

LPO 8110: Economics of Education
Peabody College, Department of Leadership Policy and Organizations

Spring 2019 Syllabus

Meeting time and location:

Monday, 8:10-11:00 am, Payne Building 108

Instructor:

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Office location: 205B Payne Hall

Office hours: 11 am-12 pm on Mondays or by appointment

Course description:

This course focuses on economic theory, econometric methods and related social sciences research to investigate economic issues in education. We will begin with theory and research that views education as an investment in the future productivity of individuals and economies and that assesses the value of and returns to education. We will next turn to the production of education, considering the different inputs into education, and will examine the role of education in economic growth (domestically and globally). We will also explore the economics of education in early childhood, K-12 education and higher education, with special attention to topics of current policy interest and debate. The course continues with a discussion of the organization of education and the role of incentives in improving organizational and educational effectiveness. We will then turn to research on education markets, school quality and choice and will consider the influence of peers and the educational environment as well. Finally, we will explore various education reforms and efforts to increase accountability in education, with attention to the growing role of econometric methods in measuring and understanding the impacts of educational policies and interventions.

Optional course book (available as an e-book for rent or purchase):

Economics of Education, Michael Lovenheim and Sarah Turner, Macmillan Learning, 2018
(see <https://store.macmillanlearning.com/us/digital/intro/ebooks>)

This book could be a helpful reference for everyone, but I particularly recommend renting this book if you are “rusty” in your economics training or if a more basic introduction to the topics we will study in this course would be helpful to you.

Course requirements and evaluation:

Course grades will be based on the following (as described in detail below):

Weekly discussion and class participation (including discussion leads): 15%

Assignment #1 (due Feb. 4): 2-page critique of education production function for framing and guiding education research, 10%

Assignment #2 (due March 11): Annotated bibliography and paper outline, 15%

Paper on educational reform evaluation (working with another class member, due April 1): 20%

Final paper (due April 29) and short in-class presentation (April 22): 40%

Class participation:

Each week, unless otherwise noted (and/or when other assignments are due), you will be required to prepare and submit two questions for class discussion (no more than two sentences for each question), drawn from your reading of the assigned course materials, by 7 pm on the day before class (Sundays). In addition, you will choose one of the journal articles assigned for required class reading and will take the lead in discussing this article during that class period. The quality and profundity of your discussion questions and your participation and engagement during our class sessions will determine your **class participation** grade.

John Bryson (U. of Minnesota) offers four “hallmarks of good participation” that I recommend to you: (1) risk-taking (i.e., presenting an opposing view or a different interpretation of readings/information); (2) listening (i.e., trying to understand what others are saying and why they are saying it); (3) bringing in your own work-related and other experiences when relevant to the discussions; and (4) monitoring your own participation in terms of both “airtime” and quality.

Two-page critique of education production function for framing and guiding education research

The education production function is a foundational theory/conceptual tool for the economic study of education. What do you see as intuitive or useful about the education production function for framing your own research agenda or intellectual pursuits, and in what ways do you find it to be limiting or unconstructive? This assignment is intended in part to get you started in thinking about the research you will pursue in this class and present in a final paper.

Annotated bibliography and final paper outline:

You will develop an annotated bibliography on a question in the economics of education that interests you (and which you intend to address in the final paper). The annotated bibliography and outline should show how you plan to conduct research on this particular question. The

bibliography should succinctly review the literature on this topic and the data available for analysis, providing just enough description of each item included to show how why it is important to your chosen topic.

Paper on an evaluation of an educational reform/intervention:

For this paper, you can work with another classmate to identify an educational reform or intervention of interest to you and an evaluation of the reform. This can be a local, state, national or international reform, program or intervention, and the evaluation can be of any form/design—qualitative, quantitative, mixed methods, short-term or long-term, process or impact, etc. In the paper, you will be assessing what you learn from this evaluation of the reform/program/intervention: (1) What was the focus of the evaluation? (2) Did you learn whether the program or intervention was effective or worked (or *how* it worked) to achieve its stated objectives? (3) Were the design and methods applied in the evaluation adequate to obtain valid answers to the evaluation questions? (4) If you identify shortcomings of the evaluation, what would be your recommendations to improve future evaluation efforts of a similar reform or intervention? The paper should be approximately 8-10 pages (double-spaced, 1” margins), not including tables, figures and references.

