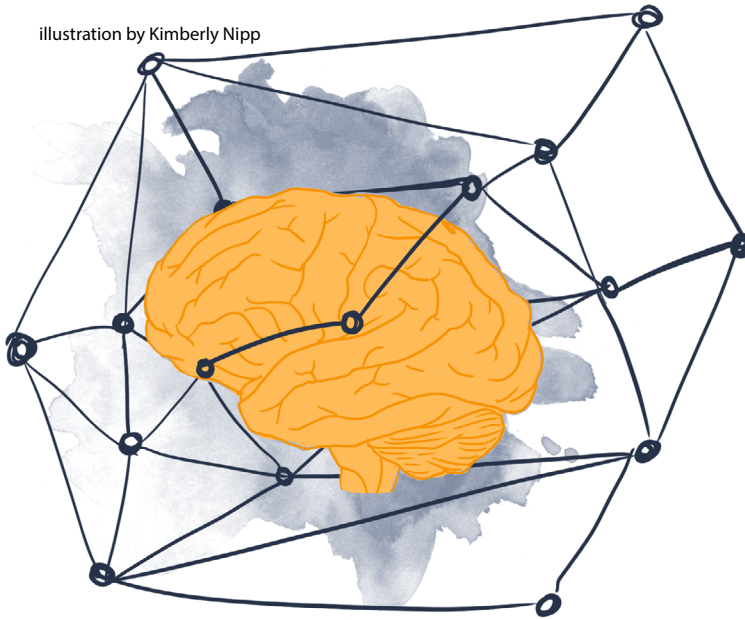


illustration by Kimberly Nipp



PSYCHOLOGY 101-990

2023 Winter Term 1

Introduction to Biological and Cognitive Psychology

LEARNING GOALS

By the end of this course you should be able to

1. Explain what psychology is and isn't.
2. Describe the history and evolution of the field of psychology and the various theoretical approaches to the study of behaviour.
3. Use effective evidence-based study strategies based on current psychological research.
4. Be able to engage effectively and collaboratively with others in an online learning environment.
5. Be able to manage the knowledge you obtain from the course and apply it in real-world settings.
6. Understand the nature of scientific inquiry.
7. Understand and explain basic research methods currently employed by psychologists.
8. Explain the concept of an 'experiment'; its strengths and its weaknesses.
9. Use and interpret basic descriptive inferential statistics.
10. Recognize, recall, connect, and evaluate psychological concepts and theories from specific subfields (e.g., biological and cognitive psychology).
11. Think critically and creatively about psychological research and media representations of it.

ACKNOWLEDGMENT

The UBC Point Grey Campus is located on the traditional, ancestral, and unceded territory of the Musqueam people. The land it is situated on has always been a place of learning for the Musqueam people, who for millennia have passed on their culture, history, and traditions from one generation to the next on this site.

ABOUT PSYCHOLOGY 101

This psychology course will introduce you to some of the major research areas within the field of psychology: the scientific study of behaviour. The course begins with an overview of psychology and its research methods, and then covers several fundamental topics in behavioural neuroscience and cognitive science.

This section of PSYC101 is an **online course**. It is almost entirely *asynchronous* (not live; e.g., prerecorded lectures, online exams, and self-assessments); it has optional *synchronous* (live) Zoom office hours. **This means that, unless you attend one of our office hours, you will not have synchronous contact with the course instructional team.** Still, there is no requirement in this course for synchronous activities. Moreover, to accommodate students in different time zones, exams are open for a period of 12 hours.

The course uses an open-source text that is supplemented by many video-based lectures and online resources. In addition, the course contains interviews with some leading research psychologists and some custom animations.

There are no prerequisites or corequisites for this course. Note that you cannot receive credit for both PSYC101 and PSYC100.



CONTACT INFO AND WEBSITES

Course psyc101de@psych.ubc.ca

Email:

- **Please use this email address for all non-confidential communication.**
- In most cases, email messages will be answered within 24-48 hours on weekdays during normal working hours.
- We encourage you to use the Piazza discussion forums for your questions, as that allows other students to benefit from your questions and your TAs and peer's responses.
- When you send us an email, the subject line should include the nature of the inquiry (e.g., "Question about the limbic system"); the body of your message should include your full name and student number.
- If you do send us an email that is content related, it should contain no more than three questions and you should try to explain your current understanding of the content in the email (which will be affirmed or corrected by your TA).

