

EC235- Quantitative Techniques & Research Methods, Fall 2009 Amjad Rabi

arabi@wlu.ca

Text: Statistics for Management and Economics, eighth edition, Keller, Duxbury Press, 2008. Additional resources can be found on the WEBCT site. **Please bring your text book to every class.**

Additional materials on how to use STATA will be posted on WebCT.

Office Hours: Thursday 2-4 pm. Office: P2045

Grading:

Midterm Exam (35%) Two Assignments (7.5% each) Two Formula Sheets (2.5% each) Final Exam (40%) Practical test (5%)

Syllabus: Anticipated coverage of the text, subject to change, is as follows:

Covered on Exam I: Chapter 1, 2, 3, 4 (4.1-4.4, 4.7-4.8), 5, 6, 7, and 8

Covered on Final Exam: Chapter 9, 10, 11 (11.1-11.2), 12 (12.1-12.3), and 14 (14.1)

Goals: The goal for this course is to learn, understand and be able to work with descriptive statistics and probability and how and why statistical techniques are applied. This does not only mean that you should be able to work through a bunch of problems similar to ones seen in the homework. But that you should have the ability to articulate the ideas presented in the course in a clear and coherent manner as well. You should also be able to apply a number of different statistical procedures and understand how to use and interpret STATA and Microsoft Excel statistical output in ways as it pertains to business and economics.

Expectations: You are expected to do most of your learning outside of the classroom. Statistics, like most subjects, is learned by doing it. There will not be time in class for you to do a lot of statistics yourself. If you must miss a class, you are expected to find out what happened. You are responsible for everything that goes on in class.

Homework: As the name suggests, this is work to be done outside of class. A few of the homework problems may be worked in class either as examples or quizzes. You are encouraged to work with other students on the homework.

Exercises covered in the Midterm Exam

| Chapter 2 | 2.97, 2.99, 2.100, 2.107, 2.109, 2.113 |
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| Chapter 3 | |
| Chapter 4 | 4.83, 4.85, 4.91, 4.93, 4.94 |
| Chapter 5 | |
| Chapter 6 | 6.87, 6.88, 6.89, 6.95, 6.99, 6.102, 6.103, 6.77, 6.81, 6.82, 6.94, |
| | 6.98, 6.100 |
| Chapter 7 | 7.1, 7.2, 7.5, 7.7, 7.12, 7.20, 7.21, 7.55, 7.70, 7.71, 7.93, 7.97, |
| | 7.106, 7.114, 7.116, 7.119 |
| Chapter 8 | 8.7, 8.8, 8.9, 8.10, 8.54, 8.57, 8.58, 8.79, 8.80, 8.82, 8.83, 8.85, |
| | 8.87, 8.90, 8.91, 8.93, 8.95, 8.98, 8.99 |

Exercises covered in the final exam

| Chapter 9 | 9.1, 9.2, 9.5, 9.10, 9.15, 9.16, 9.24, 9.25, 9.38, 9.39, 9.43, 9.44, |
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| | 9.52, 9.53 |
| Chapter 10 | 10.9, 10.10, 10.11, 10.31, 10.32, 10.34, 10.37, 10.51, 10.52, 10.54 |
| Chapter 11 | 11.30, 11.31, 11.32, 11.38, 11.40, 11.42, 11.44, |
| Chapter 12 | 12.24, 12.53, 12.67, 12.106, 12.117, 12.119, 12.122, 12.123 |
| Chapter 14 | 14.9, 14.12 |

Graded Work: the <u>midterm</u> exam is tentatively scheduled for <u>Thursday October 29th</u>, <u>2009</u>. The <u>final</u> exam will be between December 10th and 22nd, 2009, the exact date will be determined by the registrar. There will be two <u>assignments</u> and will be announced in class 10 days before the due date. These assignments require you to use STATA. An introduction on how to use STATA will be presented in class. In addition, more resources on getting started with STATA will be posted on WebCT.

The <u>Practical test</u> is to be completed in groups of 5-6 and will be taken in class on <u>September 29th</u>, 2009 (and if needed, October 1^s as well). A sheet that contains time slots will be circulated in the first class to choose your group members. The objective of this exam is to test your ability to use Microsoft Excel to solve an assigned problem. I will select only **one** member of the group at random and ask her/him to do the exercise (that means ever member has an equal probability of being selected and thus you need to make sure that all members are equally prepared). Each group should not take more than 5 minutes.

Lastly, you are required to develop a <u>formula sheet</u> so that you can use it during the exam. The formula sheet must be turned in at the end of the exam (if you want credit). The allowed paper size is 8.8X11in and you can write (or type) in both sides.

There will be **no make-ups** for missed work.

Calculator Policy: All are permitted, no restrictions. Manual calculations will be used to determine descriptive statistics (Chapter 4) and probability (Chapters 6, 7, 8, 9, and parts of 10, 11). **please bring your calculator in every class and during the exams.**

Software: This course uses both Microsoft Excel and STATA. An introduction on how to use STATA will be presented in class. In addition, more resources on getting started with STATA will be posted on WebCT.

Students with disabilities or special needs are advised to contact Laurier's Accessible Learning Centre for information regarding its services and resources. Students are encouraged to review the Calendar for information regarding all services available on campus.