

## GEOG 3225 – Transportation Geography & GIS

### Course Outline: Section 001 Winter 2022

#### 1. Course Information



	Delivery Mode	Day/Time	Location
Lecture	Online – <b>Asynchronous</b>	Each week	N/A
Lab	Online - <b>Synchronous</b>	Thursdays (1:30 – 3:30 PM)	Zoom

\*Details about design and delivery of the course are listed below in Section 5

Classes Start	Spring Reading Week	Classes End	Study day(s)	Exam Period
January 10	February 21-25	April 8	April 9	April 10-30

January 18, 2022: Last day to add a second-term half course

March 14, 2022: Last day to drop a second term half course without penalty

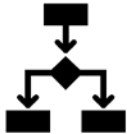


Course Instructor	Contact Information	Office Hours
Dr. Jinhyung Lee	<a href="mailto:jinyung.lee@uwo.ca">jinyung.lee@uwo.ca</a>	By appointment only over Zoom

Teaching Assistant(s)	Contact Information	Office Hours
Mr. Milad Malekzadeh	<a href="mailto:mmalekz4@uwo.ca">mmalekz4@uwo.ca</a>	By appointment only over Zoom

## 2. Calendar Description

Provides a comprehensive introduction to concepts, theories, and models in the field of transportation geography. GIS and spatial analysis methods for solving transport issues and problems will be presented. Topics covered include accessibility, planning, public transit, active transport, smart mobility, impacts on land use, health, energy, environment, and social equity.



2 lecture hours, 2 lab hours, 0.5 course

Antirequisite(s): None.

Prerequisite(s): Third or fourth year-status, GEOG 2220A/B or equivalent, or permission from the instructor.

Prerequisite checking is the student's responsibility

Senate Regulations state, "unless you have either the requisites for this course or written special permission from your Dean to enroll in it, you will be removed from this course and it will be deleted from your record. This decision may not be appealed. You will receive no adjustment to your fees in the event that you are dropped from a course for failing to have the necessary prerequisites."

## 3. Textbook

A **required** textbook (it's freely available via the book website (see below)) of this course is:



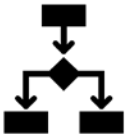
- Jean-Paul Rodrigue, *The Geography of Transport Systems* (2020), Fifth edition, ISBN 0367364638, Routledge.
  - **Book website:** <https://transportgeography.org>

Selected readings such as news articles and journal papers related to the course topics could be posted to the OWL course website. Stay tuned!

## 4. Course Objectives and Format

### Course objectives:

- I. Understand the fundamental concepts, theories, and models of transport geography/planning and GIS for transportation (GIS-T).
- II. Have necessary quantitative and GIS skills for analyzing transport issues and problems within cities.
- III. Solve transport problems using spatial analysis techniques and GIS software (e.g., ArcMap, ArcGIS Pro).



Mode	Dates	What are we going to do?	Frequency
Lecture - Virtual <b>asynchronous</b>	N/A	Students will spend on asynchronous materials on average 45 min – 1 hour	Weekly
Lab - Virtual <b>synchronous</b> (via Zoom)	Thursdays	Live-demonstration, help session, and supported work time	Weekly

All course material will be posted to OWL: <http://owl.uwo.ca>. Any changes will be indicated on the OWL site and discussed with the class.

Google Chrome or Mozilla Firefox are the preferred browsers to optimally use OWL; update your browsers frequently. Students interested in evaluating their internet speed, please click [here](#).

If students need assistance, they can seek support on the OWL Help page. Alternatively, they can contact the Western Technology Services Helpdesk. They can be contacted by phone at 519-661-3800 or ext. 83800.

## 5. Course Content and Schedule

### General

Week	Dates (Monday)	Topic	Lab/Quiz
<b>Part 1: Overview, contexts, and foundational concepts</b>			
1	Jan 10	Course overview and introduction	Lab 1
2	Jan 17	What is transportation geography?	Lab 2
3	Jan 24	Accessibility, mobility	Lab 3
4	Jan 31	Transport, land use, and urban structure <b>Term Project Introduction</b>	Lab 3 help Term Project help
<b>Part 2: Problems</b>			
5	Feb 7	Congestion, safety, and resilience	Lab 4
6	Feb 14	Environmental impacts	Lab 4 help Term Project help
7	Feb 21	<b>Reading Week (No Lecture)</b>	N/A
8	Feb 28	Social impacts	Lab 5
9	Mar 7	<b>Exam 1</b>	Lab 5 help Term Project help
<b>Part 3: Solutions</b>			
10	Mar 14	Travel behaviour and four-step transport model	Lab 6
11	Mar 21	Transport demand management	Lab 6 help Term Project help
12	Mar 28	Sustainable transport: Transit, walking, biking	Lab 7
13	Apr 4	<b>Exam 2</b>	Lab 7 help Term Project help



