

Economics 432: Environmental Economics
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Rutgers University, Spring 2026
MW 2 pm, ABW 1170

Professor Hilary Sigman

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Office hours: Wednesday 1-1:45 pm or by appointment

Course overview: This course uses economics to analyze public policies for environmental protection. We will discuss the role of environmental policy in a market economy, tools for evaluating public policies, and conventional and incentive-based approaches to environmental policy. Along the way, we will apply the analysis to specific areas of environmental policy and end the class with an extended application to public policy for climate change.

Learning outcomes: You will build on your understanding of microeconomics and learn to apply economic analysis to environmental issues. You will strengthen the mathematical and graphical analysis skills you have developed in earlier economics classes and become more familiar with use of econometrics in practice. Finally, you will likely learn about current public policies for environmental protection.

Prerequisites: Intermediate Microeconomics and Econometrics. This class is an “upper level” elective for the Economics major.

Website: The class has a [Canvas](#) website with presentations, readings, problems, and sample exam questions. Materials are arranged in weekly Canvas Modules. The materials on the Canvas site are for your personal use only and may not be reposted to other websites. Please make sure that the e-mail address linked to Canvas is one you check regularly because it will be used for any last-minute communications (e.g., snow days).

Readings: The main text, *Markets and the Environment*, 2nd edition, Nathaniel O. Keohane and Sheila M. Olmstead (Island Press, 2016, ISBN: 978-1-61091-607-3) The textbook is available free as an [e-book](#) from [Rutgers University Libraries](#). In addition, the RU Bookstore should have some copies for sale. The textbook is somewhat less advanced than the class. To provide more technical background and expand the covered topics, other readings will be posted in the Canvas modules as the term progresses. Unless otherwise indicated, reading the text and other materials is required classwork.

In-class response: Most class periods will include a few (4-8) clicker questions. Responding to a question will give you 1 point plus an additional 1 point if your response is correct. Your lowest 5 class clicker scores will be dropped. These dropped scores can serve as an automatic excuse for illness, conflicts, or technical issues with the app (though please let me know about technical issues and we will try to sort them out). No other excuses will be available. I will occasionally

audit students' presence in the classroom to compare with the clicker attendance. Clicker points will be rescaled to contribute 10% of the overall score in the class.

Exams: Two in-class midterm exams (**Wed, Feb 25** and **April 8**) and a cumulative final exam at the time scheduled by the Registrar (**Friday, May 8, 4-7 pm**). Please check to be sure that you can attend all the exams before deciding to take the class. Except in cases of *documented* medical necessity or family emergency, there will be no alternative exam dates. The exams will be mostly multiple choice with a few open-ended questions.

Grading policy: Course grades will be based on clicker scores (10%), midterms (22.5% each), and final (45%). All course grades will be curved. No extra credit assignments will be available for any reason and no other criteria or weights will be used in assigning grades.

Academic Integrity: Students must submit their own work and respond with their own clickers. Even initial violations of academic integrity will be taken extremely seriously and may result in grade penalties, disciplinary sanctions, or educational sanctions. For more information, please consult the [Rutgers academic integrity policy](#).

Student Wellness Services: Counseling, ADAP & Psychiatric Services (CAPS): (848) 932-7884 www.rhscaps.rutgers.edu. Please take care of yourself and your fellow students.

Spring 2026 Calendar

Rutgers Economics 432: Environmental Economics Professor Sigman

Day	Topic	Reading (ch/pp in Keohane & Olmstead)
W, 1/21	Economics and the environment	pp. 12-30 in ch 2 & pp 74-78 in ch 4
M, 1/26	Public goods	pp. 85-91 in ch 5
W, 1/28	Public goods/Externalities	pp. 80-85 in ch 5
M, 2/2	Externalities/Property rights	pp. 140-143 and p. 144 box in ch 8
W, 2/4	Valuing the environment	pp. 44-52
M, 2/9	Travel cost method	Reading on Canvas
W, 2/11	Hedonic price method	Reading on Canvas
M, 2/16	Stated preference method	pp. 52-55 and pp. 46-48 (WTP/WTB) in ch 3
W, 2/18	Valuing risk reduction	Reading on Canvas
M, 2/23	Problems	
W, 2/25	*First Midterm Exam	
M, 3/2	Cost effective environmental policy	pp 169-176 in ch 9
W, 3/4	Taxes and subsidies	pp. 144-158 in ch 8
M, 3/9	Taxes and subsidies	
W, 3/11	Emission trading	pp. 177-8 in ch 9
M, 3/23	Emission trading	pp. 200-207 (on EU ETS) in ch 10
W, 3/25	Taxes vs trading	pp. 162-6 in ch 8 and pp. 190-4 in ch 9
M, 3/30	Incentives for innovation	pp. 179-184 in ch 9
W, 4/1	Monitoring and enforcement	Reading on Canvas
M, 4/6	Problems	
W, 4/8	*Second Midterm Exam	
M, 4/13	Legal liability as environmental policy	Reading on Canvas
W, 4/15	Income, growth, and the environment	Box on p. 235 and pp. 245-52 in ch 11
M, 4/20	International trade and the environment	Reading on Canvas
W, 4/22	Estimating climate change harms	Readings on Canvas
M, 4/27	Social cost of carbon/discounting	Readings on Canvas
W, 4/29	International climate agreements	Readings on Canvas
M, 5/4	Problems	
Fri, 5/8, 4 pm	*Final Exam (cumulative)	