

**University of California, San Diego. Department of Economics  
Winter Quarter 2007**

## **ECON 120C: ECONOMETRICS C**

Professor Magdalena Sokalska e-mail: [msokalska@ucsd.edu](mailto:msokalska@ucsd.edu)  
Office, Economics Bld. Room # 111  
Office hours: Tue 6:40-7:40pm Course webpage at [webct.ucsd.edu](http://webct.ucsd.edu)  
Lectures: T Th 5:00p - 6:20p WLH 2001

### COURSE DESCRIPTION

Econ 120C is a sequel to Econ 120A and Econ 120B. The objective of the course is to provide you with knowledge of econometrics in theory and applications. At the end of the course, students should be able to apply fundamental econometric methods to analyze real-life economic relations.

### REQUIRED TEXTBOOK

James Stock and Mark Watson, *Introduction to Econometrics*, (Addison Wesley 2003).

### ADDITIONAL MATERIAL (for your reference only)

Dougherty, C, *Introduction to Econometrics*, Oxford University Press, 2002, Selected chapters may be useful for background reading for inquisitive students.  
Wooldridge, J., *Introductory Econometrics*, Southwestern, 2002. For more mathematically inclined students.

### REQUIRED SOFTWARE

The software for this course is STATA ([www.stata.com](http://www.stata.com)). Students can use STATA in the computer laboratory in Econ 100.

### GRADING

Midterm	30%
Homework	10%
Final	60%

Homework will not be graded; you will get credit by just handing it in. Homework may be handwritten. Each person is required to hand in a separate paper, although the results may come from group work. Short outlines of solutions will be provided at the course's website.

The midterm will take place during lecture time on Thursday February 8, 2007. There will be no makeup exam. If you miss the midterm for a medical or another university approved reason, the weight will be allocated to the remaining exams. Final exam is cumulative but much bigger emphasis will be placed on the material not covered in the midterm.

All exams will be closed book, but you are allowed to bring one hand-written formula page. Photo reducing is not permitted. The page may not be larger than 8.5in by 11in. For the midterm it has to be one-sided for the final it can be two-sided. You may bring a calculator.

There is no additional time for late students. Once a student has finished a test and left the classroom, no late student can start the test. If a student leaves the classroom during the exam, he cannot come back to finish the test. Copies are generally corrected and returned one week after the exam in class. Grades are posted on WebCT, they are not given by email.

Re-grading is exceptional. If the copy is written with a pencil, no re-grading is possible.

Procedure : Ask the TA for re-grading. If you disagree with the TA, contact the instructor with a written note explaining your request and the reason for disagreement with the TA; attach your note to exam copy. The instructor will re-grade considering the entire copy.

Deadline to re-grade of the midterm-end of week 9.

Deadline to re-grade the final exam: one month after the beginning of the following quarter.

### TEACHING ASSISTANTS AND READERS

Name	TA/Reader	E-mail	Location
Lu, Xun	TA	xunlu@ucsd.edu	Sequoia Hall 205
Tocoian, Oana	TA	otocoian@ucsd.edu	Economics 127
Chen, Pei-Szu	R	pschen@ucsd.edu	Economics 119
Nageswaran, Shalini	R	snageswaran@ucsd.edu	Sequoia Hall 226

### COURSE OUTLINE

#### *Introduction*

#### *PART I: Nonlinear and Discrete Choice Models*

(SW 6 and 9)

Polynomial and logarithmic regression model

Dummy variables

Interactions between independent variables

Linear probability model

Maximum likelihood estimation.

Probit and Logit models.

#### *PART II: Basic Time Series Analysis*

(SW 12 and 14)

Introduction to time series data: autocovariance and autocorrelation

AR(p) model: estimation and forecasting

ADL(p,q) model (time permitting)

Regression with autocorrelated errors: HAC standard errors

Stationarity

Error correction model and cointegration.

#### *PART III: IV estimation and Panel regression*

(SW 10 and 8)

Failure of the OLS estimation and the IV estimation

Panel data regression: fixed effects and time effects (time permitting)

**Final exam**

03/22/2007    Th    7:00p - 10:00p    Location: TBA