

**Course**        **ECO227Y Quantitative Methods in Economics**

**Lecturer**     Victor Yu

- **Office**        GE344, Max Gluskin House, 150 St. George Street
- **E-mail**       [victor.yu@utoronto.ca](mailto:victor.yu@utoronto.ca) (This is the best way to contact Dr. Yu. *Always indicate that you are a student in ECO227 in your email.* Otherwise you will get my reply with only sentence: “what course are you in?”. If possible, include your telephone number(s) in your e-mail and indicate a convenient time to call. *Do not send attachment*)
- **Office Hours**    Wednesday    12:00–1:30pm in GE344  
                          Thursday\*     1:30–3:30pm in GE344

\*Due to unforeseen circumstances, the office hours on Thursdays may change on some days. If there is a change, an announcement will be posted in Blackboard on or before Thursday. It is not necessary, but it is recommended that you email Dr. Yu before you come to the office hour.

**Webpage**      Blackboard

**Textbook**      An Introduction to Mathematical Statistics and its Applications, 5<sup>th</sup> edition or 4<sup>th</sup> edition. R.J. Larsen and M.L. Marx, Prentice Hall 2012.

<b>Marking Scheme</b>	<b>Weight</b>	<b>Time and Date</b>	<b>Location</b>
Test 1	13%	2–4 pm Wed 2012–10–17	EX310
Test 2	17%	2–4 pm Wed 2012–11–28	EX310
Test 3	17%	2–4 pm Wed 2013–02–06	EX310
Test 4	17%	2–4 pm Wed 2013–03–20	EX310
<u>Final exam</u>	<u>36%</u>	<u>Exam Period, 2013 April 10–30</u>	

**Aids for tests and final exam**

- Test: One aid sheet (2 pages, 8.5”x11” paper) and any calculator.
- Final Exam: Two aid sheets (4 pages, 8.5”x11” paper) and any calculator.

**Course Outline**

	<u>Wednesday</u>
Chapter 1. Introduction	2012–09–12
Chapter 2. Probability	2012–09–19 2012–09–26
Chapter 3. Random Variables	2012–10–03 2012–10–10 (no lecture, tutorial by a TA) 2012–10–17 (Test 1, 2–4 pm in EX310) 2012–10–24
Chapter 4. Special Distributions	2012–10–31
Chapter 5. Estimation	2012–11–07

	2012-11-14
	2012-11-21
	2012-11-28 (Test 2, 2-4 pm in EX310)
Chapter 6. Hypotheses Testing	2013-01-09
	2013-01-16
Chapter 7. Normal Distribution	2013-01-23
	2013-01-30
	2013-02-06 (Test 3, 2-4 pm in EX310)
Chapter 9. Two Sample Problems	2013-02-13
(only if time permits)	2013-02-20 (study break, no class)
	2013-02-27
Chapter 11. Regression	2013-03-06
	2013-03-13
	2013-03-20 (Test 4, 2-4 pm in EX310)
	2013-03-27
	2013-04-03

**Recommended exercises from the Textbook (5<sup>th</sup> or 4<sup>th</sup> edition). You should do at least 5 exercises from section. For example, do five (or more) exercises from section 2.2, 2.3 and so on. The more exercises you practice, the more you will understand the material.**

Chapter 2 Probability

2.2.3, 2.2.9, 2.2.11, 2.2.17, 2.2.19, 2.2.21, 2.2.23, 2.2.25, 2.2.27, 2.2.29, 2.2.33  
 2.3.1, 2.3.3, 2.3.5, 2.3.7, 2.3.9, 2.3.11, 2.3.13  
 2.4.1, 2.4.3, 2.4.7, 2.4.9, 2.4.11, 2.4.13, 2.4.15, 2.4.17, 2.4.25, 2.4.27, 2.4.29  
 2.4.41, 2.4.43, 2.4.45, 2.4.47, 2.4.49  
 2.5.1, 2.5.3, 2.5.5, 2.5.7, 2.5.15, 2.5.17, 2.5.19, 2.5.23,  
 2.7.1, 2.7.3, 2.7.5, 2.7.7

