

BIOB50 Syllabus, Fall 2016
Prof. Péter Molnár

Course description

BIOB50 provides an introduction to the main principles of ecology, the science of the interactions of organisms with each other and with their environment. The course covers community and population ecology, and provides an emphasis on how ecology relates to other areas of biology, and to contemporary human and environmental issues.

Course information

Professor:

Dr. Péter Molnár

Office: SW567A

Office hours: Thursday 2.30 - 4pm

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Phone: 416-208-2247

Teaching Assistants:

Juan Sebastian Vargas Soto, juan.vargassoto@mail.utoronto.ca

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Andrew Masson, andrew.masson@mail.utoronto.ca

Course coordinator:

Irene Wandili, irene.wandili@utoronto.ca

Lecture times:

Tuesday & Thursday, 10-11am

Location:

Academic Centre (AC) 223

Tutorials:

Tutorials for BIOB10 (Cell Biology), BIOB34 (Animal Physiology), and BIOB50 (Ecology) are all scheduled for Thursday, 5-7pm, AC-223. Tutorials will alternate between these three courses, so there is no overlap, allowing students to attend all tutorials even if they have registered in two or more of these courses.

BIOB50 tutorials are scheduled for **Sep 22, Oct 20, and Nov 24**. The dates of the BIOB10 and BIOB34 tutorials will be announced in those courses.

Textbook:

Cain, M.L., Bowman, W.D. and Hacker, S.D. *Ecology – 3rd edition*. Sinauer Associates, Inc. Paper and e-book options available!

Exams:

1 midterm and 1 final, dates TBA

Project:

Ecology-news assignment (**due Tuesday, November 15, 3pm**)

Course resources

Course Website and Online Lectures: Course information will be posted on the course website on the UofT portal (Blackboard): portal.utoronto.ca. Lecture slides will also be posted here the evening before the lecture. For instructions on how to access the course website, please refer to <http://www.portalinfo.utoronto.ca>. It is critical that you familiarize yourself with Blackboard and its contents, and check it regularly.

Textbook: Cain, M.L., Bowman, W.D. and Hacker, S.D. *Ecology – 3rd edition*. Sinauer Associates, Inc. Paper and e-book options available! This book will be used heavily in forming lectures, and students are responsible for understanding the concepts introduced in the lecture by understanding chapter material. Exams will cover the lecture material and the material in the pertinent book chapters, but not book chapters that were not explicitly referred to in the lecture.

Textbook website: Sinauer offers a website accompanying the textbook at <http://sites.sinauer.com/ecology3e>. Here, you will find chapter summaries, hands-on practice problems, flashcards for studying, additional readings and many other things. You are encouraged to use this resource for studying, but note that if you find additional material here that is not covered in the lecture, then that material will not be on any exam.

Tutorials:

Tutorial 1, Sep 22: TA will present on picking a news topic and finding relevant ecology papers for the ecology-news assignment.

Tutorial 2, Oct 20: Review of the mathematical models discussed in the lectures thus far. You will be encouraged to submit specific questions to the instructor ahead of this tutorial for discussion during the tutorial.

Tutorial 3, Nov 24: Review of semester material and Q&A session. You will be encouraged to submit specific questions to the instructor ahead of this tutorial for discussion during the tutorial.

Facilitated Study Groups (FSGs):

BIOB50 is supported by Facilitated Study Groups. These weekly study sessions are open to everyone in the class. Attendance is voluntary, but students who attend regularly often earn higher grades. If you have any questions, please ask your facilitator, or visit the FSG website at <http://ctl.utsc.utoronto.ca/home/fsg>.

How to Get Help with the Course: **First, check this syllabus;** you will find the answer to almost all procedural questions here. If you have a question that cannot be answered by this syllabus, check the course website. If this does not answer your question, then decide if the question is conceptual or procedural. Conceptual questions are best answered by the TAs or during the professor's office hours. For procedural questions, you should contact the course coordinator, Irene Wandili (irene.wandili@utoronto.ca). If you have other questions, feel free to email either a TA or the professor. The professor will reply to your email in a

reasonably timely fashion, Monday through Friday, but will not respond to questions where the answer is found in the syllabus. When emailing the instructor, **please use your UTOR email only** (as hotmail, gmail and other email providers are spam-filtered on a regular basis), and **please begin your subject line with “BIOC50: <subject>” to make sure emails are not overlooked.** It is the responsibility of the student to adhere to these instructions and make sure his or her email reaches the instructor.

Marks breakdown:

Ecology-news assignment (due Tuesday, November 15, 3pm)	15%
Midterm exam	35%
Final exam	50%

Ecology News-assignment

Instructions for the Ecology News-assignment will be conveyed on or before the Sep 22 tutorial. The assignment is worth 15% of your final mark and **due Tuesday, November 15, 3pm**. A **printed copy** of the assignment is to be submitted to the instructor or TA in person before the deadline.

Late penalties: There will be a penalty of 10% per day for assignments received late. Weekend days count as individual days. Unless there are extenuating circumstances (e.g. medical reasons with a medical certificate), a mark of zero will be applied to assignments submitted one week late or more. Heavy workloads or malfunctioning computer equipment are not legitimate reasons for late submission. If you know ahead of time that you have a legitimate reason why you cannot hand in the assignment at the due date, let the course instructor know **as early as possible and before** the due date.

