Western University
Department of Mechanical & Materials Engineering

MME 3381a - "Kinematics and Dynamics of Machines"

COURSE OUTLINE – 2025-2026

CALENDAR DESCRIPTION:

Displacement, velocity and acceleration analysis of linkage mechanisms; inertia force analysis of mechanisms; balancing of reciprocating and rotating masses

COURSE INFORMATION:

Instructor: R. Tutunea-Fatan, PhD, PEng
Office: ACEB 3462
Email: rtutunea@eng.uwo.ca

Schedule: Please check https://draftmyschedule.uwo.ca/

PREREQUISITES: MME 2213a/b, NMM 2270a/b or the former AM 2270a/b
ANTIREQUISITE: MSE 3381 a/b

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 if you are dropped from a course for failing to have the necessary prerequisites.

CONSULTATION HOURS:

By advance notice via email or drop in anytime.

ACCREDITATION UNITS:

Engineering Science = 75%, Engineering Design = 25%

TOPICS:

- Fundamentals of mechanisms and machines
- Techniques in geometric constraint programming
- Planar linkage design
- Graphical position, velocity, and acceleration analysis
- Design and analysis of cam-based mechanisms
- Design and analysis of gear-based mechanisms
- Static and dynamic force analysis of mechanisms
- Dynamic force analysis
- Balancing of rotating and reciprocating machines

LEARNING OUTCOMES:

The Mechanical and Materials Engineering Program has been accredited by Canadian Engineering Accreditation Board (CEAB) of Engineers Canada. Accredited programs provide the academic requirements for licensure as a professional engineer in Canada. Western Engineering has defined indicators of the 12 Graduate Attributes (GAs) that the CEAB expects graduating engineering students to demonstrate. The connections between course learning outcomes and Western Engineering's GA Indicators are identified below.

Upon successful completion of this course, students will:

- Understand and assess the functionality of a mechanism (KB3)

- Select or design a mechanism for a specific purpose (DE1, DE2)
- Analyze the position, velocity and acceleration of a linkage using graphical, analytical and computer-based methods (KB3, PA1, PA2, ET2)
- Model and analyze a mechanism using motion simulation software (PA1, PA2, ET1, ET2)
- Use hand calculations, computer simulation, and experiments in designing and analyzing machines (IN1, IN2, PA1, PA2, ET1, ET2)
- Verify, compare and interpret differences between the results obtained through different means of analysis (IN3, PA3, ET1, ET2, CS3)
- Evaluate the implications of an incorrect mechanism design (PA3)

CONTACT HOURS: 3 lecture hours, 2 tutorial hours, 0.5 laboratory hours, half course

RECOMMENDED TEXTBOOKS: No textbook is required for this course. Nonetheless, for those interested, the (text)book listed below could provide valuable information to complement the material presented in class. Its reading and/or consultation is, however, entirely optional and not required for the purpose of this course.

Waldron K.J., Kinzel G.L., Agrawal S.K., *Kinematics, Dynamics, and Design of Machinery*, 3rd Edition, Wiley, 2016. Available for purchase in Western Bookstore and other sources (hardcover or ebook format).

EVALUATION: The final course grade will be determined according to the following weighting scheme:

Eight in-tutorial assignments (open book)	10%
One take home assignment	5%
SolidWorks motion analysis tutorials (pre-project)	5%
Project	15%
Laboratory session	5%
Two quizzes (closed book)	20%
Final examination (closed book)	40%

Quizzes, projects and laboratories will be carried out according to the following *tentative* schedule:

Evaluation Format	**Weight**	**Effort Type**	**Assigned**	**Due**
Eight in-tutorial assignments	10% (Average of best seven)	Team[a]	Weekly **except for** the first two Thursdays of the term, Fall Reading Week, and days of the two quizzes.	End of tutorial hour[e]
Pre-project	5%	Team[a]	Week of Sep. 15	Oct. 3[d]
Quiz 1	10%	Individual	Oct. 16[c]	
Project	15%	Team[a]	Week of Oct. 6	Week of Dec. 1[d]

Evaluation Format	Weight	Effort Type	Assigned	Due
Peer-graded Assignment	5%	Team[a]	Week of Oct. 20	Week of Nov. 17 [d]
Quiz 2	10%	Individual	Nov. 13[c] (Designated Assessment)	
Lab	5%	Group[b]	Week of Nov. 17	Week of Nov. 24
			Makeup offered in the last week of the term	
Final exam	40%	Individual	TBA (Dec. examination period)	

[a] Team is student-formed (same team throughout the entire course).
[b] Group is instructor-formed (applies just to the lab session).
[c] These dates are tentative and might shift to avoid conflicts with other term tests. Final dates will be announced after the start of classes.
[d] Deliverable with a flexible deadline; undocumented absences are not accepted for them.
[e] Flexible assignment (average of best seven in-tutorial assignments) but not flexible submission deadline; undocumented absences are not accepted for in-tutorial assignments.