Chapter 3 Random Variables

3.2.1, 3.2.5, 3.2.7, 3.2.9, 3.2.11, 3.2.21, 3.2.23, 3.2.25  
 3.3.1, 3.3.3, 3.3.5, 3.3.7, 3.3.11, 3.3.15  
 3.4.1, 3.4.3, 3.4.5, 3.4.7, 3.4.9, 3.4.11, 3.4.13  
 3.5.1, 3.5.3, 3.5.5, 3.5.7, 3.5.9, 3.5.11, 3.5.15, 3.5.19, 3.5.21, 3.5.23  
 3.5.27, 3.5.29, 3.5.31, 3.5.33  
 3.6.1, 3.6.3, 3.6.5, 3.6.7, 3.6.9, 3.6.11, 3.6.15, 3.6.21, 3.6.23  
 3.7.1, 3.7.3, 3.7.5, 3.7.7, 3.7.9, 3.7.11, 3.7.13, 3.7.15, 3.7.17, 3.7.19, 3.7.21, 3.7.23,  
 3.7.31, 3.7.33, 3.7.35, 3.7.37, 3.7.39, 3.7.43, 3.7.45, 3.7.51  
 3.8.1, 3.8.3, 3.8.5, 3.8.7, 3.8.9  
 3.9.1, 3.9.3, 3.9.5, 3.9.7, 3.9.13, 3.9.15, 3.9.17,  
 3.11.1, 3.11.3, 3.11.5, 3.11.7, 3.11.9, 3.11.11, 3.11.13, 3.11.15, 3.11.17  
 3.12.1, 3.12.3, 3.12.5, 3.12.7, 3.12.9, 3.12.11, 3.12.13, 3.12.15  
 3.12.17, 3.12.19, 3.12.21, 3.12.23

Chapter 4 Special Distributions

4.2.1, 4.2.3, 4.2.5, 4.2.17, 4.2.19, 4.2.21, 4.2.23  
 4.3.1, 4.3.3, 4.3.5, 4.3.7, 4.3.9, 4.3.11, 4.3.13, 4.3.15, 4.3.17, 4.3.19  
 4.3.21, 4.3.23, 4.3.25, 4.3.27, 4.3.29, 4.3.33, 4.3.35

Chapter 5 Estimation

5.2.1, 5.2.3, 5.2.5, 5.2.7, 5.2.11  
5.3.3, 5.3.5, 5.3.9, 5.3.13, 5.3.17, 5.3.23, 5.3.25  
5.4.1, 5.4.7, 5.4.9, 5.4.11, 5.4.17  
5.5.1, 5.5.3  
Chapter 6 Hypothesis Testing  
6.2.1, 6.2.3, 6.2.5, 6.2.7, 6.2.9, 6.2.11  
6.3.1, 6.3.3, 6.3.5, 6.3.7, 6.3.9  
6.4.1, 6.4.3, 6.4.5, 6.4.7, 6.4.9, 6.4.15, 6.4.17, 6.4.19, 6.4.21  
Chapter 7 The Normal Distribution  
7.4.1, 7.4.3, 7.4.5, 7.4.7, 7.4.11, 7.4.13, 7.4.15  
7.4.17, 7.4.19, 7.4.21  
7.5.1, 7.5.3  
Chapter 9 Two Sample Problems  
9.2.3, 9.2.5, 9.2.7, 9.2.9, 9.2.11, 9.2.15  
9.3.1, 9.3.3, 9.3.5  
9.4.1, 9.4.3, 9.4.5, 9.4.7  
9.5.1, 9.5.3, 9.5.7,  
Chapter 11 Regression  
11.2.1, 11.2.3, 11.2.7, 11.2.9, 11.2.11  
11.3.1, 11.3.3, 11.3.9  
11.4.15, 11.4.17

### **Missing a Test**

- If you miss a test, you must submit a **medical doctor's note** or a **letter** to Dr. Yu explaining the reason for missing the test. There is no make up test.
- If you miss only one test, the missing test mark is assumed equal to the final exam mark.
- If you miss more than one test, the 2<sup>nd</sup>, 3<sup>rd</sup> and 4<sup>th</sup> missing tests will get zero marks.
- In case there is an upward adjustment to the course marks, only students who have completed all term tests and the final exam will be adjusted. Students who miss one or more tests will not get any upward adjustment in the course marks. For example, if there is an upward adjustment of 5 marks to the final exam, only the students who have completed all term tests and the final exam will be adjusted. Students who miss one or more tests will NOT get this adjustment.