AECN 840 Fall 2018

APPLIED WELFARE ECONOMICS AND PUBLIC POLICY

Department of Agricultural Economics University of Nebraska-Lincoln

Instructor: Dr. Emie Yiannaka Office: 314B Filley Hall Phone: 472-2047

E-mail: ayiannaka2@unl.edu

Office Hours: By appointment. The best way to set up a time to meet is via e-mail. Class information: Classes meet on Tuesdays and Thursdays, 3:15-4:30pm at 47 Filley Hall.

Prerequisites: AECN/ECON 873

Welcome to the class!

I look forward to getting to know you and working with you this semester.

COURSE SYLLABUS

COURSE JUSTIFICATION

Suppose in your role as an economist you are asked to advise a food regulator on the implementation of two alternative food policies, one that bans foods that are produced using a certain production process (e.g., Genetic Modification or Genetic Use Restriction Technologies) versus a policy that requires mandatory labeling of these foods. Which policy would you recommend and what would be the economic basis for your suggestion? How would you calculate the economic gains and losses associated with each of these policies? Should the gains and losses to the different groups (e.g., consumers, producers) be given the same or different weights; should heterogeneity within the groups be taken into account? Do you need to consider the effects of these policies on food products and sectors outside those directly affected by the policies? Where should the chain of analysis end?

Welfare Economics provides the theoretical basis for evaluating different policies and the tools that help economists provide answers to the above questions.

COURSE DESCRIPTION AND OBJECTIVES

The course is an application of welfare theory to public policy issues. An overview of the development of welfare economics and its importance for applied economics will be followed by an examination of the challenges of measuring social welfare and choosing welfare criteria. The main part of the course involves examining the theory of welfare economics and the problems encountered when putting the theory to work. In this part we will examine tools that can be used to measure welfare and welfare change for consumers and producers. The last part of the course examines applied welfare economics in practice both at the applied theory and empirical level. Specifically, we will examine how to use economic welfare theory for policy analysis and to assess policy decisions in various areas of economics such as food production, the economics of innovation, intellectual property rights, environmental and natural resources and international trade.

After completing this course you should not only know how to go about answering the questions posed in the above policy dilemma but also understand why another economist may come up with different answers to those same questions. A good understanding of Welfare Economics is critical if one wants to effectively use economics in policy-making.

COURSE REQUIREMENTS AND GRADING PROCEDURES

- ATTENDANCE: All students are expected to be present in all class sessions and actively participate in class discussions.
- ASSIGNMENTS: Each student will make presentations and lead discussion on assigned readings. Summaries of presentations and power points should be uploaded by students on Canvas. Problem sets are designed to test your understanding of the material as well as to let you explore how economic theory tools can be applied to solving real world problems.
 Scores on problem sets submitted up to a day late will be reduced by 20%. Problem sets submitted more than one day late will not receive credit.
- EXAMS: During the course each of you will have to take one midterm and one final exam. Both exams are in-class exams.
- GRADING: Course grades will be determined as follows:

Presentations and problem sets	35%
Classroom participation and evaluations	15%
Midterm exam	20%
Final exam	30%

GRADING POLICY: A=90-100, B=80-89, C=70-79, D=60-69, F=below 60. Plus and minus grades will be given within these ranges.

COURSE MATERIALS

We will be using parts of the following two textbooks:

- Robin Boadway and Neil Bruce. Welfare Economics. Oxford. Blackwell 1984.
- Richard Just, Darrell Hueth and Andrew Schmitz. *The Welfare Economics of Public Policy: A Practical Approach to Project and Policy Evaluation.* Edward Elgar 2004.

All additional readings, journal articles and book chapters, listed in the course outline below will be available on Canvas.

COURSE OUTLINE

1. Introduction to Welfare Economics and Policy Analysis

- Chapter 1 in Just, Hueth and Schmitz, pp. 1-13.
- Chapter 1 in Boadway and Bruce, pp. 1-27.
- Atkinson A. "The Restoration of Welfare Economics." *The American Economic Review*, Volume 101, Number 3, (May 2011): 157-161(5).
- Constanza et al. "Time to Leave GDP Behind." Comment in *Nature* Vol 505, January 2014.

