S220513A



NOTICE OF MEETING

There will be a meeting of the Senate on Friday, May 13, 2022, at 2:30pm LOCATION: Virtual Meeting

Link: Join Microsoft Teams Meeting

AGENDA

Land Acknowledgement

1	Approva	l of Agenda	(Unstarring agend	da items))
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2 Minutes of the meeting of April 8-11, 2022 E-Vote of April 13, 2022 S220408-11M-Approval S220413E-Information

- 3 Business arising from the minutes
 - 3.1 Revisions on Senate Policy and Bylaws re Student Evaluations of Teaching (SET)

Soutter-Approval S220513-3.1

- 4 Outstanding Business/Action Items
 - *4.1 Master of Materials Chemistry and Engineering Minor Program Changes (Form C)

Greg Chung-Yan-Approval S220513-4.1

*4.2 Chemistry and Biochemistry (Undergraduate/Graduate) – New Course Proposal (Form D)

Greg Chung-Yan-Approval S220513-4.2

*4.3 Bachelor of Engineering Technology (Biomedical Engineering Stream) – Major Program Change (Form B)

Greg Chung-Yan-Approval S220513-4.3

- 5 Reports/New Business
 - 5.1 Program Development Committee
 - *5.1.1 Program/Course Changes
 - (a) Engineering Minor Program Changes (Form C)
 - (b) English and Creative Writing Minor Program Changes (Form C)
 - (c) Kinesiology (Graduate) Minor Program Changes (Form C)
 - (d) Kinesiology Minor Program Changes (Form C)
 - (e) Mathematics and Statistics (Graduate) Minor Program Changes (Form C)
 - (f) BFA in Film Production Minor Program Changes (Form C)
 - (g) Sociology and Criminology Minor Program Changes (Form C)
 - (h) Visual Arts Minor Program Changes (Form C)
 - (i) Engineering New Course Proposals (Form D)
 - (j) Engineering (Graduate) New Course Proposal (Form D)
 - (k) Communication, Media, and Film and School of Creative Arts – New Course Proposal (Form D)
 - (I) Mathematics and Statistics New Course Proposal (Form D)
 - (m) Kinesiology (Graduate) New Course Proposals (Form D)

Greg Chung-Yan-Approval S220513-5.1.1a-m

	*5.1.2	Political Science – Request for Waiver of Course Deletions	Greg Chung-Yan -Information S220513-5.1.2
	*5.1.3	Education (Graduate) – Course Learning Outcomes	Greg Chung-Yan -Information S220513-5.1.3
	*5.1.4	Nursing (Graduate) – Course Learning Outcomes	Greg Chung-Yan -Information S220513-5.1.4
	*5.1.5	Master of Human Kinetics in Sport Management – Program Learning Outcomes	Greg Chung-Yan -Information S220513-5.1.5
	*5.1.6	Economics (Graduate) – Course Learning Outcomes	Greg Chung-Yan -Information S220513-5.1.6
	*5.1.7	Economics – Articulation Agreement (Anshan Institute) – Deletion	Greg Chung-Yan -Information S220513-5.1.7
5.2	Acade 5.2.1	mic Policy Committee Office of Open Learning Annual Report (2020-2021)	Antonio Rossini-Information S220513-5.2.1
5.3	Senate 5.3.1	e Governance Committee Revisions to Bylaws 54 and 55 – Voluntary Withdrawal Deadline	Rick Caron-Approval S220513-5.3.1
5.4	Senate	e Student Caucus	Dave Andrews-Information
5.5	Repor	t from the Student Presidents	UWSA/GSS/OPUS-Information
5.6	Repor	t of the Academic Colleague	Philip Dutton-Information
5.7	Repor	t of the President	Robert Gordon-Information
5.8	Repor	t of the Provost	Patti Weir -Information S220513-5.8
	5.8.1	Optional Inclusion of Student Evaluations of Teaching in RTP and Performance Review Processes	Patti Weir-Approval S220513-5.8.1
	5.8.2	Enrolment Management Update	Chris Busch-Information S220513-5.8.2
5.9	Repor	t of Vice-President, Equity, Diversity, and Inclusion	Clinton Beckford-Information S220513-5.9
5.10	Repor	t of Vice-President, Research and Innovation	K W Michael Siu-Information S220513-5.10

6 Question Period/Other Business

7 Adjournment

Please carefully review the 'starred' (*) agenda items. As per the June 3, 2004 Senate meeting, 'starred' items will not be discussed during a scheduled meeting unless a member specifically requests that a 'starred' agenda item be 'unstarred', and therefore open for discussion/debate. This can be done any time before (by forwarding the request to the secretary) or during the meeting. By the end of the meeting, agenda items which remain 'starred' (*) will be deemed approved or received.

3.1: Revisions on Senate Policy and Bylaws re Student Evaluations of Teaching (SET)

Item for: Approval

Forwarded by: Jennifer Soutter, Senator

Motions are all related.

1. Motions re: Senate Policy on Student Evaluations of Teaching

Moved that: Senate Policy on Student Evaluations of Teaching (SET) and Mandatory Administration of SET, page 4 penultimate paragraph, the following language be removed:

". . . . skew instructor and or AAU averages and, most importantly,"

The new paragraph would read:

The process of evaluating teaching, and the feedback this evaluation provided to both instructors and students, is critical to the University's efforts to enhance the teaching/learning culture on campus. Failure to administer the SET forms would deny students a medium to express their views regarding the course.

Moved that: Senate Policy on Student Evaluations of Teaching (SET) and Mandatory Administration of SET, on page 5, first paragraph, the following language be removed:

"Where questions from the SETS form are used, the mean (average) scores need to be calculated for the respective questions."

