

Course ID:	Course Title:	Winter 2021
BIO 105	The Organization and Diversity of Life	Prerequisite: None
		Credits: 3

Class Information		Instructor Information		Important Dates	
Delivery:	Online	Instructor:	Dr. Megan Hallam, PhD	First day of classes:	Mon, Jan 11
Days:	Tues/Thurs	Email:	mhallam@ambrose.edu	Last day to add/drop, or change to audit:	Sun, Jan 24
Time:	5:00 – 6:15 pm	Phone:	403-410-2000 ext 6905	Last day to request revised final exam:	Mon, Mar 8
Room:	-	Office:	L2107	Last day to withdraw from course:	Fri, Mar 19
Lab/ Tutorial:	-	Office Hours:	By appointment: calendly.com/hallammc	Last day to apply for coursework extension:	Mon, Mar 29
Final Exam:	Yes (in-class final) Thursday April 15, 5:00 – 6:15 pm			Last day of classes:	Fri, Apr 16

Course Description

This course studies biological concepts and mechanisms using current examples from medicine and the environment.

Note: Credit for this course cannot be applied to a Bachelor of Science Degree. Students cannot take both BIO 105 and BIO 131 or BIO 133 for credit.

This course has an existing transfer credit agreement through Alberta Council on Admissions and Transfer. Visit www.transferralberta.ca for details.

Expected Learning Outcomes

Students will

1. Develop an understanding of how science is conducted.
2. Develop an understanding of basic concepts necessary for biological literacy..
3. Apply higher-level thinking to biology concepts, with emphasis placed on skills and content needed by educated citizens
4. Explore biological issues of concern to the public, forming a foundation for life-long learning on scientific issues.

Textbooks

Required: The Story of Life: Great Discoveries in Biology by Sean B. Carroll. W. W. Norton & Company,

Course Schedule

Lines with a grey background indicate a **LIVE** class.

*In-class Assignment dates may change based on timing of lecture material delivery.

**A more specific reading schedule will be provided with each module.

	Date	Topic	Story of Life Chapters**	Activities Due
Module 1 – Exploring Biology & Introduction to Evolutionary Biology	Jan 12	Introductions		
	Jan 14	Scientific Method	1-2	
	Jan 19	Evolutionary Biology	7-10	In-class Assignment 1*
Module 2 – Mechanisms of Evolution	Jan 21	Evolution		
	Jan 26	Evolution	11-12	
	Jan 28	Evolution		
Module 3 – Speciation & Phylogeny	Feb 2	Organization of Life		In-class Assignment 2* (Modules 2 & 3)
	Feb 4	Organization of Life		Critical Reflection 1
	Feb 9	Modules 1-3 Exam		Modules 1-3 Exam
Module 4 – Biodiversity of Vertebrate Animals	Feb 11	Biodiversity		
	Feb 16 & 18	NO CLASSES – READING WEEK		
	Feb 23	Biodiversity		
Module 5 - Symbiosis	Feb 25	Symbiosis	13-15	
	Mar 2	Symbiosis		In-class Assignment 3* (Modules 4 & 5)
Module 6 – Ecosystem Ecology	Mar 4	Ecosystems		
	Mar 9	Ecosystems		
Module 7 – Conservation & Sustainability	Mar 11	Conservation Biology	16	Critical Reflection 2
	Mar 16	Conservation Biology		In-class Assignment 4* (Modules 6 & 7)
	Mar 18	Conservation Biology		Critical Reflection 2 Discussion

	Mar 23	Modules 4-7 Exam		Modules 4-7 Exam
Module 8 – Chemistry of Life	Mar 25	Chemistry Concepts		
	Mar 30	Building Blocks of Life	3-6	In-class Assignment 5*
Module 9 – Cellular Structure	Apr 1	Cellular Structure & Function		
	Apr 6	Cellular Structure & Function		Critical Reflection 3
Module 10 – Unifying Concepts of Animal Structure & Function	Apr 8	Systems Biology	17-19	Critical Reflection 3 Discussion
	Apr 13	Systems Biology		
	Apr 15	Modules 8-10 Exam		Modules 8-10 Exam

Requirements:

In-class assignments – multiple dates, 24% (6% each)

Critical Reflection 1 – February 4, 5%

Modules 1-3 Exam – February 9, 16%

Critical Reflection 2 – March 11, 8%

Critical Reflection 2 Discussion, March 18, 2%

Modules 4-7 Exam – March 23, 17%

Critical Reflection 3 – April 6, 10%

Critical Reflection 3 Discussion – April 8, 3%

Modules 8-10 Exam – April 15, 15%

Please note that while Moodle will be used to report most of your grades, it is not used to calculate your final grade in the course.

Reflective Assignments

Written portions of reflective assignments should be completed in accordance with the following criteria:

- Typed using a word processor
- Double spaced
- Font style: Arial, Calibri, or similar (please avoid serif fonts like Times New Roman)
- Font size: 12-point

All assignments are to be done using full sentences and proper spelling and grammar. Each unique error in spelling, grammar, and/or formatting will result in a deduction of 0.5 marks.

