

ALFONSO MONTES

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EMPLOYMENT

THEMA Laboratory, Université Cergy-Pontoise *2020 - present*
Postdoctoral Fellow

EDUCATION

PhD in Economics, Ecole Polytechnique *2016 - 2020*
Dissertation Title: “Essays in Bayesian Games”
Expected completion date: 11/2020

MSc in Applicable Mathematics, London School of Economics *2015 - 2016*
Dissertation Title: “Bayesian Persuasion with Rational Inattentive Receiver”

Master in Economics (highest distinction), Universidad de Chile *2012 - 2014*
Dissertation Title: “Integrated Tax Systems and the Cost of Capital”

Bachelor in Economics (distinction), Universidad de Chile *2007 - 2011*
Universidad de Chile

RESEARCH FIELDS

Primary Fields: Microeconomic Theory, Game Theory.
Secondary Field: Political Economy, Industrial Organization.

REFERENCES

Olivier GOSSNER
Ecole Polytechnique, CNRS
5 ave Le Chatelier
91120 Palaiseau, France
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Tristan TOMALA
HEC, CNRS
1 rue de la Liberation
78350 Jouy-en-Josas, France
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Yukio KORIYAMA
Ecole Polytechnique
5 ave Le Chatelier
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RESEARCH EXPERIENCE AND OTHER EMPLOYMENTS

Data Analyst Inter-American Development Bank	2016 - 2017
Data Analyst Development Planning Unit, University College London	2015 - 2016
Research Assistant, Professor Ramon Lopez (PhD) Universidad de Chile, Economics Department, Chile	2014 - 2015
Research Assistant, Professor Pablo Serra (PhD) Universidad de Chile, Economics Department, Chile	2013 - 2014

CONFERENCES AND PRESENTATIONS

- GAMES 2020, 6th World Congress of the Game Theory Society (Expected) 2020
- Economic World Congress, Information acquisition 2020
- Econometric Society Winter Meeting, Micro Theory 2019
- Center for Research in Economics and Statistics (CREST), Internal Seminar 2019
- Center for Research in Economics and Statistics (CREST), PhD Seminar 2019
- Stony Brook International Conference in Game Theory 2018

TEACHING EXPERIENCE

Courses taught as Teacher Assistant

- Intermediate Microeconomics, Ecole Polytechnique (Undergraduate). Fall 2018/2019 Teaching Professor Thibaud Verge. Bachelor Program.
- Introduction to Economics, Ecole Polytechnique (Undergraduate). Spring 2018. Teaching Professor Olivier Gossner and Jean Baptiste Micheau. Engineering track.
- Microeconomics, Universidad de Chile (Postgraduate). Fall 2013. Teaching Professor Oscar Landerretche. Course for the Master in Public Policy.
- Microeconomics II, Universidad de Chile (Undergraduate). Fall 2010/2011/2012. Teaching Professor Jorge Rivera. Standard course in microeconomics.
- Microeconomics I, Universidad de Chile (Undergraduate). Spring 2010/2011. Teaching Professor Jorge Rivera. Standard course in microeconomics.
- Resources Allocation and Welfare Economics, Universidad de Chile (Undergraduate). Fall 2010/2011. Teaching Professor Javier Nunez. Fourth year course in economics.

Courses taught as Lecturer

- Mathematical Methods for Economics III, Universidad de Chile (Undergraduate). Standard course in Calculus and Linear Algebra.
- Microeconomics I, Universidad Federico Santa Maria, Engineering School (Undergraduate). Standard course in microeconomics.

SCHOLARSHIPS

- Full academic scholarship for PhD in Economics, Ecole Polytechnique. 2019-2020
- Full academic scholarship for PhD in Economics, Ecole Polytechnique. 2016-2019

- Full academic scholarship for MSc in Applicable Mathematics, LSE. 2012-2014
- Full academic scholarship for MA in Economics, Universidad de Chile. 2012-2014

RESEARCH PAPERS

- **“Canonical Equilibria in Games with Flexible Information Acquisition”**. 2020 (Job Market Paper)
I study costly information acquisition by multiple decision makers facing a strategic environment. First, each agent chooses an arbitrary *signal* about the state of nature, and she incurs in a cost that is increasing in the amount of information contained in the signal. Then, once information has been acquired, agents choose their actions in a Bayesian game. I show that for every equilibrium there exists an *equivalent* pure strategy Bayes Nash equilibrium in which the space of signals is equal to the action space. The existence of such equilibrium, which I call *canonical equilibrium*, provides a *revelation principle* for games with flexible information acquisition. I also prove existence of equilibrium, and I extend some results from single-agent costly information acquisition to strategic environments.
- **“Bayesian Persuasion with Rational Inattentive Receiver”**. Working Paper. 2019. **R&R at the Journal of Economic Theory**. Currently a joint project with Ludmila Matysková.
This paper extends the basic Bayesian Persuasion setup by allowing the receiver, after observing the information disclosed by the sender, to gather additional information. Information gathering is costly for the receiver, but it is not for the sender. The cost of information extraction is assumed to be proportional to the reduction of his uncertainty (as measured by the entropy of his beliefs). The cost is parametrized by a scalar, which I take as receiver’s ability to gather information. I analyze the impact of changes in receiver’s ability of gathering information on the well being of both, sender and receiver. On the one hand, I show that the sender cannot be better off if the receiver’s ability of gathering information increases. On the other hand, and in contrast with straightforward intuition, I show that the receiver may be worse off when he is better at gathering information. The reason is that more ability to gather information could lead the sender to provide less information in order to prevent the receiver from choosing a particular action. This in turn could imply less total information disclosed at equilibrium, making the receiver to be worse off.
- **“Ideology, Media Outlets, and Political Extremism”**. Working Paper. 2020.
This papers studies the role of *ideology* in political extremism and social welfare. I model ideology as a misperception of reality that agents recognize in others but fail to acknowledge in themselves. Specifically, two ideological groups receive information that is biased and correlated, and they suffer from *bias neglect* and *correlational neglect*. Agents correctly assess the bias and correlation in the information sources of the other group, and they acknowledge that the other group is failing to recognize them. Agents also receive information from an unbiased publicly available source. Individuals have to choose their political position on an issue, and their payoffs depends not only on the realization of an unknown state but also on the the level of agreement with the rest of the population. In this context, I show that the precision of the public and private information have an ambiguous effect in political extremism. I further show that welfare is increasing in the precision of the public signal, and decreasing in bias and correlational neglect.

SKILLS, LANGUAGES AND OTHER

Software Skills

MATLAB, STATA, Java, L^AT_EX, Microsoft Office.

Language

Spanish (Native), English (Academic, Fluent), French (Intermediate, A2)

Citizenship

Chilean