(January 8, 2012)

OM 337: Total Quality Management

SPRING 2012 TTH 12:30–1:45 PM UTC 1.146 Unique # 03900

Instructor: Rayan Bagchi
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Office Hours: T 2-3 PM; TH 9:30-10:30 AM and by appointment;
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COURSE TOPICS:

This course focuses on the essence, principles, and practices of total quality management (TQM). Some of the ideas and topics that are covered are: process improvement; service quality; customer satisfaction; process control and capability; role of inspection; economics of quality; report cards; and organizational learning.

COURSE PREREQUISITE:

For business majors, Operations Management 335 (or Management 335 or Management Science 335) or Operations Management 335H (or Management 335H or Management Science 335H) with a grade of at least C*;* for others, admission to an appropriate major sequence in engineering.

COURSE LEARNING OBJECTIVES:

By the end of this course, you should have:

gained an improved understanding of

- what quality is as viewed from a variety of perspectives;
- the foundational elements of total quality management;
- the organizational, competitive and economic potential of quality.

and acquired the skills to

- analyze a process to uncover improvement opportunities;
- determine if a process is in control and its capability;
- articulate a business case for investment in quality.

LEARNING MATERIALS:

The Memory Jogger II by Brassard and Ritter

A **readings packet** containing all the readings and cases is available from the University Co-op Custom Publishing. A **class companion packet** containing some materials we shall use in class is available from the GSB Copy Center (GSB 3.136). Please remember to bring the class companion packet to class starting with Session 2.

PERFORMANCE EVALUATION:

Class Participation	25%
Case Reports (5)	10%
Group Presentation (*March 1, 6, 8*)	12.5%
Group Presentation (*April 19, April 24, April 26*)	12.5%
Exam 1 (*February 23, 7:00-9:30 PM*) – covers Sessions 1-11	20%
Exam 2 (*April 12, 7:00-9:30 PM*) – covers Sessions 1-22	20%
Total	100%

Case Reports: At the beginning of every class session in which a case report is due, you will turn in a typed report, not to exceed 1 double-spaced page, which addresses the case discussion questions listed for that session in the detailed schedule. The report should not have any attachments. **No late report will be accepted.** These reports will not be returned to you, so please keep a copy for yourself. In preparing the case reports, you are free to work with others in this class, and should you choose, you may submit a group report. But whatever bears your name must have your substantive input.

Class Participation: This, the single most important component of your course grade, is essentially a measure of how actively you are engaged in class proceedings, and what you contribute to the learning of others. Class attendance is an essential component of class participation.

Group Presentations:
Your group will make two oral presentations to the class, of approximately 15 minutes duration each, on topics assigned to you. The presentations are scheduled for March 1, March 6, March 8, April 19, April 24, and April 26. Please form your own group (4-5 members) as soon as possible.

DETAILED SCHEDULE:

NO CLASS or OFFICE HOUR on Tuesday, January 17

SESSION 1 (TH, 1/19) **INTRODUCTION**
Readings: "Made in U.S.A.: A Renaissance in Quality"

SESSION 2 (T, 1/24) **WHAT IS QUALITY?**
Readings: Memory Jogger- Radar Chart

SESSION 3 (TH, 1/26) **WHAT IS TQM?**
Case: Paul Chesler, Director, Quality Assurance
Case Questions:
1. What are the causes of the quality problem on the Greasex line?
2. What should Paul Chesler do about the quality problem?

SESSION 4 (T, 1/31) **PROCESS FOCUS**
Readings: Memory Jogger- Team Guidelines
Case: Massachusetts General Hospital: CABG Surgery (A)
Case Questions:
1. What are the reasons for using CABG as the starting point for care path creation at MGH?
2. For each key stakeholder (surgeons, nurses, administrative staff, patients) of MGH, identify why there may be resistance to the care path. For each key concern, what should be the response of MGH?
Assignment: *Case Report*

SESSION 5 (TH, 2/2) **PROCESS FOCUS**
Readings: Memory Jogger- Team Guidelines
Case: Massachusetts General Hospital: CABG Surgery (A)
Case Questions:
3. What are the reasons for long lengths of stay (LOS) of CABG patients at MGH?
4. Why did LOS decline during 1993-1994?
5. If CABG care path is a success at MGH, what are some of the longer-term improvement opportunities that would leverage the CABG success?