- Runge C. and R. Myers. "Shifting Foundations of Agricultural Policy Analysis: Welfare Economics when Risk Markets are Incomplete." *American Journal of Agricultural Economics*, (December 1985): 1010-1016.
- Stiglitz J. "Information and the Change in the Paradigm in Economics." Nobel Prize Lecture, 2001.

2. The Pareto Criterion, Pareto Optimality and Compensation

- Chapter 2 in Just, Hueth and Schmitz, pp. 14-31.
- Chapter 3 in Just, Hueth and Schmitz, pp. 32-40.
- Chapter 3 in Boadway and Bruce, pp. 61-102.
- Hahn F. "On the Notion of Equilibrium in Economics." Inaugural Lecture, Cambridge University, (1973): 1-41.
- Chipman J. and J. Moore. "The New Welfare Economics 1939-74." International Economic Review, (October 1978): 547-581.

3. Measurement Criteria

3.1 Consumer surplus, WTP, consumer welfare and variation measures

- Chapter 5 in Just, Hueth and Schmitz.
- Chapter 2 in Boadway and Bruce.
- Currie et al. "The Concept of Economic Surplus and its Uses in Economic Analysis." *Economic Journal* (December 1971): 741-99.
- Chapter 6 in Just, Hueth and Schmitz.
- Chapter 7 in Boadway and Bruce, pp. 195-220.
- Willig R. "Consumer's Surplus Without Apology." *American Economic Review*, (September 1976): 589-97.
- Hausman J. "Exact Consumer's Surplus and Deadweight Loss." *American Economic Review* (September 1981): 662-76.

3.2 Producer surplus, producer welfare and the variation measures

- Chapter 4 in Just, Hueth and Schmitz.
- Chapter 7 in Boadway and Bruce, pp.220-223.

3.3 Welfare Measurement

- Mackenzie G. and I. Pearce. "Welfare Measurement: A Synthesis." *American Economic Review* (September 1982): 669-82.
- Chipman J. and J. Moore. "Compensating Variation, Consumer's Surplus, and Welfare." *American Economic Review* Vol. 70, No. 5 (December 1980), pp. 933-949.
- Hanemann M. "Willingness to Pay and Willingness to Accept: How Much Can They Differ?" *American Economics Review* (1991): 635-647.
- Sen A. "The Welfare Basis of Real Income Comparisons: A Survey." *Journal of Economic Literature* (1979): 1-45.

4. Market Failure and the Theory of Second Best

4.1 Causes of Market Failure

- Chapter 4 in Boadway and Bruce, pp.103-131.
- Arrow K. "The Organization of Economic Activity: Issues Pertinent to the Choice of Market Versus Nonmarket Allocation." in *Analysis and Evaluation of Public* Expenditures: The PPB System, Joint Economic Committee, U.S. Congress (1969): 47-64.

4.2 Externalities

- Chapter 13 in Just, Hueth and Schmitz, pp. 527-549.
- Coase R. "The Problem of Social Cost." *Journal of Law and Economics* 3 (Oct. 1960): 1-44.
- Dahlman C. "The Problem of Externality." *Journal of Law and Economics* (1979): 141-62.
- Marchand J. and K. Russell. "Externalities, Liability, Separability and Resource Allocation." *American Economic Review* (Sept., 1973): 611-20.
- Davis O. and A. Whinston. "Externalities, Welfare and the Theory of Games." *Journal of Political Economy* (1962): 241-62.

4.3 Public Goods and the Free Rider Problem

- Chapter 13 in Just, Hueth and Schmitz, pp. 550-560.
- Sugden R. "Reciprocity: The Supply of Public Goods Through Voluntary Contributions." *Economic Journal* (Dec., 1984): 772-787.
- Sugden R. "Spontaneous Order." *The Journal of Economic Perspectives*, Vol. 3, No. 4 (Autumn, 1989), pp. 85-97.
- Dawes R. and R. Thaler. "Anomalies: Cooperation." *Journal of Economic Perspectives* (Summer, 1988): 187-197.
- Sen A. "Rational Fools: A Critique of the Behavioral Foundations of Economic Theory." *Philosophy & Public Affairs* (6) (1977): 317-344.
- Runge C. "Institutions and the Free Rider: The Assurance Problem in Collective Action." *Journal of Politics*, Vol. 46 (1984): 154-81.

