System Analysis
- ◆ Capability Analysis
- ◆ Basic Process Analysis – Rolled throughout yield
- ◆ Identifying Potential Causes (qualitative tools - C&E Matrix, Fishbone, FMEA)
- ◆ Inferential statistical analysis and Hypothesis testing
- ◆ Generating and Evaluating Potential Solutions
- ◆ Control and Monitoring Methods
- ◆ Mistake Proofing
- ◆ Statistical Process controls
- ◆ Implementation Planning and project transition back to line