

# COURSE OUTLINE Introduction to Maps and GIS

**Office Hours:** Tuesdays and Wednesdays 15:00 pm to 16:00 pm, zoom meeting links will be shared on the Coursespaces announcements.

## Contact: rezania@uvic.ca

**Class Meetings:** Related links will be posted on the Coursespaces announcements.

# Labs: You must be registered in a Lab Section.

The labs links will be posted on the Coursespaces.

## **COURSE DESCRIPTION:**

The objectives of this course will be to introduce you to the idea of basic background material for understanding geographic information, spatial data, and Geographic Information Systems. Students will be to get familiar with fundamental of GIS project management, including GIS software, digital mapping, and GIS applications.

In this course they will be focusing on the basic background material for understanding geographic concepts. During the lab sessions, students will get familiar with the specific implantation of those concepts within Quantum GIS (Q-GIS) and ArcGIS online. The purpose of all these materials is preparation for the next courses like cartography and finding the value of using geographic information system in different majors.

# **REQUIRED Software(S)**

1- Zoom

All UVic students are able to have their own Zoom accounts (<u>uvic.zoom.us</u>). All the students pay close attention to the Zoom Terms of Service, specifically the <u>Privacy Policy</u>. The Zoom Orientation Guide can help students get started with using Zoom.

2- Quantum GIS (Q-GIS)

It is a free and open-source cross-platform desktop geographic information system (GIS) application. The essential link and tutorial for the installation are on our lab website.

# **REQUIRED TEXT(S)**

There is no required textbook for this course, however weekly readings and online learning resources will be provided on CourseSpaces throughout the course.

### **LEARNING OUTCOMES**

- 1. ability to complete continuous and discrete geo-referencing;
- 2. ability to read and calculate scales;
- 3. ability to understand, evaluate and select suitable map projections;
- 4. ability to classify geographic information;
- 5. ability to differentiate between different types of maps;
- 6. describe how GIS can be used to solve problems;
- 7. ability to explore GIS data, metadata and maps;
- 8. ability to create a basic digital GIS map.

# **EVALUATION**

Midterm-1 Exam (July 20<sup>th</sup>) 15% Midterm-2 Exam (August 4<sup>th</sup>) 15% Laboratory Assignments x 6 30% Final Exam (August 18<sup>th</sup>) 40%

**Exam Format:** The questions for the midterm exams and final exam will be based on lectures, labs, posted learning resources and class discussion. The final exam is comprehensive. Formats includes a combination of short-answer, calculations, and multiple-choice questions.

### **GRADING SYSTEM**

As per the Academic Calendar:

Grade	Grade point value	Grade scale	Description	
A+ A A-	9 8 7	90-100% 85-89% 80-84%	<b>Exceptional</b> , <b>outstanding</b> and <b>excellent</b> performance. Normally achieved by a minority of students. These grades indicate a student who is self-initiating, exceeds expectation and has an insightful grasp of the subject matter.	
B+ B B-	6 5 4	77-79% 73-76% 70-72%	<b>Very good</b> , <b>good</b> and <b>solid</b> performance. Normally achieved by the largest number of students. These grades indicate a good grasp of the subject matter or excellent grasp in one area balanced with satisfactory grasp in the other area.	
C+ C	3 2	65-69% 60-64%	<b>Satisfactory</b> , or <b>minimally satisfactory</b> . These grades indicate a satisfactory performance and knowledge of the subject matter.	
D	1	50-59%	<b>Marginal</b> Performance. A student receiving this grade demonstrated a superficial grasp of the subject matter.	
F	0	0-49%	<b>Unsatisfactory</b> performance. Wrote final examination and completed course requirements; no supplemental.	
N	0	0-49%	Did not write examination or complete course requirements by the end of term or session; no supplemental.	

### **GEOGRAPHY DEPARTMENT INFO**

- Geography Department website: <u>uvic.ca/socialsciences/geography/</u>
- Undergraduate Advising: geogadvising@uvic.ca
- Department Chair: Dr. David Atkinson geogchair@uvic.ca

### **COURSESPACES**

CourseSpaces learning management systems (LMS) will serve as the main avenue of communication (http://coursespaces.uvic.ca). Please monitor the page on a regular basis for course announcements. If you are having difficulty logging in or password problems, contact the Computer Help Desk Email: helpdesk@uvic.ca, Tel: 250-721-7687

#### **POLICY ON ATTENDANCE**

A high level of student cooperation and participation, involving asking and answering questions is expected. The meeting software (Zoom) is recording only name and number of participants automatically. Students are expected to attend all lectures, take notes and be punctual for class.