Moved that: On Senate Policy on Student Evaluations of Teaching (SET) and Mandatory Administration of SET, page 7, the following language be removed:

"It should be understood that student questionnaires form an important part of evaluating teaching effectiveness or a course's value, but cannot be taken alone as a complete assessment of an instructor or course. Concerns have been expressed that the current University of Windsor evaluation questionnaire may not be an accurate measure of a teacher's ability or of a course's value and that factors other than an instructor's teaching ability or a courses's value may influence ratings."

and be replaced with the following language:

SETS are prohibited to be used in any way as a criterion for faculty renewal, tenure, and promotion, except at the written request of the faculty member with that request included in their submitted portfolio. Teaching dossiers, solicited and unsolicited letters, teaching materials, peer observations, or other evidence as provided by the candidate will be used to demonstrate an instructor's teaching effectiveness.

2. Motions re: Revision to Bylaw 23, article 3.1.1

Moved that: the following language "student evaluations" be removed from the paragraph and that the following statement be added at the end of the paragraph:

SETS are prohibited to be used in any way as a criterion for faculty renewal, tenure, and promotion except at the written request of the faculty member with that request included in their submitted portfolio." The new paragraph will then read (language to be deleted in strikethrough; language to be added in **bold**):

3.1.1 A candidate for renewal of contract must have competent ability as demonstrated by such instruments as student evaluations, sample course outlines, a UCAPT teaching dossier, and other evidence as provided by the candidate. The required statement by the AAU head must contain a detailed assessment of the candidate's commitment to and ability in teaching. SETS are prohibited to be used in any way as a criterion for faculty renewal, tenure, and promotion except at the written request of the faculty member with that request included in their submitted portfolio.

3. Motions re: RTP documents

Moved that: All Renewal, Tenure, and promotion documents at the AAU level, the decanal level and at UCAPT remove any and all language related to SETS.

UCAPT Rating and Evaluation Form

Delete wording "SET Reports and"

Delete 1.A) in its entirety including "Overall Evaluation of Teaching Ability and Performance."

Rationale

The overwhelming body of evidence shows SETs do not successfully evaluate teaching, are racist and biased¹ and in the case of the University of Windsor SETS, generate faulty data for critical assessment and specific feedback. The SET questions are widely open to diverse interpretations; data calculations do not acknowledge student diversity, motivations,² background, or a rationale behind each student's responses, suppressing the varied factors, including some of the most unethical, that motivate and shape students' numerical choices and decisions. Ryerson decision³ "confirms what the body of research has concluded for years: student evaluations are not a barometer with which to judge a professor's teaching effectiveness and therefore should not be used for employment-related decisions such as promotion and tenure." Further they "are imperfect at best and downright biased and unreliable at worst."

- Stark, P. B. (2016). Expert Report on Student Evaluations of Teaching (Faculty Course Surveys). Prepared for The Ryerson Faculty Association and The Ontario Confederation of University Faculty Associations.
- Freishtat, R. L. (2016). Expert report on student evaluations of teaching (SET).
- OCUFA. (2019). Report of the OCUFA Student Questionnaires on Courses and Teaching Working Group.
- Uttl, B., White, C. A., & Gonzalez, D. W. (2017). Meta-analysis of faculty's teaching effectiveness: Student evaluation of teaching ratings and student learning are not related. *Studies in Educational Evaluation*, *54*, 22-42.
- SETS establish a numerical response to particular questions that generate a numerical standard. When these
 standards are imposed on faculty to satisfy criteria for renewal, tenure, and promotion the act becomes a
 breach of academic freedom because these student standards impose and limit the instructor's academic and
 professional decisions to shape and direct the classroom as they see fit.⁵

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¹ Troy Heffernan, "Sexism, Racism, Prejudice, and Bias: a literature review and synthesis of research surrounding student evaluations of courses and teaching," Assessment & Evaluation in Higher Education 47/1 (2022): 144-154.

² Student diversity and motivation, for example, may include academic entitlement, see Dennis L. Jackson et al, "Are There Types of Academically Entitled Students? A Cluster Analysis," *Canadian Journal of Education* 43/4 (2020): 1008-1034.

 $^{^{\}rm 3}$ Ryerson University v Ryerson Faculty Association, 2018 CanLII 58446 (ON LA).

⁴ CAUT. (2018). The end of student questionnaires? https://www.caut.ca/bulletin/2018/11/end-student-questionnaires; and Boring et al. Science Open Research 2016, Student evaluations of teaching (mostly) do not measure teaching effectiveness, (DOI: 10.14293/S2199- 1006.1.SOR-EDU.AETBZC.v1)

⁵ Jason Rodriguez, "The Weaponization of Student Evaluations of Teaching: Bullying and the Undermining of Academic Freedom," *American Association of University Professors* 10 (2019), 1-16.

*4.1:	Master of Materials Chemistr	/ and Engineering – Minor P	rogram Changes (Form C	<u>`)</u>

Item for: Approval

MOTION: That the admission requirements for Master of Materials Chemistry and Engineering program be changed in accordance with the program/course change forms.^

^Subject to approval of the expenditures required.

- Following the April 2022 Senate meeting, revisions were made to the Indigenous question on the form.
- This change has been approved by the Department of Chemistry and Biochemistry, the Faculty of Engineering Coordinating Council, the Science Program Development Committee (SPDC) (as delegated by the Faculty of Science Coordinating Council), and the Faculty of Graduate Studies Council.
- See attached.

TITLE OF PROGRAM(S)/CERTIFICATE(S): Master of Materials Chemistry and Engineering		
DEPARTMENT(S)/SCHOOL(S):	Chemistry and Biochemistry and Mechanical, Automotive, Materials	
	Engineering.	
FACULTY(IES):	Faculty of Science and Faculty of Engineering	

Proposed change(s) effective as of* [Fall, Winter, Spring]:	Spring 2022
*(subject to timely and clear submission)	

A.1 PROGRAM REQUIREMENT CHANGES

Please provide the current program requirements and the proposed new program requirements by cutting and pasting from the current undergraduate or graduate web calendar (www.uwindsor.ca/secretariat/calendars) and clearly marking deletions with strikethrough (strikethrough) and additions/new information with bolding and underlining.