4.4 The General Theory of Second Best

- Chapter 4 in Boadway and Bruce pp.131-135.
- Lipsey R. and K. Lancaster. "The General Theory of Second Best." *Review of Economic Studies* (1956-7): 11-32.
- Davis O. and A. Whinston. "Welfare Economics and the Theory of Second Best." *Review of Economic Studies* (January 1965): 1-14.
- Davis O. and A. Whinston. "Piecemeal Policy in the Theory of the Second Best." *Review of Economic Studies* (July 1967): 323-31.

5. Social Welfare Functions, Fairness Theory and Justice

- Chapters 5 and 6 in Boadway and Bruce.
- Sen A. "Personal Utilities and Public Judgments: Or What's Wrong with Welfare Economics?" *Economic Journal* (Sept. 1979): 537-58.
- Schelling T. "Self-Command in Practice, in Policy, and in a Theory of Rational Choice." *American Economic Review* (May, 1984): 1-11.
- Akerlof G. "Loyalty Filters." American Economic Review (March, 1983): 54-63.
- Varian H. "Distributive Justice, Welfare Economics, and the Theory of Fairness." *Philosophy and Public Affairs* (1975): 223-47.
- Fleurbaey M., and F. Maniquet. "Fair Social Orderings when Agents Have Unequal Production Skills." *Social Choice and Welfare* 24, 1(Feb 2005): 93-127.

6. Future Direction in Welfare Theory

- Becker G. "Altruism, Egoism, and Genetic Fitness: Economics and Sociobiology." In Becker (ed.) *The Economic Approach to Human Behavior*, (1976): 282-294.
- Hirshleifer J. "The Expanding Domain of Economics." *American Economic Review* (Dec., 1985): 53-68.
- Akerlof G. and R. Kranton. "Economics and Identity." *Quarterly Journal of Economics* (2000). Vol. CXV, Issue 3: 715-753.
- Bernheim B. D. "Behavioral Welfare Economics." *Journal of the European Economic Association*, (2009) 7(2-3): 267-319.
- Bernheim B.D. and A. Rangel. "Beyond Revealed Preference: Choice-Theoretic Foundation for Behavioral Welfare Economics." *Quarterly Journal of Economics*, (2009) 124(1): 51-104.

7. Welfare Economics Applications

7.1 Welfare Effects in Vertically and Horizontally Related Markets

• Chapter 9 in Just, Hueth and Schmitz.

7.2 The Welfare Effects of Market Structure

• Chapter 10 in Just, Hueth and Schmitz, sect. 10.1-6

7.3 The Welfare Effects of Information

• Chapter 11 in Just, Hueth and Schmitz, sect. 11.1-4.

8. Welfare Economics in Practice: Empirical and Applied Theory Policy Issues

Trade

• Bagwell, K. and R. W. Staiger. "An Economic Theory of GATT." *American Economic Review* (March, 1999): 215-248.

- Maggi, G. "The Role of Multilateral Institutions in International Trade Cooperation." American Economic Review (March, 1999): 190-214.
- Gatsios, K. and L. Karp. "The Welfare Effects of Imperfect Harmonization of Trade and Industrial Policy." *The Economic Journal* (Jan. 1992): 107-116.

Food Policy – Heterogeneity

- Fulton M. and K. Giannakas. "Inserting GM Products into the Food Chain: The Market and Welfare Effects of Different Labeling and Regulatory Regimes." *American Journal of Agricultural Economics* 86(2004): 42-60.
- Giannakas K. and A. Yiannaka. "Market and Welfare Effects of the Second-Generation, Consumer-Oriented GM Products." *American Journal of Agricultural Economics* 90(2008): 152-71.
- Plastina A., K. Giannakas and D. Pick. "Market and Welfare Effects of Mandatory Country-Of-Origin-Labeling in the US Specialty Crops Sector." *Southern Economic Journal* 77, 4(2011): 1044-69.
- Awada, L. and A. Yiannaka. "Consumer Perceptions and the Effects of Country of Origin Labeling on Purchasing Decisions and Welfare." *Food Policy 37* (2012): 21-30.

Property Rights and Externalities

- Katz, M. L. and C. Shapiro. "Network Externalities, Competition and Compatibility." *American Economic Review* (June, 1985): 424-440.
- White, T. Anderson and C. Runge. "Common Property and Collective Action: Lessons from Cooperative Watershed Management in Haiti." *Economic Development and Cultural Change* 43(1) (October 1994): 1-43.