GEOG*3210: Management of the Biophysical Environment
Fall 2020 Course Outline
Department of Geography, Environment and Geomatics, University of Guelph

Disclaimer:

Schedule of lecture topics and assigned readings may change. Any such changes will be announced via CourseLink and/or class email.

Please note that the ongoing COVID-19 pandemic may necessitate a revision of the format of course offerings and academic schedules. Any such changes will be announced via CourseLink and/or class email. All University-wide decisions will be posted on the COVID-19 website and circulated by email.

Course Instructor: Dr. Faisal Moola, PhD

Email: fmoola@uoguelph.ca (put GEOG3210 in subject)

Lectures: Tuesday and Thursday from 10:00 am – 11:20 pm on Zoom

Office Hours: Tuesday and Thursday: 12:00 – 1 pm. By appointment until further notice.
Dr. Faisal Moola, PhD is an Associate Professor in the Department of Geography, Environment and Geomatics at the University of Guelph. Prior to joining the University of Guelph, he worked for the David Suzuki Foundation for over 15 years, where he was the organization’s Director of Terrestrial Conservation and Science and later its Director General for Ontario and Northern Canada. Faisal has a PhD in biology from Dalhousie University and has published widely in scientific journals on topics of ecology, conservation biology, and environmental policy. Faisal is a regular contributor to the Toronto Star, Vancouver Sun, Globe and Mail, CBC and other media outlets as an opinion writer and political analyst on conservation, Indigenous Rights and other environmental and social issues. He is the director of the People Plants and Policy Lab at the University of Guelph which does research on the ecology and ethnoecology of cultural keystone species and other plant biodiversity in Canada and overseas.
Faisal Moola web page.

Teaching Assistants:
Rachel Young: ryoung07@uoguelph.ca
Conor Russell: conchobh@uoguelph.ca

Course Description and Objectives
This course will examine the concepts and methods used by the state to manage the natural environment. Through an investigation into contemporary environmental issues in Canada (with occasional reference to other areas of the world) we will develop an understanding of the particular rationales for and evolution of state management. Important trends and issues will
be treated with particular attention given on the intersection of Indigenous Peoples and their rights with colonial law and policy.

At the end of the course you should be able to:

- Identify and explain the rationales for state-led resource management.
- Be familiar with the state of biodiversity in Canada and the major drivers of species endangerment.
- Identify and describe major policies in Canada related to the protection and restoration of biodiversity, including endangered species legislation.
- Identify and explain resource management strategies including command and control, adaptive management, co-management, public participation
- Be familiar with the significance of Indigenous Rights in resource development conflicts, including Treaty and Aboriginal Rights as well as Canada’s obligations as a signatory to the UN Declaration on the Rights of Indigenous Peoples.

Prerequisite(s):
- 7.50 credits including GEOG*2210

Skill Acquisition
In addition to learning the content, this course is designed to improve your abilities in:

- Communicating the nuance and complexity inherent in environmental issues clearly and effectively
- Effective peer-to-peer commentary and cross-cultural communication skills
- Effective and concise writing

Course Format
The course is scheduled for T,TH from 10:00 – 11:20 pm. The readings and online materials are required and are crucial in meeting some of the learning objectives in this class. The online materials provide “real-world” policy examples as well as the perspectives of Indigenous knowledge holders. See the weekly schedule for more details.

Required Readings
Additional readings will be assigned as required and available on Courselink.

Evaluation
20% Message Box Assignment.
20% Mid-term take home exam.
20% Briefing Note Assignment.
40% Final Exam.

Message Box Assignment (20%). Due October 9th 2020
Most environmental issues are inherently complex and nuanced and it’s a huge challenge to come up with a simple narrative to share with the media, policymakers or the public. In addition, environmental advocates often suffer from the “curse of too much knowledge” about
their subject matter and can easily slip into overwhelming their audience with a plethora of information, instead of focusing on the big picture of why the issue matters and why their audience should care— in other words “So What?”. Thankfully, there is a simple tool, call the Message Box, that can help one distil the most important messages that will most strongly resonate with your audience and help you to prioritize those messages and frame them appropriately to be interesting and relevant. In this assignment, you will be responsible to analyze a current environmental issue using the Message Box in order to identify key frames and messages for how you could communicate that issue effectively to the public, media or policymakers. Details on the Message Box will be provided shortly with the assignment instructions.

