

Introduction to Economic Growth: Why are Some Countries Richer than Others?

Summer 2021 CEEC 0940 01

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Office hours: Monday: 1pm-2:30pm, Wednesday 5pm-6:30pm, Friday, 9am-10:30am (broken down into 15-minute slots), book slots via the Canvas page (Calendar tab)

Course overview:

This course explores vast inequalities in well-being and economic development across the world and discusses various explanations for why certain places and populations are richer than others. The richest countries in the world today are as much as 60 times more prosperous in terms of incomes per capita than their poorest counterparts. Other living standards vary enormously as well: in 35 countries, less than half of the population has access to electricity (in 2020!); and life expectancy is below 50 years in some of the poorest areas.

What can explain these inequalities? What mechanisms are behind the long-run accumulation of capital, knowledge, ideas, and institutional capacities that make some countries richer? And what are the “deep-rooted” determinants behind prosperity? For example, what is the role of geography? What is the role of culture: our social norms, beliefs, and behavioral practices? Or do formal institutions, such as the democratic government and the rule of law, decide the game?

Along the way of exploring the questions outlined above, this course will: (i) expose students to a huge and rapidly growing field of economic growth, (ii) present some of the key models of long-run economic development that illustrate and illuminate the main reasons for why the world looks the way it does today, and (iii) outline some of the most widely used methods of data analysis that are used nowadays to better understand the issues and prospects of economic development.

Course prerequisites: high school algebra and economics principles (required); some familiarity with calculus and intro probability and statistics (recommended).

Course grading:

- 20% Short quizzes (one per module)
- 30% Home assignments (3)
- 20% Final exam (1)
- 20% Group presentation of a project (1)
- 10% Participation in Discussions (one per module)

Readings:

Main textbook:

- (DW) David Weil: Economic Growth (3rd ed.)

Additional textbooks:

- (AR) Daron Acemoglu and James Robinson: Why Nations Fail (on the role and formation of political and economic institutions across the world)
- (WE) William Easterly: The Elusive Quest for Growth. (case studies and motivating examples)
- (GM) Gregory Mankiw: Principles of Macroeconomics (a general introduction to macroeconomics)

Academic papers: see below in the syllabus, also in Canvas “Files” folder

Online materials: see Canvas course page for links to blogs, videos, and data.

Structure of the course:

Week 1 *Module 1: Facts and Mysteries of Growth; Measurement; Conceptual Framework*

Module 2: The Solow Growth model and Related Topics

Week 2 *Module 3: Productivity, Innovations, and the Endogenous Growth Theories*

Module 4: Malthusian Stagnation, and Transition to Modern Growth; the Unified Growth Theory

Week 3 *Module 5: ‘Institutions Rule’; an Overview of Modern Political Economy of Growth*

Module 6: Culture and Economic Growth; Interaction of Culture and Institutions

Week 4 *Module 7: Deep-rooted Factors of Economic Growth: Geography, Diseases, and Other*

Final exam + Students’ projects presentations + Guest Lecture

Detailed syllabus

Module 1. Introduction: (i) Stylized facts and puzzles of Economic Growth (mystery of growth, mystery of differences); (ii) Measurements of growth and wellbeing; (iii) Framework for the course, and an overview of explanations

Main Sources:

Lecture 1: videos and slides

Textbooks: DW (Chapters 1 and 2)

Additional Sources:

Books:

WE (Chapters 1 and 2 – interesting motivating reading on why we study growth and what happens when there is no growth)

GM (read about the definitions of GDP, PPP, some basic macro models, and other concepts if you need a refresher)

Academic papers:

Pritchett (2000). “Understanding Patterns of Economic Growth; Searching for Hills among Plateaus, Mountains, and Plains”.

