HUMAN IMPACT ON THE ENVIRONMENT

GEOG*1220 | Fall 2021

M/W/F 9:30 - 10:20AM
War Memorial Hall

Department of Geography, Environment and Geomatics | University of Guelph

This course provides foundational understanding in the societal dimensions and drivers of environmental issues. Our goal is to understand how some of the world’s most pressing environmental issues - climate change, biodiversity loss, water pollution, and so on - have their roots in human institutions, decisions, and culture/worldviews. We will achieve this goal by integrating perspectives from environmental and social sciences.

The course is best described in three parts. First, we review basic concepts that will help us to think about, or conceptualize, human-environment relationships and human impact on environment. Second, we will explore a range of key issues around resource use and environmental degradation, with particular emphasis on food, energy, and water systems. Third, we will consider some of the strategies that can be pursued in order to reduce human impact on environment; here, we provide an introduction to ideas in environmental governance and environmental justice. Throughout the course we will contrast issues and management approaches in various countries around the world, but with emphasis on Canadian and North American examples.

Course Organization
- Mondays and Wednesdays: lectures
- Fridays: demos, activities, Q&A, and guest lectures

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<thead>
<tr>
<th>Instructor</th>
<th>Dr. Eric Nost</th>
<th><a href="mailto:enost@uoguelph.ca">enost@uoguelph.ca</a></th>
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Office Hours

Learning Outcomes
By the end of this course, you will be able to:
- Describe environmental changes from a biophysical perspective using the language of environmental sciences (e.g. feedback loops, open/closed systems)
• Identify, apply, and evaluate different theories explaining what drives human impacts on the environment
• Identify, apply, and evaluate approaches to managing human impacts on environment
• Synthesize diverse sources of knowledge to communicate to varied audiences about real-world, place-based environmental issues

Textbook & Resources
• You must purchase the textbook and access to the Mastering and Learning Catalytics platforms. We will use these for quizzes, polls, and other interactive assignments that will facilitate our learning. A new hardcopy of the textbook automatically comes with access to these platforms.
• The eText version also automatically gives you access to these platforms. You can get the eText through the bookstore or Pearson.
• If you buy the book used, you will need to purchase both Mastering and Learning Catalytics separately (~$62; further details provided in class).
• **Bottomline:** the eText version is the best deal!
<table>
<thead>
<tr>
<th>WEEK OF</th>
<th>#</th>
<th>LECTURE TOPIC</th>
<th>READINGS</th>
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<tbody>
<tr>
<td>Sept 6</td>
<td>0</td>
<td>Welcome!</td>
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<td>Sept 13</td>
<td>1</td>
<td>Are we in the age of Anthropocene? The science behind the stories</td>
<td>Chapter 2 (Earth Systems)</td>
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<td>Chapter 16 (Anthropocene) pgs. 510-518</td>
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<td>Sept 20</td>
<td>2</td>
<td>What factors shape human impact on environment? IPAT and beyond</td>
<td>Chapter 1: pgs. 3-16 (“Our Island, Earth” to end of “Ecological Footprints”)</td>
<td>Research Journal Topic Due</td>
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<td>Chapter 15 (Environmental Ethics and Economics)</td>
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<td>Sept 27</td>
<td>3</td>
<td>Common Earth and collective action: Overview of environmental governance</td>
<td>Supplemental Chapter 21 (Environmental Management) (available on Mastering)</td>
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<td>Chapter 21 (Environmental Management)</td>
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<td>Oct 4</td>
<td>4</td>
<td>Oceans and fisheries: common pool resources</td>
<td>Chapter 10 (Coastal Systems and Fisheries)</td>
<td>Research Journal #1 Due</td>
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<td>Chapter 12 (Coastal Systems and Fisheries)</td>
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<td>Oct 11</td>
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<td>First half recap and catch-up</td>
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<td>Oct 18</td>
<td>6</td>
<td>Water everywhere and not a drop to drink? The hydrological cycle as a social system</td>
<td>Chapter 9 (Freshwater Systems)</td>
<td>Chapter 11 (Freshwater Systems)</td>
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<td>Oct 25</td>
<td>7</td>
<td>Producing edible environments: connecting our food choices to the landscapes around us</td>
<td>Chapter 5 (Soil Resources, from “Soil is an important terrestrial reservoir of carbon” to end of the chapter)</td>
<td>Chapter 7 (Soil Resources, from “Soil is an important terrestrial reservoir of carbon” to end of the chapter)</td>
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<td>Nov 1</td>
<td>8</td>
<td>Reformulating Earth’s systems to satisfy our energy demands: past, present and future (PART 1: Upstream impacts)</td>
<td>Chapter 12 (Fossil Fuels)</td>
<td>Chapter 15 (Fossil Fuels)</td>
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<tr>
<td>Nov 8</td>
<td>9</td>
<td>Reformulating Earth’s systems to satisfy our energy demands: past, present and future (PART 2: Downstream impacts)</td>
<td>Chapter 13 (Energy Alternatives)</td>
<td>Chapter 16 (Energy Alternatives)</td>
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<td><strong>Hardcopy</strong></td>
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<td>Chapter 8 (Forests): 232-251</td>
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<td>Review Chapter 15 (Environmental Economics):</td>
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<td>pgs. 474-486</td>
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<td>Chapter 10 (Forests): 290-309</td>
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<td>Review Chapter 20 (Environmental Economics):</td>
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<td>pgs. 632-644</td>
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<td>Nov 29</td>
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<td><strong>Course review and Exam</strong></td>
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**Submit Policy Memo by TBD**
Methods of Evaluation