Example: Degree requirements: WXYZ-1000, WXYZ-1010, WXYZ-1100, WXYZ-2100, WXYZ-3100, WXYZ-4100, plus three additional courses at the **3000-level or** 4000-level.

Master of Materials Chemistry and Engineering

Students entering the MMCE program:

- (a) must have a four (4) year B.Sc (Honours) in Chemistry or B.ASc (Honours) degree in Materials Engineering, or accepted equivalent from an academic institution approved by the University of Windsor. They must have the equivalent of a B (73%) average or higher in their undergraduate studies when converted to Ontario standards.
- (b) demonstrated English proficiency by meeting or exceeding an IELTS score of 6.5 (or equivalent, i.e, 83 TOEFL Internet Based Test). If an application receives an English language proficiency score of less than 6.5 (or equivalent) they may be offered a conditional letter of acceptance pending successful completion of an approved English Language Training program.
- (c) Applicants must pass a successful interview with a representative or agent acting on behalf of the University of Windsor and submit two letters of reference.
- (c) Applicants must submit current Resume, Statement of Purpose, and two letters of reference.

A.2 MINOR COURSE CHANGES REQUIRING ADDITIONAL RESOURCES OR AFFECTING DEGREE REQUIREMENTS

If this is a minor course and calendar change (usually noted on a Form E) requiring additional resources or affecting degree requirements, please provide the current course information and the proposed new course information by cutting and pasting from the current undergraduate or graduate web calendar and clearly marking deletions with strikethrough (strikethrough) and additions/new information with bolding and underlining. Examples of minor course changes include: deleting courses, course description changes, pre/anti/co- requisite changes, contact hour/lab requirement changes, course title changes, renumbering courses, and/or cross-listing courses. Minor course calendar changes, which do not require additional resources or do not affect degree requirements, should be submitted on a Form E.

N/A

B. RATIONALE

Please provide a rationale for the proposed change(s).

The proposed change is in line with other grad program's admission process. So it is requested to replace "c" with "Applicants must submit a current Resume, Statement of Purpose, and two letters of reference."

B.1 Indigenous (First Nations, Métis, or Inuit) Content, Perspectives, or Material

The University of Windsor is committed to building and sustaining stronger, more meaningful inclusive partnerships with Indigenous students, scholars, and communities. Indigenization of curriculum takes place in a larger context, including a requirement to respond to the four Calls to Action in education of the <u>Truth and Reconciliation Report</u> (2015) (page 1), the unique legal requirements of the <u>Constitution Act 1982</u> (Sections 25, 35), the provincial legal requirements of the <u>Ontario Human Rights Code</u>, 1990, and provincial legislation <u>Bill Pr36</u> (1967).

In <u>revising this program</u>, **how** has consideration been given to incorporating Indigenous (First Nations, Métis, or Inuit) content, perspectives, or material into the curriculum?

Please consider these prompt questions and additional Resources including disciplinary examples:

- What process has your department/Faculty used to consider Indigenization?
- **How** have you considered the importance or relevance to the course/program?
- How has your department or faculty approached raising awareness for Indigenous knowledges in your area?
- What do the <u>TRC</u> and <u>University Principles</u> documents suggest relevant to your course?
- What have other similar courses/programs done that might be relevant to your course/program?
- In what ways could your course/program have flexibility to include new ways of learning, or content for Indigenous approaches or knowledges?
- What is your awareness of the history or background to approaches you are considering, such as the land acknowledgement? How have you developed your awareness?
- Which <u>literatures</u>, sources, or Indigenous Knowledge Holders have you consulted? (Please confirm you have permission to share any names, it may be helpful to have the person confirm the text if you will be submitting their name)
- Are you engaging in critical analysis of Settler Colonialism and/or Decolonization?
- Have you included the information in the other relevant areas in the PDC form such as learning outcomes and/or in the syllabus where appropriate?

The change removes an uncontrolled and unrecorded "interview" that adds potential bias in consideration of the application carried out by an "agent" of the university. The submission of a CV and Statement of Intent allows a prospective student to make their case for admission to an admission committee composed of employees of the University of Windsor and is also a part of a written record of application that is possible to be reviewed. In the event of an appeal on denial of registration, the Head of Department, Dean, or Provost would be able to review the application and ensure that equity and inclusion was considered in the decision. This is a significantly higher protection for any applicant over the undefined and uncontrolled "interview" by an "agent".

The Faculty of Science is looking to welcome an expert in indigenous-centred relationships who is a recognized Knowledge Keeper in their community into a role within the Integrative Biology Department to pursue community-based interests in research, teaching, and capacity development. With the help and support of this individual we hope to build and develop new and innovative initiatives to further indigenous-focussed research co-production and lifelong learning within the Department and across the Faculty of Science. In person, this role will support the creation of an indigenized space for Indigenous students, community members and allies to engage, learn and create. It is expected that courses will be offered relating to Indigenous Natural Science and ecology, natural resource management, conservation, and governance. The Indigenous Knowledge Keeper will provide counsel to the Office of the Dean to create further space for Indigenous knowledge and partnerships in the Faculty of Science and across the University of Windsor.

Further, individual faculty members delivering courses will review course materials to identify aspects of the course which have direct application or relevance to indigenous communities. Where appropriate material directly relevant

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to these communities will be highlighted and presented in conjunction with material of a more generic nature. Faculty members recognise that courses develop in a holistic way and opportunities to develop indigenous content will be implemented where they are identified. This modular approach affirms the spirit of Call to Action 62(i) of the Final Report Summary of the Truth and Reconciliation Commission of Canada by extending it to this program in the post-graduate educational environment.

C. RESOURCES

C.1 Available Faculty Expertise and Staff Resources (QAF sections 2.1.7, 2.1.8, 2.1.9 and 2.1.10)

Describe, in general terms, all faculty expertise and staff resources (e.g., administrative, teaching, supervision) from all affected areas/departments currently available and actively committed to support the program change(s). Please <u>do not</u> name specific individuals.

