
Economic Growth

Economics 4794-001

Tuesday & Thursday 12:30-1:45 p.m.

MUEN E417

Course Outline and Reading List

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Text

There is one required text: David N. Weil, Economic Growth, 2nd edition. There are copies available at CU Bookstore, but you can buy the book through any bookstore.

Objectives of the course

Economic Growth has emerged as an independent area of active field of research within economics. The aim of this course is to synthesize recent ideas and approaches to understanding economic growth at the undergraduate level, and to survey the leading explanations for the causes of growth. This course is organized into three substantive sections. The first examines the degree to which income variations across countries can be attributed to variations in factor accumulation, and, the determinants of factor accumulation. In the second part of the course, we study of the role of productivity and technology in explaining income differences. The third section explores the deeper or fundamental characteristics of countries that may underlie differences in factor accumulation and productivity among countries. We will supplement textbook material with articles about the economic history of country experiences.

Prerequisites

Econ 1088 Math Tools for Economists II or equivalent.

Econ 3070 Intermediate Micro or Econ 3080 Intermediate Macro.

Prerequisite courses should be completed with earned credit before taking this class. If you are uncertain whether you have the prerequisites, you should find this out immediately. Students without the necessary prerequisites will be administratively dropped.

Class Email: I will be using the class email list for this course to communicate information about classes. Please check your CU email account to ensure that you will be up to date with the latest announcements.

Course Requirements and Evaluation

The format of classes will consist of interactive lectures and lab demonstrations. Lab demonstrations basically consist of empirical problems that we will solve in class and hands-on examples of how data may be used to analyze issues in economic growth. There will be an emphasis on quantitative reasoning and problem solving. These exercises will not be handed in for a grade but will be crucial for understanding how to answer questions that may appear on your exams.

Evaluation will be based on a midterm, a final exam, a group presentation of a published research article, and a research paper.

Your grade will have the following components:

Midterm	25%
Research Paper	25%
Presentation and Discussion	15%
Final Exam	35%

Research Paper

In your paper you will compare the growth performance of a country of your choice with the growth performance of two other countries. For example, you may compare the growth performance of Columbia over the years 1970 to 2006 with that of two other countries of similar income and size during the same period. The goal of the paper is to explain the growth performance of the country in question, drawing on concepts covered in class, while demonstrating your competence in quantitative methods and qualitative interpretation. By midterm, you need to send me the name of your chosen country, the names of your comparison countries, and the time period of your study. The paper is due in class on our last meeting, May 3, 2012. The paper should be about 15 pages (double-spaced in 11 point font), including all references and tables and figures.

Presentation and Discussion

The final weeks of the course will introduce you to a number of research papers in the topic of Economic growth. The main focus of our activity will be in-class group presentations of select papers and how they

relate to topics we have covered in class. This will give you a new perspective on how questions of growth translate into data and research. The goal is also to encourage more class participation.

You will know your paper and group assignment by the beginning of Spring Break. Your group will be responsible for a presentation (about 20 minutes) of the paper, and, the crafting of three questions directed to the class to initiate discussion. I will be choosing some of the questions to include in the final exam so try to come up with some good questions! Groups must email me their PowerPoint presentation slides at least 1 hour ahead of class so that we can avoid wasting class time setting up presentation material.

Class Attendance and Participation: Attendance is important for this class. I will hand out sign-up sheets on randomly chosen dates to evaluate this. You can miss 3 classes for any reason. Beyond 3 classes, each recorded absence will negatively impact your final grade by 3% points. If you miss a class, you are strongly encouraged to make an appointment with me to discuss specific questions about the material after you have obtained notes from someone in class.

Policy on Late Work and Exams: There are no makeup examinations for missed exams and no late papers will be accepted. If you miss the midterm due to an emergency, your grade will be reweighted by the final exam. The paper is a long-term project that cannot be missed because of an emergency. There are no extra credit provisions. All students must take the final exam to pass the course.

The final exam is on Tuesday May 8, 1:30 p.m. - 4:00 p.m. It is comprehensive. Students who have three or more final exams on the same day are entitled to reschedule the last exam or exams that day, but must make arrangements to do so no later than Feb. 24. See University policy on final exam scheduling: http://www.colorado.edu/policies/final_exam.html.

Last, but not Least: Additional Class Policies, which are also CU policies.

Honor Code: Cheating and plagiarism are academic offenses and any student caught cheating or plagiarizing will be sanctioned. <http://www.colorado.edu/policies/academic-integrity-policy>.

Classroom Behavior: Courtesy in the classroom is expected. Disruptive conduct includes behavior that hinders or distracts the class from the subject matter or discussion, and may result in academic sanctions, see <http://www.colorado.edu/policies/student-classroom-and-course-related-behavior>.

Disability Accommodations: If you qualify for accommodations because of a disability, please submit to me a letter from Disability Services by the third week of class so that your needs may be addressed. Disability Services determines accommodations based on documented disabilities.

<http://www.Colorado.EDU/disabilityservices>

Religious observance: (see full details of this policy at http://www.colorado.edu/policies/fac_relig.html). If you have a conflict covered by this policy, let me know by the third week of class so as to allow ample time to make alternative arrangements.

Topic Outline and Readings

The schedule is approximate and subject to change based on class progress. Articles assigned for reading will be available on library e-reserves.

I. Introduction and Preliminaries

(Week 1 and 2) Chapter 1 and 2: Differences in the level and rate of income growth among countries.

Theory: Working with growth rates; review of the logarithm function.

Readings:

- Debraj Ray, *Development Economics*, Ch. 2.
- Lant Pritchett. "Divergence, Big Time," *Journal of Economic Perspectives*, 1997, 11(3), p. 3-17.
- Abhijit Banerjee and Esther Duflo, "The Economic Lives of the Poor," *Journal of Economic Perspectives*, 21(1), 2007.

II. Factor Accumulation

(Week 3 and 4) Chapter 3: Capital's Role in Production

Theory: Harrod-Domar Model; the Solow Model.

Reading:

- Ray, pp. 47-57.

(Week 5 and 6) Chapter 4: The Role of Population in Economic Growth (skip appendix).

Theory: The Malthusian Model; Fertility Transition.

Reading:

- Timothy Guinnane, "The Historical Fertility Transition and Theories of Long Run Growth: A Guide for Economists," *Journal of Economic Literature*.

(Week 7) Chapter 6: The Effect of Human Capital on Growth

Theory: Return to Education.

Midterm, Mar. 1

III. Productivity

Chapter 7: How much does productivity growth differ among countries?

Theory: Growth Accounting, Total Factor Productivity

Chapters 8 and 9: Can technological gaps explain differences in productivity?

Theory: Model of Technological Change

Reading:

- Joel Mokyr. *The Enlightened Economy*, (Yale, 2010), Ch. 7. “Technological Change in the Industrial Revolution.”
- William D. Nordhaus, “Two Centuries of Productivity Growth in Computing” *Journal of Economic History*, 67 (1), 2007.

Chapter 10: How much of productivity differences come from inefficiency?

Theory: Decomposing productivity into technology and efficiency

IV. Fundamentals

(Weeks 12-15) Most dates during these last weeks will be devoted to group presentations and discussions drawn from the following topics. Readings for group presentation will be distributed by Spring Break.

Chapter 12. How Government affects Growth; Is democracy good for growth?

Chapter 13. Inequality and Growth

Chapter 14. Cultural Differences and Growth

Chapter 15: Historical Influences Explaining Differences in Wealth

Chapter 16. Incorporating Resources into Growth

Final Exam: May 8, 1:30 p.m. – 4:00 p.m.