Jones (2016). “The Facts of Economic Growth”. (review paper)

Module 2. The Solow Growth model: (i) role of investment, population growth, productivity growth; (ii) testing predictions of the model against the data: convergence hypothesis, historical episodes of ΔK , ΔL , the effects of investment and population on GDP per capita

Main Sources:

Lecture 2: videos and slides

Textbooks: DW (Chapters 3 and 4.2)

Academic papers:

Mankiw, Romer, Weil (1992). “A Contribution to the Empirics of Economic Growth”.

Additional Sources:

Textbooks: DW (Chapters 6 and 7)

Academic papers:

Quah (1996). “Empirics for economic growth and convergence”.

Galor (1996). “Convergence: Inferences from Theoretical Model”.

Jones and Romer (2010). “The New Kaldor Facts: Ideas, Institutions, Population, and Human Capital”.

Jorda et al. (2020). “Longer-run Economic Consequences of Pandemics”.

Module 3. Endogenous Growth Theories: (i) productivity, technological progress, and ideas; (ii) ‘Shumpeterian’ theory of creative destruction

Main Sources:

Lecture 3: videos and slides

Textbooks: DW (Chapters 8 and 9)

Academic papers:

Romer (1990). “Endogenous Technological Change”.

Jones (2005). “Growth and Ideas”. (review paper)

Jones (2019). “Paul Romer: Ideas, Nonrivalry, and Endogenous Growth”. (review paper)

Aghion et al. (2005). “Competition and Innovation: an Inverted-U Relationship”.

Additional Sources:

Academic papers:

Jones and Tonetti (2020). Nonrivalry and the Economics of Data

Bloom et al. (2020). Are Ideas Getting Harder to Find?

Module 4. From Stagnation to Growth: (i) Malthusian stagnation; (ii) Transition from stagnation to growth, and (iii) the Unified Growth Theory

Main Sources:

Lecture 4: videos and slides

Textbooks: DW (chapter 4.1, 4.3, 4.4)

Academic papers:

Galor (2005). "From Stagnation to Growth: Unified Growth Theory" (review paper)

Ashraf and Galor (2011). "Dynamics and Stagnation in the Malthusian Epoch".

Murtin (2012). "Long-term Determinants of the Demographic Transition".

Galor (2012). "The demographic transition: causes and consequences". (review paper)

Additional Sources:

Academic papers:

Kremer (1993). "Population growth and technological change: one million B.C. to 1990".

Galor and Weil (2000). "Population, technology, and growth: From Malthusian stagnation to the demographic transition and beyond".

Strulik et al. (2013). "The past and future of knowledge-based growth".

Bleakley and Lange (2009). "Chronic Disease Burden, and the Interaction of Education, Fertility, and Growth".

Greenwood and Seshadri (2002). "The U.S. Demographic Transition".

Module 5. 'Institutions Rule': (i) effects of institutions on growth (corruption, property rights, etc.); (ii) modern political economy approach to institutions and development; (iii) empirical approaches to institutions

Main Sources:

Lecture 5: videos and slides

Textbooks: DW (Chapter 12)

Academic papers:

Acemoglu et al. (2001). "The Colonial Origins of Comparative Development: An Empirical Investigation".

Glaeser et al. (2004). "Do Institutions Cause Growth?".

Michalopoulos and Papaioannou (2014). "National Institutions and Subnational Development in Africa".

Acemoglu et al. (2019). "Democracy Does Cause Growth".

Additional Sources:

Books: AR “Why Nations Fail” (one of the best sources on the importance and formation of institutions: read it through when you have time (not during the course presumably))

Academic papers:

Mauro (1995). “Corruption and Growth”.

Murphy et al. (1993). “Why is Rent-Seeking so Costly to Growth?”.

Besley and Ghatak (2010). “Property Rights and Economic Development”. (review paper)

Module 6. The role of Culture: (i) Cultural and economic growth; (ii) Interaction of culture and institutions

Main Sources:

Lecture 6: videos and slides

Textbooks: DW (Chapter 14)

Academic papers:

Knack and Keefer (1997). “Does Social Capital Have an Economic Payoff? A Cross-Country Investigation”.