Teaching **Raymond McNeil**

Assistant: psyc101de@psych.ubc.ca

Online Office Hours: see the Canvas 'Office Hours' module

Instructor: **Steven Barnes**

sjb@psych.ubc.ca

Online Office Hours: see the Canvas 'Office Hours' module

About Steven

I was born in Montreal, Quebec, and spent my teenage years in Toronto, Ontario. About 25 years ago, I moved to Vancouver for my UBC degrees: BSc, MA, and PhD--all in Behavioural Neuroscience. Then, I completed two postdoctoral fellowships: One in neurophysiology (University of Bonn) and one in computer programming and interactive art (Simon Fraser University).

I am currently a Professor of Teaching in UBC's Department of Psychology, and am also the Director of the Undergraduate Program in Neuroscience.

My current research interests include: novel online technologies for learning and wellbeing (e.g., tapestry-tool.com, mytyde.ca), bipolar disorders (e.g., crestbd.ca), science writing, student mental health and wellbeing, and neuroscience in general. Within the field of Behavioural Neuroscience, the three topics that excite me the most are: drugs & addiction, sleep & dreaming, and psychiatric & neurological disorders.

Please only contact me directly for personal issues affecting your performance, academic concessions, or accommodations. Because of the email volume associated with an online-only class of this size, I will be forwarding all other course-related emails directly to your TA at: psyc101de@psych.ubc.ca. Please take no offence if and when I do so.

Websites: canvas.ubc.ca

We will be using Canvas for this course.

Canvas. Please note that not all of the content in the course will be visible to you the first time you log into Canvas. **Course content is released one week at a time.** The only exception is the readings: You will have access to all the text readings from the beginning of the course. The reason for releasing content one week at a time is to give me time to review, update, and extend the content for that week, if needed.

Note: Canvas captures data about your course-related activities and provides information that can be used to improve the quality of teaching and learning. In this course, we plan to use analytics data to: (1) view overall class progress; (2) review statistics on course content being accessed to support improvements in the course; and (3) monitor activity during exams.

EVALUATION

In this course you have some choice in how you are evaluated. You can either choose to complete the course by being evaluated almost entirely on your performance on 3 exams, or you can explore other methods of assessment.

The course is divided up into 13 weeks. Each week (except Week 1) begins on Friday at 12 am, and ends the following Thursday at 11:59 pm (Pacific time). **Course content for each week is released Friday at 12 am.**

1. Exams (up to 98%):

There will be 2 midterms and a final exam during the course. All exams are timed (typically 1-2 hours) and closed book, and you will have a 12-hour period within which to complete them. Weights and dates are below.

Midterm 1 (25%)

Oct 11, 9 am - 9 pm (Pacific)

Midterm 2 (30%)

Nov 8, 9 am - 9 pm (Pacific)

Final Exam (43%)

During the Final Exam period (Dec 11-22)--dates and times are typically announced in late October by UBC.

Notes on the Exams:

- Midterm exams are not cumulative and only cover the specified weeks materials (see page 7). The final exam is cumulative.

- Exams will be 'closed book'.
- In an effort to discourage academic misconduct and maintain the integrity of the assessments, this course: (1) **uses Lockdown Browser for exams**; and (2) **exam questions are presented one at a time**. Please make sure you download and install Lockdown Browser and test it with the practice exam well in advance of the first midterm. **It is your responsibility to ensure you meet the technical requirements to complete this online course.**
- There will be no makeup exams. If you receive a concession for missing a midterm exam, that portion of your course grade will be evenly split amongst the remaining exams in the course. If you receive a concession for missing two midterm exams, you will be assigned a significant research project to make up for the 55% of your grade associated with those missed midterms. If you miss the final exam, you will need to confer with your faculty advising office as to how this will be handled.
- You will not receive a concession for missing a midterm exam unless you [complete this survey](#) within 48 hours of missing the midterm. You will not receive a concession for missing the final exam unless you speak with your faculty advising office.
- Each exam will be timed and will typically be 1-2 hours in length. Please ensure you start the exam with enough time to complete it within the 12-hour window.
- If you have an accommodation through the Centre for Accessibility for extra time on exams, you will need to inform me before you attempt the first midterm so that I can add additional time for you for all the exams.
- It is your responsibility to ensure that you have an adequate internet connection and the proper setup at the time you write an exam.
- There will be topics covered in the lectures that are not in the text and topics in the text that are not covered in the lectures. You will be responsible for both. That is, all readings and all lecture materials are examinable.