Final paper:

The final paper can be written on a topic in the economics of education of your choosing. In general, your paper should include the following components: (1) clearly define the issue, question or problem you are addressing; (2) describe the framework or theories you are using to approach this issue/question/problem; (3) present your arguments and/or analysis and the evidence that supports them; (4) draw conclusions and make recommendations (as appropriate), referencing the evidence that supports them. If you would like to propose an alternative structure for the paper, you are welcome to set a meeting with me to discuss this. **The final paper (due April 29)** should be approximately 15-20 pages (double-spaced, 1” margins), not including tables, figures and references. **On April 22, you will make a 15-minute presentation to the class to describe your work and findings.**

Honor Code and Diversity and Inclusion:

For this course, you are bound by the terms of the Vanderbilt Honor Code. Any breach of academic honesty, including cheating, plagiarism, or failing to report a known or suspected violation of the Code will be reported to the Honor Council. In particular, papers must assign credit to the sources you use. Material borrowed from another—quotations, paraphrases, key words, or ideas—must be credited following appropriate citation procedures (footnotes or parenthetical citation and bibliography).

You can view the full details of the honor code at the following link:

http://www.vanderbilt.edu/student_handbook/the-honor-system#honorcode

In group work, you are jointly responsible for ensuring that your work is in compliance with the honor code. That is, all group members are responsible for ensuring that each individual's contributions to the product that is submitted for grading do not violate the honor code.

Vanderbilt University supports an inclusive learning environment where diversity and individual differences are understood, respected, appreciated, and recognized as a source of strength.

Course outline:

January 7

1. Introduction to the Economics of Education

Blaug, M. 1985. Where Are We Now in the Economics of Education? *Economics of Education Review*, 4(1):17–28.

Dominic J. Brewer, Guilbert C. Hentschke and Eric R. Ride. 2008. The Role of Economics in Education Policy Research. Ch. 2 in *Handbook of Research in Education Finance and Policy*, edited by Helen F. Ladd and Edward B. Fiske, Routledge, New York, pp. 23-41.

Lavecchia, Adam; Liu, Heidi; Oreopoulos, Philip. 2016. Behavioral Economics of Education: Progress and Possibilities. (*Handbook of the Economics of Education, Volume 5*, 2016, Pages 1–74 and NBER Working Paper 20609).

Optional: Chapter 2, “The Structure and History of Education Markets in the United States,” in *Economics of Education*, Michael Lovenheim and Sarah Turner

January 14

2. Investing in human capital and the returns to education

Psacharopoulos, George and Harry Anthony Patrinos. 2004. Human capital and rates of return. Ch. 1 in the *International Handbook on the Economics of Education*, edited by Geraint Johnes, and Jill Johnes, pp. 1-57.

McMahon, Walter W. 2004. The social and external benefits of education. Ch. 6 in the *International Handbook on the Economics of Education*, edited by Geraint Johnes, and Jill Johnes, pp. 211-259.

Ashenfelter, Orley and Alan Krueger 1994. Estimates of the Economic Return to Schooling from a New Sample of Twins. *The American Economic Review*, Vol. 84, No. 5, pp. 1157-1173.

Trostel, P., I. Walker, and P. Woolley, 2002. Estimates of the economic return to schooling for 28 countries. *Labour Economics*, 9 (1) (2002), pp. 1–16.

Optional: Chapter 4, “The Human Capital Model,” in *Economics of Education*, Michael Lovenheim and Sarah Turner

(No class on January 21, Martin Luther King, Jr. Day)

January 28

3. Education, wages and the signaling value of education

Andrew Weiss, Human Capital vs. Signaling Explanations of Wages, *The Journal of Economic Perspectives*, Vol. 9, No. 4 (Autumn, 1995), pp. 133-154

John H. Tyler, Richard J. Murnane and John B. Willett. 2000. Estimating the Labor Market Signaling Value of the GED. *The Quarterly Journal of Economics*, Vol. 115, No. 2, pp. 431-468.