Note that the dates listed above are **tentative** and may be adjusted if needed. Marks will be assigned based on the analysis method, correctness, presentation, clarity and neatness.

COURSE POLICIES

The following course-specific policies will be strictly enforced throughout the course:

Academic Considerations

- Please note that for academic relief to be granted for being absent in a laboratory session, or for writing the final exam in April according to the official schedule issued by the Office of Registrar, students must obtain approved academic considerations.
- Academic considerations are of two main types: accompanied by supporting documentation (”old” or “traditional” type) and unaccompanied by supporting documentation (“new” type, introduced in September 2024).
- Please note that - according to approved policies - academic considerations for undocumented absences are limited *to one per term and per course*.
- For more information on this topic (including on the process of requesting academic relief via academic considerations), please review the general policies appended at the end of this outline and/or posted on relevant faculty/university webpages.

Deliverable Deadlines

- As shown in the tentative course schedule, some course deliverables have a flexible submission deadline (pre-project, project, peer-graded assignment). In this course, the flexible submission deadline is constituted by a 72-hour window immediately (immediately following the original deadline of the

deliverable) in which the deliverable can be submitted without late penalties. This submission deadline flexibility implies that academic considerations – documented or undocumented – will not be accepted for any of these course deliverables.

- Once the 72 hour no-late-penalty window has passed, late penalties of 20% per day will be applied to late submissions.
- Due to the built-in flexibility, academic considerations – documented or undocumented - will also not be accepted for flexible assessments that allow "best X out of Y" submissions with X < Y. This policy applies to in-class assignments for which academic considerations (regardless of their type) will not be accepted.

Individual Contributions to Team/Group Deliverables

- The default assumption is that everyone contributes equally to the group/team effort (lab reports, pre-project, project, peer-graded assignment, in-class tutorial) and hence everyone should receive the same mark for common group/team submissions.
- Please note that whenever individual contributions to the group/team effort are not equitably shared by the group/team members, individual adjustments of the marks might occur at the discretion of the instructional team of the course (course instructor and teaching assistants).

Laboratory sessions

- Students must attend the laboratory session for which they have signed up.
- Passing of the laboratory component is equivalent with obtaining more than 50% on the laboratory component of the course.
- A maximum of **one** make-up session will be offered to students who have missed a laboratory session with academic consideration. This make up session will be scheduled in the last week of the term.
- All approved make-up laboratory sessions will be offered in the final week of the term.
- Missing the laboratory session **without** academic consideration will translate into a zero mark for the laboratory session.
- *Failure to pass the laboratory component of the course will result in automatic course failure*.
- When academic consideration has been obtained for a particular laboratory session, it is student's responsibility to contact *timely* (*i.e.*, within maximum three days after consideration has been obtained) the instructor of the course in order to seek alternate arrangements for the missed laboratory session.
- Students are required to contact the instructor of the course for any other circumstances that appear to not be covered by the non-exhaustive list above.

Quizzes

- The quizzes will take place during the timetabled tutorial sessions.

- Quizzes will be closed book.
- Quiz 2 is the designated assessment and as such will require supporting documentation to receive academic consideration.
- Each quiz will be approximately 1.5 hours long with the reminder of tutorial time used to discuss the quiz solution.
- Missing a quiz **without** academic consideration will translate into a zero mark for that quiz.
- **No make-up quiz** will be offered to those who miss it with academic consideration. The weighting of the quizzes missed with academic consideration will be shifted automatically to the final exam. There will be no exceptions!
- Students are required to contact the instructor of the course for any other circumstances that appear to not be covered by the non-exhaustive list above.

