

BIOL3151 Biogeography (Orillia Campus)

Course Syllabus

Winter 2026

“Biogeography provides us with an unrivaled opportunity to teach the “great stories of Earth”, including those of the origins, diversification, spread, and ultimate collapse and extinction of the marvelous diversity of lineages chronicled in the fossil record.” – Mark V. Lomolino et al.,

Biogeography 5th, ed.

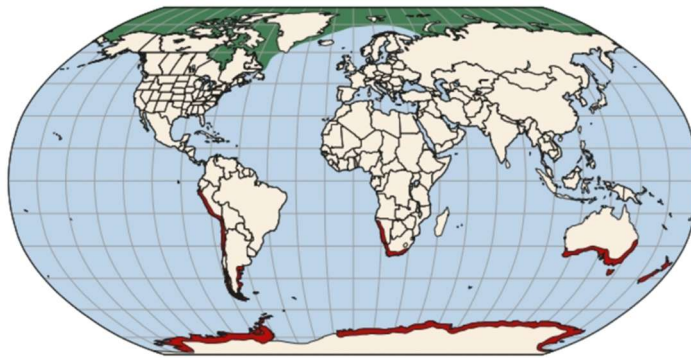


Figure 1.2 Biogeography 5th ed., restriction of polar bears to Northern hemisphere (green) and penguins to the Southern hemisphere (red).

Land Acknowledgement

Lakehead University respectfully acknowledges its campuses are located on the traditional lands of Indigenous peoples.

Lakehead Thunder Bay is located on the traditional lands of the Fort William First Nation, Signatory to the Robinson Superior Treaty of 1850. Lakehead Orillia is located on the traditional territory of the Anishinaabeg. The Anishinaabeg include the Ojibwe, Odawa, and Pottawatomi nations, collectively known as the Three Fires Confederacy.

Lakehead University acknowledges the history that many nations hold in the areas around our campuses, and is committed to a relationship with First Nations, Métis, and Inuit peoples based on the principles of mutual trust, respect, reciprocity, and collaboration in the spirit of reconciliation.

Important Course Information

Course Instructor:

Dr. Britney Picinic

bpicinic@lakeheadu.ca

Office: TBD – meetings will likely be on Zoom

Office Hours: these will be assigned on a need-by-need basis, with individual students. Please send me an email to book an appointment.

Class Time and Location:

When: Monday and Wednesday from 2:30pm-4:00pm EST

Where: TBD

Course Materials:

There is no required textbook for this course. However, I highly recommend the textbook, *Biogeography: Biological Diversity Across Space and Time 5th Edition* by Mark V. Lomolino, Brett R. Riddle, and Robert J. Whittaker (\$354.99). This book will be available through the bookstore if you are interested in purchasing. I will be using this textbook to guide the lecture material, however **all assessment material will be delivered to you via lecture, D2L, or otherwise provided content**. If you have access to an older version or other biogeographical texts, you are welcome to read those as well.

Communication Expectations:

Course Instructor to Students – **I will communicate with you via email and through D2L.** I will typically make some course announcements in person during lecture but will also be making a majority of announcements through our class page on D2L. I am only on campus Mondays and Wednesdays for class, so I will try to be available after class for a short period to answer any course content questions. If there are questions that require a longer or more thorough discussion, then please email me to book an appointment.

Students to Course Instructor – **It is your responsibility to regularly check D2L for announcements, updated content, scheduling, changes to course, etc.** If you have any questions, it is your responsibility to contact me via email (or in-person depending on the nature of the question) as soon as necessary. I typically respond to emails from 8:30am-4:00pm on weekdays, excluding holidays. I occasionally but not regularly check emails during evenings and on weekends, so please ensure you have accounted for timelines when sending an email with questions/concerns. **Please wait 48 hr before sending me a reminder email, if I have not responded within two business days.**

Learning Expectations:

In BIOL3151, you can expect to learn about general geographical patterns within and between a variety of animal and some plant species. We will mainly focus on causes of species dispersal from a variety of sources and work to identify patterns and their associated theories to explain the species dispersal. You can also expect to learn valuable writing skills through a literature review assessment, as well collaboration and critical thinking during our group discussions and peer review assignment.

