



## **Visiting Professor Program Academic Year 2023/2024**

**TEACHING COMMITMENT:** 16 hours

**COURSE TITLE**

**Advanced Empirical Methods for Economists**

**TEACHING PERIOD**

2nd term

**SCIENTIFIC AREA**

Economics

**LANGUAGE USED TO TEACH**

English

**COURSE SUMMARY**

This course covers the main methods for doing sound empirical work at the master level. It is particularly aimed at students and researchers who plan on doing applied work for their thesis, or in their future job. The identification issue of causal relationship when analyzing experimental and non-experimental data represents the unifying topic of the course. We will cover the most common approaches to identify causal relationships: conditional independence assumption, matching, instrumental variables, random assignment, regression discontinuity, synthetic control approach, and difference-in-differences. We are also going to cover recent advances in machine learning. Whenever possible graphical methods are going to complement the different approaches to identification.

### **LEARNING OBJECTIVES**

Applied econometric papers will serve as a potential source for the most recent advances, as well as well-known examples from the literature. Both types of papers should give a taste about how to perform a convincing empirical analysis. The ideal experimental setting is often going to serve as a benchmark case. Empirical exercises using STATA with real data are going to be part of the module. Some tasks might involve replicating empirical results of published papers. And students will be asked to do empirical and to present their results in class. By the end of the course students should have a good understanding of empirical methods in economics.

### **TUTORSHIP ACTIVITIES**

N/A

### **LAB ACTIVITIES**

N/A

### **OTHER ACTIVITIES BESIDES THE COURSE**

N/A

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### **VISITING PROFESSOR PROFILE**

The visiting professor should ideally be an expert in text analysis, which represents a growing empirical method in economics. He/she should have experience in teaching machine learning methods for the analysis of text.

### **CONTACT REFERENT**

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