Professor Colin Stewart Max Gluskin House, Room 223, 150 St. George St. email: colinbstewart@gmail.com

## ECO2030H1S: Microeconomic Theory II (PhD), Unit I Winter 2017

CLASSES: 9:10–11:00am Mondays in WW119 and Wednesdays in BA2135

TUTORIALS: Tuesdays 11:10am–1:00pm in BA3012

**REQUIRED TEXTBOOK:** 

A Course in Game Theory, by M. Osborne and A. Rubinstein, MIT Press.

Additional References:

Game Theory, by D. Fudenberg and J. Tirole, MIT Press. Game Theory: Analysis of Conflict, by R. Myerson, Harvard University Press. Microeconomic Theory, by A. Mas-Colell, M. Whinston, and J. Green, Oxford University Press.

## GOALS:

This course is designed with several goals in mind. The first is to provide you with an understanding of the core elements of game theory that you can draw on regardless of what subfield you pursue (these ideas and theory based on them are becoming increasingly important in a wide range of subfields beyond micro theory, including, e.g., IO, macro, and health). Second, mastering the course material will ensure that those of you interested in pursuing research in micro (or macro) theory or structural estimation of games are adequately prepared. Finally, solving problems and working through the material will help to develop your facility with economic modelling in general.

## EVALUATION AND REQUIREMENTS:

Your mark for this unit will be 90% of your mark on the final exam plus 10% of your average on the problem sets. The exam will be closed book with no aids permitted and will take place in class on February 27th. The overall grade for the course will be determined by the average of the grades in units 1 and 2. Problem sets will be (approximately) weekly.

 $\underline{\text{TUTORIALS}}$ : The TA for the course is David Walker-Jones. He will conduct weekly tutorials starting on January 10th.

<u>COMMUNICATION</u>: Email should be used only for logistical questions about the course. Questions about course content should be asked in person, either at office hours or after class. If you do not receive a response to an email within two days, please resend the email.

Course content and announcements will be posted on Blackboard.

## **OUTLINE OF TOPICS:**

- 1. Strategic games with complete information: OR2–4, FT1–2
- 2. Bayesian games: OR2.6 and 5, FT6
- 3. Extensive games with perfect information: OR6, FT3
- 4. Bargaining: OR7 and 15, FT4.4
- 5. Repeated games: OR8, FT5
- 6. Extensive games with incomplete information: OR11-12, MWG9, FT8