Pre-project/Project

- Project teams will be formed in the first week of classes via OWL sign-up.
- *Failure to pass the pre-project/project component of the course will result in automatic course failure.*
- The maximum team size will be three students, while the minimum team size will be two students.
- The same project team will also work on the eight in-tutorial assignments scheduled throughout the term.
- Once the team formation deadline has passed, team membership cannot be changed.
- SolidWorks will be used for the kinematic analysis of the mechanism generated for project purposes.
- Students are required to contact the instructor of the course for any other circumstances that appear to not be covered by the non-exhaustive list above.

In-Tutorial Assignments

- **In-tutorial assignments will take place during the second hour of the tutorials.**
- The assignments will consist of problems to be solved by the same team formed for pre-project/project purposes.
- The instructor of the course will solve problems during the first tutorial hour. Similar problems will constitute the subject of the in-tutorial assignment assigned in the second hour of the tutorial.
- Teams that do not submit their solved assignment problems by the end of the tutorial will receive a zero mark for that tutorial. In-tutorial assignments do not have a flexible submission deadline, their deadline is set at the end of the second hour of the tutorial.
- Teams will receive problem solving assistance from TAs and instructor who will be in the tutorial room. However, prior knowledge on problems assigned (like the ones solved by the instructor in the preceding week) will be highly beneficial.

- No make-up sessions will be offered for those missing the in-tutorial assignment (irrespective of the reason).
- If the in-tutorial assignment is missed **with** academic consideration, then its weight will be equally distributed over the completed assignments.
- If the in-tutorial assignment is missed **without** academic consideration, then its mark will be zero.
- *Attendance will be recorded during the first hour of the tutorial. Students who miss the first hour but attend the second one will lose 80% of the mark obtained by their team for that week's in-tutorial assignment, while those absent for the entire tutorial will receive zero for that week's in-tutorial assignment.*
- Students are required to contact the instructor of the course for any other circumstances that appear to not be covered by the non-exhaustive list above.

Peer-Graded Assignment

- The assignment will consist of two separate, but interconnected parts: Part 1 will require the team to work together and complete the required deliverable(s) whereas Part 2 will require each team member to review and grade/rank the deliverables submitted by all other teams in the class.
- Part 1 will be graded by the rest of the class ("peer-graded assignment").
- Part 2 will not receive any marks, but those who will not submit timely their ranking of Part 1 submissions will incur individual late penalties of 20% per day for the peer-graded assignment (even if Part 1 was submitted on time by the team).

Term work

- If a minimum of 50% is not obtained on the term work (assignments, quizzes, pre-project, project, and laboratory sessions), the student will fail the course regardless of the mark obtained on the final examination.
- Please note that whenever possible, due warning on this topic will be given. However, since the project (15% weight) is due in the final day of classes, it is possible that accurate calculations will not be possible until final grades are calculated.
- No appeals on this topic will be accepted, such that students are strongly encouraged to self-monitor their academic progress in the course throughout the term.

Final examination

- If a minimum of 50% is not obtained on the final examination, the student cannot receive a final mark greater than 48%.

Submission Deadlines

- In-tutorial assignments are due at the end of the tutorial hour in which they were assigned. No late submissions will be accepted.

- Lab reports will be due at the end of the lab session in which data was provided and was processed. No late submissions will be accepted.
- For deliverables with flexible submission deadlines (pre-project, project, peer-graded assignment) late submissions (made after the 72-hour no-penalty period) will be penalized with 20% per day.
- For deliverables with strict submission deadlines (quizzes, lab report, in-tutorial assignments) late submissions (made after the end of the quiz, laboratory or tutorial session) will be receive zero marks.
- The final examination will have a total duration of three hours.
- Students are required to contact the instructor of the course for any other circumstances that appear to not be covered by the non-exhaustive list above.

UNITS: Metric and US customary.

General Faculty / University Policies

In the event of contradictions between course-specific policies above and general Faculty / University policies described below, please contact your course instructor for clarification.

ATTENDANCE

A student is entitled to be examined in courses in which registration is maintained, subject to the following limitations:

1) A student may be debarred from writing the final examination for failure to maintain satisfactory academic standing throughout the year.
2) Any student who, in the opinion of the instructor, is absent too frequently from class or laboratory periods in any course, will be reported to the Dean (or delegate) of the Faculty offering the course (after due warning has been given). On the recommendation of the department concerned, and with the permission of the Dean (or delegate) of that Faculty, the student will be debarred from taking the regular examination in the course. The Dean (or delegate) of the Faculty offering the course will communicate that decision to the Dean, Undergraduate of the Faculty of Registration.

