Regulation and Competition Policy

Course Number: 21935 (21233)

Course Teacher: Christian Michel (christian.michel@upf.edu)

Course Dates:

Lectures: Week 2-11, Monday and Tuesday, 11.00-12.30, Room 20.031 Exercise classes: Weeks 4, 6-10, Friday 11.00-12.30, 14.00-15.30, 15.30-17.00 All exercise classes will be held by myself

Course Objective: The main objective of this course is to give an overview of the most important concepts in modern Competition Policy and Regulation. Part of the course focuses on theoretical competition policy and regulation models from Industrial Organization. However, due to the increased importance of empirical methods in this field both in academic research and the business world, another part will focus on empirical methods and applications. The exercise classes will introduce the relatively common STATA software, and especially practice the empirical methods presented in the lectures.

Prerequisites: Industrial Organization and Introduction to Econometrics

Office Hours: Tuesday, 2pm-3.30pm, Jaume 20, Room 1E52 (please drop me a quick Email if you intend to pass by)

Textbooks:

Motta, M. (2004). Competition policy: Theory and Practice. Cambridge University Press.

Davis, P., & Garcés, E. (2009). *Quantitative Techniques for Competition and Antitrust Analysis*. Princeton University Press.

Train, K. (2009). Discrete Choice Methods with Simulation. Cambridge university press.

Viscusi, W. K., Harrington, J. E., & Vernon, J. M. (2005). Economics of Regulation and Antitrust. *MIT Press Books*.

Tirole, J. (1988). The Theory of Industrial Organization: Jean Tirole. MIT press.

Belleflamme, P., & Peitz, M. (2010). *Industrial Organization: Markets and Strategies*. Cambridge University Press.

For further understanding, I highly recommend Motta (2004) as a textbook, even if the course does not always follow along the book's lines. If you are interested more in the empirical aspects of Competition Policy, Davis and Garcés' book shows many interesting tests and problems. If you are interested in the discrete choice literature, I can highly recommend to have a look at the book by Train (even if it is not needed for this course). I think his book can also be obtained as freeware from his website, together with many interesting video lectures.

However, no textbook fully covers the more the more advanced empirical methods, there you will need to take a look at the recommended journal articles.

The Viscusi-Harrington-Vernon book covers most of the regulatory parts. However, I do not think that it is necessary to buy this book for the course.

The books by Tirole and Belleflamme/Peitz are pure Industrial Organization books and can be used to review some of the core theories in the first part of the course.

Outline of Course Schedule (subject to change, not all sections will be devoted the same amount of time):

(*) for recommended readings

PART I: Preliminary Issues and Basic Theory Tools in Competition Policy

1: Introduction to Competition Policy

Literature: Motta (2004), Ch.1 (*)

2: Relationship between Efficiency and Market Structure

Literature: Motta, Ch.2, Ch.5 (*) Farrell, Joseph, and Carl Shapiro. "Horizontal mergers: an equilibrium analysis." *The American Economic Review* (1990): 107-126.

3: Theoretical models of product differentiation:

Literature: Tirole, Ch 7(*)

4: Collusion and Horizontal Agreements – Theory

Literature: Motta, Ch. 4 (*) Davis and Garces, Ch. 9 Green, Edward J., and Robert H. Porter. "Noncooperative collusion under imperfect price information." *Econometrica: Journal of the Econometric Society* (1984): 87-100. Bernheim, B. Douglas, and Michael D. Whinston. "Multimarket contact and collusive behavior." *The RAND Journal of Economics* (1990): 1-26.

PART II: Empirical Methods for Competition Policy

5: Market Definition and Tests of Market Power

Literature: Motta, Ch.3 (*) Davis and Garces, Ch.4

6: Homogeneous Demand Estimation and Identification of Conduct

Literature:

Davis and Garces, Ch. 6 (*)

Porter, Robert H. "A study of cartel stability: The Joint Executive Committee, 1880-1886." *The Bell Journal of Economics* (1983): 301-314. Genesove, David, and Wallace P. Mullin. "Testing static oligopoly models: conduct and cost in the sugar industry, 1890-1914." *The RAND Journal of Economics* (1998): 355-377.