# No audio, video, or screen recordings are permitted unless approved in writing (in advance) by the course instructor.

Topic handouts based on lecture presentations will be provided before the beginning of class meetings on CourseSpaces. These handouts will be removed **ten days** after the posting date. Students are responsible for downloading/saving and completing notes packages. *If you miss any material, make arrangements to get handouts from a fellow student in the zoom chat, not from the instructor.* 

**Students must complete all evaluation components to obtain credit**. Failure to complete any evaluation component without permission from the instructor, may result in an 'N' grade, which equals a Grade Point Value of 0.

Students will not be permitted to write make-up tests except for documented medical or compassionate reasons. Please inform the instructor of your situation promptly and present written proof within five working days. Any make-up test or examination may not follow the same format as the in-class one.

**Please sign in and attend only the laboratory section for which you are registered**. If you must miss a lab for exceptional circumstances, please make arrangements with your TA in advance to attend another section. This however does not change the due date of your lab assignment.

Conflicts with holidays or travel plans are not considered an acceptable reason to apply for a deferred examination or an assignment extension.

### POLICY ON LATE ASSIGNMENTS

Lab assignments are due 48 hours after your lab section (+24 hours in case of technical issue); thereafter late penalties will be applied.

Late assignments will be penalized **30% for a 48-hour time period** (each day %15, including weekends and holidays). After that, they will **no longer** be accepted for grade and will receive **0%**. Students must inform their Lab Instructor about the technical issue **one day before** the due date.

Details regarding your labs and their marks are managed by the course Lab Instructors. Please discuss any issues or questions on labs with your Lab Instructor first. Any discrepancy with lab grades must be reported to your Lab Instructor, then the Course Instructor within **seven days** of receiving the marked assignment.

Advice: Students have in the past found that some of the lab assignments can be time-consuming and challenging. We are here to help with this – Please make sure you schedule your time effectively. The Labs are **four** hours. Please plan to be there for the entire lab time. The labs materials are designed to be both **supplemental** and **complementary** to the lectures. Slides are **not** designed to replace attendance in class or lab.

# PLAGIARISM

Academic dishonesty (plagiarism, cheating) is a very serious matter in any academic institution and is dealt with severely at the University of Victoria. *The responsibility of the institution:* Instructors and academic units have the responsibility to ensure that standards of academic honesty are met. By doing so, the institution recognizes students for their hard work and assures them that other students do not have an unfair advantage through cheating on essays, exams, and projects. *The responsibility of the student:* Plagiarism sometimes occurs due to a misunderstanding regarding the rules of academic integrity, but it is the responsibility of the student to know them. If you are unsure about the standards for citations or for referencing your sources, ask your instructor.

Infractions will be dealt with in accordance with University policy. Commonly, the penalty for any form of cheating/plagiarism is a grade of F on the tests or laboratory assignments, or a final grade of F in the course. However, depending on the severity of the case other penalties may include a record on the student's transcript or expulsion.

Please familiarize yourself with the University policy on academic integrity found in the Undergraduate Calendar at the following website. Please contact me if you have any questions. web.uvic.ca/calendar2019-09/undergrad/info/regulations/academic-integrity.html

# EDUCATIONAL TECHNOLOGY

In this course a variety of educational technology will be used, including internet-based technologies or web-based applications, cloud services and social media. The use of technology is part of your engagement at the University. Some of these learning tools may collect, use and/or disclose your personal information and store or access that information outside of Canada.

UVic cannot require students to disclose personal information to technologies or organizations which may store information on servers located outside of Canada because disclosure of personal information to vendors, systems or services storing or accessing that personal information outside of Canada is restricted by section 30.1 of BC's Freedom of Information and Protection of Privacy Act (FIPPA). Personal information is information about an identifiable individual; for example, your name or your email address.

The following educational technology, which stores or accesses your personal information outside Canada, is required for this course: [ESRI : ArcGIS Online <a href="https://www.arcgis.com/home/index.html">https://www.arcgis.com/home/index.html</a>]. In case of changing this list, you will be inform as soon as possible. Using these technologies enhance your educational experience at UVic. The personal information is required by the service. The privacy policy and the terms of use are available at: <a href="https://www.esri.com/en-us/privacy/overview">https://www.esri.com/en-us/privacy/overview</a>. I encourage you to read these documents.

For the use of ArcGIS Online, we generate a username that will be an alias – but in order to generate and manage your password, your email address is required.

If you are not comfortable with your personal information being stored outside of Canada, please speak to me within the first week of class about using an alternative (such as using an alias or nickname).

Otherwise, by continuing in this course, you agree to the use of the educational technology in the course and the storage of personal information outside of Canada.

## ACADEMIC INTEGRITY

It is every student's responsibility to be aware of the university's policies on academic integrity, including policies on **cheating**, **plagiarism**, **unauthorized use of an editor**, **multiple submission**, and **aiding others to cheat**.