Joseph G. Altonji and Charles R. Pierret. 2001. Employer Learning and Statistical Discrimination. *The Quarterly Journal of Economics*, Vol. 116, No. 1, pp. 313-350.

Peter Arcidiacono, Patrick Bayer and Aurel Hizmo. 2010. Beyond Signaling and Human Capital: Education and the Revelation of Ability. *American Economic Journal: Applied Economics* Vol. 2, No. 4, pp. 76-104.

Carolina Arteaga. 2018. The effect of human capital on earnings: Evidence from a reform at Colombia's top university. *Journal of Public Economics*, Volume 157: 212-225.

February 4

4. Production of education and resources for production

Assignment #1 due: Critique of education production function for framing and guiding education research

Jennifer King Rice and Amy Ellen Schwartz. 2008. Toward an Understanding of Productivity in Education. Ch. 8 in *Handbook of Research in Education Finance and Policy*, edited by Helen F. Ladd and Edward B. Fiske, Routledge, New York, pp. 131-146.

P. Glewwe and S. Lambert. 2010. Education Production Functions: Evidence from Developing Countries. *International Encyclopedia of Education*, pp. 412-422.

Eric A. Hanushek. 1986. The Economics of Schooling: Production and Efficiency in Public Schools. *Journal of Economic Literature*, Vol. 24, No. 3, pp. 1141-1177.

Alan B. Krueger. 1999. Experimental Estimates of Education Production Functions. *The Quarterly Journal of Economics*, Vol. 114, No. 2, pp. 497-532.

David P. Baker, Brian Goesling and Gerald K. LeTendre. 2002. Socioeconomic Status, School Quality, and National Economic Development: A Cross-National Analysis of the “Heyneman-Loxley Effect” on Mathematics and Science Achievement. *Comparative Education Review*, Vol. 46, No. 3, pp. 291-312.

February 11

5. Effects of education on economic growth, development and inequality

P. Glewwe and K. Muralidharan. 2016. Improving Education Outcomes in Developing Countries: Evidence, Knowledge Gaps, and Policy Implications. *Handbook of the Economics of Education, Volume 5*, 2016, Pages 653–743.

Eric A. Hanushek and Dennis D. Kimko. 2000. Schooling, Labor-Force Quality, and the Growth of Nations. *The American Economic Review*, Vol. 90, No. 5, pp. 1184-1208.

Stephan Klasen. 2002. Low Schooling for Girls, Slower Growth for All? Cross-Country Evidence on the Effect of Gender Inequality in Education on Economic Development. *The World Bank Economic Review*, Vol. 16, No. 3, pp. 345-373.

Eric A. Hanushek and Ludger Woessmann. 2012. Schooling, educational achievement, and the Latin American growth puzzle. *Journal of Development Economics*, Vol. 99, Issue 2, 497-512.

Optional: Stephen Heyneman and Chad Lykins. 2008. The Evolution of Comparative and International Education Statistics. Ch. 7 in *Handbook of Research in Education Finance and Policy*, edited by Helen F. Ladd and Edward B. Fiske, Routledge, New York, pp. 105-127.

February 18

6. Early childhood education

Drew Bailey, Greg J. Duncan, Candice L. Odgers & Winnie Yu. 2017. Persistence and Fadeout in the Impacts of Child and Adolescent Interventions, *Journal of Research on Educational Effectiveness*, 10:1, 7-39.

Jens Ludwig & Douglas L Miller. 2007. Does Head Start Improve Children's Life Chances? Evidence from a Regression Discontinuity Design. *The Quarterly Journal of Economics*, 122(1), pages 159-208.

Lipsey M. W., Weiland C., Yoshikawa H., Wilson S. J., Hofer K. G. (2015). The prekindergarten age-cutoff regression-discontinuity design: Methodological issues and implications for application. *Educational Evaluation and Policy Analysis*, Vol. 37 no. 3: 296-31.

Heckman, J.J., Moon, S.H., Pinto, R., Savelyev, P.A. and A. Yavitz. 2010. The rate of return to the HighScope Perry Preschool Program. *Journal of Public Economics* 94 (1-2): 114-128.