Learning Outcomes for BIOL3151:

1. Identify key biogeographical patterns
2. Draw connections between the historical development of some species and their resulting geographical dispersion
3. Understanding of key theories that have been proposed to explain biogeographical patterns
4. Read and critically evaluate literature pertaining to topics in biogeography
5. Effectively communicate biogeographical research in presentation and written format
6. Assess and critically evaluate presentations on important research topics by peers

BIOL3151 Evaluation Summary:

NOTE: all listed assessment and due dates are subject to change

Term Test #1 (25%*) Wednesday, January 28th, 2026 – focuses on first half of course material (Lectures 1-7 – see Course Schedule below), delivered in-person with a mix of multiple choice and written answer questions.

Term Test #2 (30%*) Wednesday, March 11th, 2026- focuses on second half of course material (Lectures 9-17 – see Course Schedule below), delivered in-person with a mix of multiple choice and written answer questions.

*= Test weighting as stated above will be followed if only 1 out of 2 of the tests is written during their regularly scheduled classes OR 1 or more term tests are written as a makeup test. If a student writes both test 1 and test 2 during their regularly scheduled classes, then the higher grade of the two tests will weigh 35%, while the lower grade will weigh 20%.

Research Presentation (10%) – select a key paper from your literature review topic and summarize it in 7-minute presentation (subject to change), with 2-3 minutes of questioning from peers. **Research presentations will take place during the classes of March 16th/18th and March 23rd/25th.** ALL slides are to be submitted via D2L by Friday, March 13th, 2026 at 11:59pm, regardless of presentation date. Individual presentation dates will be first come first served through a sign in sheet that will become available on D2L.

Peer Review Assessment (6%) – critically assess a select number (contingent on class size) of peer research presentations that will be assigned to you, based on a rubric/grading scheme.

Attendance for Presentation Classes (4%) – attendance at all FOUR presentation classes (**March 16, March 18, March 23, and March 25**) will count towards your final grade. Attendance at each lecture will account for 1%, to a total of 4% of your final grade if all four lectures are attended.

Literature Review Paper (25%) – conduct a written literature review on a subtopic of biogeography from a provided list or selected by you and approved by course instructor. **The review paper will be due on Wednesday, April 1st, 2026 by 11:59pm EST.**

Missed Exams, Late Penalties and Extension Policies:

There will be only be one opportunity to write a makeup test for each term test, which will be scheduled at a later date, in the event that you have missed the regularly scheduled term test. Please see above information on test weighting conditions.

All late submissions of work including but not limited to presentation slides and literature review paper will receive a penalty of 5% per day for up to 3 days, after which a grade of zero (0%) will be given for the late work. Extensions will not be granted on an individual basis and will only occur in the event of extenuating circumstances. For research presentations, missing your timeslot to present will result in a grade of zero (0%), with no opportunity to make this up.

Assignment and Exam Academic Integrity:

By taking this course, you agree to the following:

I understand and agree that:

- (a) Unless otherwise allowed by the course instructor, I must complete the assignments in this course without the assistance of anyone else.

- (b) Unless otherwise allowed by the course instructor, I must not access any sources or materials (in print, online, or in any other way) to complete any course exam.

I further understand and agree that, if I violate either of these two rules, or if I provide any false or misleading information about my completion of course assignments or exams, I may be prosecuted under the Lakehead University Student Code of Conduct – Academic Integrity, which requires students to act ethically and with integrity in academic matters and to demonstrate behaviours that support the University's academic values.

Accommodations and Accessibility:

Lakehead University is committed to achieving full accessibility for persons with disabilities/medical conditions. Part of this commitment includes arranging academic accommodations for students with disabilities/medical conditions to ensure they have an equitable opportunity to participate in all of their academic activities. If you are a student with a disability/medical condition and think you may need accommodations, you are strongly encouraged to contact Student Accessibility Services (SAS) and register as early as possible. I aim to ensure that all students can achieve their best possible results, so if you have circumstances affecting your assessments, please speak to me as soon as you can.

For more information, please email sas@lakeheadu.ca or visit <https://www.lakeheadu.ca/faculty-and-staff/departments/services/sas>

For students registered with Student Accessibility Services (SAS) – SAS will communicate with me about accommodations and thus you are not required to speak to me directly about your accommodation. However, if you would like to discuss anything in regards to your accommodation, then please reach out as soon as possible. I am always open to feedback and suggestions in how I handle and approach accessibility and accommodations throughout the term.

