Statistical Methods in Psychology II PSYC 300B 03 (CRN 22846)
Spring 2023: January-April

Territory Acknowledgement

We acknowledge and respect the lək̓ʷəŋən peoples on whose traditional territory the university stands and the Songhees, Esquimalt and WSÁNEĆ peoples whose historical relationships with the land continue to this day.

When and Where is Class?

Lectures	When: Mondays, Wednesdays, and Thursdays at 2:30-3:20pm Where: David Turpin Building A104
	Note: Sessions in this course may be recorded and posted in Brightspace to allow students who are not able to attend to watch later. Please note that recordings are not guaranteed, and glitches may occur that prevent recordings from being possible or diminish the quality of the recording. Students who have privacy concerns can contact me and will have the option to limit their personal information shared in the recording. If you have other questions or concerns regarding class recording, please contact privacyinfo@uvic.ca.
Labs	Check the academic calendar to find the date and time for which you signed up.

Meet Your Teaching Team

Professor	Name: Dr. Maria Iankilevitch (she/her) Email: mariaiankilevitch@uvic.ca Office hours: Wednesdays & Thursdays 4:30-5:30pm in COR A250 Other times by appointment in COR A250
Teaching Assistant	Name: Kingsley Ivande (he/him) Email: kingsleyivande@uvic.ca Office hours: by appointment

* Note that office hours will be available during the following dates: January 11th-April 6th. Office hours will not be available during holidays or Reading Week.

Course Description and Prerequisites

Prerequisite: Completion of PSYC300A with a minimum grade of 50%.

Description: This course provides a conceptual and practical understanding of statistical analyses applied to research designs with one, two, and more than two groups. Students will develop their skills to evaluate and carry out statistical analyses in psychology. Students will analyze a data set with statistical software using the popular statistical program

Learning Goals

By the end of the course, you will…	
Understand	Explain which statistical analyses to conduct for a given study design. Explain the logic and theory behind each analysis.
Apply	Calculate the appropriate statistic for the appropriate purpose. Apply your understanding of statistics to answer various research questions.
Analyze	Examine, compare, and contrast different types of study designs and analyses. Organize, structure, and analyze data. Use statistical software to explore and analyze a data set to answer a research question
Evaluate	Evaluate the quality of statistical analyses that have already been conducted. Think critically about data and analyses. Decide the best course of action to proceed with. Draw correct conclusions based on evidence.
Create	Design and execute a plan for conducting analyses about a novel research question.
Communicate	Convey research ideas and research findings in written communication. Communicate the results of an analysis in a clear and concise manner.

Course Resources and Required Materials

There is no textbook required for this course. All course content will be delivered through lectures, assignments, and discussions of course concepts. If you are interested in having a supplemental text as a guide, I recommend the following **<u>optional</u>** texts:

1. Field, A., Miles, J., & Fields, Z. (2012). *Discovering statistics using R*. Thousand Oaks, CS: Sage Publications.
2. Gravetter, F. J., & Wallnau, L. B. (2017). *Statistics for the behavioral sciences* (10th ed.). Wadsworth, Cengage Learning.
3. Howell, D. C. (2017). *Fundamental statistics for behavioral sciences* (9th ed.). Wadsworth, Cengage Learning.

You will need a scientific (non-graphing) calculator for this course to be able to work on problems. It is recommended that the calculator have exponents, brackets, square root, etc., which are standard functions on a scientific calculator.

The course website is **Brightspace** and can be found at https://bright.uvic.ca

You will need to check your University of Victoria email account **daily** for relevant updates. These can be personal emails or class-wide announcements.

Overview: This course will involve learning about and using the statistical software called R. You will use R to analyze data during Labs and for your Research Report. Note that every student is expected to conduct analyses themselves on their personal device.

Prior to arriving to your first lab of the semester:
1. **Laptop (preferred option)**: Download R (the programming language) and R Studio (the program to interface with R). Note that R and R Studio require two separate downloads and R should be downloaded prior to R Studio. **Tablet**: Sign up with a free account with posit.cloud.
2. Watch the introductory videos available on the Lab Brightspace site.
3. Open a dataset on the device you will be using for labs. You will be expected to already know how to do this with your personal lab   -0.003   T.4   (t)3.5   (udi)003   Tw

Course Communication and Support

As a first step, you should always check the syllabus and the course website to find the answer to your questions. If you do have a question, there are several ways you can get help. Given that oftentimes multiple people have the same question, the professor will send out announcements to the class with answers to common questions. Below are different ways that you can find information and get support in this course:
1. Check Brightspace (i.e., syllabus, course announcements, exam instructions, lectures, etc.)
2. Students are welcome to ask questions during lectures and labs by raising their hand.
3. Students may speak to the professor during class time (i.e., before class and after class if times allows).
4. Students are welcome to attend the professor's office hours for one-on-one meetings.
5. Students can also email the TA or the professor to set up a one-on-one meeting.
6. Students are encouraged to form study groups with fellow students and/or to work with their lab groups to study together and/or ask questions.
7. For questions of a personal nature (e.g., extensions, concerns, accessibility, illness, etc.), students should email the professor and can set up a one-on-one meeting if needed.