2. Optional Course Project (up to 24%):

You may elect to do a project of one of three types (described below), and on a topic of your choosing that is related to the course materials. If you do elect to do a project, the grade you receive on that project will be worth 24% of your final grade, and the weights of the exams will be reduced to the following:

Midterm 1: 17%
 Midterm 2: 22%
 Final Exam: 35%

Note that your grade on the course project will only be counted if it improves your final grade in the course.

There are three purposes for this course project:

1. To offer you the chance to explore a topic of your choice in

greater depth than the lectures and text can offer.

2. To assess your ability to think both critically and creatively.
3. To offer you a chance to explore other ways of expressing your knowledge.

Project Option 1: Essay. The first type of optional project you can choose to do is an essay related to a topic in the course. For this option, you would compose an essay of 1500-2000 words. Your essay must be your own work and be composed for this class alone.

Project Option 2: Video. The second type of optional project you can choose to do is to create a video related to a topic in the course.

Project Option 3: Graphic Novel. The third type of optional project you can choose is to create a graphic novel related to a topic of your choosing in the course.

Optional Project Due Dates and Grading. Your grade for the optional course project is comprised of three items:

Project proposal (5%; submit to Canvas) **Sep 22 11:59 pm**
 Project draft (15%; submit to Canvas) **Oct 27 11:59 pm**
 Final project (80%; submit to Canvas) **Dec 4 11:59 pm**

Please note that late submissions of proposals will not be accepted, and late submissions of the draft or final project will result in -10% per day.

The purpose of the proposal and draft is to allow us to give you initial feedback on your work. To that end, if you do not hand in a proposal or draft you will not be able to hand in a final project.

Notes on the Optional Project. There are two things to be particularly mindful of when completing the optional project. The first is to ensure that the topic you choose for the project is related to a topic in the course. The second is that all materials all used in your project should be cited—including images and video and other media.

TurnItIn. Please note that if you choose Project Option 1, you must submit the final version of your project using a two-step submission procedure:

1. Submit the final version of your project as a Microsoft .doc or .docx file, by 11:59 pm on Dec 4, to Turnitin.com.

• To submit your essay on TurnItIn you will need to go to [turnitin.com](https://www.turnitin.com), create an account if you do not yet have one (see below), select "enroll in a class," enter our Class ID (40382636) and Enrollment Key (*alwayscite*).

2. Submit your essay as a Microsoft .doc or .docx file, by 11:59 pm on Dec 4, to Canvas. The copy of your essay that you submit to Canvas must clearly indicate your TurnItIn user id on its first page.

Setting up an account on Turnitin. To submit your paper on Turnitin, you will need to create a unique user profile, consisting of a username (e-mail address) and password. Please note that information submitted to Turnitin is stored in the

United States.

If you have concerns about privacy, it is recommended that you remove identifying information, such as your name and student number, from the text of any assignment submitted to Turnitin. In addition, please follow these instructions:

1. Create an anonymous email address using one of the available free services.
2. Go to turnitin.com.
3. At the top right, go to Create Account and select Student.
4. Enter the Class ID (40382636) and Enrollment Key (*alwayscite*).
5. Create an alias or pseudonym. Please remember to also submit that alias/pseudonym via Canvas.
6. Please delete any identifying information from the original document prior to uploading it. This includes your name and student number in the document, as well as any metadata or hidden data that might be stored in the document itself. To remove metadata from your Microsoft Word document:
 - Windows: You can remove the hidden data by using Microsoft Word's Document Inspector.
 - Mac: You can remove the hidden data by clicking on Word > Preferences > Security, then selecting Remove personal information from this file on save.

3. RESEARCH EXPERIENCE COMPONENT (REC; 2%)

Psychology is an active and exciting scientific discipline. Many of the studies you will learn about in this course were carried out at universities just like ours. As part of this course, you will be asked to complete a research experience component (REC) as way of introducing you, in a more hands on and interactive way, to cutting edge research in psychology. This REC will be worth 2% of your grade, and you are free to choose one of the following two options:

OPTION 1: Participate in the Psychology Department Human Subjects Pool (HSP)

Most students will choose to earn their research experience component by spending two hours participating in psychology studies (worth 1% point for each hour) through the Department of Psychology's Human Subject Pool (HSP) system. You can locate, create an account, and sign up for studies by going to hsp.psych.ubc.ca. Please register in the system by the end of the first month of classes to have the opportunity to earn your first ½ hour credit with a brief online survey that will increase your eligibility for more studies.