7: Differentiated Products Demand Estimation: Discrete Choice Models, Estimation of Market Power, and Merger Simulation

Literature: Davis and Garces, Ch.8, 9 Motta, Ch. 3, 5 Berry, Steven T. "Estimating discrete-choice models of product differentiation." *The RAND Journal of Economics* (1994): 242-262. (*) Berry, Steven, James Levinsohn, and Ariel Pakes. "Automobile prices in market equilibrium." *Econometrica: Journal of the Econometric Society* (1995): 841-890. Nevo, Aviv. "Measuring market power in the ready-to-eat cereal industry." *Econometrica* 69.2 (2001): 307-342. Nevo, Aviv. "Mergers with differentiated products: The case of the ready-to-eat cereal industry." *The RAND Journal of Economics* (2000): 395-421.

Part III: Advanced Competition Policy Theory and Regulation of Natural Monopolies

8 Vertical relations

Literature: Motta, Ch. 6 (*) Rey, Patrick, and Jean Tirole. "A primer on foreclosure." *Handbook of industrial organization* 3 (2007): 2145-2220. Davis and Garces, Ch. 10

9: Regulation: Natural monopolies, industry details, and tensions between Competition Policy and Regulation

Literature: Harrington and Viscusi, Ch. 10-12 (*) Armstrong, Mark, and David EM Sappington. "Recent developments in the theory of regulation." *Handbook of industrial organization* 3 (2007): 1557-1700.

Part IV : Exam Preparation

At one point during the course I will hand out a mock exam for practice reasons. The last lecture will consist of a review session.

Course Evaluation: During the course there will be 3 problem sets, each containing theoretical problems but having an especially strong focus on empirical problems. Each problem set will count for 10% of the final grade. Furthermore, every student will be given (voluntarily) the opportunity to participate in a ``virtual competition/regulation'' case that will take place twice during the exercise classes. This will result in an extra 15% participation grade. On top of that, those who will have an excellent participation in the exercise classes will get an extra 5% final grading "reward". The remainder (i.e. between 50% and 70% of the final grade) will be attributed to the exam grade. However, to pass the course a necessary requirement is to get at least a 5 out of 10 in the exam.

Acknowledgments: There are several courses I attended or worked with as a student myself from which the lecture slides for this course highly benefited. These are: Theoretical Industrial Organization by Volker Nocke (especially for sections 2, 4, and 9), The Economics of Mergers and Merger Control by Paul Heidhues (especially sections 2 and 5), Empirical Industrial Organization by Philipp Schmidt-Dengler (especially sections 5-8), and Industrial Organization: Markets and Strategies by Martin Peitz (especially section 3). Of course, all potential errors on the slides are mine.

Competencias: G1, G4, G7, G9, G20, G11 G13, G14, G18, G19, E1

G1. Comprender e interpretar de manera pertinente y razonada textos escritos de nivel y carácter académicos.

G4. Ser capaz de utilizar la lengua inglesa en todos los ámbitos laborales (leer, escribir y hablar en un registro alto)

G7. Desarrollar la capacidad de razonamiento autónomo con distancia crítica en temas o cuestiones controvertidas.

G9. Tener consolidados hábitos de autodisciplina, autoexigencia y rigor en la realización del trabajo académico, así como en la organización y en su correcta temporalización.

G11. Ser capaz de aplicar con flexibilidad y creatividad los conocimientos adquiridos y de adaptarlos a contextos y situaciones nuevas

G13. Demostrar un nivel de conocimientos suficientes para la actuación profesional

G14. Conocer los diferentes contextos en los que trabaja: la coyuntura económica, el sector, el mercado, la empresa y el departamento

G18. Aplicar los conocimientos y procedimientos relevantes a un abanico de situaciones complejas

G19. Identificar los factores claves de un problema

G20. Demostrar una aproximación crítica ante situaciones diversas

E1 Análisis de modelos del comercio internacional