Emails: When communicating via email please adhere to the following protocols:
- Students can expect an **email response within 48 hours not including weekends** (avoid emailing the night before an assignment is due with a question about the assignment because we might not see your email in time to send a helpful reply). If we have not answered your email in two business days, feel free to send a follow-up email.
- Please consult the course outline, other handouts, and the course website **before** submitting inquiries by email.
- If you want to set an appointment, include a **variety of dates and times** that would work for you, and allow a few days for us to get back to you. Please do not email the night before and expect us to be available the next day.
- In the subject line indicate the course code, section number, and the topic of your email (e.g., PSYC300B 03 descriptive statistics question).
- Emails should come from your UVic email account.
- All communications (verbal, email) should be respectful in language and tone and constructive in nature. This includes communications with the professor, the TA, and your fellow students.

The big picture: Ultimately, **you are not alone** in this course and the teaching team is here to support you! All you need to do is take advantage of the many resources available! We look forward to interacting with you all!

Course Feedback

You may submit feedback anonymously about the course at any time throughout the semester by completing a brief feedback form, which can be found on the Feedback about the Course link in the "Course Orientation, Syllabus, and Other Resources" module on Brightspace. You may submit feedback as many times as you would like to throughout the course. Through this, you can share with me:
- Difficulties that may arise with the comprehension of the subject matter;
- Insights on the various topics and critical reflections;
- Positive experiences that you are having in the course and that you would like to see continue;
- Any other feedback that is relevant, constructive, respectful, and would serve to improve the content or the delivery of the lectures and make them a better learning experience.

Informative feedback is the cornerstone of a positive learning environment. As such, I will read all

should) always communicate directly with the professor or the TA should you feel that you require immediate attention.

research project lab will be dropped such that the best 5/7 computer labs (worth 9% of total grade) and the best 2/3 research project labs (worth 1% of total grade) will count towards the final lab grade. This will allow you to miss up to three lab sessions due to illness or other external factors without penalty. There are no make-ups for labs. **Important: please read the schedule on page 8 carefully about what to do during the first week of classes (week of January 9th) to prepare yourself for labs.**

Lab Attendance: Labs are mandatory and students are expected to attend them. You must earn a passing grade (minimum 50% average) on the labs. If you do not earn a passing grade in the labs, you will not be able to write the final exam for the course and consequently will earn an "N" grade in the course. Given that we drop the three lab scores, there are no make-up labs.

Exams: Exams will cover material covered in relevant lectures, labs, homework, and quizzes. Overall, the questions in the exams are designed to not only test .6 (us)-1.9 (te2 664.62 Tm [(e1t)3.6 ( )0.5)0.6 ( )22 Tm [(6 (00(,)3.6 (

external hard drive, etc.) as you are working on the assignment. No extensions will be granted based on loss of work or other technological failures.

3. Ensure that you receive confirmation from Brightspace that your work is submitted after you click the submit button. It is your responsibility to make sure that the work is not in progress but that it is fully submitted. Furthermore, all work must be submitted on Brightspace and attachments to emails will not be accepted.

Bonus Student Survey: A brief survey will be available for students to complete and earn 1% bonus for the course. The goal of this survey is to collect a bit of data that will be used in the course labs to practice R. This means that we will be analyzing the data in this course for the purposes of learning data analysis using statistical software. The survey will ask a few questions about your views on social media and no identifying information will be collected in the main survey.

The survey is anonymous, will remain confidential, and will only be used for the purposes of this course. This survey is also voluntary, meaning that students can skip questions they do not want to answer. The survey will not be published anywhere and will not be shared with anyone outside this course. Given that this survey is worth a bonus point, students will not earn any points for completing the survey late.

iClicker Participation: iClickers are used as a way to work together through questions posed in class. When used effectively, iClickers can increase your ongoing engagement and involvement, promote a safe environment to communicate your answers, and create lively discussions in class. iClickers can also provide immediate feedback about your understanding of the class material and help us figure out how to improve your understanding of a concept.

In order to receive the full 2% bonus, students need to participate in 75% of questions posed in 75% of classes with iClicker questions. Given that these are bonus points and the level of participation required to receive maximum points is set at 75% of all classes to allow you to occasionally miss a class, skip a question at times, forget your iClicker, or run out of batteries, there are no opportunities to make up iClicker Participation points.

It is an academic infraction to use or bring another student's iClicker to class, to lend your iClicker to another student, or to click in when not present in class. This will be treated similarly to other academic infractions (such as cheating on an exam) and will be subject to university disciplinary procedures. Please remember that the iClickers provide you with an opportunity to enhance your in-class learning, and it is expected that you cooperate in making the system work to help you and your colleagues learn.

Course Completion Requirements

Students who have completed the following elements will be considered to have completed the course:

UVic Library Document on **Avoiding Plagiarism**