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<td><strong>Quizzes and Participation</strong> – you will be graded on your best 15 participation opportunities and weekly quizzes</td>
<td>10 participation opportunities - Fridays will be geared towards creating community and learning by doing: demos, hands-on activities, and guest lectures. For each week, you will be assessed on your answers to polls in the Learning Catalytics platform. Assessment will be based on both completion and correctness. 10 weekly quizzes - Each week I will deliver ~10-20 minutes worth of questions to you through the Mastering platform. You can take these quizzes on your own time. They will provide you with timely feedback and keep you on track with the readings.</td>
<td>10%</td>
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<td><strong>Exam (December 1)</strong></td>
<td>The exam is designed to take 1 hour and will consist of multiple-choice type questions. Questions will be inclusive of the entire course.</td>
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<td><strong>Research Journal Entries</strong> – see below for further detail</td>
<td>Throughout the course, you will turn in a series of short “journal entries” that will prepare you to write the policy memo. Topic – Week 2 – Ungraded Entry #1 – Week 4 – 15% Entry #2 – Week 7 – 15% Entry #3 – Week 11 – 15% Policy Memo – Exam Period – 20%</td>
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Research Journal Entries

*Please take note: you will receive more detailed instructions for these assignments in follow-up documents.*

You will first identify a specific human impact on the environment you would like to learn more about over the course of the semester. For each journal entry, you will complete an annotated bibliography of 1 peer-reviewed scholarly article and 1 other source, and write a 1 paragraph reflection on what you have learned about your topic from these materials. For entry #3, you will review a documentary, film, or podcast that explores your chosen human impact on the environment. Finally, you’ll synthesize the work you’ve done in your journal entries and write a policy memo.

The journal entries and policy memo must be submitted on time to the relevant section of Courselink. Late assignments will be penalized at the rate of 10% per day, and will not be accepted (i.e., will receive a grade of 0) after five days. Students whose assignment is late because of valid medical reason, family emergency, or other acceptable reason will not be penalized. We are only able to make accommodations...
if we are aware of your situation, so please keep the lines of communication open as early and often as possible.

**Asking for Help**
1. Check here! (the course outline)
2. Ask me (Prof Nost) on CourseLink Discussion Boards - your peers may benefit from clarification
3. Check the “Get Assistance” link from the Library: http://www.lib.uoguelph.ca/get-assistance
4. Attend your TA’s office hours
5. Attend my office hours, email me

**Teaching Platforms**
Through the **Mastering** platform, you will be provided with a set of virtual homework assignments that you can complete to ensure your steady progression through the course.

In addition, as a way to facilitate engagement in a large class setting, this class will use the **Learning Catalytics** teaching platform. This platform allows an instructor to pose questions to the group, and to summarize and visualize responses. We will use this during lectures and **participation grades for the course will be based in part on it.**

There is a cost associated with Mastering and Learning Catalytics, but they are relatively cheap, come bundled with the hardcopy and eText versions of the textbook, and the cost matches the value you will derive from these tools.

**Pearson Technical Support Office Hours** - **TBD**
Outside of these office hours, your best (and quickest) path to resolve technical issues is to contact technical support (https://support.pearson.com/getsupport/s/contactsupport). They have access to your user account and can quickly see what might be going on.

When you contact them please include the following information:
1. Your username
2. OS (Windows or Mac)
3. Browser (preferred browser is Chrome)
4. Exactly what you are trying to open.
5. Error message (if any) that appears when you try to open it.
6. Tell them your course is integrated into a D2L platform

What you can expect from me
- To help you not only understand but get excited about the material, learning as much as possible! We’re all coming from different perspectives and starting points, meaning that it is everyone’s responsibility, but especially mine, to work to provide a respectful and engaging learning environment. I’m here to work with you from where you are and build up your understanding of the course content.
- To provide prompt feedback on assignments.
- To give you a sense of the flow of the semester – when the assignment load will be heavier, so that you can prepare appropriately.
- To assist in developing your critical analysis and communication skills, through our assignments. These are skills that will be useful to you in both your chosen profession and as a citizen.
- To advise you on future coursework, jobs, grad school, and/or volunteering opportunities.