Once registered in the system, you will be able to browse through and select which studies you wish to participate in, sign up for an available timeslot, and confirm your accumulated credits afterward. **At the end of the last day of class for the term, the subject pool is closed.** At that point, you will no longer be able to receive credits. **I strongly urge you to participate in and confirm your credits long before the last week of class since many studies will not offer timeslots near the end of the term and you may be locked out before allocating your credits to your desired course.** Further

instruction on how to use the HSP online system can be found at psych.ubc.ca/undergraduate/opportunities/human-subject-pool/ in the document entitled "Subject Pool Information for Participants."

OPTION 2: The Library Option

As an alternative to participation in psychology subject pool experiments, you may complete a library-writing project. Such projects consist of reading and summarizing 1) the research question, 2) the methods and 3) the results (in written form) of a research article from the peer reviewed journal *Psychological Science*. You will receive one (1) research participation credit for each article summary that meets the following requirements.

Requirements:

- The article must have been published in the journal titled "Psychological Science."
- The article must have a publication date from the year 2000 to present (i.e. papers from 2001 are acceptable; those from 1999 or earlier are not).
- The article must be a research article; it cannot be a review article, a news item, a notice, or a letter to the editor, for example.
- The summary should be approximately 500 words in length.
- You must include your name, student number, course, section, instructor and email address on each summary.
- You must log on to the Human Subject Pool (HSP) system (hsp.psych.ubc.ca) and create an account before submitting your article summaries. Your credit is assigned using the online system.
- You can obtain the same number of extra credits via the library option as with the HSP option (see above).
- **Summaries must be submitted no later than 10 days before the end of classes.**

If you don't have a turnitin account already account already (from a previous course), you will need to create a user account in Turnitin. **For the library assignment the class ID is 40264948, class name is "HSP W1 2023-2024" and password is "Research".** See turnitin.com, and click on the "Training" link at the top of the page for detailed instructions on how to submit papers to Turnitin. Any student who is suspected of plagiarism will, at a minimum, not be granted credit, and I will be notified by the HSP administrators. Further action may be taken at a departmental or university level.

4. EXTRA HSP CREDIT (optional; up to 3% bonus)

You may earn up to 3% extra credit that will be added to your final grade. These extra credit points can be earned by doing up to three additional hours of study participation in the HSP (or summarizing another three additional journal articles for the library option), as described above for the research experience component of the course.

COURSE MATERIALS

Required: Spielman, R., Jenkins, W., & Lovett, M. (2021). H5P Psychology. BCCampus. <https://opentextbc.ca/h5ppsychology/>

This text was selected because it is of high quality, it is free to use, and has hundreds of interactive activities. This text will be supplemented by many in-course videos and additional external resources that are designed to facilitate your understanding of the course materials. This text is embedded in Canvas for your convenience.

WITHDRAWAL DATES

If you wish to withdraw from this course without any record of the course on your transcript, you must do so on or before **Sep 18**. If you wish to withdraw with a "W" on your transcript, you must do so on or before **Oct 27**.

GRADING AND ATTENDANCE

Grading. In order to reduce grade inflation and maintain equity across multiple-section courses (like this one), all psychology classes are required to comply with departmental norms regarding grade distributions. According to this policy, the average grade in 100- and 200-level Psychology classes will be 72 for an exceptionally strong class, 70 for an average class, and 68 for a weak class, with a standard deviation of 14. Scaling may be used in order to comply with these norms; grades may be scaled up or down as necessary by myself or the department. Grades are not official until they appear on your academic record.

You will receive both a percent and a letter grade for this course. At UBC, they convert according to the key below:

A+	90-100%	A	85-89%
A-	80-84%	B+	76-79%
B	72-75%	B-	68-71%
C+	64-67%	C	60-63%
C-	55-59%	D	50-54%
F	0-49%		

Because you are earning a degree at a highly reputable post-secondary institution, the criteria for success are high. The Faculty of Arts offers the following guidelines that broadly characterize the kind of work that is generally associated with the particular grade ranges. These characteristics help put the Psychology Department grading policies into perspective. Please note that adequate performance is in the C range.

