Environmental Economic Geography

G&ES 631 (3 credits) Spring 2012

Instructor: James T. Hathaway, member of Association of PA State College & University

Faculties (APSCUF). APSCUF is committed to promoting excellence in all that we do to ensure that our students receive the highest quality education.

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When and Where: M, 6:30-9:00, 153 ATS

Office Hours: M: 2:00-2:45, T: 2:15-4:15; Th, 2:15-4:30; feel free to see me at other times

Required Text: Juliet Schor, *Plenitude: The New Economics of True Wealth (*Penguin, 2010); other

readings will be distributed each week

Catalog Description

Environmental economic geography takes a geographical approach to the interface between nature and the economy, with an emphasis on patterns and trends in environmental services and resource management.

Student Learning Outcomes (or goals)

Goals and outcomes are two sides of the same coin. Both involve reaching a desired level of achievement, with goals referring to a level of accomplishment you are trying to reach, while outcomes refer to a level of accomplishment you have reached at the end of a process of striving. The overall goal of this class is for you to develop competence in using geographic and economic tools to analyze and evaluate sustainability issues. At the end of the course, you should achieve the course outcomes listed below, and these in turn will help you achieve the program outcomes, which are also listed below. Finally, both sets of outcomes dovetail with the following University Outcomes for Student Learning and Development: communication, critical thinking and problem solving, values and ethics, global interdependence, and professional proficiency.

Course Learning Outcomes	Outcomes in Brief	
Evaluate differing geographic and economic perspectives on the interface between	Geographic and	
nature and economy at local through global scales	economic skills	
Become familiar with the policies and instruments designed to enhance the	Geographic and	
environmental performance of private and public sector organizations and learn	economic skills	
how to evaluate the effectiveness of those policies and instruments		
Articulate the nature, history, geography, and potential futures of a broad range of	Geographic and	
firms, agencies, and organizations in the environmental sector	economic skills	
Demonstrate analytical skills through the use of spreadsheet and mapping software	Quantitative and	
in data collection and analysis	mapping skills	
See improvement in your ability to apply the skills common to all academic	Academic skills	
disciplines, including writing, speaking, collaborative work, and critical thinking		
(see list of critical thinking skills below)		

Program Learning Outcomes

Understand the relevant concepts and methods of science, economics, politics, ethics, design, and geography pertaining to the sustainability of environmental resources and quality of life

Critically evaluate the sustainability of energy and resource systems, technology, the built environment, and environmental regulations and policy

Work effectively within the private and public sector to develop and implement sound and equitable strategies for achieving sustainability

Grading

The table below shows how your learning is evaluated, and the weight given to each method of evaluation.

Methods of evaluation	Point total	Dates, etc.
Class participation	200	
Concept maps/50-word	100	
sentence		
Jobs vs env project	200	March 12
Research project	500	April 30 for presentation, May 11 for project
Total	1000	900-1000 = A, 800-899 = B, 700-799 = C, 600-699 = D

Here is some further information on the components of your final grade.

- The criteria for your participation grade are quality and consistency. An 'A' participant is consistently engaged in class discussion, always demonstrating that she or he has engaged the reading thoroughly and thoughtfully. The 'A' student has questions, ideas, or observations about the assignment and does not substitute quantity of participation for quality. A 'B' discussant is less consistent than an 'A' but actively responds to questions posed by the teacher and other students. To get a 'B' in participation, you will need to talk regularly--more, certainly, than a couple of times during a class session. A 'C' means that your contributions have been infrequent and that your involvement did not work consistently to make the class a productive learning experience. A 'D' means that you rarely talked during the semester.
- After a warm-up exercise, you will produce a concept map on one of our reading assignments. A
 concept map graphically represents information with shapes, text, and arrows. Your task is to use
 concept mapping software to represent the contents or argument of a reading and to electronically
 distribute your concept map to class members 48 hours before the start of class. A second
 requirement is the 50-word sentence assignment, in which you summarize the argument of a reading.
- The jobs vs environment project involves the spreadsheet and mapping analysis of economic and environmental data to evaluate the "jobs vs environment" myth.
- For your research project, you will produce a professional paper that applies one or more geographic and economic perspectives and incorporates geographic and economic concepts from the first part of the course to some aspect of the environmental sector included in the second part of the course. The length will be from 3000 4000 words. Also, you will briefly present the results of your project to the class at the end of the semester.

