Lean Six Sigma Green Belt Program

Description

Built to educate and enable participants to become American Society for Quality (ASQ) certified Lean Six Sigma Green Belts, the program consists of Foundations and Advanced Topics courses that present the Green Belt Body of knowledge.

A test preparation course is offered as an optional refresher that can be taken just before the participant sits for their ASQ certification exam. At the end of the program, a Capstone course is offered to provide a forum for structured mentoring, so newly certified LSS Green Belts have the opportunity to practice what they've learned using a live project.

The courses are offered in-person and instructed by a certified Lean Six Sigma Black Belt or Master Black Belt. Our instructors are practitioners first and trainers second, the students benefit from 'real-world' examples given in context of the material as it is presented. Each class is highly participatory where students are encouraged to engage and offer their own experiences. Some classroom exercises are used, however, the focus is on the student applying the learning in real-time in their respective professional positions.

Overview

Course Name	***Contact Hours***
LSS GB Foundations	21
LSS GB Advanced Topics	21
LSS GB ASQ Test Preparation	12
LSS GB Capstone	15

LSS GB Foundations

A practical approach to Lean Six Sigma. Designed for those new to Lean Six Sigma, learn best practices approaches you can apply immediately in your work and build a foundation for further development. Learn the Lean approach and the Six Sigma DMAIC (define, measure, analyze, improve and control) model to process improvement projects and the appropriate tools and techniques. Understand basic statistics, quality principles and systems, strategy, process and project management, lean principles in the organization, team management and best practices for continuous improvement.

This course covers the main parts in the ASQ Body of Knowledge for SSGB certification and it is a prerequisite for Lean Six Sigma Green Belt – Advanced Topics.

Knowledge Areas Covered

- Value of Lean Six Sigma
- Process Management for Projects
- Project Management Basics

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- Introduction to Statistics for Lean Six Sigma
- Lean Six Sigma Acronyms
- Lean Concepts and Tools
- Value Add vs. Non-value Add
- Theory of Constraints
- Team Stages and Team Dynamics
- Creating Change
- Project Management Tools
- Process Analysis and Documentation
- Introduction into Probability
- Collecting Data
- Introduction into Statistics
- Summarizing Data
- Measurement System Analysis (an introduction)
- Variation
- Capability Analysis
- C&E Diagram & C&E Matrix
- An Introduction to Linear Regression Analysis
- Introduction to Hypothesis Testing
- Introduction to Statistical Process Control
- Introduction to Control Plans

LSS GB Advanced Topics

The Lean Six Sigma Green Belt Advanced Topics course builds on the Foundations course and introduces additional concepts, tools and techniques used through the Define, Measure, Analyze, Improve, and Control (DMAIC) method. It enhances the student's understanding of creating improvement strategies and executing and deploying six sigma DMAIC projects. Additional concepts related to quality systems, strategy creation, process management, lean principles & practices, and team management are presented.

This course completes the coverage for the American Society for Quality (ASQ) Lean Six Sigma Green Belt Body of Knowledge.

Knowledge Areas Covered

- Lean principles in the organization
- Process management for projects
- Team dynamics and performance
- Basic probability and statistics
- Collecting and summarizing data
- Probability distributions
- Measurement system analysis
- Process capability and performance
- Exploratory data analysis
- Hypothesis testing
- Confidence Intervals
- Introduction to ANOVA
- Introduction to Design for Experiments (DOE)
- Statistical Process Control (SPC)

LSS GB ASQ Test Preparation

This course is designed for quality practitioners with Lean Six Sigma experience desiring a refresher

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course to help assure successful completion of the ASQ Green Belt certification exam. In includes four sessions where the student takes a progressive exam - then works with the instructor to review and polish their understanding of the LSS GB body of knowledge.

Course includes an Electronic Exam Compact Disc: CD contains 1,000 questions and solutions offered via a test bank that can be randomized or categorized for effective test taking simulation.

Knowledge Areas Covered

- Question Types
- Exam Environment
- Answering Strategies
- Open Book Strategies

LSS GB Capstone

Offered to participants who have completed the LSS GB program, this course puts into practice the student's learning in practical project applications. The course includes three complete case studies that can be used in lieu of and/or in conjunction with an outside Green Belt project. This instructor led course offers the student a review of the GB concepts and access to a Lean Six Sigma Black Belt to support and offer guidance, direction and inspiration as the GB student completes their project.

Knowledge Areas Covered

- Application of key Lean Six Sigma tools as they are applied to an A3 Improvement approach.
- Project Charter
- Process Mapping
- Affinity Diagrams
- Multi-Voting
- Data Collection
- Root Cause Analysis
- Cause and Effect Diagrams
- Improvement Idea Creation
- Improvement Planning and Implementation
- Project Execution
- Benefit Recognition and Communication

Reference Materials Included (for all courses):

- The Certified Six Sigma Green Belt Handbook by Munro, Maio, Nawaz, Ramu, and Zrymiak.
- Quality Council of Indiana - Green Belt Primer
- Quality Council of Indiana - Test Questions CD
- Student Handbook for each course

Entrance Requirements
None - LSS Yellow Belt is preferred.

Program Cap
12 to 15 participants is ideal

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Sign Up

Ceptara provides these courses to organizations as part of their internal training programs or as a standalone program. Learn more and Request a FREE quote... [1]

If you are an individual student interested in the LSS Green Belt program, these courses are offered via Open Enrollment at Everett Community College and Cascadia College in Washington state.
Tell me more... [2]

Source URL: http://ceptara.com/training/lssgb

Links:
[1] http://ceptara.com/lp/customtraining?channel=web&program=lssgb
[2] http://www.everettcc.edu/ccec/certificate-programs/lean-six-sigma

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