N/A

C.1.1 Extent of Reliance on Adjunct, Limited-term, and Sessional Faculty in Delivering the Revised Program

Describe the area's expected reliance on, and the role of adjunct, limited-term, and sessional faculty in delivering the revised program.

N/A.

C.1.2 Graduate Faculty Qualifications and Supervisory Loads (FOR GRADUATE PROGRAMS ONLY)

Explain how supervisory loads will be distributed, and describe the qualifications and appointment status of faculty who will provide instruction and supervision in the revised program.

N/A.

C.1.3 Financial Assistance for Graduate Students (where appropriate) (FOR GRADUATE PROGRAMS ONLY)

Where appropriate to the revised program, provide evidence that financial assistance for graduate students will be sufficient to ensure adequate quality and numbers of students.

N/A.

C.2 Other Available Resources (Ministry sections 3 and 4)

Provide evidence that there are adequate resources available and committed to the revised program to sustain the quality of scholarship produced by undergraduate students as well as graduate students' scholarship and research activities, including for example: staff support, library, teaching and learning support, student support services, space, equipment, facilities, GA/TA

N/A.

C.3 Resource Implications for Other Campus Units (Ministry sections 3 and 4)

Describe the reliance of the proposed program revisions on existing resources from <u>other</u> campus units, including for example:

- existing courses,
- equipment or facilities outside the proposer's control,
- external resources requiring maintenance or upgrading using external resources

Provide relevant details.

N/A.

C.4 Anticipated New Resources (QAF sections 2.1.7, 2.1.8 and 2.1.9; Ministry section 4)

List all **anticipated new resources** originating from within the area, department or faculty (external grants, donations, government grants, etc.) and committed to supporting the revisions to this program.

C.5 Planned Reallocation of Resources and Cost-Savings (QAF section 2.1.7 and 2.1.9; Ministry section 4)

Describe all opportunities for <u>internal reallocation of resources and cost savings</u> identified and pursued by the area/department in support of the revisions to this program. (e.g., streamlining existing programs and courses, deleting courses, etc.).

N/A.

C.6 Additional Resources Required – Resources Requested (QAF section 2.1.7 and 2.1.9)

Describe all **additional faculty, staff and GA/TA resources** (in all affected areas and departments) required to run the revised program.

If not applicable, write n/a.

Faculty:	N/A
Staff:	N/A
GA/TAs:	N/A

N/A

C.6.1 Additional Institutional Resources and Services Required by all Affected Areas or Departments

Describe all **additional institutional resources and services** required by <u>all affected</u> areas or departments to run the revised program, including library, teaching and learning support services, student support services, space and facilities, and equipment and its maintenance.

If not applicable, write n/a.

Library Resources and Services:	N/A
Teaching and Learning Support:	N/A
Student Support Services:	N/A
Space and Facilities:	N/A
Equipment (and Maintenance):	N/A

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*4.2: Chemistry and Biochemistry (Undergraduate/Graduate) – New Course Proposal (Form D)

Item for: Approval

Forwarded by: Program Development Committee

MOTION: That the following course be approved:^

BIOC-8580/BIOC-4580. The Human Subject: Animal-Free Methods in Biomedical Research and

Toxicology

^Subject to approval of the expenditures required.

- Following the April 2022 Senate meeting, revisions were made to the Indigenous question on the form.
- This course has been approved by the Department of Chemistry and Biochemistry, the Science Program Development Committee (SPDC) (as delegated by the Faculty of Science Coordinating Council), the Faculty of Graduate Studies Council, and the Program Develop Committee.
- See attached.

TITLE OF PROGRAM(S)/CERTIFICATE(S):		ce in Chemistry and Biochemistry				
		sophy in Chemistry and Biochemistry cal Biotechnology				
DEPARTMENT(S)/SCHOOL(S):	Chemistry and Biochemistry					
FACULTY(IES):	Science, Graduate Studies					
	Proposed change(s) effective as of* [Fall, Winter, Spring]: Fall 2022					
*(subject to timely and clear submission)		<u> </u>				
A. NEW COURSE PROFILE						
A. NEW COOKSET KOTTEE						
Course # and Title: BIOC-8580 The Human S	ubject: Animal-Fre	ree Methods in Biomedical Research and Toxicology				
• 4 Colondo Book 1915						
A.1 Calendar Description	a tha thind navan					
•	•	n and should provide a general outline of the cours , which might be covered in the course, should also b				
provided.	topics of themes,	which might be covered in the course, should also b				
The future of biomedical research and chem	ical safety testing	g is human-centred. In line with emerging global tren				
·	-	gies in alternatives to animal testing. From genomics				
	•	nedicine and computational toxicology, the course off				
-		ns for disease modeling and toxicology. Content will chemical safety testing from academic, industry, a				
		re program or permission of the instructor). (3 lections of the instructor) is the instructor of the i				
hours per week).	a g	- F G				
A.2 Experiential Learning Categories	2.51 1 11.1					
Does the course include experiential learning for definitions go to: https://www.uwindscondingscondin	~	* * *				
Tor definitions go to. <u>https://www.dwindst</u>	71.cu/cces/1425/ex	xperiential-learning-definitions				
applied research		field work				
capstone		industry/community consulting project				
clinic clinic		interactive simulations				
□ со-ор		internship – full-time				
community service learning		internship – part-time				
creative performance or exhibit (for visual	al and performing	g arts) professional practicum				
entrepreneurship		research project				
Ifield experience or site visit		study abroad				

☐ No experiential learning in this course

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A.3 Other Course Information

Please complete the following tables.