What I expect of you
- To treat each other with respect. Our classroom is a safe space for all students, regardless of sex, gender, race, ethnicity, religion, age, sexual orientation, political orientation, nationality, ability or disability. Every person is welcome here.
- To communicate with me about what you expect from the course, what you need, and your challenges.
- To put your best possible effort into this class.

A brief Q&A
Q: How do I contact you?
A: See above. The Courselink Discussion Board is best for general inquiries. Please check there first to see if someone else has already asked your question. I will check the Discussion often during weekdays until 6pm, and occasionally in the evenings and weekends. I will respond to your requests and questions as soon as I can. Please do not count on an immediate response, especially for important last minute questions regarding assignments.

Q: I’m confused about the material—what should I do?
A: First off, don’t feel embarrassed—few scholars, whether undergraduates or tenured professors - understand everything completely the first time! Please bring your questions to class! If you are confused,
it’s likely that your classmates are, too. If you bring me questions, it helps me evaluate how best to help you learn the material. If you are still confused, please come to my office hours. I am glad to help!

Q: I have to miss an exam for a family/personal/medical emergency. What should I do?
A: As soon as possible, get in touch – with me (Prof Nost) concerning the exam, or with your TA if it concerns an assignment.

Q: I’m not happy about my exam/lab grade. Will you change it?
A: For regrades, we reserve the right to either increase OR decrease your grade depending on what we find in regrading. For a regrade, wait 24 hours, then email a written description of why you deserve a better grade to: your TA (assignments) or me (exam).
University of Guelph Policy Statements

E-mail Communication
As per university regulations, all students are required to check their <uoguelph.ca> e-mail account regularly: e-mail is the official route of communication between the University and its students.

When You Cannot Meet a Course Requirement
When you find yourself unable to meet an in-course requirement because of illness or compassionate reasons, please advise the course instructor (or designated person, such as a teaching assistant) in writing, with your name, id#, and e-mail contact. See the undergraduate calendar for information on regulations and procedures for Academic Consideration.

Drop Date
Courses that are one semester long must be dropped by the end of the last day of classes; two-semester courses must be dropped by the last day of classes in the second semester. The regulations and procedures for Dropping Courses are available in the Undergraduate Calendar.

Copies of out-of-class assignments
Keep paper and/or other reliable back-up copies of all out-of-class assignments: you may be asked to resubmit work at any time.

Accessibility
The University promotes the full participation of students who experience disabilities in their academic programs. To that end, the provision of academic accommodation is a shared responsibility between the University and the student.

When accommodations are needed, the student is required to first register with Student Accessibility Services (SAS). Documentation to substantiate the existence of a disability is required, however, interim accommodations may be possible while that process is underway.

Accommodations are available for both permanent and temporary disabilities. It should be noted that common illnesses such as a cold or the flu do not constitute a disability.

Use of the SAS Exam Centre requires students to make a booking at least 7 days in advance, and no later than November 1 (fall), March 1 (winter) or July 1 (summer). Similarly, new or changed accommodations for online quizzes, tests and exams must be approved at least a week ahead of time.

More information: www.uoguelph.ca/sas

Academic Misconduct
The University of Guelph is committed to upholding the highest standards of academic integrity and it is the responsibility of all members of the University community – faculty, staff, and students – to be aware of what constitutes academic misconduct and to do as much as possible to prevent academic offences from occurring. University of Guelph students have the
responsibility of abiding by the University’s policy on academic misconduct regardless of their location of study; faculty, staff and students have the responsibility of supporting an environment that discourages misconduct. Students need to remain aware that instructors have access to and the right to use electronic and other means of detection.

Please note: Whether or not a student intended to commit academic misconduct is not relevant for a finding of guilt. Hurried or careless submission of assignments does not excuse students from responsibility for verifying the academic integrity of their work before submitting it. Students who are in any doubt as to whether an action on their part could be construed as an academic offence should consult with a faculty member or faculty advisor.

The Academic Misconduct Policy is detailed in the Undergraduate Calendar.

Recording of Materials
Presentations which are made in relation to course work—including lectures—cannot be recorded or copied without the permission of the presenter, whether the instructor, a classmate or guest lecturer. Material recorded with permission is restricted to use for that course unless further permission is granted.

Resources
The Academic Calendars are the source of information about the University of Guelph’s procedures, policies and regulations which apply to undergraduate, graduate and diploma programs.