Aghion et al. (2010). “Regulation and distrust”.

Gorodnichenko and Roland (2011). “Individualism, innovation, and long-run growth”.

Alesina and Giuliano (2015). “Culture and Institutions”. (review paper)

Guiso et al. (2016). “Long-term Persistence”.

Lowes et al. (2017). “The Evolution of Culture and Institutions: Evidence from the Kuba Kingdom”.

Additional Sources:

Academic papers:

Algan and Cahuc (2010). “Inherited Trust and Growth”.

Alesina and Giuliano (2014). “Family Ties”. (review paper)

Gorodnichenko and Roland (2011). “Which Dimensions of Culture Matter for Long-Run Growth?”.

Dell et al. (2018). “The Historical State, Local Collective Action, and Economic Development in Vietnam”.

Module 7. Deep-rooted Factors of Economic Growth: Geography and Biology (diseases, isolation, domesticable animals, etc.): (i) direct effects, (ii) effects via institutions and culture, (iii) ‘reversal of fortune’ and persistence

Required Sources:

Lecture 7: videos and slides
Textbooks: DW (Chapter 15)

Academic papers:

Gallup et al. (1999). “Geography and Economic Development”.
Sokoloff and Engerman (2000). “Institutions, Factor Endowments, and Paths of Development in the New World”.
Acemoglu et al. (2002). “Reversal of Fortune: Geography and Institutions in the Making of the Modern World Income Differences”.
Diamond (2002). “Evolution, consequences and future of plant and animal domestication”.
Sachs and Malaney (2002). “The economic and social burden of malaria”.
Alesina et al. (2013). ”On the Origins of Gender Roles: Women and the Plough”.
Galor and Ozak (2016). “The Agricultural Origins of Time Preference”.

Additional Sources:

Mehlum et al. (2006). “Cursed by Resources or Institutions”.
Bleakley (2010). “Malaria Eradication in the Americas; A Retrospective Analysis of Childhood Exposure”.
Spolaore and Wacziarg et al. (2013) How deep are the roots of economic development?”.
Alsan (2015). “The Effect of the TseTse Fly on African Development”.

Diversity statement

In an ideal world, science would be objective. However, much of science is subjective and is historically built on a small subset of privileged voices. Many of the readings in this course are authored by white men. Furthermore, the course often focuses on historically important episodes through the lens of authors' perspective, which can be biased. I acknowledge that it is possible that there may be both overt and covert biases in the material due to the lens with which it was written, even though the material is of a scientific nature. Integrating a diverse set of experiences is important for a more comprehensive understanding of science. Please contact me or submit anonymous feedback if you have any suggestions to improve the quality of the course materials.

Furthermore, I would like to create a learning environment for my students that supports a diversity of thoughts, perspectives, and experiences, and honors your identities (including race, gender, class, sexuality, religion, ability, etc.) To help accomplish this:

- If you have a name and/or set of pronouns that differ from those that appear in your official Brown records, please let me know!
- If you feel like your performance in the class is being impacted by your experiences outside of class, please don't hesitate to come and talk with me. I want to be a resource for you. If you prefer to speak with someone outside of the course, Dean Bhattacharyya, Associate Dean of the College for Diversity Programs, is an excellent resource.
- I (like many people) am still in the process of learning about diverse perspectives and identities. If something was said in class (by anyone) that made you feel uncomfortable, please talk to me about it (anonymous feedback is always an option as well).

Academic Integrity statement

Brown demands that all enrolled students behave in accordance with the rules of academic integrity.

"A student's name on any exercise (e.g., a theme, report, notebook, performance, computer program, course paper, quiz, or examination) is regarded as assurance that the exercise is the result of the student's own thoughts and study, stated in his or her own words, and produced without assistance, except as quotation marks, references, and footnotes acknowledge the use of printed sources or other outside help." ([Academic Code](#), p. 5)