

Health Economics  
HSMP 6604, Spring 2021

**Updated: 1/27/2021**

**Instructor**

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**Teaching assistant**

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**Course Title:** Health Care Economics  
**Credit Hours:** Three Credit Hours  
**Meeting Time:** Tuesday and Thursday, 2:30pm to 3:50pm  
**Meeting Place:** Zoom (link available on Canvas)

**HSMP Course Competencies**

MS-HSR 1 and PhD-HSR 1: Identify the main components and issues of the organization, financing, and delivery of health services and public health systems in the U.S.

**Course Overview**

This course introduces the economic foundations of health care. Economic theory and empirical work are fundamental for understanding health policy proposals and the organization of the health care market. We start by covering the foundations of microeconomics: supply and demand for goods and services and how the healthcare market deviates from a perfectly competitive market. We then cover the demand for medical care and health insurance. We proceed to the supply of medical care and the behavior of health care providers – physicians, hospitals, nursing homes. Other topics include socioeconomic disparities in health, quality measurement, payment models, and economic evaluations. We will discuss in detail the Affordable Care Act and well as other health policy reforms and topics.

**Evaluation**

Grades are based on performance on:

- |              |     |
|--------------|-----|
| • Homework   | 35% |
| • Midterm    | 25% |
| • Final exam | 40% |

**Homework:** Weekly homework assignments are usually due after a week of being posted. **No late homework allowed** unless you have a valid justification, which needs to be communicated *before* the

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due date. Midterm and Final dates TBD. **Note for HSMP PhD students (health services research and health economics):** there are additional questions in homework/exams and extra readings required.

Required textbook: *Health Economics*, Bhattacharya, Hyde, and Tu. 2014 Ed, Palgrave MacMillan. **Please buy the book.**

Helpful books (some chapters will be assigned):

Cutler, D.M., 2005. *Your money or your life: Strong medicine for America's health care system*. Oxford University Press.

Krugman, P.R, 1994. *Peddling prosperity: Economic sense and nonsense in the age of diminished expectations*. WW Norton & Company. (This book is not about health economics, but about how economic analysis is used and the role of politics.)

McAfee PR, Lewis T, Dale DJ. *Introduction to Economic Analysis*. This textbook is free. The current version is here: <https://vita.mcafee.cc/Introecon/ieav21.pdf>

Additional Reading Material: Posted on Canvas. **Starred articles are optional.**

Expectations: **Attendance is not required** but is highly recommended. Please do ask questions during class. Email the instructor or the TA when you have questions.

### **Academic Conduct Policy**

All students are expected to abide the Honor Code of the Colorado School of Public Health. Unless otherwise instructed, all of your work in this course should represent completely independent work.

Students are expected to familiarize themselves with the Student Honor Code that can be found at [https://www.ucdenver.edu/docs/librariesprovider151/default-document-library/coloradosph-honor-code.pdf?sfvrsn=5d211eb9\\_4](https://www.ucdenver.edu/docs/librariesprovider151/default-document-library/coloradosph-honor-code.pdf?sfvrsn=5d211eb9_4)

or the Education – Calendar and Policies section of the ColoradoSPH website. Any student found to have committed acts of misconduct (including, but not limited to cheating, plagiarism, misconduct of research, breach of confidentiality, or illegal or unlawful acts) will be subject to the procedures outlined in the ColoradoSPH Honor Code.

### **Accommodations for Disabilities: Virtual and In-Class**

University of Colorado Anschutz is committed to providing equitable access to learning opportunities to students with documented disabilities (e.g. mental health, attentional, learning, chronic health, sensory, or physical). To ensure access to this class, and program, please contact Sherry Holden ([sherry.holden@cuanschutz.edu](mailto:sherry.holden@cuanschutz.edu)) for disability services to engage in a confidential conversation about the process for requesting reasonable accommodations in the classroom and clinical settings.

Accommodations are not provided retroactively Students are encouraged to register with Disability Resources and Services as soon as they begin their program. The Colorado School of Public Health encourages students to access all resources available through Disability Resources and Services for consistent support and access to their programs. More information can be found online at:

<http://www.ucdenver.edu/student-services/resources/disability-resources->

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[services/CU%20ANSCHUTZ%20MEDICAL%20CAMPUS/CU%20Anschutz%20Disability%20Resources%20Contact%20Form/Pages/form.aspx.](#)

**Mental Health Services**

<https://www.ucdenver.edu/life/services/student-health/mental-wellness/Pages/default.aspx>

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**Note:** Syllabus will be updated during the semester to reflect readings and additional material. I organized the lectures into weeks, but we may need to adjust the timing. **Starred articles are optional.** Articles marked with a **GS** are required readings for PhD students (health services research and health economics).

### **Week 1: Overview of the class and an introduction to microeconomics**

Overview of the topics we will cover during the semester and other class logistics. Review of health through history and the relationship between health and health care as well as health and income/education. The relationship between income/education and health vary between and within countries. Improvements in medical care have contributed to life expectancy and health outcome gains, so what is exactly the problem of spending more on health care?

