BIOL 307 Chordate Zoology Syllabus – Spring 2023

General Course Information

Welcome to Chordate Zoology! This course will provide an introduction to the diversity, anatomy, ecology, and behaviour of chordate animals. The Biology 307 Laboratories will provide you with the opportunity to gain an appreciation for the relationship between form and function of chordates and will attempt to do so by taking a comparative approach. The lectures will complement this by providing ecological and evolutionary

- Lectures will be delivered in person or via Zoom; electronic (.pdf) versions of the lecture slides and video recordings of (most) sessions will be posted on BRS after class.
- Lab materials: there is no lab manual for this course. Lab write-ups will be posted on BRS the week before each lab. Also check BRS for information regarding assignments.
- 4) Optional textbook: Kardong, K. V. 2019. Vertebrates: Comparative Anatomy, Function, Evolution. 8th Edition. McGraw-Hill Education, New York.
 (A list of required readings will be posted on the course website)

Intended Learning Outcomes

This course is designed to provide information that is of fundamental scientific interest and importance but also to impart skills that are valuable in a professional scientific career (in biology and elsewhere). After completion of this course, you will be able to successfully identify and classify the major groups of living (extant) chordate animals based on anatomical features. You will recognize differences among these groups in skeletal, respiratory, and nervous systems and understand their evolutionary origins and ecological context (*i.e.* phylogeny and functional morphology). You will possess the foundational skills for generating and testing hypotheses using comparative data, as well as skills in cooperative learning and effective communication of scientific information.

Assessment

You will have the opportunity to demonstrate your progress and proficiency through various forms of evaluation, including:

Lab Content (breakdown provided separately)	50%
Lecture Content	
Prep Survey & Career Exercises	3%
Packback Assignments (approximately weekly)	10%
Discussion(s)	2%
Morphometrics Assignments	5%
Lecture Test 1 - Stage I (12%) + Stage II (3%)	15%
Lecture Test 2 (during Final Exam period)	15%

To pass the course, students must:

- 1) Write Lecture Test 2
- 2) Complete all Lab Assignments
- 3) Score a grade of 25 points, or greater, out of a possible 50 in the Laboratory component
- 4) Score a grade of 50 points, or greater, combined across **Lecture** and **Laboratory** components

If either 1 or 2 are not completed, the student will automatically fail the course and receive an "N" ('Incomplete') on their transcript. If a student successfully completes 1 and 2 <u>but is not</u> <u>successful in either 2 or 3</u>, they will receive an "F" on their transcript.