BIOL3151 Course Schedule at a Glance

Week	Date of Class	Lecture # - Monday's	Date of Class	Lecture # - Wednesday's	Assessment
1	Jan 5	#1 – Introduction to Course	Jan 7	#2 – History of Biogeography	
2	Jan 12	#3 – Science of Biogeography	Jan 14	#4 – Ranges	
3	Jan 19	#5 – Dispersal	Jan 21	#6 – Speciation	
4	Jan 26	#7 - Glaciation	Jan 28	#8 – Term Test #1 Material tested form lectures 1-7	
5	Feb 2	#9 – Swamping	Feb 4	#10 - Diversity Gradients Pt 1	
6	Feb 9	#11 – Diversity Gradients Pt 2	Feb 11	#12 – Lineages & Biotas	Choice of Literature Review Due Feb 13
7	Reading Week (Feb 16-Feb 20)				
8	Feb 23	#13 – Islands Pt 1	Feb 25	#14 - Islands Pt 2	
9	Mar 2	#15 – Islands Pt 3	Mar 4	#16 – Insect Dispersal	
10	Mar 9	#17 - Biogeography of Humanity	Mar 11	#18 – Term Test #2 Material tested form lectures 9-17	Presentation Slides Due Mar 13
11	Mar 16	Presentations	Mar 18	Presentations	*Attendance Counts*
12	Mar 23	Presentations	Mar 25	Presentations	*Attendance Counts*
13	Mar 30	Q&A for Paper	Apr 1	Literature Review Paper DUE	

Important Things to Know:

Diversity, Equity, and Inclusion

In BIOL3151, my goal is to ensure that ALL students feel welcomed, respected, and safe in sharing their space and opinions regardless of culture, ethnicity, gender identity, national origin, race, sexual orientation, socio-economic status, religion, mental and physical ability, experience, as well as all other aspects of identity/background. It is important that we all work together to ensure this expectation is met in and outside of the classroom. With that in mind, I expect that all students taking this course will follow the below rules in class:

- 1) All questions and opinions regarding course content is welcome, so as long as non-offensive and inclusive language is used
- 2) Discussion of ideas and theories is always welcome, with respect to the individual delivering their ideas
- 3) Always listen when others are speaking and approach discussion with a learning-focussed mindset
- 4)

Academic Integrity

I highly encourage you to view and familiarize yourselves with the [Student Code of Conduct – Academic Integrity](#), as it clearly highlights my and the Universities expectations of your academic integrity through your studies. I have zero tolerance for academic dishonesty and with that, any breach of academic integrity.

A breach of academic integrity is a serious offense and can result in serious consequences. Non-compliance with the Student Code of Conduct will not be tolerated in this course and disciplinary action following the terms of the Code of Conduct will be followed. It is important that you recognize and understand that a breach of academic integrity is true disrespect to the process of obtaining a University degree. It is your responsibility to complete ALL of your work independently (unless instructed otherwise), using your own reading, writing, and interpreting skills.

Copyright Compliance

I understand and agree that all instructional, reference, and administrative materials to which I am given access in this course (the "course materials"), whether they consist of text, still or kinetic images, or sound, whether they are in digital or hard copy formats, and in whatever media they are offered, are protected in their entirety by copyright, and that to comply with this copyright and the law.

(a) I may access and download the course materials only for my own personal and non-commercial use for this course; and

(b) I am not permitted to download, copy, store (in any medium), forward or share, transmit, broadcast, show, post or play in public, adapt, or change in any way any text, image, or sound component of the course materials for any other purpose whatsoever except as expressly authorized, and only to the extent authorized, in writing, by the course instructor.

I further understand and agree that, if I infringe the copyright of the course materials in any way, I may be prosecuted under the Lakehead University Student Code of Conduct – Academic Integrity, which requires students to act ethically and with integrity in academic matters and to demonstrate behaviours that support the University's academic values.

Recording Lectures and Class Activities

In Biogeography, BIOL3151, instruction may be recorded, where possible, for confidential access by students registered in the course but who are unable to attend class due to illness or other necessity, however this will not occur on a regular basis. To the greatest extent possible only the image and voice of the instructor will be recorded for this purpose but, due to class interaction, the images and voices of students present in the classroom may be incidentally recorded and, thus, be available for access by course students in remote locations. These recordings; however, are strictly confidential and may be used only by the instructor and students registered in the course and only for purposes related to the course. They may otherwise not be used or disclosed. Students in the classroom who are concerned about being recorded in this fashion may request the instructor to exclude them from the recording to the greatest degree possible on the understanding that total exclusion cannot be guaranteed. The recordings are made under the authority of sections 3 and 14 of The Lakehead University Act, 1965. Questions about the collection of the images and sounds in the recordings may be directed to the Chair of the Department of Biology, Lakehead University, 955 Oliver Rd, Thunder Bay, ON, P7B 5E1, +1 (807) 343-8010 ext 8460.