### Lab

	Topic	Lab session date	Due date
Lab 1	Constructing a network dataset in ArcGIS	Jan 13	In two weeks
Lab 2	Delineating accessible areas	Jan 20	
Lab 3	Accessibility analysis – Part 1	Jan 27	
Lab 4	Accessibility analysis – Part 2	Feb 10	
Lab 5	Public transit planning	Mar 3	
Lab 6	Measuring accessibility by public transit	Mar 17	
Lab 7	Walkability analysis	Mar 31	

## Exam

	Scope	Time	Format
Exam 1	Part 1, 2	In class time, Tuesday, Mar 8 <sup>th</sup> , 2022	Mixed format (multiple choice, short answer, long answer)
Exam 2	Part 3	In class time, Tuesday, Apr 5 <sup>th</sup> , 2022	Mixed format (multiple choice, short answer, long answer)

## Term Project

	Time (Due date)
Term Project Proposal (written)	Mar 10, 2022
Term Project Final Report (written)	April 21, 2022

## 6. Communication



- Students should check the OWL site every 24 – 48 hours
- A weekly update will be provided on the OWL announcements
- For any other communication, the centrally administered **e-mail account** provided to students will be considered the individual's official university e-mail address. It is the responsibility of the account holder to ensure that e-mail received from the University at his/her official university address is attended to in a timely manner. You can read about the privacy and security of the UWO email accounts [here](#).
- Emails will be monitored daily; students will receive a response in 24 – 48 hours, **excluding weekends**

## 7. Evaluation

Below is the evaluation breakdown for the course. Any deviations will be communicated.



Assessment	Weighting
Labs	35%
Exam 1	15%
Term Project Proposal	10%
Term Project Final Report	25%
Exam 2	15%

Students are responsible for material covered in the lectures as well as the assigned chapters/sections in the text.

- All assignments are due at **11:55 pm EST** unless otherwise specified
- Assignments will be accepted up to **48 hrs** after their scheduled due date, excluding weekends (e.g., if your lab is due on a Tuesday, you have until Thursday to hand it in).
- After an assessment is returned, students should wait 24 hours to digest feedback before contacting their evaluator; to ensure a timely response, reach out within 7 days

Click [here](#) for a detailed and comprehensive set of policies and regulations concerning examinations and grading. The table below outlines the University-wide grade descriptors.

A+	90-100	One could scarcely expect better from a student at this level
A	80-89	Superior work which is clearly above average
B	70-79	Good work, meeting all requirements, and eminently satisfactory
C	60-69	Competent work, meeting requirements
D	50-59	Fair work, minimally acceptable
F	below 50	Fail



#### Information about late or missed evaluations:

- Assignments (Labs, Term Project Proposal, Term Project Final Report) will **NOT be accepted for grading more than 48 hours** (excluding weekends) after the scheduled due date & time (e.g., if your lab is due on a Tuesday, you have until Thursday to hand it in).
- Late assessments **without** illness self-reports will be subject to a late penalty **10 %/day**.
- Late assessments **with** illness self-reports should be submitted within 24 hours of submission of the last illness self-report.
- A make-up test for Exams will NOT be offered.** If you self-report an absence on the test date, the **test will be reweighted to the final or vice versa.**

**Grades will not be adjusted on the basis of need. It is important to monitor your performance in the course. Remember: *You* are responsible for your grades in this course.**

## 8. Accommodation Policies

Students with disabilities work with Accessible Education (formerly SSD) which provides recommendations for accommodation based on medical documentation or psychological and cognitive testing. The accommodation policy can be found here: [Academic Accommodation for Students with Disabilities](#).

### Academic Consideration for Student Absence

Students will have up to two (2) opportunities during the regular academic year to use an on-line portal to self-report an absence during the term, provided the following conditions

are met: the absence is no more than 48 hours in duration, and the assessment for which consideration is being sought is worth 30% or less of the student's final grade. Students are expected to contact their instructors within 24 hours of the end of the period of the self-reported absence, unless noted on the syllabus. Students are not able to use the self-reporting option in the following circumstances:

- for exams scheduled by the Office of the Registrar (e.g., December and April exams)
- absence of a duration greater than 48 hours,
- assessments worth more than 30% of the student's final grade,
- if a student has already used the self-reporting portal twice during the academic year

If the conditions for a Self-Reported Absence are *not* met, students will need to provide a Student Medical Certificate if the absence is medical, or provide appropriate documentation if there are compassionate grounds for the absence in question. Students are encouraged to contact their Faculty academic counselling office to obtain more information about the relevant documentation.

Students should also note that individual instructors are not permitted to receive documentation directly from a student, whether in support of an application for consideration on medical grounds, or for other reasons. **All documentation required for absences that are not covered by the Self-Reported Absence Policy must be submitted to the Academic Counselling office of a student's Home Faculty.**

[Western University policy on Consideration for Student Absence](#)

[Student Medical Certificate \(SMC\)](#)

### **Religious Accommodation**

Students should consult the University's list of recognized religious holidays, and should give reasonable notice in writing, prior to the holiday, to the Instructor and an Academic Counsellor if their course requirements will be affected by a religious observance. Additional information is given in the [Western Multicultural Calendar](#).