**Mid-Term Exam; Take-Home (20%). Due October 23rd 2020**

The objective of the mid-term is to ensure that you review and critically engage with the material introduced in lectures, films, and readings. The mid-term exam will be a mix of short answer and essay questions. It will cover material from the lectures and readings of weeks 2 - 6. The mid-term will be assigned on October 14th and is due on October 18th in the CourseLink Dropbox.

**Briefing Note Assignment (20%). Due November 13th 2020**

A key component of this class is to connect what we’re doing in lecture and in the readings with what is happening right now in the world beyond our classroom. You will be responsible for writing a briefing-note submission on a current environmental issue to a real policymaker and to offer recommendations on how to resolve the issue.

**Final Exam (40%). Assigned December 14th and Due December 18th 2020**

The final exam will cover material from the whole term, although it will be more heavily focused on material from after the mid-term. The format will be multiple choice, short answer and essay questions.
<table>
<thead>
<tr>
<th>Week</th>
<th>Lecture</th>
<th>Lecture Topic</th>
<th>Readings</th>
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<tbody>
<tr>
<td>1</td>
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<td>Course Introduction</td>
<td>Course Syllabus</td>
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<td>2</td>
<td>1</td>
<td>Humanized Landscapes</td>
<td>Ellis and Ramankutty. 2008. Putting people in the map: anthropogenic biomes of the world</td>
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<td></td>
<td>2</td>
<td>Resource Management in the Age of the Anthropocene</td>
<td>Steffen et al. 2007. The Anthropocene: are humans now overwhelming the great forces of nature?</td>
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<td>3</td>
<td>1</td>
<td>Introduction to Natural Capital and Ecosystem Services: informing policy</td>
<td>Guerry et al. 2015 Natural capital and ecosystem services informing decisions: From promise to practice</td>
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<td>Environmental Communications</td>
<td>The Message Box</td>
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<td>Species at Risk Case Study on British Columbia</td>
<td>Moola et al. 2007. Waiting for the Ark: the biodiversity crisis in British Columbia and the need for an endangered species law</td>
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<td>Federal Species at Risk Policy</td>
<td>Moers et al. 2007</td>
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<td>Federal Species at Risk Policy</td>
<td>Alexander, Chapter 12 of Textbook</td>
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<td>2</td>
<td>Natural Climate Solutions</td>
<td>TBD</td>
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<td><strong>MESSAGE BOX ASSIGNMENT DUE OCTOBER 9TH 2020</strong></td>
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<td>6</td>
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<td>NO LECTURE</td>
<td>FALL STUDY BREAK DAY OCTOBER 13TH 2020</td>
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<td>2</td>
<td>Case Study on Grizzly Bears</td>
<td>David Suzuki Foundation, Securing a National Treasure: protecting Canada’s grizzly bear</td>
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<td>Film</td>
<td>SPOIL</td>
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<td>2</td>
<td>Indigenous and Local Knowledge: case study on cultural keystone species</td>
<td>Mulrennan, Chapter 3 of Textbook</td>
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<td><strong>MID-TERM EXAM DUE OCTOBER 23RD 2020</strong></td>
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<td>8</td>
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<td>Protected Areas Policy</td>
<td>Deardon and Bennett, Chapter 13 of Textbook</td>
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<td>2</td>
<td>Indigenous Conservation</td>
<td>David Suzuki Foundation. Tribal Parks and Indigenous Protected and Conserved Areas</td>
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<td>9</td>
<td>1</td>
<td>Environmental Assessment Policy</td>
<td>Sinclair and Doelle. Chapter 5 of Textbook</td>
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<td>2</td>
<td>Environmental Assessment Policy Continued</td>
<td>Doelle 2012. The End of Federal EA as we Know It?</td>
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<td>10</td>
<td>1</td>
<td>Managing Cumulative Effects and Cumulative Impacts in Resource Policy Continued.</td>
<td>Fitzpatrick and Louise McAllister, Chapter 16 of Textbook</td>
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<td><strong>BRIEFING NOTE ASSIGNMENT DUE NOVEMBER 13TH 2020</strong></td>
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<td>11</td>
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<td>Forest Management</td>
<td>Hanna, Chapter 11 of Textbook</td>
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<td>12</td>
<td>1</td>
<td>Case Study: Acadian Forest</td>
<td>Moessler et al. 2003. Old-growth Forests of the Acadian Forest Region</td>
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Final Exam Due December 18th 2020