Bhattacharya, Hyde, and Tu (**BHT**), Chapter 1

Cutler, DM. "What Is the US Health Spending Problem?" *Health Affairs* 37, no. 3 (February 14, 2018): 493–97.

Krugman, PR. Two Cheers for Formalism. <http://web.mit.edu/krugman/www/formal.html>

GS, \*Cutler, DM, Deaton A, Lleras-Muney A., "The Determinants of Mortality," *Journal of Economic Perspectives*, 2006, 20(3), 97-120.

\*Case, A. and Deaton, A., 2015. Rising morbidity and mortality in midlife among white non-Hispanic Americans in the 21st century. *Proceedings of the National Academy of Sciences*, 112(49), pp.15078-15083.

\*Garber, A.M. and Skinner, J., 2008. Is American health care uniquely inefficient? *Journal of Economic Perspectives*, 22(4), pp.27-50.

### **Week 2: Perfectly competitive markets versus the market for health care (microeconomics 101)**

We continue with a review of basic supply and demand in economics with a focus on perfectly competitive markets and deviations from perfect competition, which is the bulk of economics and actual markets. We contrast the characteristics of a perfectly competitive market with the characteristics of the health care market.

Arrow KJ, Uncertainty and the Welfare Economics of Medical Care, *American Economic Review*, 1963.

Knight, V. "Retiree Living the RV Dream, Fights A Nightmare \$12,387 Lab Fee," *NPR News*, 12/23/2020:

<https://www.npr.org/sections/health-shots/2020/12/23/949287668/retiree-living-the-rv-dream-fights-a-nightmare-12-387-lab-fee>

GS, \*Fuchs, V.R., 1996. Economics, values, and health care reform. *American Economic Review*, 86(1), pp.1-24.

\*McAfee, Lewis, and Dale. Chapters 1,2,9,12. <https://vita.mcafee.cc/Introecon/ieav21.pdf>

### **Weeks 3 and 4: Demand for health and health care**

We review studies and concepts related to how people demand health care, including studies trying to understand if people demand health care as if were any other good or if health care is a special type of

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product. We will cover the “canonical” Grossman model, which is still the standard conceptual framework for understanding the demand for health. We review different ways of conceptualizing disparities in health.

BHT, Chapters 2, 3, 4 (Demand for health care, Demand for health: the Grossman model, Socioeconomic disparities in health)

GS: Grossman, M., 2000. The human capital model. In Handbook of health economics (Vol. 1, pp. 347-408). Elsevier. (Update of: “On the Concept of Health Capital and the Demand for Health,” *Journal of Political Economy*, 1972, 80(2), 223-255.) (**Read the introduction and conclusion; PhD students, go over the entire paper**)

\*Zweifel, P., 2012. The Grossman model after 40 years. *The European Journal of Health Economics*, 2012.

\*Kaestner, R., 2013. The Grossman model after 40 years: a reply to Peter Zweifel. *The European Journal of Health Economics*, 14(2), pp.357-360.

\*Heckman J, Mosso S, The Economics of Human Development and Social Mobility. Working paper: [http://humcap.uchicago.edu/RePEc/hka/wpaper/Heckman\\_Mosso\\_2014\\_economics-human-development.pdf](http://humcap.uchicago.edu/RePEc/hka/wpaper/Heckman_Mosso_2014_economics-human-development.pdf)

\*Aron-Dine, A., Einav, L. and Finkelstein, A., 2013. The RAND health insurance experiment, three decades later. *Journal of Economic Perspectives*, 27(1), pp.197-222.

\*Becker, GS., Tomas JP, and RR. Soares, “The Quantity and Quality of Life and the Evolution of World Inequality,” *American Economic Review*, 2005, 95(1), 277-291.

\*Finkelstein, A., Hendren, N. and Luttmer, E.F., 2019. The value of Medicaid: Interpreting results from the Oregon health insurance experiment. *Journal of Political Economy*, 127(6), pp.2836-2874.

\*Taubman, S.L., Allen, H.L., Wright, B.J., Baicker, K., Finkelstein, A.N., 2014. Medicaid increases emergency-department use: evidence from Oregon's Health Insurance Experiment. *Science*, 343(6168), pp.263-268.

\*Cutler, D.M. and Lleras-Muney, A., 2010. Understanding differences in health behaviors by education. *Journal of Health economics*, 29(1), pp.1-28.

\*Cutler, D.M. and Lleras-Muney, A., 2006. Education and health: evaluating theories and evidence (No. w12352). National bureau of economic research.

### **Weeks 5 and 6: Supply of health care: physicians, hospitals, and nursing homes**

We review how providers –physicians, hospitals, medical practices, nursing homes—supply health care services. We discuss current policy issues regarding hospitals and nursing homes.

BHT, Chapters 5, 6 (The labor market for physicians, The hospital industry)

Mor, V., Zinn, J., Angelelli, J., Teno, J.M. and Miller, S.C., 2004. Driven to tiers: socioeconomic and racial disparities in the quality of nursing home care. *The Milbank Quarterly*, 82(2), pp.227-256.

\*Cromwell, J. and Mitchell, J.B., 1986. Physician-induced demand for surgery. *Journal of Health Economics*, 5(4), pp.293-313.

