

Growth, Development, & the Environment: Introduction

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Lecture Notes for PhD Growth, Development, & the Environment (EC8510)

Logistics

- ▶ Contact:
 - ▶ Email: jonathan.colmer@virginia.edu
 - ▶ Office hours: Happy to chat at any mutually convenient time in person or on zoom.
- ▶ Grading:
 - ▶ Weekly Research Ideas (30%)
 - ▶ Summer Paper Research Proposal (50%)
 - ▶ Class Participation (20%)
- ▶ Slides posted in advance on Github

Rescheduling Dates

- ▶ September 4th (we may start late)
- ▶ October 9th
- ▶ October 16th

Logistics: Readings and Seminars

- ▶ Reading list posted on Github
 - ▶ I don't expect you to read everything in depth, this is meant to act more as a substantial reference list for each topic.
 - ▶ Try and read the abstract/introduction/conclusion of key papers (I will signal what to read).
 - ▶ Ultimately, read things you think are interesting/will be useful
 - ▶ Be self-aware that you may not know what you think is interesting/useful until you read it
 - ▶ Some readings may be added shortly before/after a lecture
 - ▶ Work, discuss, and read collectively.
- ▶ I would encourage you to actively participate in at least 1 seminar per week even if isn't directly related to your interests/work.

Logistics: Weekly Research Ideas/“Research Therapy”

- ▶ Research is hard.
 - ▶ Focus on developing your own independent research agenda.
 - ▶ What are you interested in?
 - ▶ What questions do you want to know the answer to?
 - ▶ Have they been answered?
 - ▶ If so, what new questions follow on?
- ▶ If you already know the answer, you're doing it wrong.

Logistics: Project Proposals

- ▶ Following on from weekly research ideas you will push forward a single idea.
- ▶ Collectively this accounts for 30% of your final grade.
- ▶ The goal is to see how far you can push an idea forward.
- ▶ At a minimum this is a project proposal, but you're not doing this for me.

Any Questions?

The Big Question(s) in Macro Development

- ▶ Differences in living standards are large and persistent.

- ▶ GDP per Worker (constant 2017 PPP \$)

- ▶ US: \$129k

- ▶ Malawi: \$2.6k

- ▶ Indonesia: \$25k

US work days to produce same as one year:

- ▶ Malawi: 7 days

- ▶ Indonesia: 70 days

- ▶ Why?

The Big Question(s) in Growth and Development

- ▶ Some countries have experienced dramatic increases in relative living standard over the last 70 years.
 - ▶ How was this achieved?
- ▶ Others have languished or even experienced large reductions in relative living standard over this time period.
 - ▶ What could have been done to avoid this?

Why Development Economics?

"Is there some action a government of India could take that would lead the Indian economy to grow like Indonesia's or Egypt's? If so, what, exactly? If not, what is it about the 'nature of India' that makes it so? The consequences for human welfare involved in questions like this are simply staggering: Once one starts to think about them, it is hard to think about anything else."

– Robert E. Lucas (1988)

Why Development Economics?

“A study of LDCs is to economics what the study of pathology is to medicine; by understanding what happens when things do not work well, we gain insight into how they work when they do function as designed. The difference is that in economics, pathology is the rule: less than a quarter of mankind lives in the developed economies.”*

– Joseph Stiglitz (1989)

- ▶ Today less than 15% of the global population live in developed countries.
- ▶ Almost all population growth comes from developing countries.

From the Center to the Periphery of Economics...

The classical economists of the 17th, 18th, and early 19th centuries were all development economists, as they were usually writing about a developing country (in many cases, Britain) going through a process of industrial transformation.

But it is only after 1940 that the subject really took off... [the] literature originated in a clear perception of the limited usefulness... of orthodox economics, particularly in its standard Walrasian form with CRS, pure competition, perfect information, insignificant transaction costs and externalities, supposed institution neutrality, price-sensitive adjustments that unambiguously clear markets, and so on... For many years development economics carried on its lonely and difficult struggle to escape the well-worn grooves of mainstream economics and got marginalized in the process.

– Pranab Bardhan and Chris Udry (1999)

... and Back Again

- ▶ In the past decade Development, as a field, has established and moved from the fringe back towards the very center of the discipline.
- ▶ John Bates Clark medals to Esther Duflo (2010), Dave Donaldson (2017), and Melissa Dell (2020)
- ▶ Nobel prizes for Angus Deaton (2015), Esther Duflo, Abhijit Banerjee, and Michael Kremer (2019)
- ▶ However, very few economists label themselves as development (and only development) economists anymore.

Development +

- ▶ Much of the frontier work in development is combined with frontier work in other fields,
 - ▶ Trade and Development
 - ▶ IO and Development
 - ▶ Public Finance and Development
 - ▶ Environment and Development
 - ▶ Political Economy and Development
- ▶ Increasingly research in development economics is gravitating towards: theory, macro, structural estimation.
- ▶ In all cases, data and thoughtful identification is crucial.

Why Growth, Development & the Environment?

- ▶ Eliminating extreme poverty and confronting environmental degradation are two of the most pressing global challenges of our time.
- ▶ Environmental degradation worsens poverty.
- ▶ Efforts to promote growth and development are critical to eliminating poverty, but can exacerbate environmental degradation
- ▶ **Fundamental Question:** How do we balance growth and the externalities from growth?

Course Outline

- ▶ Measurement and Facts
- ▶ Growth and Poverty Traps
- ▶ Development Accounting
- ▶ Misallocation
- ▶ Topics in Environmental Economics

Any Questions?