POLICY ON MISSED DELIVERABLES

To avoid penalties, students missing the deadline of a deliverable designated as "mandatory" will have to report the absence by submitting an Academic Consideration Request through Student Absence Portal. In this case, both the academic consideration request and supporting documentation should be submitted as soon as possible and no later than 48 hours after the deadline of the missed deliverable. Students should seek the guidance of their Academic Advisor if the request for academic consideration was not submitted timely.

For undocumented absences for deliverables that are not designated as mandatory, the Academic Consideration Request must be submitted within 48 hours from the deadline of the missed deliverable.

Requests for academic consideration must include the following components:

a) Self-attestation signed by the student
b) Indication of the course(s) and assessment(s) affected by the request
c) Supporting documentation as relevant.

Requests for academic consideration without supporting documentation ("undocumented absences") cannot be approved more than one per term and per course.

Undocumented absences cannot be used for examinations scheduled by the Office of the Registrar during official examination periods (including take-home final exams and December mid-year exams for full courses) and practical laboratory and performance tests typically scheduled in the last week of the term. Undocumented absences also cannot be used for the "designated assessment" in each course. When flexibility in assessment exists and is clearly stated in the course outline, both undocumented absences and academic consideration requests with documentation may be denied.

Undocumented absences cannot be used for submitted for attempted or completed work, whether online or in-person. This includes (but is not limited to) term tests, performances, presentations, and laboratory/tutorial sessions to which the student has reported. Requests for retroactive relief are addressed in the Undergraduate Student Academic Appeals policy.

Documentation for medical illness, when required, must include the completion of a Western Student Medical Certificate (SMC) or, where that is not possible, equivalent documentation, by a health care practitioner.

Once the request and supporting documents have been received and reviewed, appropriate academic consideration, if granted, shall be determined by the instructor in consultation with the academic advisor, in a manner consistent with the course outline. Of note:

- Unless decided otherwise by the Associate Dean, Undergraduate, the default assumption should be that the instructor cannot ask and is not entitled or required to know the reason for which the student has missed a course deliverable deadline (assignments, term tests, final exam, etc.) or a timetabled course component (lecture, tutorial, laboratory session, etc.). This applies to both documented and undocumented requests for academic consideration. Strict policies in this regard are applicable to academic considerations that are requested for medical reasons or other grounds covered by the Freedom of Information and Protection of Privacy Act.
- The approval of the requests for academic consideration accompanied by supporting documentation falls within the responsibility of the Office of Engineering Undergraduate Services. Depending on the situation, the instructor might or might not be consulted during the approval process. However, the instructor must be consulted when determining the form of academic relief to be granted to the student.
- Unlike the requests accompanied by supporting documentation, the instructor is solely responsible for the approval of the requests for academic consideration that are not accompanied by supporting documentation (“undocumented absences”). These requests must be approved according to the terms of the Senate-approved policy and their limit is “one per course and per term”. As noted above and within the policy, additional provisions (on the flexibility of the deadlines, etc.) may translate into the automated denial of the request for academic consideration.
- Submitting a request for academic consideration (regardless if accompanied or not by supporting documentation) does not warrant its approval.

Academic consideration may include extension of deadlines, waiver of attendance requirements for classes/labs/tutorials, or re-weighting of course requirements. Some forms of academic consideration, such as arranging Special Examinations, assigning a grade of Incomplete (INC), or granting late withdrawals without academic penalty (WDN), may only be granted by the Academic Advising office of the Faculty of Registration.

An instructor may deny academic consideration for any assessment that is not required in the calculation of the final grade (e.g., “8 of 10 quizzes”). This assessment flexibility must be indicated on the course outline.

An instructor may deny academic consideration relating to the timeframe submission of work where there is already flexibility in the submission timeframe (e.g., 72-hour submission window). This assessment flexibility must be indicated on the course outline.

Additional terms on academic considerations are available in Senate Academic Policies: Rights and Responsibilities - Academic Consideration – Undergraduate Students in First Entry Programs as well as on the Office of the Registrar and Engineering Undergraduate Services webpages.

Submitting fraudulent supporting documentation constitutes a scholastic offense that will be penalized with severity.

