



Lean Six Sigma for Production Operations “Define”

3 Days

Audience and Purpose:

This course is designed for those individuals working directly on Six Sigma projects and serving as Black Belts or Green Belts. It is assumed they come from a variety of backgrounds and disciplines and will be working on a variety of projects across the company. Tools and examples are in direct support of manufacturing and production operations.

Course Objectives:

Upon completion of the course, the participants will be able to:

1. State the Company Six-Sigma strategy and supporting infrastructure
2. Clearly identify and define an improvement project, problem statement, objectives and goals
3. Generate a financial analysis and stakeholder analysis for the project
4. Use the SIPOC method to map out a high-level process flow including customer and supplier relationships
5. Map the process to understand the IS and SHOULD BE condition
6. Provide project leadership to Lean Six Sigma improvement projects

Course Outline:

Section I	Introduction to Six Sigma What is Lean Six Sigma? DMAIC Roadmap Roles and responsibilities for Lean Six Sigma
Section II	Identify Project, Champion, and Project Owner Select the project Identify project Champion and Project Leader Prioritize opportunities/estimate benefits
Section III	Define Problem, Objective, Goals and Benefits Define problem, objectives, and scope Determine goals Financial analysis and summary of benefits
Section IV	Determine Customer Requirements and CTQs Determine Voice of the Customer (VOC) Convert VOC into Critical to Quality (CTQ) Parameters Define Specifications for all CTQs



Section V	Define Resource/Stakeholder Analysis Resource analysis Team formation Stakeholder analysis
Section VI	Develop Project Plan Determine detailed tasks and timelines, construct plan Communicate project plan
Section VII	Project Leadership Qualities of an effective leader Leadership self assessment Effective meetings
Section VIII	Introduction to JMP Preferences Table organization and data types Column commands Row commands Table commands Saving graphs and files
Section IX	Map the Process Process Mapping Introduction SIPOC Detailed and Cross-functional Process Maps