SESSION 6 (T, 2/7) **SERVICE QUALITY**
Readings: "Improving Service Quality in America: Lessons Learned"
Case: Singapore Airlines (A)
Case Questions:
1. What are the two or three key elements of SIA's competitive strategy?
2. SIA management states that cabin crews are a vital component of its service strategy. Evaluate the elements of SIA's cabin-crew-management program (e.g., training program, performance measurement, feedback, and communication procedures).
Assignment: *Case Report*

SESSION 7 (TH, 2/9) **SERVICE QUALITY**
Readings: "Improving Service Quality in America: Lessons Learned"
Case: Singapore Airlines (A)
Case Questions:
2. How does SIA assess service quality?
3. How sustainable is SIA's strategy?

SESSION 8 (T, 2/14) **GAP MODEL OF CUSTOMER SATISFACTION**
Readings: "The Power of Unconditional Service Guarantees"

SESSION 09 (TH, 2/16) **ECONOMICS OF QUALITY**
Readings: "Zero Defections: Quality Comes to Services"

SESSION 10 (T, 2/21) **ECONOMICS OF QUALITY**
Readings: "Zero Defections: Quality Comes to Services"

SESSION 11 (TH, 2/23) **REVIEW FOR EXAM 1**

Exam 1 on Thursday, February 23, 7:00-9:30 PM

NO CLASS or OFFICE HOUR on Tuesday, February 28

SESSION 12 (TH, 3/01) **GROUP PRESENTATIONS**

SESSION 13 (T, 3/06) **GROUP PRESENTATIONS**

SESSION 14 (TH, 3/08) **GROUP PRESENTATIONS**

SESSION 15 (T, 3/20) **PROCESS CONTROL & CAPABILITY**
Readings: "Understanding Variation"
"Six-sigma Quality Programs"
Memory Jogger- Control Charts, Data Points, Process Capability

SESSION 16 (TH, 3/22) **OPTIMAL INSPECTION POLICIES**

SESSION 17 (T, 3/27) **OPTIMAL INSPECTION POLICIES**

SESSION 18 (TH, 3/29) **MEASUREMENT, FEEDBACK, MOTIVATION**

SESSION 19 (T, 4/03) **ORGANIZATIONAL LEARNING**
Readings: "Building a Learning Organization"
Case: Analog Devices: The Half-Life System
Case Questions:
1. How is Schneiderman's half-life effect different from the well-known experience/learning curve effect?
2. What is the role of the half-life method at Analog?
Assignment: *Case Report*

SESSION 20 (TH, 4/05) **HEALTH AND SAFETY**
Case: Workplace Safety at Alcoa (A)
Case Questions:
1. What has been and needs to be the half-life of Mission Valley's safety improvement?
2. As Paul O'Neil, how do you describe what has and has not worked at Mission Valley?
Assignment: *Case Report*

SESSION 21 (T, 4/10) **HEALTH AND SAFETY**
Case: Workplace Safety at Alcoa (A)
Case Questions:
2. As Paul O'Neil, how do you describe what has and has not worked at Mission Valley?
3. What is your evaluation of Linda Merton's plan for 1992?

SESSION 22 (TH, 4/12) **REVIEW FOR EXAM 2**

Exam 2 on Thursday, April 12, 7:00-9:30 PM

NO CLASS or OFFICE HOUR on Tuesday, April 17

SESSION 23 (TH, 4/19) **GROUP PRESENTATIONS**

SESSION 24 (T, 4/24) **GROUP PRESENTATIONS**

SESSION 25 (TH, 4/26) **GROUP PRESENTATIONS**

SESSION 26 (T, 5/01) **QUALITY AND FOCUS**
Case: Shouldice Hospital
Case Questions:
1. What evidence is there that Shouldice is better (not cheaper or faster)?
2. What is Shouldice's service concept?
3. What explains Shouldice's superior quality?

NO CLASS on Thursday, May 3

McCombs Classroom Professionalism Policy

- **Students arrive on time.** On time arrival ensures that classes are able to start and finish at the scheduled time. On time arrival shows respect for both fellow students and faculty and it enhances learning by reducing avoidable distractions.
- **Students display their name cards.** This permits fellow students and faculty to learn names, enhancing opportunities for community building and evaluation of in-class contributions.
- **Students minimize unscheduled personal breaks.** The learning environment improves when disruptions are limited.