Course Outline and Tentative Schedule			Week	date
1.	The Interface Between Nature and Economy: Perspectives, Concepts, Policy Implications			1/23
	a.	Perspectives on sustainability: economic geography/political economy, environmental economics, ecological economics, 0% vs. 10%	1	1/23
	b. c.	Sustainable development, sustainability indicators, Limits: sources, sinks, thermodynamics, doomsters	2	1/30
	d.	Perspectives on sustainability: environmental economic geography, ecological modernization, techno-economic paradigm, political ecology, environmental skeptics	3	2/6
	e. f.	Consumption, stuff, happiness Lab: jobs vs environment project, environmental quality index	4	2/13
	g. h.	Perspectives on sustainability: alternative social science and science, industrial ecology, natural step, systems thinking Energy: the big picture	5	2/20
	i.	Sustainable and unsustainable food systems, film: "Our Daily Bread"	6	2/27
		Sustainable and unsustainable food systems, continued	7	3/5
Spring break		8		
	j.	Market failure and solutions: externalities, discount rates, natural capitalism, ecosystem services	9	3/19
2.	Αŗ	Applications: Patterns and Trends in the Environmental Sector		
	a.	Environmental services: environmental consulting and remediation in Pittsburgh, brownfields, site assessment	10	3/26
	b.	Environmental services: environmental management systems, ISO 14000	11	4/2
	c.	Green jobs	12	4/9
	d.	Environmental agencies, nongovernmental organizations: policy and instruments, regulations, quotas, taxes	13	4/16
	e. f.	Corporate environmentalism Moving to a sustainable economy	14	4/23
3.	Re	search presentations (last class meeting and final exam week meeting)	15	4/30 5/11

Critical thinking comprises a number of overlapping abilities or strategies. I've listed some below (for another set of definitions, see this web site: http://www.criticalthinking.org/aboutCT/define critical thinking.cfm).

- 1. Observes. One must both look closely and remain open to hidden or unexpected explanations to think critically. Gathering information in a systematic manner can increase one's willingness to accept evidence even if it contradicts one's previous opinions. The recall and comprehension (putting what is recalled in one's own words) of what one sees are important steps in critical thinking.
- 2. Analyzes. In order to truly understand one must break down material into its component parts so that its organizational structure may be understood. In other words, analysis involves knowing the relationships between parts and recognizing the organizational principles that connect them.
- 3. Recognizes ambiguity. Ambiguity means having two or more meanings. Issues are often complex, and that complexity only emerges from confusion if one is able to recognize ambiguity.
- 4. Comes to grips with complexity. Here one recognizes that there are usually no easy answers to important issues or questions. Complex issues do not lend themselves to simple single-cause explanations.
- 5. Identifies assumptions. All reasoning is based on assumptions. An assumption is something taken for granted, i.e., accepted as true without proof, by a thinker but often left unstated. Since assumptions are not mentioned and thus not backed up with evidence, they offer insight into the validity of our own arguments as well as those of others.
- 6. Assumes perspective of another. You may have heard the phrase "walk a mile in their shoes." This saying implies a willingness to explore ideas contrary to one's own beliefs and the ability to see problems and issues in a broader perspective than one's own culture or interest group.
- 7. Adopts multiple perspectives. To adopt multiple perspectives means to see a problem from many angles. There are as many perspectives as there are people, but several important categories include race, class, and gender. Adopting multiple perspectives allows one to anticipate counterarguments and to address them even before one's position is questioned. Multiple perspectives can also lead one to reconsider one's own position.
- 8. Synthesizes. Synthesis puts parts together to form a new whole. It is the opposite of analysis. Synthesis involves seeing connections among various and seemingly unrelated facts and experiences (e.g., different texts, different courses, different personal experiences, or current events, etc.) Creativity is an important part of synthesis, since the connections one finds may be original.
- 9. Recognizes bias. A goal of critical thinking is fair mindedness. One tests one's own impressions in all ways possible. Recognizing bias helps one to see their own assumptions and thus to reduce personal prejudice and to recognize it in others.
- 10. Evaluates. To evaluate one must judge the worth or significance of something and to judge one must have definite criteria. Such criteria may be internal (e.g., how effectively is the purpose carried out?) or external (e.g., why might this work be of interest to someone? How does it compare to other works in its field?)