Lean Six Sigma Green Belt Certification
Tool Development for Internal Champions

Six Sigma is an enterprise-wide, data-driven methodology used to improve products or processes. This course brings together service and manufacturing industries who want to improve their processes and drive efficiencies in their companies.

Participants will earn both a Yellow Belt and a Green Belt during the program, which includes engaging in an industry case study. The class will analyze the company’s approach to Lean Six Sigma across a broad spectrum of functions, including customer service and logistics. Students also will learn the latest Lean Six Sigma tools, including visual management, Eight Wastes, 5S methodology, mistake proofing, and SMED. Participants will have the option to sit for their Lean Six Sigma Green Belt certification exam.

This session will combine lectures, discussions, cases, exercises, and other activities. Participants will be encouraged to contribute to the sessions with their anecdotes and experiences.

The course structure will explore subjects such as …

Yellow Belt (2-days)

**Phase I**
- Six Sigma Introduction
- The DMAIC Roadmap
- Capturing the Voice of the Customer
- The Project Charter
- Managing the Project
- Stakeholder Analysis
- Six Sigma Teams
- Selecting Projects

Green Belt (3-days)

**Phase II**
- More Graphical Analysis
- Lean
- Making Sense of Data; Introduction to Statistics
- Measures of Central Tendency
- Measures of Dispersion
- Hypothesis Testing

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Expected Outcomes

Participants will learn how to…

- Apply the Six Sigma methodology, DMAIC (Define-Measure-Analyze-Improve-Control)
- Analyze data to identify root causes
- Implement a solution and control plan to ensure that the improved process is carried out consistently

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Instructor Profile

Dr. Mary McShane-Vaughn is Principal at University Training Partners (UTP), a strategic partner to the University of Georgia, Terry College of Business Executive Programs. UTP develops and delivers Six Sigma training for corporations and universities. She holds a Ph.D. in Industrial Engineering and an MS in Statistics from the Georgia Institute of Technology, and a BS in Industrial Engineering from General Motors Institute (now Kettering University) in Flint, Michigan. Dr. McShane-Vaughn is the former Six Sigma Black Belt Exam Chair for the American Society for Quality, and is a member of the Georgia Oglethorpe Board of Examiners, Georgia’s equivalent of the National Malcolm Baldrige Award.