

# Certified Six Sigma Green Belt Refresher Course Syllabus QCTC 1005

**Instructor:** Bill Sampson, CSSBB

**Phone:** 683-8879

**Course Time:** 6:00 PM - 9:00 PM

**Place:** ACC Highland Business Center, 5930 Middle Fiskville Road, Austin

**Room:** TBD

**Length of Course:** 48 Hours

**Class Days:** Monday and Wednesday evenings

## **Course Description:**

This course is a refresher study of the Body of Knowledge for the Certified Six Sigma Green Belt. Topics include business process, quality management techniques, project management, DMAIC methodology, statistical applications and methods, design of experiments, lean enterprise, and design for six sigma. The student will focus on the methodology and application of these Green Belt skills by studying the assigned materials and taking sample exams containing questions similar to those on the actual CSSGB exam. These sample exams and their answers will be reviewed in class and for homework to increase the student's ability to understand and correctly answer exam questions.

**Course Objective:** This course prepares students for the American Society for Quality (ASQ) "Six Sigma Green Belt" certification. Passing a separate examination, given twice per year by ASQ, will grant certification. Since the course is intended to be a refresher course, students are expected to have some familiarity with most elements of the body of knowledge through work and/or educational experience.

## **Rationale:**

The CSSGB refresher course is offered to equip the quality professional to successfully pass the ASQ CSSGB exam. By obtaining the certification, the quality professional will improve quality in the Austin area.

## **Evaluation:**

The evaluation criteria a passing grade on the CSSGB exam practice exams.

## **Texts:**

*Certified Six Sigma Green Belt Primer with Solution Text* from Quality Council of Indiana (812-533-4215) [http://www.qualitycouncil.com/cssgb\\_p.asp](http://www.qualitycouncil.com/cssgb_p.asp)

*Quality Engineering Statistics* by Robert A. Dovich (ASQ 800-248-1946)  
<http://qualitypress.asq.org/>

*Lexicon of Quality Terms for CQE, CQT, CMI* by Brenden Duffy (409-722-6241)

*Implementing Six Sigma* by Forrest Breyfogle, Smarter Solutions (512-918-0280)

# Prerequisites for CSSGB Refresher Class

- Be sure you are qualified to take the exam. You can determine this by going to the ASQ website <http://www.asq.org/certification/six-sigma-green-belt/>. This will also be covered the first day of class and is contained in the Certified Six Sigma Green Belt brochure from ASQ. ASQ will provide a copy free of charge by calling their toll free number 800-248-1946 or you can download it from the website.
- Obtain written course materials: *CSSGB Primer, Quality Engineering Statistics* from sources listed above.
- Other books, *Lexicon of Quality Terms, Implementing Six Sigma*, are **optional**, but highly recommended.
- Fill out the exam application and enclose payment to sit for the exam. See the exam application, contained in the CSSGB brochure, or obtainable at ASQ's web site (<http://www.asq.org/standcert/cert.html>) for costs. **The deadline for applying for the Dec. 2 exam is October 6, 2006.**

## Class Recommendations

- Attend class: Since this is a Continuing Education course, there is a requirement for you to meet the contact hours (48) for the class. Role will be taken at each class and must be submitted to ACC. If you must be absent, please notify the instructor so that you will receive all materials and have all questions answered.
- Develop and use good study habits. It is recommended that you spend at least the same amount of time studying and reading outside class as in class.
- Take practice exams at home. Go through all questions in the blue pages of the primer and try to select the right answer. It is OK to use the other pages for reference, as in the real exam, but time yourself. You have to answer an average of one question every 1.5 minutes.
- Read material before the class in which they are covered. The course schedule shows what parts of the Primer are to be covered in class.
- Ask questions. Your instructors welcome questions in class. Save questions you might have during study time, if possible, so that the entire class can learn.
- Keep in mind, that some of the questions are phrased in a way that might lead you to a wrong answer, so read the question carefully before answering. We will discuss this further in class.

Fall 2006 CSSGB Refresher Course Plan									
Session No.	Day	Instructor	Date	Topic	Primer Section		Total Pages by Section	Total Pages by Class	Overhead Pages
					Section	Pages			
1	Mon	B. Sampson	2-Oct	Introduction, Six Sigma Goals	I, II				48
2	Wed	B. Sampson	4-Oct	Lean & DFSS	III				53
3	Mon	B. Sampson	9-Oct	Define - Teams & Customers	IV				72
4	Wed	B. Sampson	11-Oct	Define - Projects, Tools & Results	V				71
5	Mon	B. Sampson	16-Oct	Measure - Data & Process Analysis	VII				41
6	Wed	B. Sampson	18-Oct	Measure - Probability	VIII				26
7	Mon	B. Sampson	23-Oct	Measure - Capability & Measurement	VIII				30
8	Wed	B. Sampson	25-Oct	Analyze - Correlation and Regression	IX				62
9	Mon	B. Sampson	30-Oct	Analyze - Hypothesis Testing	IX				-
10	Wed	B. Sampson	1-Nov	Analyze - Hypothesis Testing	IX				-
11	Mon	B. Sampson	6-Nov	Improvement Techniques - DOE	X				40
12	Wed	B. Sampson	8-Nov	Improvement Techniques - DOE	X				-
13	Mon	B. Sampson	13-Nov	Improvement - Response Surfaces	X				-
14	Wed	B. Sampson	15-Nov	Control Concepts - SPC	XI				42
Thanksgiving Week			20-Nov	Thanksgiving week - no class					
15	Mon	B. Sampson	27-Nov	Control Concepts - SPC	XI				-
16	Wed	B. Sampson	29-Nov	Course Review, Exam Prep					
	Sat		2-Dec	Exam					