Legend:

Blue: Zoom Lectures
Orange: Assignments and Exams
University of Guelph Policy Statements:

**Illness**
The University will not require verification of illness (doctor's notes) for the fall 2020 or winter 2021 semesters.

**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 the teaching assistant in the case of the proposal or essay] in writing, with your name, id#, and e-mail contact. Where possible, this should be done in advance of the missed work or event, but otherwise, just as soon as possible after the due date, and certainly no longer than one week later. Note: if appropriate documentation of your inability to meet that in-course requirement is necessary, the course instructor, or delegate, will request it of you. Such documentation will rarely be required for course components representing less than 10% of the course grade. Such documentation will be required, however, for Academic Consideration for missed end-of-term work and/or missed final examinations. See the undergraduate calendar for information on regulations and procedures for Academic Consideration.

**Drop Date**
The last date to drop one-semester Fall 2020 courses, without academic penalty, is Friday, December 4, 2020. For regulations and procedures for Dropping Courses, see 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 book their exams at least 7 days in advance, and not later than the 40th Class Day.

More information: www.uoguelph.ca/sas

**Academic Misconduct**
The University of Guelph is committed to upholding the highest standards of academic integrity and enjoins 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. The University of Guelph takes a serious view of academic misconduct, and it is your responsibility as a student to be aware of and to abide by the University’s policy. Included in the definition of academic misconduct are such activities as cheating on examinations, plagiarism, misrepresentation, and submitting the same material in two different courses without written permission from the relevant instructors. To better understand your responsibilities, read the Undergraduate Calendar for a statement of Students’ Academic Responsibilities; also read the full Academic Misconduct Policy.

You are also advised to make use of the resources available through the Learning Commons (http://www.learningcommons.uoguelph.ca/) and to discuss any questions you may have with your course instructor, TA, or academic counsellor.

Instructors have the right to use software to aid in the detection of plagiarism or copying and to examine students orally on submitted work. For students found guilty of academic misconduct, serious penalties, up to and including suspension or expulsion, can be imposed. Hurried or careless submission of work does not exonerate students of responsibility for ensuring the academic integrity of their work. Similarly, students who find themselves unable to meet course requirements by the deadlines or criteria expected because of medical, psychological or compassionate circumstances should review the university’s regulations and procedures for Academic Consideration in the calendar and discuss their situation with the instructor and/or the program counsellor or other academic counsellor as appropriate.

**University Policy on Academic Misconduct**
*Academic misconduct, such as plagiarism, is a serious offence at the University of Guelph. Please consult the Undergraduate Calendar for offences, penalties and procedures relating to academic misconduct.*

**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.

Online Behaviour
Inappropriate online behaviour will not be tolerated. Examples of inappropriate online behaviour include:

- Posting inflammatory messages about your instructor or fellow students
- Using obscene or offensive language online
- Copying or presenting someone else's work as your own
- Adapting information from the Internet without using proper citations or references
- Buying or selling term papers or assignments
- Posting or selling course materials to course notes websites
- Having someone else complete your quiz or completing a quiz for/with another student
- Stating false claims about lost quiz answers or other assignment submissions
- Threatening or harassing a student or instructor online
- Discriminating against fellow students, instructors and/or TAs
- Using the course website to promote profit-driven products or services
- Attempting to compromise the security or functionality of the learning management system
- Sharing your username and password