POLICY ON LATE SUBMISSIONS

To avoid penalties for late submissions, students are required to advise - **prior to the due date of the deliverable** - the instructor that they will be unable to submit the deliverable on time. Nonetheless, the instructor has the right to deny deadline extensions, particularly when the deliverable does not have a flexible deadline or when the extension requested falls outside of the aforementioned "no-penalty" period (72 hours) for deliverables with flexible deadlines.

If requested by the instructor, students should submit an Academic Consideration Request Form and provide documentation supporting their absence.

If an extension is granted, an individual deadline should be set by the instructor and communicated to the affected student. The approval of the Associate Chair, Undergraduate and Associate Dean, Undergraduate ("Undergraduate Program Leaders") are required if the revised deadline was set within the examination period.

The approval of the Undergraduate Program Leaders is not required if the revised deadline was set prior to the last day of classes.

Some courses have built-in flexibility for assignment deadlines or the total number of assignments that will be graded. In these cases, the instructor might choose to deny any late submissions. Please review the course outline for details on course-specific policies and approach the instructor for additional clarifications on this matter.

POLICY ON MISSED FINAL EXAMINATIONS

Students who are unable to write the final exam are required to report their absence by submitting an Academic Consideration Request through Student Absence Portal. The request for academic consideration should be submitted as soon as possible and no later than 48 hours after the missed final examination.

In case of missed final examinations, students should be prepared to provide Engineering Undergraduate Services with supporting documentation within 48 hours of the missed final examination. The following circumstances are not considered grounds for missing a final examination or requesting special examinations: common cold, headache, sleeping in, misreading/misinterpreting final examination timetable and travel arrangements.

In order to receive permission to write a Special Examination, you must obtain the approval of the Associate Dean, Undergraduate that is issued in response to the submitted Academic Consideration Request. **It is student's responsibility to find out the date, time, and location of the Special Examination** for which they were approved.

RELIGIOUS ACCOMMODATIONS

When scheduling unavoidably conflicts with religious holidays, which (a) require an absence from the University or (b) prohibit or require certain activities (i.e., activities that would make it impossible for the student to satisfy the academic requirements scheduled on the day(s) involved), no student will

be penalized for absence because of religious reasons, and alternative means will be sought for satisfying the academic requirements involved. If a suitable arrangement cannot be worked out between the student and instructor involved, they should consult the appropriate Department Chair (or delegate) and, if necessary, the student's Dean (or delegate).

It is the responsibility of such students to inform themselves concerning the work done in classes from which they are absent and to take appropriate action.

Additional terms on religious accommodations are available in the Academic Handbook, Rights and Responsibilities, Accommodation for Religious Holidays.

ACADEMIC INTEGRITY

In the Faculty of Engineering, we encourage students to create a culture of honesty, trust, fairness, respect, responsibility, and courage, befitting the professional degree you are pursuing.

Please visit Academic Integrity Western Engineering for additional information on this topic.

ACADEMIC OFFENSE

Plagiarism means using another's work without giving credit. The university has rules against plagiarism and other scholastic offences. Western Engineering has a zero-tolerance policy on plagiarism. The minimum penalty is zero on the course work and a repeat offence will earn you zero on the course. A third offence may lead to expulsion from the university.

Scholastic Discipline for Undergraduate Students & Cheating, Plagiarism and Unauthorized Collaboration: What Students Need to Know

Students must write their reports, essays and assignments in their own words. Whenever students take an idea or a passage from another author, they must acknowledge their debt both by using quotation marks where appropriate and by proper referencing such as footnotes or citations. University policy states that cheating, including plagiarism, is a scholastic offence. The commission of a scholastic offence is attended by academic penalties, which might include expulsion from the program. If you are caught cheating, there will be no second warning.

All required papers may be subject to submission for textual similarity review to commercial plagiarism detection software under license to the University for the detection of plagiarism. All papers submitted will be included as source documents on 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). Scholastic offences are taken seriously and students are directed to read the appropriate policy, specifically, the definition of what constitutes a Scholastic Offence, in the relevant section of the Academic Handbook:
http://www.uwo.ca/univsec/pdf/academic_policies/appeals/scholastic_discipline_undergrad.pdf

POLICY ON THE USE OF GENERATIVE AI

The use of Generative Artificial Intelligence (GenAI) tools is generally permitted in the Faculty of Engineering unless otherwise stated in the course outline. Students must disclose when GenAI was used while preparing the response to a course deliverable.