February 25

7. K-12 education inputs

Greenwald, Rob ; Hedges, Larry V. ; Laine, Richard D. 1996. The Effect of School Resources on Student Achievement. *Review of Educational Research*, Vol.66 (3), p.361-96.

Chingos, Matthew M. (2013). Class Size and Student Outcomes: Research and Policy Implications, *Journal of Policy Analysis and Management*, 32 (2): 411-438.

Martorell, Paco, Kevin Stange, and Isaac McFarlin Jr, (2016). Investing in schools: capital spending, facility conditions, and student achievement, *Journal of Public Economics*, 140 (2016) 13–29.

Joshua M. Cowen and Katharine O. Strunk. 2015. The impact of teachers' unions on educational outcomes: What we know and what we need to learn. *Economics of Education Review*, 48: 208–223.

Donald J. Boyd, Pamela L. Grossman, Hamilton Lankford, Susanna Loeb and James Wyckoff. 2009. Teacher Preparation and Student Achievement. *Educational Evaluation and Policy Analysis*, Vol. 31, No. 4 (Dec., 2009), pp. 416-440.

No class on March 4 (spring break)

March 11

Assignment #2: Annotated bibliography and final paper outline due by start of class

8. Higher education: demand and supply-side economics

Gordon C. Winston. 1999. Subsidies, Hierarchy and Peers: The Awkward Economics of Higher Education. *The Journal of Economic Perspectives*, Vol. 13, No. 1, pp. 13-36.

Carlos Calcagno, Thomas Bailey, Davis Jenkins, Gregory Kienzl, Timothy Leinbach. 2008. Community college student success: What institutional characteristics make a difference? *Economics of Education Review* 27: 632–645.

David J. Deming, Claudia Goldin, and Lawrence F. Katz. 2012. The For-Profit Postsecondary School Sector: Nimble Critters or Agile Predators? *Journal of Economic Perspectives*, Volume 26, Number 1, pp 139–164.

Martha Bailey and Susan Dynarski. 2011. "Inequality in College Entry and Completion" in Greg Duncan & Richard Murnane (Eds.) *Whither Opportunity: Rising Inequality, Schools, and Children's Life Chances*, New York: Russell Sage.

Zachary Bleemera and Basit Zafarb, 2018. Intended college attendance: Evidence from an experiment on college returns and costs. *Journal of Public Economics*, Volume 157: 184-211

March 18

9. Organization, finance and incentives in education

Sean P. Corcoran and William N. Evans. 2008. Equity, Adequacy and the Evolving State Role in Education Finance. Ch. 19 in *Handbook of Research in Education Finance and Policy*, edited by Helen F. Ladd and Edward B. Fiske, Routledge, New York, pp. 332-356.

C. Kirabo Jackson, Rucker Johnson, Claudia Persico. 2016. The Effect of School Finance Reforms on the Distribution of Spending, Academic Achievement, and Adult Outcomes. *The Quarterly Journal of Economics* (2016), 157–218.

Steven G. Craig, Scott A. Imberman and Adam Perdue. 2015. Do administrators respond to their accountability ratings? The response of school budgets to accountability grades. *Economics of Education Review*, Volume 49, pp. 55–68.

Thomas S. Dee and James Wyckoff. 2015. Incentives, Selection, and Teacher Performance: Evidence from IMPACT. *Journal of Policy Analysis and Management*, Volume 34, Issue 2, pages 267–297.

March 25

10. Education markets, school quality and choice

Ladd, Helen F. 2002. "School Vouchers: A Critical View." *Journal of Economic Perspectives*, 16(4): 3-24.

Caroline M. Hoxby. 2000. Does Competition among Public Schools Benefit Students and Taxpayers? *American Economic Review*, Vol. 90, No. 5, pp. 1209-1238.

Jesse Rothstein Does Competition among Public Schools Benefit Students and Taxpayers? Comment. *American Economic Review*, Vol. 97, No. 5 (Dec., 2007), pp. 2026-2037.

Joseph G. Altonji, Todd E. Elder and Christopher R. Taber. 2005. An Evaluation of Instrumental Variable Strategies for Estimating the Effects of Catholic Schooling. *Journal of Human Resources*, XL:791-821.