Policy on Academic Integrity: web.uvic.ca/calendar/undergrad/info/regulations/academic-integrity.html

If you have any questions or doubts, talk to me, your course instructor. For more information, see <u>uvic.ca/learningandteaching/cac/index.php</u>.

## ACCESSIBILITY

Students with diverse learning styles and needs are welcome in this course. In particular, if you have a documented disability or health consideration that may require accommodations, please feel free to approach me and/or the Centre for Accessible Learning (CAL) as soon as possible (<u>uvic.ca/services/cal/</u>). The CAL staff is available by appointment to assess specific needs, provide referrals, and arrange appropriate accommodations. The sooner you let us know your needs, the quicker we can assist you in achieving your learning goals in this course.

### POSITIVITY AND SAFETY

The University of Victoria is committed to promoting, providing and protecting a positive and safe learning and working environment for all its members.

### SEXUALIZED VIOLENCE PREVENTION AND RESPONSE AT UVIC

UVic takes sexualized violence seriously, and has raised the bar for what is considered acceptable behaviour. We encourage students to learn more about how the university defines sexualized violence and its overall approach by visiting <u>uvic.ca/svp</u>. If you or someone you know has been impacted by sexualized violence and needs information, advice, and/or support please contact the sexualized violence resource office in Equity and Human Rights (EQHR). Whether or not you have been directly impacted, if you want to take part in the important prevention work taking place on campus, you can also reach out:

Where: Sexualized violence resource office in EQHR; Sedgewick C119 Phone: 250.721.8021 Email: <u>svpcoordinator@uvic.ca</u> Web: <u>uvic.ca/svp</u>

COURSE EXPERIENCE SURVEY (CES)

We value your feedback on this course. Towards the end of term, as in all other courses at UVic, you will have the opportunity to complete an anonymous survey regarding your learning experience (CES). The survey is vital to providing feedback to me regarding the course and my teaching, as well as to help the department improve the overall program for students in the future. The survey is accessed via MyPage and can be done on your laptop, tablet, or mobile device. I will remind you and provide you with more detailed information nearer the time but please be thinking about this important activity during the course.

Week	Dates	Lab	Due
1	July 6 <sup>th</sup> to July 10 <sup>th</sup>	Lab 0 & Lab 1- Spatial Data (5%)	July 10 <sup>th</sup> or July 11 <sup>th</sup>
2	July 13 <sup>th</sup> to July 17 <sup>th</sup>	Lab 2- Coordinate Systems (5%)	July 17 <sup>th</sup> or July 18 <sup>st</sup>
3	July 20 <sup>th</sup> to July 24 <sup>th</sup>	Lab 3- Queries (5%)	July 24 <sup>th</sup> or July 25 <sup>th</sup>
4	July 27 <sup>th</sup> to July 31 <sup>st</sup>	Lab 4- Overlay Analysis (5%)	July 31 <sup>st</sup> or August 1 <sup>st</sup>
5	August 3 <sup>rd</sup> to August 7 <sup>th</sup>	Lab 5- Raster Analysis (5%)	August 7th or August 8 <sup>th</sup>
6	August 10 <sup>th</sup> to August 14 <sup>th</sup>	Lab 6- Data Editing and Web Maps (5%)	August 14 <sup>th</sup> or August 15 <sup>th</sup>

# **WEEKLY Lecture Topics Tentative Calendar**

## DISCLAIMER

The above schedule, policies, procedures, and assignments in this course are subject to change in the event of extenuating circumstances.

### NOTE:

A note to remind you to take care of yourself. Do your best to maintain a healthy lifestyle this semester by eating well, exercising, getting enough sleep and taking some time to relax. This will help you achieve your goals and cope with stress. All of us benefit from support during times of struggle. You are not alone.

Counselling Services - Counselling Services can help you make the most of your university experience. They offer free professional, confidential, inclusive support to currently registered UVic students. <u>uvic.ca/services/counselling/</u>

Health Services - University Health Services (UHS) provides a full-service primary health clinic for students, and coordinates healthy student and campus initiatives. <u>uvic.ca/services/health/</u>

Centre for Accessible Learning - The CAL staff are available by appointment to assess specific needs, provide referrals and arrange appropriate accommodations <u>uvic.ca/services/cal/</u>. The sooner you let us know your needs the quicker we can assist you in achieving your learning goals in this course.

Elders' Voices - The Office of Indigenous Academic and Community Engagement (IACE) has the privilege of<br/>assembling a group of Elders from local communities to guide students, staff, faculty and administration<br/>in<br/>IndigenousIndigenous<br/>waysof<br/>knowing<br/>knowingknowing<br/>knowingbeing.uvic.ca/services/indigenous/students/programming/elders/index.phpindbeing.being.