Credit	Total	Delivery format			Breakdown of contact hours/week				
weight	contact hours	In-class e-learning Distance Other flexible learning delivery [please specify]		Lecture	Lab/ Tutorial	Online	Co-op/ practicum/ experienti al learning		
3.0	36	3	0	0	0	3	0	0	0

Pre-requisites	Co-requisites	Anti-requisites	Cross-listed	Required	Replacing old course***
			with:	course?	[provide old course number]
Undergraduate			BIOC-4580		
degree in the life					
sciences					

***Replacing Old Course: this does not mean that the former course will be deleted from the calendar. If it is to be deleted, a Form E must be completed.

Will students be able to obtain credit for the new course and the course(s) that it is replacing? N/A

B. RATIONALE

B.1 Course Goal(s)

Please provide a statement about the purpose of the course within the program of study or as an option.

This graduate level course for students in the life sciences provides a comprehensive overview of an internationally significant field of science, currently not offered by any other university in Canada (Canadian Centre for Alternatives to Animal Methods housed in the Faculty of Science at UWindsor is the first and only Centre of its kind in Canada). With emerging global efforts to reduce and replace animals in biomedical research and regulatory testing (drug and chemical safety), our goal is to instill curiosity, ignite a passion for the discipline, build a solid knowledge base, and develop critical thinking skills to *think outside the cage*. In due time, this course will become a core component of a future proposed one-year masters program in new approach methodologies (alternatives to animal methods).

B.2 Indigenous (First Nations, Métis, or Inuit) Content, Perspectives, or Material

The University of Windsor is committed to building stronger, more meaningful partnerships with Indigenous students, scholars and communities. In developing this course, how has consideration been given to incorporating Indigenous (First Nations, Métis, or Inuit) content, perspectives, or material into the curriculum?

The Faculty of Science is looking to welcome an expert in Indigenous-centred relationships who is a recognized Knowledge Keeper in their community into a role within the Integrative Biology Department to pursue community-based interests in research, teaching, and capacity development. With the help and support of this individual we hope to build and develop new and innovative initiatives to further Indigenous-focused research co-production and lifelong learning within the Department and across the Faculty of Science. In person in this role will support the creation of an indigenized space for Indigenous students, community members and allies to engage, learn and create. It is expected that courses will be offered relating to Indigenous Natural Science and ecology, natural resource management, conservation, and governance. The Indigenous Knowledge Keeper will provide counsel to the Office of the Dean to create further space for Indigenous knowledge and partnerships in the Faculty of Science and across the University of Windsor. Specifically with respect to BIOC-8580/4580 subject matter, this course will address Indigenous content and perspectives in terms of science and ethics. For science and technology modules, it will explore concepts in

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personalized medicine that can capture genetic variations in Indigenous populations through emerging technologies such as adult stem cells to understand population-specific disease mechanisms and to develop safe and effective therapeutics (which cannot be done accurately in animal models). In the ethics module, this course will incorporate Indigenous perspectives on animals as it applies to animals in science. While there are many diverse Indigenous populations across Canada, in many Indigenous cultures, animals are imbued with spiritual significance and treated with great respect—values that can be used to enhance the 3Rs ethical principle in the life sciences (to Reduce, Refine, and Replace the use of experimental animals). It will explore Indigenous Peoples' intricate, sacred kinship with earth and all living things (Enawendiwin)—proudly displayed on the Turtle Island Walk, "To honour all of creation" and "To know your shared place within creation"—and how the Western culture of science can adopt these concepts to make animal welfare regulations better for animals in science.

B.3 LEARNING OUTCOMES (QAF section 2.1.1, 2.1.3, and 2.1.6)

Please complete the following table. State the specific learning outcomes that make up the goal of the course (what will students know and be able to do at the end of this course?) and link the learning outcomes to the Characteristics of a University of Windsor Graduate outlined in "To Greater Heights" by listing them in the appropriate rows.

Please note that a learning outcome may link to more than one of the specified Characteristics of a University of Windsor Graduate, and that a single course might not touch on each of the Characteristics. If a specific learning outcome is not applicable for the course, please enter N/A or not applicable.

Information on learning outcomes is appended to this form (Appendix A). Proposers are also strongly encouraged to contact the Centre for Teaching and Learning for assistance with the articulation of learning outcomes.

Course Learning Outcomes This is a sentence completion exercise. At the end of this course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate A U of Windsor graduate will have the ability to demonstrate:
A. define, describe, and apply major concepts and elements of human biology-based methods from genes to organism—genomic, proteomic, and biological networks; cellular and tissue models of diseases (disease-in-a-dish) and novel toxicity methods such as organon-a-chip; non-invasive imaging technologies; computational modeling and systems biology; and regulatory testing for chemical safety and risk assessment;	A. the acquisition, application and integration of knowledge
B. critically evaluate the species specificity of biological regulation at every level biological complexity—from genes to organism—and apply novel concepts and methodologies to facilitate human-centred experimental design in various contexts from disease modeling, drug testing, and chemical safety assessment;	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
C. evaluate evidence to decipher intrinsic limitations of current approaches and utilize and implement pragmatic human biology-based approaches to advance biomedical research and safety testing;	C. critical thinking and problem-solving skills
D. find and evaluate reliable information, working with data, and data analysis;	D. literacy and numeracy skills

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Course Learning Outcomes This is a sentence completion exercise.	Characteristics of a University of Windsor Graduate
At the end of this course, the successful student will know and be able to:	A U of Windsor graduate will have the ability to demonstrate:
E. explain ethical responsibility in biomedical research and chemical safety testing through Canadian and international laws, regulations, and bioethics governing animal and human research;	E. responsible behaviour to self, others and society
F. utilize science, ethics, and diplomacy to communicate to scientists, policy makers, and the public to embrace human biology-centred methodologies;	F. interpersonal and communications skills
G. apply concepts from the Chemical Test Guidelines Program of the Organization for Economic Cooperation & Development (36-nation consortium) to demonstrate understanding of international multidisciplinary teamwork required to advance and harmonize a field of science as diverse as chemical safety testing with global implications;	G. teamwork, and personal and group leadership skills
H. creatively and pragmatically utilize modern tools, techniques, and skills to address research and product safety testing questions in a world constantly demanding animal-free safety testing;	H. creativity and aesthetic appreciation
I. identify how knowledge regarding human-centred methods in biomedical research may influence future educational, career, and personal choices.	the ability and desire for continuous learning

B.4 Demand for Course

Please provide as much information on projected enrolment as possible.

