JEAN-FRANÇOIS FOURNEL

McGill University
Dept. of Economics, Leacock Building
855 Sherbrooke Street West
Montreal, QC, Canada H3A 2T7
Phone: (514) 865-4550

Email: <u>jean-francois.fournel@mcgill.ca</u> Website: <u>www.jean-francoisfournel.com</u>

PLACEMENT DIRECTORS

Prof. Francesco Amodio <u>francesco.amodio@mcgill.ca</u> (514) 398-2184 Prof. Francisco Alvarez-Cuadrado <u>francisco.alvarez-cuadrado@mcgill.ca</u> (514) 398-8804

EDUCATION

Ph.D. Economics, McGill University, expected August 2022

M.A. Economics, McGill University, 2016

B.Mus. Jazz Performance (Saxophone), McGill University, 2005

FIELDS OF SPECIALIZATION

Primary: Industrial Organization, Econometrics

Secondary: Environmental Economics

DISSERTATION

Three Essays on Industrial Organization

Committee: Prof. Laura Lasio (Chair), Prof. Hassan Benchekroun, Prof. John W. Galbraith

JOB MARKET PAPER

"Electric Cars and Network Effects: Are Subsidies the Right Tool for Reducing Emissions?"

This paper studies the impact of the *Roulez Vert* program, which subsidized new purchases of electric vehicles in the province of Quebec, Canada. I explore several outcomes crucial to policymakers: how costly it is to replace traditional vehicles with electric or to avoid carbon emissions using subsidies, and the impact they have on sales, prices, and charging station deployment. To study these questions, I rely on a structural model in which demand follows the nested logit specification and supply is determined by multi-product firms competing on prices (Berry, Levinsohn and Pakes, 1995). I build on Springel's (2017) methodology and propose a new model for charging station deployment. In my setup, county-level governments choose where and how many stations to install in their region to provide charging capacity to EV owners. My findings suggest the subsidy program to be responsible for 45.7% of electric vehicle sales and 27.7% of charging stations installed between 2012 and 2018. I estimate abating emissions in this way to have an average cost \$1,345 and a marginal cost of \$1,541 per ton of CO₂ which is significantly higher than current estimates for the social costs of carbon. Part of the reason behind these sizeable costs is that 62.1% of new electric vehicle sales associated with the policy came from consumers that would have chosen not to purchase a vehicle if no subsidy was available, suggesting that the policy poorly targeted the right consumers.

OTHER RESEARCH PAPERS

"Environmental Regulation in the Car Market with Consumer Heterogeneity: Countering the Rise of the SUV", in progress

"Environmental Regulation in the Car Market with Consumer Heterogeneity: Countering the Rise of the SUV", in progress

TEACHING EXPERIENCE

Instructor, Economic Statistics - Honours (joint with Prof. John Galbraith), Winter 2018

Instructor, Mathematics for Economists (graduate), Summer 2020

Teaching Assistant, Intro to Econ Theory - Honours, Fall 2015 - Winter 2017

Teaching Assistant, Economic Statistics - Honours, Fall 2017

Teaching Assistant, Industrial Organization, Fall 2018

Teaching Assistant, Econometrics 1 - Honours, Fall 2019, Fall 2020, Fall 2021

Teaching Assistant, Econometrics 1 (graduate) Fall 2020

Teaching Assistant, Econometrics 2 (graduate) Winter 2019, Winter 2020

Teaching Assistant, Applied Cross-Sectional Methods (graduate), Winter 2019

GRANTS AND AWARDS

2019-2022 FRQSC Doctoral Research Scholarship 2019-2021 SSHRC Doctoral Research Scholarship

2019 Graduate Mobility Award

2016-2020 McGill University Doctoral Fellowship

LANGUAGES

French (native), English (fluent)

REFERENCES

Professor Laura Lasio McGill University laura.lasio@mcgill.ca 514-398-2953

Professor Hassan Benchekroun McGill University hassan.benchekroun@mcgill.ca 514-398-4400 Professor John W. Galbraith McGill University john.galbraith@mcgill.ca 514-398-2768