All assignments must be handed in electronically using Moodle in .doc or .docx format, or .ppt or .pptx when appropriate. Moodle cannot accept Pages or other kinds of files from Mac computers.

Turnitin will be used for all written assignments. This web-based tool will compare your work with numerous sources, including your fellow students, to check for plagiarism. Please ensure you are handing in your own original work, and properly citing appropriate sources both in-text and in a reference list. Refer to Page 5 for the Plagiarism Policy.

Late assignments: Late assignments will be accepted for 5 days after the due date. For example, if an assignment is due on a Tuesday, late assignments would be accepted until the following Sunday. Late assignments should be e-mailed to the instructor. Late marks will be deducted until the assignment is submitted via email. For each day an assignment is late, 10% will be deducted from the grade earned on the assignment. In-class assignments cannot be handed in late.

In-Class Assignments

These will be completed in groups of 3-4 students, and groups will be randomly created by Zoom as they will be done in breakout rooms. There will be no make-up assignments if absent, even if it is an excused absence. You must be present to receive marks for a given in-class assignment. There will be 5 in-class assignments and your top 4 marks will be used to calculate your grade.

Exams

Exams will be a combination of multiple choice, true/false, and short answer. Material will be taken from PowerPoint slides, discussions in class, and readings.

Attendance:

This online course will be conducted with both synchronous and asynchronous components. Live classes will occur every Tuesday and students are expected to join the class via Zoom. Two of the three exams will be given online during these live classes using Moodle, the last Module exam will be during the scheduled class time on Thursday April 15. Live classes will include more discussion and activities, including group work with your classmates. This will often require that you have watched corresponding pre-recorded lecture material, or done readings assigned in the asynchronous components of the course. Other activities that may be assigned in the asynchronous component of the course include forum discussions and responding to classmates in those discussions.

Grade Summary:

The available letters for course grades are as follows:

Letter Grade	Percentage	Description
A+	95-100%	
A	91-95%	Excellent
A-	88-91%	
B+	83-88%	
B	78-83%	Good
B-	73-78%	
C+	68-73%	
C	64-68%	Satisfactory
C-	60-64%	
D+	55-60%	
D	51-55%	Minimal Pass
F	Below 50%	Failure

Because of the nature of the Alpha 4.00 system, there can be no uniform University-wide conversion scale. The relationship between raw scores (e.g. percentages) and the resultant letter grade will depend on the nature of the course and the instructor's assessment of the level of each class, compared to similar classes taught previously.

Please note that final grades will be available on student registration system. Printed grade sheets are not mailed out.

Other:

Plagiarism Policy:

It is your responsibility to ensure that all work you submit is original and that credit is given to ideas that are not your own. See below for Ambrose's statement defining plagiarism and outlining its consequences. While you will be working with at least one partner during labs it is expected that you each hand in your own, individual assignment that is your own original work.

Examples of plagiarism include, but are not limited, to:

1. Copying an assignment from someone else and submitting it as your own work.
2. Working with a friend and writing down identical answers, whether you understand the content or not, and submitting the assignments separately.
3. Quoting directly from a source without supplying quotation marks or a citation.
4. Quoting directly from a source without supplying quotation marks, even if it is referenced.
5. Using additional materials during closed book exams. This includes but is not limited to: textbooks, class notes, Google and other online resources.
6. Submitting an assignment in which >30% of the content is properly quoted; that is, at least 70% of the words in an assignment need to be your own. A general rule of thumb: for every line quoted, there should be three lines of your own material explaining that quote.
7. Submitting the same or similar assignment for more than one class, or more than one iteration of the same class.

Penalties for plagiarism

For a first offense in any one of my classes, a zero on the assignment with no chance of rewriting it, and a note in your academic file.

For a second offense in any one of my classes, a zero in the class, and recommendation for a note on your transcript.

For a third offense in any one of my classes, a zero in the class and a recommendation for expulsion from the university.

Note that Ambrose has an appeals process in place if you feel that allegations of plagiarism are unfounded; these are for final marks only, and not for individual assignments.

Note that my record of a student's past plagiarism does not reset with each semester.

Ambrose University Academic Policies:

Communication

All students have received an Ambrose e-mail account upon registration. It is the student's responsibility to check this account regularly as the Ambrose email system will be the professor's instrument for notifying students of important matters (cancelled class sessions, extensions, requested appointments, etc.) between class sessions. If students do not wish to use their Ambrose accounts, they will need to forward all messages from the Ambrose account to another personal account.

Registration

During the **Registration Revision Period** students may enter a course without permission, change the designation of any class from credit to audit and/or voluntary withdraw from a course without financial or academic penalty or record. Courses should be added or dropped on the student portal by the deadline date; please consult the List of Important Dates. After that date, the original status remains and the student is responsible for related fees.