Projected enrolment levels for the first 5 years of the	Year 1	Year 2	Year 3	Year 4	Year 5
new course.	16	20	20	20	20

This course was offered as a Special Topics course (BIOC 8208) in Winter 2021 with an enrolment of 16 graduate students from the Master of Medical Biotechnology Program. Given there are no other courses at UWindsor that cover similar content, this course will be an enticing elective for graduate students not only in Chemistry/Biochemistry, but in other life sciences departments as well. With novel and interesting course content and appealing layout with expert guest lectures from academic, industry, and government sectors, we predict that enrolment will not be a limiting factor.

B.4.1 Impact of New Course on Enrolment in Existing Courses

What will be the impact of offering the new course on enrolments in existing courses in the program or Department?

This unique course will provide students with an option to build knowledge in a new, globally emerging field of science to satisfy their curiosity and fulfil their program requirements. Therefore, it is anticipated that students who are in Chemistry/Biochemistry and Biomedical Science will be the primary audience for this course. As it is an elective for those students, it will not negatively impact existing courses, but may exert a positive impact on other elective courses offered through these departments. Given this course will provide a broad overview of novel technologies regardless of the specific field of study (e.g., discipline-agnostic, disease-agnostic etc.), these students may perform well in other courses such as pharmacology, biotechnology, and others.

B.5 Student Workload

Provide information on the expected workload per week of a student enrolled in this course. NOTE: Student workload should be consistent with the credit weight assigned to the course.

Aver	Average number of hours per week that the student will be expected to devote to:		
3	Lectures		
0	Tutorials		
0	Labs		
0	Practical experience		
0	Independent Study		
1	Reading for the course		
1	Work for assessment (essays, papers, projects, laboratory work)		
0	Meeting with others for group work/project assignments		
0.5	Studying for tests/examinations		
0	Other: [specify]		
How	does the student workload for this course compare	Comparable to other UWindsor upper year	
with	with other similar courses in the department/program area? courses in the life sciences.		

C. RESOURCES

C.1 Available Faculty Expertise and Staff Resources (QAF sections 2.1.7, 2.1.8, 2.1.9 and 2.1.10)

Describe all faculty expertise and staff resources (e.g., administrative, teaching, supervision) from all affected areas/departments currently available and actively committed to support the new course. Please <u>do not</u> name specific individuals.

There is sufficient administrative, teaching, and supervision currently available at the Canadian Centre for Alternatives to Animal Methods. In addition, some faculty members from Biochemistry, Biomedical Science, Philosophy, and Law can contribute, as they please, by providing guest lectures. There will not be additional teaching or supervision burden on any faculty member, as the course will be co-ordinated by the Canadian Centre for Alternatives to Animal Methods where expertise in this field already exists. This is a course that spans across a large number of disciplines and faculty interest and expertise is available in many areas to support this course—biology, biochemistry, philosophy, mathematics, computer science, law, and ethics. In addition, already committed guest lectures by external experts in the field from academic, industry, and government sectors will lessen the commitment on UWindsor faculty.

C.1.1 Extent of Reliance on Adjunct, Limited-term, and Sessional Faculty in Delivering the Revised Program

Describe the area's expected reliance on, and the role of adjunct, limited-term, and sessional faculty in delivering the new course.

In the beginning, there will be reliance on adjunct and/or sessional faculty to deliver the course. Expertise is already available at the Canadian Centre for Alternatives to Animal Methods—the executive director is an internationally recognized expert in the field. In order to expose students to new frontiers in an emerging field, a number of guest lectures will be offered by national and international experts in the field of animal alternatives and toxicology testing and regulation.

C.2 Resource Implications for Other Campus Units (Ministry sections 3 and 4)

Describe the reliance of the proposed new cxourse on existing resources from <u>other</u> campus units, including for example:

- faculty teaching,
- equipment or facilities outside the proposer's control,
- external resources requiring maintenance or upgrading using external resources

Provide relevant details.

This course does not rely upon existing resources from other campus units except for potential guest lectures by existing faculty members (single 1-hr lecture per faculty member). The course does not have a lab component and so physical lab space is not required.

C.3 Anticipated New Resources (QAF sections 2.1.7, 2.1.8 and 2.1.9; Ministry section 4)

List all **anticipated new resources** originating from within the area, department or faculty (external grants, donations, government grants, etc.) and committed to supporting the new course.

This course will be further developed with funds from the \$1 million donation made to the Canadian Centre for Alternatives to Animal Methods in October 2018. The Centre will continue to attract additional funding as its programs—including this course—expand over the coming years. There is commitment from a large number of national and international scientists in this field—from academia, industry, and government (including Health Canada)—to support this course with intellectual contributions (syllabus development, guest lectures, technological expertise sharing etc.), with the hope that it will eventually be available for the international audience.

C.4 Planned Reallocation of Resources and Cost-Savings (QAF section 2.1.7 and 2.1.9; Ministry section 4)

Describe all opportunities for <u>internal reallocation of resources and cost savings</u> identified and pursued by the area/department in support of the new course. (e.g., streamlining existing programs and courses, deleting courses, etc.).

N/A

C.5 Additional Resources Required – Resources Requested (QAF section 2.1.7 and 2.1.9)

Describe all **additional faculty, staff and GA/TA resources** (in all affected areas and departments) required to offer the new course.

If not applicable, write n/a.

Faculty:	N/A
Staff:	N/A
GA/TAs:	N/A

C.6.1 Additional Institutional Resources and Services Required by all Affected Areas or Departments

Describe all **additional institutional resources and services** required by <u>all affected</u> areas or departments to offer the new course, including library, teaching and learning support services, student support services, space and facilities, and equipment and its maintenance.

