

Topics in Development Economics
Instructor: Rajesh Ramachandran

Overview

The course introduces students to the field of economics of development. We will start off by discussing how we conceptualize or measure development and its relationship to economic growth. We will then learn about stylized macro facts about growth and some stylized facts about the lives of the poor.

The first part of the course will present a long run historical view to understanding today's large differences in the levels of per capita income across countries, and in particular, the role of institutions, geography and human capital. We will visit the theories of Jared Diamond, as well as try and understand what explains the great divergence between Europe and the rest of the world in the early modern era. We will then look at theories of structural change, demographic transition and poverty traps, as well as explore the salient features of firm dynamics and management in the global South.

We will next turn to a more micro based view of development. We will look at the state of education and health with a particular focus on sub-Saharan Africa. This will be followed by looking at the role of culture, ethnicity and gender and its role in the process of economic development. The second part of the course will pay particular attention to the causal revolution in methodology that has occurred over the last two decades. We will during the process of dealing with these topics also familiarize ourselves with the new techniques – difference-in-differences, instrumental variable regressions and randomized control trials.

Week 1

Introduction to development economics

We will have a small introduction to what motivates us to study the question of economic development by highlighting the differences in the levels of well-being and development on a global comparative scale. We will then discuss the key aspects to be covered in the course. The first lecture will then deal with the key question of how do we conceptualize and measure well being. We will compare and contrast commodity accounting and the utilitarian calculus with the capability approach.

Week's learning outcomes

1. Have an understanding of the differences in the levels of well-being across countries based on the human development index and its constituent terms.
2. Understand how income and economic growth might be an incomplete indicator for capturing well-being or development.
3. How multidimensional poverty is measured and why it might provide a different picture on the state of well-being compared to poverty lines based on income indicators.

Key Readings

1. Sen, A. K. (1990), 'Development as Capability Expansion', in Keith Griffin and John Knight (eds), *Human Development and the International Development Strategy for the 1990s*, London: Macmillan, pp. 41-58.
2. Nussbaum, M. C. (2003), 'Capabilities as Fundamental Entitlement: Sen and Social Justice', *Feminist Economics*, 9(2-3), 33-59.
3. Sugden, R. (1993), 'Welfare, Resources, and Capabilities: A Review of Inequality Reexamined by Amartya Sen', *Journal of Economic Literature*, 31, 1947-62.

Week 2

Economic Growth, Development and Lives of the Poor

We will look at the standard prediction of the growth models on convergence and how do they match the empirical realities. We will then examine the differences in the assumption underlying the growth approach and the development approach. In particular, the role of market and government failures.

We will then turn to understanding certain basic facts about the economic lives of the poor: how they spend their money; how do they earn; and consequently understand the market environment they face and public infrastructure they have access to. This will help us probe the validity of the assumptions underlying the growth and development approach.

Week's learning outcomes

1. Have an understanding of the the patterns of convergence, as well income mobility, across countries.
2. Understand the key differences in the assumptions of the growth and the development approach.
3. A picture of the economic lives of the poor.
4. An understanding of the nature of market and government failures that poor have to face.

Key Readings

1. Banerjee, Abhijit V., and Esther Duflo. "The economic lives of the poor." *Journal of economic perspectives* 21.1 (2007): 141-167.
2. Das, Jishnu, Jeffrey Hammer, and Kenneth Leonard. "The quality of medical advice in low-income countries." *Journal of Economic perspectives* 22.2 (2008): 93-114.
3. Chaudhury, Nazmul, et al. "Missing in action: teacher and health worker absence in developing countries." *Journal of Economic perspectives* 20.1 (2006): 91-116.

Week 3

The long run divergence debate - The role of geography

We will look at why geography might matter in contemporary times for economic development, in particular through the disease burden its imposes, and the varying costs of transportation and mobility.

We will next turn to understanding why geography might have an important role to play in the long run, in particular, how it affected which parts of the world where the first to convert from hunter gatherers to agriculturalists, as well as the first ones to domesticate mammals. We

will explore why the transition from hunter gatherer to agriculturalists and the ability to domesticate animals had important implications for human societies.

Week's learning outcomes

1. Have an understanding of the channels through which geography matters in contemporary times
2. Have an understanding of the channels through which geography shaped historical possibilities for development.
3. The challenges to the view that geography is a primary factor in affecting economic development.

