

Course Outline

Chapter 1 : Introduction to “Green Belt Six Sigma”

- Background
- What Is Six Sigma
- Parameters
- Five Phases
- Road maps for DfSS
- Basic failure mode and effects analysis (FMEA)
- Design FMEA and process FMEA

Chapter 2 : Six Sigma Terms

- DPMO
- Variation
- Process Capability
- Defect
- Unit
- Yield

Chapter 3 : Define Phase

- Project Charter
- Current State Mapping
- Kano Model
- Stakeholder Analysis
- Voice Of The Customer
- Project Management Basics
- Management and Planning Tools
- Business Results for Projects
- Team Dynamics and Performance

Chapter 4 : Measure Phase

- Data Collection Plan
- Prioritization matrix
- Sampling
- Failure Mode & Effect Analysis
- Process Capability & Process Sigma
- Process Analysis and Documentation
- Probability and Statistics
- Statistical Distributions
- Collecting and Summarizing Data
- Measurement System Analysis (MSA)

Chapter 5 : Analyze Phase

- Brainstorming
- Cause and Effect diagrams
- Control Charts & Frequency Plot
- Process Capability Analysis
- Pareto Charts
- Hypothesis Tests
- Regression Analysis
- Exploratory Data Analysis
- Hypothesis Testing

Course Outline



Chapter 5 : Analyze Phase

- Brainstorming
- Cause and Effect diagrams
- Control Charts & Frequency Plot
- Process Capability Analysis
- Pareto Charts
- Hypothesis Tests
- Regression Analysis

Chapter 6 : Improve Phase

1. Identifying Possible Solutions
 - Brainstorming
2. Selecting Solutions to implement
 - Weighted Criteria Matrix
3. Implementing Improvements
 - Gantt chart
4. Evaluating The Improvements
 - Design of experiments
 - Mistake Proofing

Course Outline

Chapter 7 : Control Phase

- Control Charts
- Assessing the Final process Capability
- Quality Control
- Control Plan
- Standardization
- Statistical Process Control (SPC)
- Control Plan
- Lean Tools for Process Control

Chapter 8 : Six Sigma Deployment

- C&E Matrix
- Waste Identification Methods to Reduce Waste
- Introduction to Statistics and Graphical Analysis
- Graphical Analysis with Minitab
- Statistical Process Control (SPC)
- MSA Exercise

Course Outline



Chapter 9 : Multi-Vari Studies

- T-Test / ANOVA
- Project Presentations
- Correlation & Regression
- Chi-Square
- Multi-Vari Case Study
- Intro to DOE
- Mistake Proofing
- Documentation

Some of Our Valued Clients





support@meritphase.com



www.meritphase.com