If not applicable, write n/a.

Library Resources and Services:	N/A
Teaching and Learning Support:	N/A
Student Support Services:	N/A
Space and Facilities:	N/A
Equipment (and Maintenance):	N/A

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Course Outline (12-week plan)

BIOC-8580 The Human Subject: Animal-Free Methods in Biomedical Research and Toxicology

- 1. Biomedical research: historical successes, pitfalls, and future trends
- 2. Toxicology: current approaches and future trends in drug, chemical, and product safety testing
- 3. Human-centred experimental design and animal-free reagents
- 4. Molecular frontiers: omics technologies, biomolecular networks, and high throughput screening
- 5. Cellular frontiers: Disease-in-a-Dish, Part I (primary, immortalized, and stem cell models)
- 6. Tissue/organ frontiers: Disease-in-a-Dish, Part II (organoids, organ-on-chip, 3D-bioprinting)
- 7. Organism frontiers: Non-invasive imaging, epidemiological studies, and clinical trials
- 8. Adverse outcome pathways and systems biology approaches
- 9. In vitro-to-in vivo extrapolation: in silico disease modelling and toxicity testing
- 10. Animal welfare, human bioethics, and Indigenous perspectives
- 11. Regulatory testing and chemical risk assessment: Canadian and global perspectives
- 12. Human biology, the gold standard: 21st century efforts

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*4.3: Bachelor of Engineering Technology (Biomedical Engineering Stream) – Major Program Change (Form B)

Item for: Approval

Forwarded by: **Program Development Committee**

MOTION: That the Bachelor of Engineering Technology (Biomedical Engineering Stream) be approved.^

^Subject to approval of the expenditures required.

- Following the April 2022 Senate meeting, revisions were made to the Indigenous question on the form.
- The Faculty of Engineering is proposing to expand the Bachelor of Engineering Technology (BEngTech) degree completion program to include a stream in Biomedical Engineering.
- This major program change has been approved by the Faculty of Engineering Coordinating Council, the Provost, and the Program Development Committee.
- See attached.

A. Basic Program Information

Faculty(ies)	Engineering
Department(s)/School(s)	Mechanical, Automotive & Material Engineering
Name of Program as it Will Appear on the Diploma (e.g., Bachelor of Arts Honours Psychology with thesis)	Bachelor of Engineering Technology, Biomedical
	Spring 2022
*(subject to timely and clear submission)	
Mode of Delivery:	On Campus
Planned steady-state Student Enrolment (per section B.4.2)	20 per year
Normal Duration for Completion:	3 semesters
Will the program run on a cost-recovery basis?	No

B. Major Program Changes - Overall Plan

B.1 Objectives of the Program/Summary of Proposal (QAF section 2.1.1; Ministry section 4)

Please provide a rationale for the proposed change, including a brief statement about the direction, relevance and importance of the revised program. Describe the overall aim and intended impact of the revised program. Describe the consistency of the revised program with the institution's mission, goals and objectives as defined in its strategic plan. (to view the strategic plan go to: www.uwindsor.ca/president)

The Faculty of Engineering is proposing to expand the Bachelor of Engineering Technology (BEngTech) program to include a stream in Biomedical Engineering. This interdisciplinary program will draw courses from the Faculty of Human Kinetics and several engineering programs.

The current BEngTech – General Stream program consistently draws one or two biomedical graduates each year from the 3-year Advanced Diploma program in Biomedical Technology from the college. Meetings over the past two years at St. Clair College have identified biomedical as a high-interest area. Significant student interest in the proposed Biomedical Stream of BEngTech was noted. As with the other BEngTech streams, the appeal of a bachelors degree is a strong incentive to complete an additional year. Students were particularly focussed on having a dedicated stream in the biomedical area to further their college experience. Having a specified program was tied to higher enrollment potential.

This interest in biomedical at the BEngTech level is mirrored at the BASc level, where university fair attendees regularly inquire whether Windsor has a biomedical engineering program. To this end, a faculty hire in the biomedical engineering area has been approved.

The proposed biomedical stream within BEngTech focusses on the particular engineering technology areas of biomechanics/ergonomics, bioinformatics, medical imaging, and biomedical sensors. These are in-demand areas, with a broader appeal beyond biomedical into the mechatronics area. Courses in support of the program already exist in the Faculties of Engineering and Human Kinetics. Mechanical engineering, which already hosts the mechatronics stream in BEng Tech, provides special topics courses to accommodate this new area.

Further Background

The Bachelor of Engineering Technology was approved by the Senate in April 2010. It is a *degree-completion program*, which applies to the target groups meeting the following qualifications:

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- Advanced Diploma in Technology from Ontario CAATs (or an equivalent Canadian Institution)
- Engineering graduates from a Canadian university
- University degree in a scientific or technical subject from a Canadian University.

The entrance requirements for the Biomedical Stream remain the same as for the current programs as noted in Section C1.

B.2 Changes to Program Content (QAF Section 2.1.4)

Evidence that the revised curriculum is consistent with the current state of the discipline or area of study.

Bachelor of Engineering Technology Biomedical Stream:

Biomedical engineering (BME) is an interdisciplinary area that combines engineering and medical fields for healthcare purposes. Biomedical engineering technologists are trained to utilize electronics, mechanics, and computer science to find innovative solutions to improve quality of human's life. The overall biomedical field aims to create new materials, devices, and algorithms for the prevention, diagnosis, and treatment of illnesses. Examples of biomedical achievements include the development of biocompatible materials such as artificial hips, therapeutic devices ranging from clinical equipment to micro-implants, and diagnostic algorithms using MRIs and EKG/ECGs. The continued development of such areas to meet future healthcare demands places biomedical-trained technologists and engineers in high demand.

