



# **Theoretical Industrial Organization: Search and Information**

Course title – Intitulé du cours	Theoretical Industrial Organisation : Search
	and Information
Level / Semester – Niveau /semestre	DEEQA/S2
School – Composante	Ecole d'Economie de Toulouse
Teacher – Enseignant responsable	Andrew Rhodes
Other teacher(s) – Autre(s) enseignant(s)	
Lecture Hours – Volume Horaire CM	15
TA Hours – Volume horaire TD	
TP Hours – Volume horaire TP	
Course Language – Langue du cours	English
TA and/or TP Language – Langue des TD et/ou TP	

## **Teaching staff contacts:**

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- T668
- To arrange a meeting please email me

# Course Objectives: newly acquired knowledge once the course completed should be well identified

The first two parts of the course provide an introduction to consumer search and advertising. We will demonstrate that market outcomes can be very different when consumers are poorly informed about prices and product characteristics. We will derive a consumer's optimal search rule in a canonical model of product differentiation, examine whether search costs can explain price dispersion for homogeneous products, and study the effects of firm prominence on market performance. We will also consider whether firms under- or over-invest in advertising, what is the optimal mix of information to include in an advert, and look at how an online intermediary should price access to information on its site. The final part of the course provides an introduction to cost passthrough i.e. how changes in costs (or taxes) are passed through to consumers. We will show that this simple concept helps to unify and explain several seemingly different results from the IO literature.

#### **Prerequisites:**

It is advantageous (though not necessary) to also take the other theoretical IO course that takes place in the second term.

#### Practical information about the sessions:

Students may use laptops, and are expected to actively participate during lectures and ask questions.

#### **Grading system:**

The final grade is based on class participation, as well as a presentation and short note on a recent paper. (Students taking both theoretical IO courses in the second term only need to do one presentation for both courses.)

## **Bibliography/references**:

#### Consumer Search

- Anderson, S. and Renault, R. (1999): "Pricing, Product Diversity, and Search Costs: A Bertrand-Chamberlin-Diamond Model", RAND Journal 30(4), 719-735.
- Armstrong, M., Vickers J. and Zhou, J. (2009): "Prominence and Consumer Search", RAND Journal 40(2), 209-233.
- Burdett, K. and Judd, K. (1983): "Equilibrium Price Dispersion", Econometrica 51(4), 955-970.
- Diamond, P. (1971): "A Model of Price Adjustment", Journal of Economic Theory 3, 156-168.
- Stahl, D. (1989): "Oligopolistic Pricing with Sequential Consumer Search", American Economic Review 79(4), 700-712.
- Varian, H. (1980): "A Model of Sales", American Economic Review 70, 651-658.
- Weitzman, M. (1979): "Optimal Search for The Best Alternative", Econometrica 47(3), 641-654.
- Wilson, C. (2010): "Ordered Search and Equilibrium Obfuscation", International Journal of Industrial Organization 28(5), 496-506.
- Wolinsky, A. (1986): "True Monopolistic Competition as a Result of Imperfect Information", Quarterly Journal of Economics 101(3), 493-512.

## Advertising

- Anderson, S. and Renault, R. (2006): "Advertising Content", American Economic Review 96(1), 93-113.
- Anderson, S. and Renault, R. (2009): "Comparative advertising: disclosing horizontal match information", RAND 40(3), 558-581.
- Bagwell, K. (2005): "The Economic Analysis of Advertising"
- Baye, M. and Morgan, J. (2001): "Information gatekeepers on the Internet and the Competitiveness of Homogeneous Product Markets", American Economic Review 91(3), 454-474.
- Butters, G. (1977): "Equilibrium Distributions of Sales and Advertising Prices", Review of Economic Studies 44(3), 465 491.
- Dixit, A. and Norman, V. (1978): "Advertising and Welfare", Bell Journal of Economics 9(1), 1-17.

• Johnson, J. and Myatt, D. (2006): "On the Simple Economics of Advertising, Marketing, and Product Design", American Economic Review 96(3), 756-784.

# Passthrough

- Aguirre, I., Cowan, S. and Vickers, J. (2010): "Monopoly Price Discrimination and Demand Curvature", American Economic Review 100(4), 1601-1615.
- Bagnoli, M. and Bergstrom, T. (2005): "Log-concave probability and its applications", Economic Theory 26(2), 445-469.
- Chen, Y. and Schwartz, M. (2015): "Differential pricing when costs differ: a welfare analysis", RAND Journal 46(2), 442-460.
- Corts, K. (1998): "Third Degree Price Discrimination in Oligopoly: All-Out Competition and Strategic Commitment", Rand Journal 29, 306-323.
- Gabaix, X., Laibson, D., Li, D., Li, H., Resnick, S. and de Vries, C. (2016): "The Impact of Competition on Prices with Numerous Firms", Journal of Economic Theory (165), 1-24.
- Holmes, T. (1989): "The Effects of Third-Degree Discrimination in Oligopoly", American Economic Review 79, 244-250.
- Perloff, J. and Salop, S. (1985): "Equilibrium with Product Differentiation", Review of Economic Studies 52(1), 107-120.
- Weyl, E.G. and Fabinger, M. (2013): "Pass-Through as an Economic Tool: Principle of Incidence under Imperfect Competition", Journal of Political Economy 121(3), 528-583.

## **Session planning:**

Week 1: (Random) Consumer Search

Week 2: (Ordered) Consumer Search

Week 3: Search and Advertising

Week 4: Advertising

Week 5: Passthough and Applications