Key Readings

1. Diamond, Jared M. *Guns, germs and steel: a short history of everybody for the last 13,000 years*. Random House, 1998. (Ch. 4 Farmer Power)
2. Acemoglu, Daron, Simon Johnson, and James Robinson. "Reversal of Fortune: Geography and Institutions in the Making of the Modern World Income Distribution," *Quarterly Journal of Economics*, 117, (2002): 1231-1294
3. Chanda, Areendam, C. Justin Cook, and Louis Putterman. "Persistence of fortune: Accounting for population movements, there was no post-Columbian reversal." *American Economic Journal: Macroeconomics* 6.3 (2014): 1-28.

Week 4

Colonization and its long run consequences: The role of Institutional Persistence

We will look at the long run consequences of one of the key historical events of the past millennium, the European colonization of the world.

We will first explore the role of factor endowments and disease burden in shaping the kind of institutions that were implemented by the European colonisers. We will then turn to understanding how these institutions have persisted into contemporary times. Finally, we explore four case studies from Peru, India and Africa to better illustrate the workings of the theory.

Week's learning outcomes

1. Have an understanding of the role of factor endowments and disease burden affected the incentives of the colonizers to implement different institutional arrangements.
2. The distinction between inclusive and extractive institutions.
3. The mechanisms through which institutional arrangements of the past persist in to the present.
4. Understand how instrumental variable regressions; regression continuity design and natural experiments are employed to estimate causal effects.

Key Readings

1. Engerman, Stanley, and Kenneth L. Sokoloff. "Institutions, factor endowments, and paths of development in the new world." *Journal of economic Perspectives* 14.3(2000): 217-32.
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3. Dell, Melissa. "The persistent effects of Peru's mining mita." *Econometrica* 78.6 (2010): 1863-1903.
4. Iyer, Lakshmi. "Direct versus indirect colonial rule in India: Long-term consequences." *The Review of Economics and Statistics* 92.4 (2010): 693-713.
5. Michalopoulos, Stelios, and Elias Papaioannou. "The long-run effects of the scramble for Africa." *American Economic Review* 106.7 (2016): 1802-1848.

Week 5 and Week 6

The Rise of Europe

We will look at the theories explaining why Europe was the first region to escape the Malthusian trap and industrialize.

We will look the three schools of thought: the internal view propounded by scholars such as Landes (1998), who have highlighted the uniqueness of the European experience and attributed its rise to its unique institutional framework. The view of scholars like Eric Williams and Andre Gunder Frank, highlighting the importance of colonial extraction. Finally, we will turn to the work of Pomeranz (2000) who have argued for a more balanced approach highlighting the key role of the privileged access of Europe to resources from the New world, as well as some features of institutional change.

Finally, we explore four case studies highlighting the role of discovery of silver in the new world, the feudal origins of European institutions, the impact of the Protestant Reformation and the implications of the combination of the plague, urbanization and war in escaping the Malthusian trap.

Week's learning outcomes

1. Have an understanding of the various schools of thoughts to explain the economic development of Europe.
2. Understanding the role of availability of resources from the new world in Europe's economic transformation.
3. The feudal origins of European institutions.
4. The implications of the Protestant Reformation.

Key Readings

1. Pomeranz, Kenneth. "The great divergence." *The Great Divergence*. Princeton University Press, 2009. Introduction and Ch. 1.
2. Palma, Nuno. "The real effects of monetary expansions: evidence from a large-scale historical experiment." *The Review of Economic Studies* 89.3 (2022): 1593-1627
3. Blaydes, Lisa, and Eric Chaney. "The feudal revolution and Europe's rise: Political divergence of the Christian west and the Muslim world before 1500 CE." *American Political Science Review* 107.1 (2013): 16-34.
4. Becker, Sascha O., Steven Pfaff, and Jared Rubin. "Causes and consequences of the Protestant Reformation." *Explorations in Economic History* 62 (2016): 1-25.
5. Voigtländer, Nico, and Hans-Joachim Voth. "The three horsemen of riches: Plague, war, and urbanization in early modern Europe." *Review of Economic Studies* 80.2 (2013): 774-811.

Week 7

Randomized Control Trials (RCTs)

We will have an introduction to the scientific method of RCTs. We will study how RCTs help solve the central problem of causal inference through generating an appropriate control group. We will examine the methods of individual and cluster randomization and the key issues that we need to think about when designing a RCT.