A Range: Exceptional Performance. Strong evidence of original thinking; good organization in written work; capacity to analyze (i.e., break ideas down) and to synthesize (i.e., bring different ideas together in a coherent way); superior grasp of subject matter with sound critical evaluations; evidence of extensive knowledge base.

B Range: Competent Performance. Evidence of grasp of subject

matter; some evidence of critical capacity and analytic ability; reasonable understanding of relevant issues; evidence of familiarity with the literature.

C-D Range: Adequate Performance. Understanding of the subject matter; ability to develop solutions to simple problems in the material; acceptable but uninspired work; not seriously faulty but lacking style and vigor.

F Range: Inadequate Performance. Little or no evidence of understanding of the subject matter; weakness in critical and analytical skills; limited or irrelevant use of the literature.

Attendance. During your time in this course, if you encounter medical, emotional, or other personal problems that affect your attendance or academic performance, please notify me, as well as your Academic Advisor. Please refer to the UBC Calendar for a discussion of academic concession.

The University accommodates students with disabilities who have registered with the Centre for Accessibility (see below). The University also accommodates students whose religious obligations conflict with attendance or scheduled exams. Please let me know in advance, preferably in the first few weeks of class, if you will require any accommodation on these grounds. Other absences (e.g., varsity athletics, family obligations, or similar) are not part of University policy and you should not assume they will be accommodated.

Centre for Accessibility. UBC is committed to equal opportunity in education for all students including those with documented physical or learning disabilities. If you believe you fall in this category, please visit the website for the Centre for Accessibility (students.ubc.ca/about-student-services/centre-for-accessibility) to take the necessary steps to ensure that you have every opportunity that you deserve to excel in your studies.

Early Alert Program. I participate in the Early Alert program, which helps me support students who are facing difficulties that are interfering with their education, their wellness or both. For answers to frequently asked questions regarding the early alert program, please visit facultystaff.students.ubc.ca/systems-tools/early-alert/information-students.

Credit/D/Fail Grading. This course is eligible for Credit/D/Fail grading. The last day to change between Credit/D/Fail and percentage grading is **Sep 18**.

COURSE CONTENT AND YOUR JURISDICTION

Please keep in mind that this course may cover topics that are censored or considered illegal by some non-Canadian governments. If you are a student living abroad, you will be subject to the laws of your local jurisdiction, and your local authorities might limit your access to course material or take punitive action against you. UBC is strongly committed to academic freedom, but has no control over foreign authorities (please visit <http://www.calendar.ubc.ca/vancouver/index.cfm?tree=3,33,86,0> for

an articulation of the values of the University conveyed in the Senate Statement on Academic Freedom).

Thus, we recognize that students will have legitimate reasons to exercise caution in studying certain subjects. If you have concerns regarding your personal situation, consider postponing taking a course with manifest risks, until you are back on campus or reach out to your academic advisor to find substitute courses.

OTHER COURSE POLICIES

Online Conduct. Our class is a place where you should feel safe and respected. It should also be a place that is conducive to learning and intellectual inquiry. Any behaviour on your part that compromises that environment will not be tolerated and you will be removed from this class.

Collaboration Stipulation. Although collaboration is encouraged within this course, assessments should be completed by you alone.

ACADEMIC INTEGRITY & GENERATIVE AI

The use of generative AI (e.g., ChatGPT) for the completion of the optional project (only) is allowed in this course. However, if you choose to use generative AI, you need to include the output from the AI in a separate document and demonstrate how you fact-checked the information and how you used that information to build your knowledge. A simple copy-paste from an AI chatbot is not acceptable and will be considered academic misconduct (see below). **Use generative AI as a tool for your learning, and be transparent regarding its use.**

UNIVERSITY POLICIES

UBC provides resources to support student learning and to maintain healthy lifestyles but recognizes that sometimes crises arise and so there are additional resources to access including those for survivors of sexual violence. UBC values respect for the person and ideas of all members of the academic community. Harassment and discrimination are not tolerated nor is suppression of academic freedom. UBC provides appropriate accommodation for students with disabilities and for religious observances. UBC values academic honesty and students are expected to acknowledge the ideas generated by others and to uphold the highest academic standards in all of their actions.

ACADEMIC MISCONDUCT

Cheating, plagiarism, and other forms of academic misconduct

are very serious concerns of the University, and the Department of Psychology has taken steps to alleviate them.