\*Lindrooth, R.C., Perrailon, M.C., Hardy, R.Y. and Tung, G.J., 2018. Understanding the relationship between Medicaid expansions and hospital closures. *Health Affairs*, 37(1), pp.111-120.

\*Perrailon, M.C., Konetzka, R.T., He, D. and Werner, R.M., 2019. Consumer response to composite ratings of nursing home quality. *American Journal of Health Economics*, 5(2), pp.165-190.

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- \*Konetzka, R., Grabowski, D.C., Perrailon, M.C. and Werner, R.M., 2015. Nursing home 5-star rating system exacerbates disparities in quality, by payer source. *Health Affairs*, 34(5), pp.819-827.
- \*Perrailon, M.C., Brauner, D.J. and Konetzka, R.T., 2019. Nursing home response to nursing home compare: the provider perspective. *Medical Care Research and Review*, 76(4), pp.425-443.

**Weeks 7, 8, and 9: Demand for health insurance**

We review key issues regarding the demand for health insurance: uncertainty, risk aversion, and affordability. We will discuss important concepts like adverse selection and moral hazard, which are fundamental for understanding current health reform efforts, including the design of the Affordable Care Act and proposals like single payer systems.

BHT, Chapters 7, \*8, \*9, \*10, and \*11 (focus on Demand for insurance, Adverse selection, Moral hazard)  
\* You only have to read selected sections, discussed later. This part is more technical since some topics are easier to present with more math.

- \*Akerlof, GA., "The Market for 'Lemons': Quality Uncertainty and the Market Mechanism," *Quarterly Journal of Economics*, 1970, 84(3), 488-500.
- \*Rothschild, M and JE. Stiglitz, "Equilibrium in Competitive Insurance Markets: An Essay on the Economics of Imperfect Information", *Quarterly Journal of Economics*, 1976, 90(4), 629-650.
- \*Finkelstein, A, "The Aggregate Effects of Health Insurance: Evidence from the Introduction of Medicare," *Quarterly Journal of Economics*, 2007,122(1), 1-37.
- \*Newhouse J, M Price, J Hsu J, McWilliams M, McGuire TG, 2015. "How Much Favorable Selection Is Left in Medicare Advantage?," *American Journal of Health Economics*, vol. 1(1), pages 1-26, Winter.
- \*Cutler, D.M. and Zeckhauser, R.J., 2000. The anatomy of health insurance. *In Handbook of health economics* (Vol. 1, pp. 563-643). Elsevier.

**Weeks 10 and 11: How are health markets organized or should be organized?**

We discuss the goals of health care markets and how countries have organized the supply of health care (and, to a certain extent, the demand for health care). We discuss different models (Beveridge, Bismark) and the role of government. We also focus on the challenges of an aging population.

BHT, Chapter 15, 16\*, 17\*, 18\*, 19 (focus on The health policy conundrum, The American model, Population aging and the future of health policy)

Berwick, D.M., Nolan, T.W. and Whittington, J., 2008. The triple aim: care, health, and cost. *Health Affairs*, 27(3), pp.759-769.

\* Only some sections, to be determined.

- \*Finkelstein, A., & McKnight, R. (2008). What did Medicare do? The initial impact of Medicare on mortality and out of pocket medical spending. *Journal of Public Economics*, 92(7), 1644-1668.
- \*Berkowitz, E., 2005. Medicare and Medicaid: The past as prologue. *Health care Financing Review*, 27(2), p.11.

**Weeks 12 and 13: The Affordable Care Act (ACA)**

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We will discuss the design of the Affordable Care Act, the most significant health reform since the creation of Medicare and Medicaid. We will focus on the key elements of the ACA including its predecessor, the Massachusetts health reform. We will cover the origin of the ideas, the role of politics, and some of the findings about how the different components of the ACA have impacted outcomes to date.

BHT, ACA supplemental chapter (on Canvas).

**Week 14: Health innovation and economic evaluations: defining and measuring the value of innovations and the value of medical spending.**

Are new interventions worth their cost? Do they have good value? How do we actually define value? Are current health prices justified? And while we discuss these issues, what is the economic value of life?

BTH, Chapters 13 and 14 (Technology and the price of health care, Health technology assessment)  
Cutler, D.M. and McClellan, M., 2001. Is technological change in medicine worth it?. *Health affairs*, 20(5), pp.11-29.

GS: \*Murphy, K.M. and Topel, R.H., 2006. The value of health and longevity. *Journal of Political Economy*, 114(5), pp.871-904.

\*Sanders, G.D., Maciejewski, M.L. and Basu, A., 2019. Overview of cost-effectiveness analysis. *JAMA*, 321(14), pp.1400-1401.

\*Cutler, D.M., McClellan, M., Newhouse, J.P. and Remler, D., 1998. Are medical prices declining? Evidence from heart attack treatments. *The Quarterly Journal of Economics*, 113(4), pp.991-1024.

\*Cutler, D.M., Rosen, A.B. and Vijan, S., 2006. The value of medical spending in the United States, 1960–2000. *New England Journal of Medicine*, 355(9), pp.920-927.

**Week 15: Review**

Review session focusing on the final exam.