- **Students are prepared for each class.** Much of the learning takes place during classroom discussions. When students are not prepared they cannot contribute to the overall learning process. This affects not only the individual, but their peers who count on them, as well.
- **Students do not speak unless they are speaking to the entire class.** Do not engage in private conversations, however short or innocuous, while the class is in progress. They are disruptive and discourteous to the speaker. Raise your hand if you have a question or comment.
- **Laptops are closed and put away and phones and wireless devices are turned off.**

Academic Dishonesty

The McCombs School of Business has no tolerance for acts of scholastic dishonesty. The responsibilities of both students and faculty with regard to scholastic dishonesty are described in detail in the Policy Statement on Scholastic Dishonesty for the McCombs School of Business:

By teaching this course, I have agreed to observe all of the faculty responsibilities described in that document. By enrolling in this class, you have agreed to observe all of the student responsibilities described in that document. If the application of that Policy Statement to this class and its assignments is unclear in any way, it is your responsibility to ask me for clarification. Policy on Scholastic Dishonesty: Students who violate University rules on scholastic dishonesty are subject to disciplinary penalties, including the possibility of failure in the course and/or dismissal from the University. Since dishonesty harms the individual, all students, and the integrity of the University, policies on scholastic dishonesty will be strictly enforced. You should refer to the Student Judicial Services website at http://deanofstudents.utexas.edu/sjs/ or the General Information Catalog to access the official University policies and procedures on scholastic dishonesty as well as further elaboration on what constitutes scholastic dishonesty.

Honor Code

The core values of the University of Texas at Austin are learning, discovery, freedom, leadership, individual opportunity, and responsibility. Each member of the University is expected to uphold these values through integrity, honesty, trust, fairness, and respect toward peers and community.
(Link to University Honor Code: http://registrar.utexas.edu/catalogs/gi09-10/ch01/index.html).

Class Web Sites and student Privacy

Password-protected class sites will be available for all accredited courses taught at The University. Syllabi, handouts, assignments and other resources are types of information that may be available within these sites. Site activities could include exchanging e-mail, engaging in class discussions and chats, and exchanging files. In addition, class e-mail rosters will be a component of the sites. Students who do not want their names included in these electronic class rosters must restrict their directory information in the Office of the Registrar, Main Building, Room 1. For information on FERPA related issues see http://registrar.utexas.edu/students/records/ferpa/.

Students with Disabilities

Students with disabilities may request appropriate academic accommodations from the Division of Diversity and Community Engagement, Services for Students with Disabilities, 471-6259, http://www.utexas.edu/diversity/ddce/ssd/.

Religious Holidays

By UT Austin policy, you must notify me of your pending absence at least fourteen days prior to the date of observance of a religious holy day. If you must miss a class, an examination, a work assignment, or a project in order to observe a religious holy day, you will be given an opportunity to complete the missed work within a reasonable time after the absence.

OM 337 TOTAL QUALITY MANAGEMENT (#03900) Spring 2012 Bagchi Course Outline

Session	Day	Date	Topic	Case	Assignment Due
	T	1/17	***NO CLASS (No Office Hours)***		
01	TH	1/19	Introduction		
02	T	1/24	What is Quality?		
03	TH	1/26	What is TQM?	Paul Chesler	
04	T	1/31	Process Focus	Mass Gen Hosp	Case Report
05	TH	2/02	Process Focus	Mass Gen Hosp	
06	T	2/07	Service Quality	Sing Airlines (A)	Case Report
07	TH	2/09	Service Quality	Sing Airlines (A)	
08	T	2/14	Gap Model of Customer Satisfaction		
09	TH	2/16	Economics of Quality		
10	T	2/21	Economics of Quality		
11	TH	2/23	Review for EXAM 1		
EXAM 1			**Thursday, February 23, 7:00-9:30 p.m.**		
	T	2/28	***NO CLASS (No Office Hours)***		
12	TH	3/01	Group Presentations		
13	T	3/06	Group Presentations		
14	TH	3/08	Group Presentations		
15	T	3/20	Process Control & Capability		
16	TH	3/22	Optimal Inspection Policies		
17	T	3/27	Optimal Inspection Policies		
18	TH	3/29	Measurement, Feedback, Motivation		
19	T	4/03	Organizational Learning	Analog Devices	Case Report
20	TH	4/05	Health and Safety	Alcoa (A)	Case Report
21	T	4/10	Health and Safety	Alcoa (A)	
22	TH	4/12	Review for EXAM 2		
EXAM 2			**Thursday, April 12, 7:00-9:30 p.m.**		
	T	4/17	***NO CLASS (No Office Hours)***		
23	TH	4/19	Group Presentations		
24	T	4/24	Group Presentations		
25	TH	4/26	Group Presentations		
26	T	5/01	Quality and Focus	Shouldice	Case Report
	TH	5/03	***NO CLASS***		

****PLEASE Note: No class on January 17, February 28, April 17, and May 3.****

****PLEASE Note: Evening exams on February 23 and April 12.****