

Principles of Lean Manufacturing – Lean 101

SCMEP instructors are certified trainers for the Lean Manufacturing workshop series sponsored by the National Institute of Standards & Technology Manufacturing Extension Partnership (NIST-MEP). Workshop participants gain hands-on experience that validates lean manufacturing principles. The workshop is available on-site in manufacturing plants as a contract class on an as-needed basis and as an open enrollment.

Principles of Lean Manufacturing: A Live Simulation (1 Day Workshop)

This one-day course is a mix of classroom and live manufacturing simulation that illustrates the power of implementing Lean Manufacturing techniques. Participants begin by manufacturing a product in a traditional manufacturing setting. The results of the first round of simulation provide the basis for continuous improvement, as the participants learn about the different lean techniques and apply them in subsequent rounds of the simulation. Previous participants have been able to immediately apply the principles that were learned in this course and began seeing financial impact.

Workshop topics covered:

- History of Manufacturing
- Definition of Lean Manufacturing
- Definition of Value Added and Non-Value Added activity
- 8 wastes – causes and identification
- House of Lean – Lean Tools
 - Value Stream Mapping
 - Plant Layout
 - 5S
 - Visual Management
 - Standard Work
 - Batch Reduction
 - Teams
 - POUS (Point of Use Storage)
 - Quality at the Source
 - Quick Changeover (SMED)
 - Pull/Kanban
 - Cellular/Flow
 - TPM (Total Productive Maintenance)
- Lean Implementation