Cullen, Julie Berry, Brian A. Jacob, and Steven Levitt. 2006. The effect of school choice on participants: Evidence from randomized lotteries. *Econometrica* 74.5: 1191-1230.

Atila, Abdulkadiroglu, Parag A. Pathak, and Christopher R. Walters. 2018. Free to Choose: Can School Choice Reduce Student Achievement? *American Economic Journal: Applied Economics*, 10(1): 175–206

April 1

11. Peer effects and the educational environment

Zimmer, Ron W ; Toma, Eugenia F. 2000. Peer effects in private and public schools across countries. *Journal of Policy Analysis and Management*, Vol.19(1), pp.75-92.

Lazear, Edward P. 2001. Educational Production. *The Quarterly Journal of Economics*, 1 August, Vol.116 (3), pp.777-803.

Reardon, Sean .F. 2011. "The widening socioeconomic status achievement gap: new evidence and possible explanations." in Greg Duncan & Richard Murnane (Eds.) *Whither Opportunity: Rising Inequality, Schools, and Children's Life Chances*, New York: Russell Sage, 2011.

Burdick-Will, Julia, Jens Ludwig, Stephen Raudenbush, Robert Sampson, Lisa Sanbonmatsu, and Patrick Sharkey. 2011. "Converging Evidence for Neighborhood Effects on Children's Test Scores: An Experimental, Quasi-Experimental and Observational Comparison." in Greg Duncan & Richard Murnane (Eds.) *Whither Opportunity: Rising Inequality, Schools, and Children's Life Chances*, New York: Russell Sage, 2011.

Paper on an evaluation of an educational reform/intervention due by start of class

April 8

12. Education reform and accountability

Gordon, Nora E. 2008. The Changing Federal Role in Education Finance and Governance. Ch. 17 in *Handbook of Research in Education Finance and Policy*, edited by Helen F. Ladd and Edward B. Fiske, Routledge, New York, pp. 295-313.

Jacob, Brian A. 2005. Accountability, incentives and behavior: the impact of high-stakes testing in the Chicago Public Schools. *Journal of Public Economics*, Volume 89, Issue 5, 761–796.

Dee, Thomas S; Jacob, Brian; Schwartz, Nathaniel L 2013. The Effects of NCLB on School Resources and Practices. *Educational Evaluation and Policy Analysis*, vol. 35 no. 2, 252-279.

Hanley Chiang. 2009. How Accountability Pressure on Failing Schools Affects Student Achievement. *Journal of Public Economics*, Volume 93, Issues 9–10, pp. 1045–1057.

Li Feng , David Figlio and Tim Sass 2018. School accountability and teacher mobility. *Journal of Urban Economics*, 103 (2018) 1–17.

April 15

13. Evaluating educational effectiveness

Scott Condie, Lars Lefgren and David Sims. 2014. Teacher heterogeneity, value-added and education policy. *Economics of Education Review*, 40: 76–92.

Chetty, Raj, John N. Friedman, and Jonah E. Rockoff. 2014. "Measuring the Impacts of Teachers I: Evaluating Bias in Teacher Value-Added Estimates." *American Economic Review*, 104(9): 2593-2632.

Chetty, Raj, John N. Friedman, and Jonah E. Rockoff. 2014. "Measuring the Impacts of Teachers II: Teacher Value-Added and Student Outcomes in Adulthood." *American Economic Review*, 104(9): 2633-79.

Douglas N. Harris and Matthew F. Larsen. 2018. The Effects of the New Orleans Post-Katrina Market-Based School Reforms on Student Achievement, High School Graduation, and College Outcomes. Technical Report: Education Research Alliance of New Orleans.

Nicholas A. Bowman, Sanga Kim, Laura Ingleby, David C. Ford and Christina Sibouih. 2018. Improving College Access at Low-Income High Schools? The Impact of GEAR UP Iowa on Postsecondary Enrollment and Persistence. *Educational Evaluation and Policy Analysis*, Vol. 40, No. 3, pp. 399–419.

April 22

14. Student presentations

Final paper due April 29