In all cases of suspected academic misconduct, the parties involved will be pursued to the fullest extent dictated by the guidelines of the University. Strong evidence of cheating or plagiarism may result in a zero credit for the work in question. According to the University Act (section 61), the President of UBC has the right to impose harsher penalties including (but not limited to): a failing grade for the course, suspension from the University, cancellation of scholarships, or a notation added to the student's transcript.

All graded work in this course, unless otherwise specified, is to be original work done independently by individuals. If you have any questions as to whether what you are doing is even a borderline case of academic misconduct, please consult with me. For details on pertinent University policies and procedures, please see the UBC Calendar (calendar.ubc.ca/vancouver/?tree=3,54,111,959).

LEARNING & WELLBEING RESOURCES

Wellness resources are available on the Canvas page for the course (click the header image to be taken to a list of wellness resources), and they are also available here: students.ubc.ca/health.

There is a great search tool for wellness resources here: campuslightbox.com

Learning resources are available on this UBC page: students.ubc.ca/enrolment/academic-learning-resources.

Online learning-related resources can be found on this UBC page: keeplearning.ubc.ca

COURSE SCHEDULE

Dates	Topic(s)	Assigned Readings (available on Canvas)	Important Dates
Week 1 (Sep 5-7)	Introductions, Course Syllabus, and Course Organization	Course Syllabus, Course Canvas Site	
Week 2 (Sep 8-14)	What is Psychology? (Psychology's History: Functionalism vs. Structuralism, Behaviorism, Psychophysics, Modern Approaches; Types of Psychologists)	HSP Psychology: Chapter 1 Introduction and sections 1-4.	
Week 3 (Sep 15-21)	Research Methods Pt. 1 (Nature of Scientific Inquiry, Research Methods of Psychology and Statistics)	HSP Psychology: Chapter 2 Introduction, sections 6-7, and section 9.	
Week 4 (Sep 22-28)	Research Methods Pt. 2 (Nature of Scientific Inquiry, Research Methods of Psychology, and Statistics)	HSP Psychology: Chapter 2 section 8.	<ul style="list-style-type: none"> • Sep 22, 11:59 pm (Pacific): Optional Project Proposal due
Week 5 (Sep 29-Oct 5)	Neuroanatomy and the Endocrine System	HSP Psychology: Chapter 3, Introduction and Sections 12-15.	
Week 6 (Oct 6-12)	Neurophysiology	HSP Psychology: Chapter 3, Section 12.	<ul style="list-style-type: none"> • Oct 11, 9 am - 9 pm (Pacific): MIDTERM 1. This exam covers materials from Weeks 2-5.
Week 7 (Oct 13-19)	Genetics, Evolutionary Psychology, and Behavior	HSP Psychology: Chapter 3, Section 11.	
Week 8 (Oct 20-26)	Visual System	HSP Psychology: Chapter 5 Introduction and sections 24-26.	
Week 9 (Oct 27-Nov 2)	Other Sensory Systems, Perception and Attention	HSP Psychology: Chapter 5, Sections 27-29.	<ul style="list-style-type: none"> • Oct 27, 11:59 pm (Pacific): Optional Project Draft due
Week 10 (Nov 3-9)	States of Consciousness	HSP Psychology: Chapter 4 Introduction and sections 17-22.	<ul style="list-style-type: none"> • Nov 8, 9 am - 9 pm: MIDTERM 2. This exam covers materials from Weeks 6-9.
Nov 13-15	Midterm Break		
Week 11 (Nov 10-23)	Learning: Classical Conditioning, Operant Conditioning, and Social Learning.	HSP Psychology: Chapter 6 Introduction; Chapter 6, Sections 6.1-6.4.	
Week 12 (Nov 24-30)	Cognition: Memory	HSP Psychology: Chapter 8 Introduction and sections 43-46.	
Week 13 (Dec 1-7)	Cognition: Thinking & Reasoning	HSP Psychology: Chapter 7 Introduction and sections 36, 38.	<ul style="list-style-type: none"> • Dec 4, 11:59 pm (Pacific): Optional Project Final Version due
December Exam Period (Dec 11-22)	<ul style="list-style-type: none"> • Date and time to be announced by UBC: FINAL EXAM. This exam is cumulative, but with greater weight placed on Weeks 10-13. 		

Last Modified: September 4, 2023