Oleg Baranov Assistant Professor Department of Economics

Office: ECON 14A Location: (zoom)

Voice: 303.492.7869 Meeting Times: MW 8:00-9:15 Email: oleg.baranov@colorado.edu Office Hours: F 11:00 – 12:30 Website: www.obaranov.com (or by appointment)

Course website

All course materials will be posted on <u>Canvas</u> website that can be accessed at https://canvas.colorado.edu.

Zoom Lectures

All lectures will be conducted via Zoom. The link for meetings can be found on the Canvas class webpage.

Course Description

This is the second graduate course in microeconomic theory. It consists of two main parts: non-cooperative game theory and market equilibrium and market imperfections. Together with ECON 7010 (Microeconomic Theory 1), this course aims to provide students with a solid understanding of the fundamentals of microeconomic analysis.

Textbook

The textbook is *Microeconomic Theory*, by *Mas-Colell, Whinston, and Green*. A more detailed treatment (and more accessible for first-time learners) of game theory can be found in *Game Theory for Applied Economists*, by *Gibbons* or *Game Theory*, by *Fudenberg and Tirole*.

Problem Sets

Weekly problem sets are available at the course website. You should attempt them one by one after the relevant material is covered in class. Methodically solving the problem sets is **extremely important** to succeed in this class. You are encouraged to form study groups to discuss homework and lecture materials. Sample solutions will be provided at the course website. **DO NOT TURN IN THE PROBLEM SETS.**

Assessment

Your performance in this class will be evaluated based on problem set quizzes, two midterm exams and the final exam. All exams are in a closed-book format. Weights are as follows:

- 1. Problem Set Quizzes (four quizzes, 5 points each, 20 points in total)
- 2. Midterm exams (two midterms 25 points each, 60 points in total)
- 3. Final exam (30 points)

Recitation Sessions

Every week, the TA will hold a recitation in which the problem sets are discussed.

Tentative Course Outline

Part 1a: Static Games of Complete Information.
Part 1b: Dynamic Games of Complete Information.

Midterm 1

Part 2a: Static Games of Incomplete Information. Part 2b: Dynamic Games of Incomplete Information.

Midterm 2

Part 3a: Adverse Selection and Screening Part 3b: The Principal-Agent Problem

Final Exam

SYLLABUS STATEMENTS

CLASSROOM BEHAVIOR

Both students and faculty are responsible for maintaining an appropriate learning environment in all instructional settings, whether in person, remote or online. Those who fail to adhere to such behavioral standards may be subject to discipline. Professional courtesy and sensitivity are especially important with respect to individuals and topics dealing with race, color, national origin, sex, pregnancy, age, disability, creed, religion, sexual orientation, gender identity, gender expression, veteran status, political affiliation or political philosophy. For more information, see the policies on classroom behavior and the Student Conduct & Conflict Resolution policies.

REQUIREMENTS FOR COVID-19

As a matter of public health and safety, all members of the CU Boulder community and all visitors to campus must follow university, department and building requirements and all public health orders in place to reduce the risk of spreading infectious disease. Students who fail to adhere to these requirements will be asked to leave class, and students who do not leave class when asked or who refuse to comply with these requirements will be referred to Student Conduct and Conflict Resolution. For more information, see the policy on classroom behavior and the Student Code of Conduct. If you require accommodation because a disability prevents you from fulfilling these safety measures, please follow the steps in the "Accommodation for Disabilities" statement on this syllabus.

CU Boulder currently requires masks in classrooms and laboratories regardless of vaccination status. This requirement is a precaution to supplement CU Boulder's COVID-19 vaccine requirement. Exemptions include individuals who cannot medically tolerate a face covering, as well as those who are hearing-impaired or otherwise disabled or who are communicating with someone who is hearing-impaired or otherwise disabled and where the ability to see the mouth is essential to communication. If you qualify for a mask-related accommodation, please follow the steps in the "Accommodation for Disabilities" statement on this syllabus. In addition, vaccinated instructional faculty who are engaged in an indoor instructional activity and are separated by at least 6 feet from the nearest person are exempt from wearing masks if they so choose.

If you feel ill and think you might have COVID-19, if you have tested positive for COVID-19, or if you are unvaccinated or partially vaccinated and have been in close

contact with someone who has COVID-19, you should stay home and follow the further guidance of the Public Health Office (contacttracing@colorado.edu). If you are fully vaccinated and have been in close contact with someone who has COVID-19, you do not need to stay home; rather, you should self-monitor for symptoms and follow the further guidance of the Public Health Office (contacttracing@colorado.edu).

ACCOMMODATION FOR DISABILITIES

If you qualify for accommodations because of a disability, please submit your accommodation letter from Disability Services to your faculty member in a timely manner so that your needs can be addressed. Disability Services determines accommodations based on documented disabilities in the academic environment. Information on requesting accommodations is located on the <u>Disability Services</u> website. Contact Disability Services at 303-492-8671 or dsinfo@colorado.edu for further assistance. If you have a temporary medical condition, see <u>Temporary Medical Conditions</u> on the Disability Services website.

PREFERRED STUDENT NAMES AND PRONOUNS

CU Boulder recognizes that students' legal information doesn't always align with how they identify. Students may update their preferred names and pronouns via the student portal; those preferred names and pronouns are listed on instructors' class rosters. In the absence of such updates, the name that appears on the class roster is the student's legal name.

HONOR CODE

All students enrolled in a University of Colorado Boulder course are responsible for knowing and adhering to the Honor Code academic integrity policy. Violations of the Honor Code may include, but are not limited to: plagiarism, cheating, fabrication, lying, bribery, threat, unauthorized access to academic materials, clicker fraud, submitting the same or similar work in more than one course without permission from all course instructors involved, and aiding academic dishonesty. All incidents of academic misconduct will be reported to the Honor Code (honor@colorado.edu; 303-492-5550). Students found responsible for violating the academic integrity policy will be subject to nonacademic sanctions from the Honor Code as well as academic sanctions from the faculty member. Additional information regarding the Honor Code academic integrity policy can be found on the Honor Code website.

SEXUAL MISCONDUCT, DISCRIMINATION, HARASSMENT AND/OR RELATED RETALIATION

CU Boulder is committed to fostering an inclusive and welcoming learning, working, and living environment. The university will not tolerate acts of sexual misconduct (harassment, exploitation, and assault), intimate partner violence (dating or domestic violence), stalking, or protected-class discrimination or harassment by or against members of our community. Individuals who believe they have been subject to misconduct or retaliatory actions for reporting a concern should contact the Office of Institutional Equity and Compliance (OIEC) at 303-492-2127 or email cureport@colorado.edu. Information about university policies, reporting options, and the support resources can be found on the OIEC website. Please know that faculty and graduate instructors have a responsibility to inform OIEC when they are made aware of incidents of sexual misconduct, dating and domestic violence, stalking, discrimination, harassment and/or related retaliation, to ensure that individuals impacted receive information about their rights, support resources, and reporting options. To learn more about reporting and support options for a variety of concerns, visit Don't Ignore It.

Religious Holidays

Campus policy regarding religious observances requires that faculty make every effort to deal reasonably and fairly with all students who, because of religious obligations, have conflicts with scheduled exams, assignments or required attendance. See the <u>campus policy regarding religious observances</u> for full details.