Objective

This class is for upper level graduate students. The course covers research on what I will call “comparative development”. This literature is about why some places are rich, and some are poor, but links this to historical or persistent differences in deeply rooted factors like culture, institutions, or biology. As part of studying this, a goal of the class is to introduce students to the major data sources and GIS software that is used in this literature, so that the students can collaborate on a paper within this subject area.

Course Requirements

1. The primary requirement is a paper, which is due May 3rd. This paper can be done in pairs, if students wish. You may not use a project from another class to substitute for this paper. I have two topics on which you could write (one related to cousin marriage, one related to the role of water). I will distribute some details about these projects early in the semester. There is a high bar to convince me you should work on another topic.

2. In order to prepare you for writing this paper, there are several assignments throughout the early part of the semester that teach you to use GIS with RStudio. These assignments will introduce you to the major datasets that can be leveraged for studying the role of water. For each of these assignments, you should have a laptop available with you in class. We will work on these in class, and for the most part I expect that you will complete them in class. The dates are listed below in the course outline.

3. Also as part of the preparation for writing the paper, there is a literature review due on March 6th. The papers/books you will have to review will be part of the project details I distribute. This will need to be a 2000-3000 review that contains not just a summary of these papers, but also some speculation about hypotheses that could be tested, and data that would be necessary.

4. I’ll expect that you will have read each of the listed papers in the course outline ahead of time, and will come prepared with several (2-3) questions or discussion points about each.
Course Outline

Overview

Jan 14: Introduction to broad themes of course, the persistence of economic development over time, culture and institutions as transmission mechanisms, and the path dependence of those, meaning history matters. The role of biological, climatic, and agricultural conditions in determining culture and institutions.

Persistence

Jan 16: Economic development appears to persist, and places that are rich now were (usually) rich in the past. Or, to be more accurate, population groups that are rich now are descended from population groups that were rich in the past, but they may have moved. Read carefully:


Jan 23: The location of economic development, and the determinants of that. How those determinants change with history. Read carefully:


Jan 28 and 30: Introduction to spatial data. RStudio and spatial packages. Types of spatial data, and converting from one to another. Merging. Zonal statistics. Creating a dataset from spatial data.

- Assignment: Maps and datasets of night lights

Institutions and colonization

Feb 4: Introduction to the role of institutions. Ambiguity in definitions, and failures of empirical work at the country level. I’ll summarize this literature, as opposed to concentrating on a specific paper in detail.

Feb 6: Sub-national studies of institutions within Africa. The importance of *historical* institutions relative to national measures of institutions. Leveraging spatial data to do sub-national analysis.

Feb 11 and 13: Ethnographic Atlas data, and matching this to maps of ethnicities and languages. Creating a dataset combining ethnographic and geographic data.

- Assignment: Building an ethnographic dataset

Feb 18: Research that establishes the persistent effects of specific colonial institutions on modern outcomes.


Culture and family structure

Feb 20: Overview of the literature on culture and economic outcomes. Powerful correlations but more ambiguity. I’ll give an overview of this literature, as opposed to concentrating on a specific paper in detail.

Feb 25 and 27: Family structure as a cultural carrier or determinant of economic outcomes. Differences in family structure across the globe.


Mar 4 and 6: Use the World Values Survey and General Preference Survey to build measures of cultural attitudes within countries. Building measures of underlying ethnic makeup of national populations.

- Assignment: Build merged dataset of preferences and ethnic makeup

Agricultural conditions

Mar 18: Overview of the literature on underlying agro-climatic conditions and development. The bundle of characteristics associated with rich countries, and is that necessary or contingent? I’ll summarize this literature, as opposed to concentrating on a specific paper in detail.

Mar 20 and 25: Specific cases of agricultural conditions driving culture or institutions.

Mar 27: Differences in agricultural production functions as a mediator of productivity, culture, and institutions.


Apr 1 and 3: Using the GAEZ database to build measures of inherent agricultural productivity for spatial units.

- Assignment: Build merged dataset of agro-climatic characteristics and ethnic groups.

Apr 8: Students discuss their topic area, the hypothesis they are considering, the data necessary, and the empirical specification they want to run. Feedback.

Diversity

Apr 10: Overview of the literature on population diversity, including genetic diversity, with culture, institutions, and comparative development. I’ll summarize this literature, as opposed to concentrating on a specific paper in detail.

Apr 15: Specific cases of measuring and establishing the role of diversity with economic outcomes.


Apr 17: Genetic variation and its role in development.


**Building a paper**

**Apr 22:** Students discuss topic area, hypothesis, and initial results.  
**Apr 24 and 29:** Working days for students to improve introductions, code, and results.

**Further bibliography**

This contains a deeper list of readings that pertain to different subject areas we cover. Papers in the syllabus are listed here again. There is also a list at the end of some books that are related to these larger questions which can be useful for background and/or mining for hypotheses.

**Overview**


**Persistence**


### Institutions


• D. Ma (2013). “State capacity and great divergence, the case of Qing China (1644–1911)”. *Eurasian Geography and Economics* 54.5-6, pp. 484–499. url: [https://www.tandfonline.com/doi/abs/10.](https://www.tandfonline.com/doi/abs/10.)
 Colonization and exploitation


Cultural and family

Agricultural, geographic, and biological conditions

• T. Talhelm et al. (2014). “Large-Scale Psychological Differences Within China Explained by Rice Versus Wheat Agriculture”. Science 344.6184, pp. 603–608. URL: http://science.sciencemag.org/content/344/6184/603


Diversity


O. Galor, O. Ozak, and A. Sarid (2018). “Geographical Roots of the Coevolution of Cultural and Linguistic Traits”. URL: [osf.io/preprints/socarxiv/me2g7](https://osf.io/preprints/socarxiv/me2g7)


Books