Week's learning outcomes

1. Understand how RCTs solve the inference problem.
2. The distinction between individual and cluster level randomization.
3. The pros and cons of cluster randomization.
4. The key aspects to think about when designing trials.

Key Readings

1. Muralidharan, Karthik. "Field experiments in education in developing countries." *Handbook of economic field experiments*. Vol. 2. North-Holland, 2017. 323-385.
2. Duflo, Esther, Rachel Glennerster, and Michael Kremer. "Using randomization in development economics research: A toolkit." *Handbook of development economics* 4 (2007): 3895-3962.

Week 8

Education

Creating an educated and skilled workforce is a key challenge for developing economies. In this lecture, we will look at the global trends in education. We will examine the picture with regard to both quantity, as well as quality of human capital. We will then turn to India and sub-Saharan Africa to understand the quality issues these systems are facing. Finally, we look at the factors that go into improving student learning outcomes and the most recent evidence based on RCTs in such setting.

Week's learning outcomes

1. Have an understanding of distinction quality and quantity of human capital.
2. The state of student learning outcomes in India and sub-Saharan Africa.
3. The role of inputs, governance and pedagogy as factors in affecting student learning outcomes.
4. RCTs on the role of improving inputs, governance and pedagogy and its implications.

Key Readings

1. Glewwe, Paul, and Karthik Muralidharan. "Improving education outcomes in developing countries: Evidence, knowledge gaps, and policy implications." *Handbook of the Economics of Education*. Vol. 5. Elsevier, 2016. 653-743.
2. Additional articles on education will be assigned.

Week 9

Health

Good health is not only a means to achieving economic objectives but a very important end in itself, as absence of a healthy existence, life satisfaction or well-being is likely to be negatively affected. In this lecture, we will look at the global trends in certain key indicators of health - life expectancy, infant and maternal mortality rates. We will then look at the major risk factors in global mortality and the key factors underlying the increase in life expectancy. We will then examine two salient features of health related behavior in low income settings and the use of RCTs to shed light on some key health related behaviors.

Week's learning outcomes

1. An overview of gains in the domain of life expectancy.
2. Why out of pocket expenses on health in low income settings are high.
3. Factors that may explain why people invest little in preventive health in low income settings.
4. Use of RCTs to understand whether cost sharing aids or harms adoption of health products.

Key Readings

1. Dupas, Pascaline, and Edward Miguel. "Impacts and determinants of health levels in low-income countries." *Handbook of economic field experiments*. Vol. 2. North-Holland, 2017. 3-93.
2. Dupas, Pascaline. "Getting essential health products to their end users: Subsidize, but how much?." *Science* 345.6202 (2014): 1279-1281.
3. Cohen, Jessica, and Pascaline Dupas. "Free distribution or cost-sharing? Evidence from a randomized malaria prevention experiment." *The Quarterly Journal of Economics* 125.1 (2010): 1-45.
4. Miguel, Edward, and Michael Kremer. "Worms: identifying impacts on education and health in the presence of treatment externalities." *Econometrica* 72.1 (2004): 159-217.

Week 10

Women and Economic Development

We discuss the importance of identity in affecting economic outcomes through the lens of gender. We will examine salient features of gender inequality, namely, labor force participation, gender pay gaps, the childbearing penalty, the implications of unpaid care work, women agency and finally evolution of the women labor force participation in the United States.

Week's learning outcomes

1. An overview of the extent and domains of gender inequality.
2. The role of history in particular the use of plough vs shifting culture in pre-industrial times in affecting female labor force participation today.
3. The childbearing penalty, how it is measured and the factors that underlie the same.
4. The factors underlying the rise of female labor force participation in the United States.

Key Readings

1. Chattopadhyay, R and E Duflo (2004), "Women as policy makers: evidence from a randomized experiment in India", *Econometrica* 72: 1409-1443.
2. Alesina, Alberto, Paola Giuliano, and Nathan Nunn. "On the origins of gender roles: Women and the plough." *The quarterly journal of economics* 128.2 (2013): 469-530.
3. Kleven, Henrik, et al. "Child penalties across countries: Evidence and explanations." *AEA Papers and Proceedings*. Vol. 109. 2014 Broadway, Suite 305, Nashville, TN 37203: American Economic Association, 2019.
4. Goldin, Claudia. "The quiet revolution that transformed women's employment, education, and family." *American economic review* 96.2 (2006): 1-21.