Additional terms on the use of GenAI tools for coursework purposes is available on the AI at Western website.

ACCESSIBILITY

Western is committed to achieving barrier free accessibility for persons with disabilities studying, visiting and working at Western. As part of this commitment, there are a variety of services, groups and committees on campus devoted to promoting accessibility and to ensuring that individuals have equitable access to services and facilities. To help provide the best experience to all members of the campus community, please visit the Accessibility Western University for information on accessibility-related resources available at Western.

Students with disabilities may arrange for academic accommodation at Western. For a more detailed explanation, please visit Academic Support & Engagement -Academic Accommodation.

INCLUSIVITY, DIVERSITY AND RESPECT

The Faculty of Engineering at Western University is committed to creating equitable and inclusive learning environments that value diverse perspectives and experiences. We recognize that university courses often marginalize students based on social identity characteristics such as, but not limited to, Indigeneity, race, ethnicity, nationality, ability, gender identity, gender expression, sexuality, age, language, religion, and socioeconomic status. Understanding this, we strive to facilitate equitable experiences and inclusion within the classroom by respecting and integrating multiple ways of knowing, being, and doing. Please visit the Office of Equity, Diversity and Inclusion.

HEALTH AND WELLBEING

- Health & Wellness Services – Students - Offers appointment-based medical clinic for all registered part-time and full-time students.
- Mental Health Support - Provides professional and confidential services, free of charge, to students needing assistance to meet their personal, social and academic goals. Services include consultation, referral, groups and workshops, as well as brief, change-oriented psychotherapy.
- Crisis Support - For immediate assistant, please visit Thames Hall Room 2170 or call 519-661-3030. The crisis clinic operates between 11:00 am - 4:30 pm. For after-hours crisis support, click here.

Gender-Based Violence and Survivor Support - Western is committed to reducing incidents of gender-based and sexual violence and providing compassionate support to anyone who has gone through these traumatic events. If you have experienced gender-based or sexual violence (either recently or in the past), you will find information about support services for survivors, including emergency contacts, here. To connect with a case manager or set up an appointment, please contact support@uwo.ca.

Important Links

Western Academic Calendar
Academic Rights and Responsibilities
Engineering Progression Requirements and Academic Regulations
University Students' Council (USC) - Services
Important Dates and Deadlines

Academic considerations: Academic Calendar, Senate-approved, Office of the Registrar, Western Engineering
Accommodations for Religious Holidays
Scheduling of Assignments, Tests and Examinations
Forms for Engineering Students
Office of the Registrar
Retention of Electronic Version of Course Outlines (Syllabi)
Academic Appeals
Student Absence Portal

Note: These regulations apply to all students registered in the Faculty of Engineering irrespective if the course taken is offered by the home faculty or a different faculty on campus.

Add Deadlines:

First term half course (i.e. "A" or "F")	September 12, 2025
Full courses and full-year half course (i.e. "E", "Y" or no suffix)	September 12, 2025
Second term half course (i.e. "B" or "G")	January 13, 2026

***Drop Deadlines*:**

First term half course without penalty (i.e. "A" or "F")	December 1, 2025
Full courses and full-year half courses without penalty (i.e. "E","Y" or no suffix)	January 30, 2026
Second term half or second term full course without penalty (i.e. "B" or "G")	March 30, 2026

Contact Information:

Engineering Undergraduate Services:	SEB 2097
Phone: 519-661-2130	E-mail: engugrad@uwo.ca
Mechanical Engineering:	SEB 3002
Phone: 519-661-4122	E-mail: mmeundergraduate@uwo.ca
Chemical & Green Process Engineering:	TEB 477
Phone: 519-661-2131	E-mail: cbeugrad@uwo.ca
Civil Engineering:	SEB 3005
Phone: 519-661-2139	E-mail: civil@uwo.ca
Electrical, Mechatronics & Software Eng:	TEB 279
Phone: 519-661-3758	E-mail: eceugrad@uwo.ca
Integrated Engineering	ACEB 2410
Phone: 519-661-6725	E-mail: engceli@uwo.ca
Office of the Registrar/Student Central	WSSB 1120
Phone: 519-661-2100	