

School of Urban Planning, McGill University

URBP 506 ENVIRONMENTAL POLICY AND PLANNING

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Tentative Class Schedule:

9:35 a.m.-12:25 p.m. every Wednesday, Winter Term

Room 412, Macdonald-Harrington Building

Tentative Office Hours: 3:00-5:00 p.m., Wednesday

Prerequisites: UG3 and above

COURSE OUTLINE AND OBJECTIVES

The course will address the following question: how should we think about, and what analytical and institutional approaches can we bring to bear on environmental problems, in order to understand them well, and to develop policies to address them effectively?

The course will focus on how environmental decisions ought to be made, but it will also discuss how they are in fact formulated and implemented, in order to provide an understanding of the political-institutional context in which environmental problems need to be resolved. Also, while the focus will be on analyzing specific environmental problems, the course will take a “systems” approach that recognizes linkages between environmental problems, and incorporates broader concerns such as “sustainability”.

Environmental problems involve ecological systems characterized by significant uncertainties and multiple feedback loops, and technological, institutional and human factors that are often resistant to change. Further, environmental problems have a wide range of implications for present and future generations, and involve multiple stakeholders with multiple legitimate interests and concerns that are often in conflict. Therefore, it is desirable to adopt an integrated and inter-disciplinary approach, to generate multiple perspectives, and to explicitly consider uncertainties and technology-institution-human behaviour interactions, in order to understand these problems comprehensively. Also, it is desirable to explore collaborative approaches for integrating the multiplicity of interests and concerns, and reconciling trade-offs and conflicts, in order to develop effective policies. The course will discuss ways and means of achieving these ends.

In addition to policy analysis, the course will also focus on the important but often neglected issue of policy implementation. In this regard, the course will demonstrate the usefulness of considering how people are affected by and respond to policies, for policy

robustness. In order to demonstrate the importance of being sensitive to contextual realities and of avoiding “one size fits all” solutions, policy approaches to environmental problems in the North American and international contexts will be contrasted.

The course will stress the importance of maintaining a critical (including a self-critical) attitude. Students will be encouraged to constantly expose and examine assumptions and value judgments that inevitably underlie every stage of the policy-analytic process, to explore their implications for policy choice, and to re-formulate problems and analytic approaches in light of this critical examination.

Finally, the course will highlight the importance of effective communication in the policy-making process. Students will have the opportunity to apply their learning to real-life environmental problems in their assignments. They will be evaluated on the basis of their ability to communicate the results of their analyses effectively and in a way that is understandable by lay audiences.

While the course is being offered in the School of Urban Planning, it is expected that it will interest students in the Minor in Environmental Engineering within many of the departments in the Faculty of Engineering, in the McGill School of Environment, and in other academic units such as Agricultural and Biosystems Engineering, Geography, Management, Natural Resource Sciences, and Political Science. As such, the course will aim to cater for the needs of students from a range of academic backgrounds, levels of preparation, and interests. At the same time, the course will provide students the opportunity to appreciate that the diversity of perspectives that they themselves bring from their various disciplines is necessary for effectively understanding and addressing environmental problems.

In summary, the course aims to:

- provide an understanding of some critical contemporary environmental problems, and of the political-institutional context in which environmental policies are formulated and implemented
- provide a basis for applying integrative, inter-disciplinary approaches for understanding and analyzing environmental problems in a way that reflects their complexity, and informs effective policy making and implementation
- provide opportunities for learning through application of theory and analytic techniques to real-life environmental problems, and interaction with peers from a range of disciplines
- provide opportunities to develop the ability to think critically, and to effectively communicate ideas, both through written work and oral presentations.

COURSE FORMAT AND CONTENT

The learning approaches in the course will include lectures, readings, class discussions, presentations, and a term paper. Following are the topics that will be covered.

Characteristics of environmental problems, based on examples of some critical contemporary problems from various sectors and contexts, and at the local, regional and global scales; implications for policy analysis, and policy making and implementation; the need for integrated, ecosystem, inter-disciplinary approaches; the notion of “error cost” and the precautionary principle

Environmental externalities, social traps, the environment as a public good; justification for environmental regulation; the “free rider” problem

The political-institutional context in which environmental problems are and need to be addressed; the interplay of actors and interests that shape environmental policies

Risk perception and “mental models”; statistical versus perceived risk; implications for policy making and risk communication

Technological, regulatory, and fiscal policy instruments; technology-following and technology forcing standards; “flexible” and “market-based” mechanisms

The characteristics of good policy analysis;

Economic approaches to valuing policy outcomes; cost-benefit analysis; dealing with risk and uncertainty; the discount rate;

Risk assessment and the notion of “acceptable risk”;

Multiple-objective decision analytic approaches for integrating multi-stakeholder and expert values and judgments;

Life cycle analysis;

Methodological issues

Policy implementation issues; technology-institution-human behaviour interactions; collaborative approaches for reconciling trade-offs and conflicts; negotiation and conflict resolution

The lectures will employ case studies to demonstrate the usefulness of theoretical concepts and analytical approaches. Following are some problems and issues covered in the case studies:

- Solid and hazardous wastes
- Air and water pollution
- Human exposure to toxics
- Transport, energy and the environment
- Alternative energy technologies
- Stratospheric ozone depletion and climate change

COURSE-PACK

A set of readings related to the topics listed under Course Content will be available as a course pack in the McGill Bookstore. These readings will expose students to quality writing in the field of environmental policy, and will supplement material covered in the lectures. Students will be expected to study the readings prior to the class in which the related topics will be discussed, and to be prepared to actively participate in class discussions based on the readings.

COURSE EVALUATION

- 25% for a mid-term take-home examination
- 15% for a presentation on a topic to be selected by the student and approved by the instructor
- 50% for a term paper on the same topic
- 10% for in-class participation

Information on the presentation and term paper, including evaluation criteria, will be presented in the first class. The presentations will be evaluated both by the instructor and the students.

McGill University values academic integrity. Therefore all students must understand the meaning and consequences of cheating, plagiarism and other academic offences under the Code of Student Conduct and Disciplinary Procedures (see www.mcgill.ca/integrity for more information).