This course is normally meant for second year researchers, especially those who have developed causal hypotheses in their prospectus and want to learn about some of the ways to put them to the test. The course touches on a series of designs suitable for identifying causal relations rather than correlations, from the queen technique—experiments—to second best options—natural experiments, discontinuity, panel studies, etc. The readings offer many applications of these techniques aimed at spurring participants’ imagination.

The reference texts for the seminar are:

- Thad Dunning, Natural experiments in the social sciences. A design based approach. CUP 2012 http://biblio.eui.eu/record=b1759366~S5

Classes and topics:

- o Week 1: brief history of cause-seeking designs & practical arrangements [6 Oct]
- o Week 2: problems of causal identification [13 Oct, Fabrizio Bernardi]
- o Week 3: introduction to experimental methods [20 Oct, Klarita Gerxhan]
- o Week 4: experiments [27 Oct]
- o Week 5: instrumental variables [3 Nov]
- o Week 6: difference in difference [10 Nov]
- o Week 7: regression discontinuity [17 Nov]
- o Week 8: panel and fixed effects [24 Nov]
- o Week 9: twins and siblings [1 Dec]
- o Week 10: Caveats, mixed methods and implication analysis [8 Dec, Diego Gambetta]

In order to obtain the 20 credits participants, in addition to attending regularly, are required:

1) to give a class presentation EITHER on their research design if this employs one of the techniques discussed in the course, OR on one of these techniques as described in
the readings; in the latter case, the researchers should try to develop ideas on how a particular technique might help them in their own research.

2) from Week 4 onward, to prepare brief comments on at least two of the recommended readings for each session. These comments should contain participants’ suggestions for further applications of the technique presented in each week’s readings to different research questions. These comments should be posted on the course folder by the Sunday preceding the class. A selection of these comments will be discussed in class.

Week 1 (6 October): brief history of cause-seeking designs and organisation of the course


Week 2 (13 October): Problems of causal identification, Fabrizio Bernardi


Laitin David, Joachim Moortgatb, and Amanda Lea Robinson, 2012. Geographic axes and the persistence of cultural diversity, PNAS, 109, 26


Week 3 (20 October): Introduction to experimental methods – Klarita Gërshani

Required readings


Morton, Rebecca B., and Kenneth C. Williams. 2010. *Experimental Political Science and the Study of Causality: From Nature to the Lab*. Cambridge: Cambridge University Press [sections 1.3.2 and 1.5; and chapter 2]

Other readings


Cesarini et al (2008) Heritability of cooperative behavior in the trust game *PNAS*, 105 (10) 3721-3726

Gneezy and Fessler Conflict, sticks and carrots: war increases prosocial punishments and rewards. PROCEEDINGS OF THE ROYAL SOCIETY B: BIOLOGICAL SCIENCES

**Week 4 (27 October): Experiments, and field experiments**

*Natural*


*Field*


**Other readings**


**Week 5 (3 November): Instrumental variables**


*Other readings*


Not to forget a cartoon: [http://www.manucartoons.com/manucartoons/%22Irrational_agents%22_series/Pages/Genesis_of_War,_Part_I_%28HeloMag.,_February_2010%29.html#26](http://www.manucartoons.com/manucartoons/%22Irrational_agents%22_series/Pages/Genesis_of_War,_Part_I_%28HeloMag.,_February_2010%29.html#26)
Week 6 (10 December): Difference in difference


Elisabetta Olivieri, Salvatore Sberna “‘Set the night on fire!’ Mafia Violence and Election in Italy” [working paper]


**Week 7 (17 November): Regression discontinuity**

For an overview: section 4 in Schlotter et al. 2011 and
http://en.wikipedia.org/wiki/Regression_discontinuity_design


Meyersson E. "Islamic Rule and the Empowerment of the Poor and pious" (forthcoming, *Econometrica*)

**Other readings**


Week 8 (24 November): Panel and fixed effects


Other readings

Week 9 (1 December): twins and siblings

For an overview: Firembaugh, G. 131-145


Other readings


Week 10 (8 December): Caveats, mixed methods and implication analysis (Diego Gambetta)


Durkheim E. 1897. Suicide. [The whole book is a great read. It relies on implications which Durkheim derives from various conjectures on what might be causes of suicide; read especially chapter 4, on Imitation] [In the original French the book can be found here http://www.gutenberg.org/ebooks/40489; in English here http://archive.org/details/suicidestudyinso00durk]

Beware of being driven by data availability! See these two blogs:

http://themonkeycage.org/2013/06/14/is-theory-getting-lost-in-the-identification-revolution