Submission of reports to Turnitin: Normally, students will be required to submit their Ecology-news Assignment to **Turnitin.com** for a review of textual similarity and detection of possible plagiarism. In doing so, students will allow their essays to be included as source documents in the Turnitin.com reference database, where they will be used solely for the purpose of detecting plagiarism. The terms that apply to the University’s use of the Turnitin.com service are described on the Turnitin.com web site: (<http://www.portalinfo.utoronto.ca/content/turnitin>).

As Turnitin is integrated in the UofT portal (blackboard), you will submit your assignment on blackboard, see <http://www.portalinfo.utoronto.ca/content/submit-turnitin-assignment> for instructions. **In addition, you are also required to submit a hard copy of your assignment to the instructor by the deadline.**

Turnitin.com is most effective when it is used by all students; however, if and when students object to its use on principle, the course offers a reasonable offline alternative. The student will then be asked to meet with the course instructor to outline and discuss the report before its final submission to demonstrate the process of creating the report according to the academic integrity policy.

Missed exams:

Students who miss the midterm exam for reasons entirely beyond their control may, within three (3) days of the missed test, submit a written request for special consideration to the course coordinator (Irene Wandili), explaining the reasons for missing the test and attaching appropriate documentation, i.e. the official University of Toronto medical certificate (<http://www.illnessverification.utoronto.ca/>). If it is then determined that you had a valid reason for missing the midterm, you will be permitted to write a make-up midterm exam (usually within one week of the missed exam).

If you miss the final exam, you must contact the UTSC's Registrar's Office with appropriate documentation to request a deferred exam. For details and deadlines for this, refer to <http://www.utsc.utoronto.ca/registrar/deferred-exams> and <http://www.utsc.utoronto.ca/registrar/missing-examination>.

AccessAbility

Everyone is a welcome member of this class, and we strive to provide an equal playing field for students with diverse learning styles and needs. In particular, if you have a disability/health consideration that may require accommodations, please contact the AccessAbility office as soon as possible. They will provide confidential services that include flexible, personalized solutions for test-taking, note-taking, and similar issues. The AccessAbility office is located in SW302 and can be reached at: (416) 287-7560 or ability@utsc.utoronto.ca

Academic Integrity

According to Section B of the University of Toronto's *Code of Behaviour on Academic Matters*, it is an offence for students to:

- use someone else's ideas or words in their own work without acknowledging that those ideas/words are not their own with an appropriate citation and/or quotation marks, i.e. to commit plagiarism.
- include false, misleading or concocted citations in their work.
- obtain unauthorized assistance on any assignment.
- provide unauthorized assistance to another student. **This includes showing another student completed work.**
- submit their own work for credit in more than one course without the permission of the instructor
- falsify or alter any documentation required by the University. This includes, but is not limited to, doctor's notes.
- use or possess an unauthorized aid in any test or exam.

The learning environment is built on mutual trust, and we will assume that all students operate with honesty and integrity. However, in the rare cases of substantial evidence that the University of Toronto's Code of Behaviour on Academic Matters (Section B; <http://www.governingcouncil.utoronto.ca/policies/behaveac.htm>) has been compromised, I will enact the procedures outlined in the Code of Behaviour on

Academic Matters. First, I will invite you to discuss the possible offence through an email invitation. If our discussion leads me to believe that you have not compromised the code, then the matter will be dropped. If either you fail to respond to two requests for this discussion or new evidence comes to light, then a formal investigation will be initiated, and a penalty according to the U of T's guidelines on sanctions will be put into place.

Audio/video recordings

For reasons of privacy as well as protection of copyright, unauthorized video or audio recording is prohibited. If you would like to make such recordings, for whatever reason, consult with the instructor before doing so.

Lecture Schedule

Date	Day	Lecture	Topic	Book chapter
Sep 6	TU	1	What is Ecology?	1
Sep 8	TH	2	Ecology as a science	1
Sep 13	TU	3	Organisms and their environment	2-3
Sep 15	TH	4	It's all about energy	5, 20
Sep 20	TU	5	It's all about energy	5, 20
Sep 22	TH	6	Life history	7
Sep 27	TU	7	Populations I	9-11
Sep 29	TH	8	Populations II	9-11
Oct 4	TU	9	Competition I	12
Oct 6	TH	10	Competition II	12
Oct. 10-15	Reading week			
Oct 18	TU	11	Predation and herbivory	13
Oct 20	TH	12	Parasitism	14
Oct 25	TU	13	Mutualism	15
Oct 27	TH	14	Communities	16
Nov 1	TU	15	Change in communities	17
Nov 3	TH	16	Species diversity in communities / Niches	19
Nov 8	TU	17	Food webs	21
Nov 10	TH	18	Metapopulation & metacommunities	11, NA
Nov 15	TU	19	Biogeography	18
Nov 17	TH	20	Neutral theory & landscapes	NA, 24
Nov 22	TU	21	Nutrient supply & cycling	22
Nov 24	TH	22	Global Change (excluding climate change)	25, NA
Nov 29	TU	23	Climate Change	25, NA
Dec 1	TH	24	Conservation Biology	23

* NA = material that is not covered in textbook, references to primary literature will be provided