## **9. How to Be Successful in this Class:**



Students enrolled in this class should understand the level of autonomy and self-discipline required to be successful.

1. Invest in a planner or application to keep track of your courses. Populate all your deadlines at the start of the term and schedule time at the start of each week to get organized and manage your time.
2. Make it a daily habit to log onto OWL to ensure you have seen everything posted to help you succeed in this class.
3. Follow weekly checklists created on OWL or create your own to help you stay on track.



4. Take notes as you go through the lesson material. Keeping handwritten notes or even notes on a regular Word document will help you learn more effectively.
5. Connect with others. Try forming a study group and try meeting on a weekly basis for study and peer support.
6. Do not be afraid to ask questions. If you are struggling with a topic, check the online discussion boards or contact your instructor(s) and or teaching assistant(s).
7. Reward yourself for successes. It seems easier to motivate ourselves knowing that there is something waiting for us at the end of the task.

## 10. Course delivery with respect to the COVID-19 pandemic

Although the intent is for this course to be delivered in-person, the changing COVID-19 landscape may necessitate some or all of the course to be delivered online, either synchronously (i.e., at the times indicated in the timetable) or asynchronously (e.g., posted on OWL for students to view at their convenience). The grading scheme will not change. Any assessments affected will be conducted online as determined by the course instructor.

**When deemed necessary**, tests and examinations in this course will be conducted using a remote proctoring service. By taking this course, you are consenting to the use of this software and acknowledge that you will be required to provide personal information (including some biometric data) and the session will be recorded. Completion of this course will require you to have a reliable internet connection and a device that meets the technical requirements for this service. More information about this remote proctoring service, including technical requirements, is available on Western's Remote Proctoring website at: <https://remoteproctoring.uwo.ca>.

## 11. Information on COVID-19

### Masking Guidelines

Students will be expected to wear triple layer, non-medical, paper masks at all times in the classroom as per University policy and public health directives. Students who are unable to wear a mask must seek formal accommodation through Western Accessible Education, and present medical documentation.

Students are not permitted to eat or drink while in class to ensure masks stay in place. Students will be able to eat and drink outside of the classroom during scheduled breaks.

Students unwilling to wear a mask as stipulated by Western policy and public health directives will be referred to the Dean, and such actions will be considered a violation of the student Code of Conduct.

### Course Absences due to Daily COVID Screening Questionnaire

Missed assessments (e.g., presentations, essays, quizzes, tests, midterms, etc.) require formal academic considerations (typically self-reported absences and/or academic counselling). [Methods for dealing with missed work and course content are at the discretion of the



instructor(s). Students should be aware that some learning outcomes cannot be easily made up and may need to be completed in a subsequent year. Your instructor will provide you with further information as to how this applies within this course.

Students who demonstrate a pattern of routinely missing coursework due to self-reported COVID symptoms, and therefore do not demonstrate mastery of the learning outcomes of the course, will not receive credit for the course.]

## **12. Academic Offences**

Scholastic offences are taken seriously and students are directed to read the appropriate policy, specifically, the definition of what constitutes a Scholastic Offence.

All required papers may be subject to submission for textual similarity review to the commercial plagiarism detection software under license to the University for the detection of plagiarism. All papers submitted for such checking will be included as source documents in the reference database for the purpose of detecting plagiarism of papers subsequently submitted to the system. Use of the service is subject to the licensing agreement, currently between The University of Western Ontario and Turnitin.com ( <http://www.turnitin.com> ).

Computer-marked multiple-choice tests and/or exams may be subject to submission for similarity review by software that will check for unusual coincidences in answer patterns that may indicate cheating.

## **13. Western's Commitment to Accessibility**

The Department of Geography and Environment strives at all times to provide accessibility to all faculty, staff, students and visitors in a way that respects the dignity and independence of people with disabilities.

Please contact the course instructor if you require material in an alternate format or if you require any other arrangements to make this course more accessible to you. You may also wish to contact Services for Students with Disabilities (SSD) at 519-661-2147 for any specific question regarding an accommodation. Information regarding accommodation of exams is available on the Registrar's website.

More information about "Accessibility at Western" is available.

## **14. Mental Health**

If you or someone you know is experiencing distress, there are several resources here at Western to assist you. Please visit Western's Health and Wellness website for more information on mental health resources.

## **15. Support Services**

Western's Support Services  
Student Development Centre

## **16. Important Dates**

January 10: Classes resume

January 18: Last day to add a second term half course

February 21: Family Day – Department Office Closed

February 21-25: Spring Reading Week (No classes; Department Office open)

March 14: Last day to drop a first term half course without penalty

April 8: Classes end

April 9: Study day

April 10-31: Examination Period