Students intending to withdraw from a course after the Registration Revision Period must apply to the Office of the Registrar by submitting a "Request to Withdraw from a Course" form or by sending an email to the Registrar's Office by the **Withdrawal Deadline**; please consult the List of Important Dates on the my.ambrose.edu website. Students will not receive a tuition refund for courses from which they withdraw after the Registration Revision period. A grade of "W" will appear on their transcript.

Students wishing to withdraw from a course, but who fail to do so by the applicable date, will receive the grade earned in accordance with the course syllabus. A student obliged to withdraw from a course after the Withdrawal Deadline because of health or other reasons may apply to the Registrar for special consideration.

Exam Scheduling

Students, who find a conflict in their exam schedule must submit a Revised Examination Request form to the Registrar's Office by the deadline date; please consult the List of Important Dates. Requests will be considered for the following reasons only: 1) the scheduled final examination slot conflicts with another exam; 2) the student has three final exams within three consecutive exam time blocks; 3) the scheduled final exam slot conflicts with an exam at another institution; 4) extenuating circumstances. Travel is not considered a valid excuse for re-scheduling or missing a final exam.

Electronic Etiquette

Students are expected to treat their instructor, guest speakers, and fellow students with respect. It is disruptive to the learning goals of a course or seminar and disrespectful to fellow students and the instructor to use electronics for purposes unrelated to the course during a class session. Turn off all cell phones and other electronic devices during class. Laptops should be used for class-related purposes only. Do not use iPods, MP3 players, or headphones. Do not text, read, or send personal emails, go on Facebook or other social networks, search the internet, or play computer games during class. Some professors will not allow the use of any electronic devices in class. The professor has the right to disallow the student to use a

laptop in future lectures and/or to ask a student to withdraw from the session if s/he does not comply with this policy. Repeat offenders will be directed to the Dean. If you are expecting communication due to an emergency, please speak with the professor before the class begins.

Academic Policies

It is the responsibility of all students to become familiar with and adhere to academic policies as stated in the Academic Calendar. Personal information (information about an individual that may be used to identify that individual) may be required as part of taking this class. Any information collected will only be used and disclosed for the purpose for which the collection was intended. For further information contact the Privacy Compliance Officer at privacy@ambrose.edu.

Extensions

Although extensions to coursework in the semester are at the discretion of the instructor, students may not turn in coursework for evaluation after the last day of the scheduled final examination period unless they have received permission for a course Extension from the Registrar's Office. Requests for course extensions or alternative examination time must be submitted to the Registrar's Office by the deadline date; please consult the List of Important Dates. Course extensions are only granted for serious issues that arise "due to circumstances beyond the student's control."

Appeal of Grade

An appeal for change of grade on any course work must be made to the course instructor within one week of receiving notification of the grade. An appeal for change of final grade must be submitted to the Registrar's Office in writing and providing the basis for appeal within 30 days of receiving notification of the final grade, providing the basis for appeal. A review fee of \$50.00 must accompany the appeal. If the appeal is sustained, the fee will be refunded.

Academic Integrity

We are committed to fostering personal integrity and will not overlook breaches of integrity such as plagiarism and cheating. Academic dishonesty is taken seriously at Ambrose University as it undermines our academic standards and affects the integrity of each member of our learning community. Any attempt to obtain credit for academic work through fraudulent, deceptive, or dishonest means is academic dishonesty. Plagiarism involves presenting someone else's ideas, words, or work as one's own. Plagiarism is fraud and theft, but plagiarism can also occur by accident when a student fails or forgets to acknowledge to another person's ideas or words. Plagiarism and cheating can result in a failing grade for an assignment, for the course, or immediate dismissal from the university. Students are expected to be familiar with the policies in the current Academic Calendar that deal with plagiarism, cheating, and the penalties and procedures for dealing with these matters. All cases of academic dishonesty are reported to the Academic Dean and become part of the student's permanent record.

Mental Health Support

All of us need a support system. We encourage students to build mental health supports and to reach out when help is needed.

On Campus:

- Counselling Services: ambrose.edu/counselling
- Peer Supportive Listening: One-to-one support in Student Life office. Hours posted at ambrose.edu/wellness.
- For immediate crisis support, there are staff on campus who are trained in Suicide Intervention and Mental Health First Aid. See ambrose.edu/crisissupport for a list of staff members.

Off Campus:

- Distress Centre - 403-266-4357
- Sheldon Chumir Health Care Centre - 403-955-6200
- Emergency - 911

Sexual Violence Support

All staff, faculty, and Residence student leaders have received *Sexual Violence Response to Disclosure* training. We will support you and help you find the resources you need. There is a website with on and off campus supports – ambrose.edu/sexual-violence-response-and-awareness.

Off Campus:

- Clinic: Sheldon Chumir Health Centre - 403-955-6200
- Calgary Communities Against Sexual Abuse - 403-237-5888

Note: Students are strongly advised to retain this syllabus for their records.