The Faculty of Engineering is developing a 3-semester biomedical stream based on the Bachelor of Engineering Technology program. The proposed curriculum meets the current requirements of the BEngTech – General Program with an allowance for two courses from the Faculty of Human Kinetics. As with the current general program and mechatronics stream of BEngTech degree, the proposed biomedical stream will require 15 courses. Table 1 provides a semester view of the program; key areas of the program are identified in Table 2.

Table 1. Biomedical Stream Curriculum by Semester

Semester 1 - Fall

KINE-1800 Fundamental Mechanics of Human Motion

KINE 2700 Research Design

GENG 3130 Engineering Economics

GENG-3500 Signals and Systems Analysis

GENG 3300 Applied Engineering Mathematics

Semester 2 - Winter

ELEC-2170 Digital Logic Design 1

GENG-4500 Artificial Intelligence and Machine Learning

INDE 3020 Health, Safety, and Human Factors

MECH 3221 Control Theory

MECH 3224 Engineering Measurements

Semester 3 - Summer

ELEC-4490 Sensor and Vision Systems

MECH 4240 Special Topics in Mechanical Engineering: Biomedical Signal Processing

MECH 4240 Special Topics in Mechanical Engineering: Biomedical Instrumentation and Certification

GENG-4800 Capstone Mechatronics

GENG 4600 Robotics

Table 2. Biomedical Stream by Key Areas

Field	Required and Elective* Courses
General Engineering	GENG-3130 Engineering Economics
	GENG-3300, Applied Engineering Mathematics
	GENG-3500, Signals and Systems Analysis
	MECH-3221, Control Theory
	GENG-4600, Introduction to Robotics
Biomedical	INDE 3020 Health, Safety, and Human Factors
	KINE-1800 Fundamental Mechanics of Human Motion
	KINE 2700 Research Design
Instrumentation	ELEC-2170 Digital Logic Design 1
	GENG-4800 Capstone Mechatronics
	MECH-3224, Engineering Measurements
	MECH 4240 Topics in Mechanical Engineering: Biomedical Instrumentation and
	Certification
Vision Systems	ELEC-4490, Sensor and Vision Systems
	GENG-4500, Artificial Intelligence and Machine Learning
	MECH 4240 Special Topics in Mechanical Engineering: Biomedical Signal Processing

B.2.1 Unique or Innovative Curriculum, Program Delivery, or Assessment Practices (QAF Section 2.1.4)

State the unique or innovative curriculum, program delivery, or assessment practices distinguishing the revised program from existing programs elsewhere.

Only two Ontario Universities provide for a seamless integration of college graduates with a 3-Year Advanced Diplomas in Technology: McMaster University and the University of Windsor (Table 3). The BEngTech program, approved by the Senate in April 2010, is a general program, which caters to all advanced diploma holders; it will be maintained in its current form. However, the provincial and national demands for Biomedical Engineering and Technology have provided an opportunity for the University of Windsor to develop a specific Biomedical Stream within the BEngTech program, as has been done already with Mechanical, Civil, and Mechatronics. When launched, the Biomedical Stream would be the first degree-completion program in Ontario to target college graduates in the biomedical area. It further strengthens the Faculty of Engineering's support of college-to-university pathways and builds interdisciplinary cooperation with the Faculty of Human Kinetics.

Table 3. Ontario Degree-Completion Bachelor of Technology / Engineering Technology Programs

University	Degree-Completion Program Streams / Areas
University of Windsor	Biomedical (proposed)
	Civil
	General
	Mechanical
	Mechatronics
McMaster University	Civil Engineering Infrastructure Technology
	Power and Energy Engineering Technology
	Manufacturing Engineering Technology
	Software Engineering Technology

B.2.2 Indigenous (First Nations, Métis, or Inuit) Content, Perspectives, or Material

The University of Windsor is committed to building and sustaining stronger, more meaningful inclusive partnerships with Indigenous students, scholars, and communities. Indigenization of curriculum takes place in a larger context, including a requirement to respond to the four Calls to Action in education of the Truth and Reconciliation Report (2015) (page 1), the unique legal requirements of the Constitution Act 1982 (Sections 25,

35), the provincial legal requirements of the <u>Ontario Human Rights Code</u>, 1990, and provincial legislation <u>Bill Pr36</u> (1967).

In <u>revising this program</u>, **how** has consideration been given to incorporating Indigenous (First Nations, Métis, or Inuit) content, perspectives, or material into the curriculum?

Please consider these prompt questions and additional Resources including disciplinary examples:

- What process has your department/Faculty used to consider Indigenization?
- How have you considered the importance or relevance to the course/program?
- How has your department or faculty approached raising awareness for Indigenous knowledges in your area?
- What do the <u>TRC</u> and <u>University Principles</u> documents suggest relevant to your course?
- What have other similar courses/programs done that might be relevant to your course/program?
- In what ways could your course/program have flexibility to include new ways of learning, or content for Indigenous approaches or knowledges?
- What is your awareness of the history or background to approaches you are considering, such as the land acknowledgement? How have you developed your awareness?
- Which <u>literatures</u>, sources, or Indigenous Knowledge Holders have you consulted? (Please confirm you have permission to share any names, it may be helpful to have the person confirm the text if you will be submitting their name)
- Are you engaging in critical analysis of Settler Colonialism and/or Decolonization?
- Have you included the information in the other relevant areas in the PDC form such as learning outcomes and/or in the syllabus where appropriate?

The Faculty of Engineering has adopted a modular approach to the inclusion of Reconciliation and Indigenous content in its undergraduate curricula by including content in each year of study through a common-core course required for all BASc students. This approach affirms the spirit of Call to Action 62(i) of the Final Report Summary of the Truth and Reconciliation Commission of Canada by extending it to engineering within a post-secondary educational environment.

As part of the Faculty of Engineering's continuous improvement process, the content of the modules was reviewed by the Indigenous Curriculum and Pedagogy Project Coordinator for the Centre for Teaching and Learning. In addition to this review, Indigenous Curriculum and Pedagogy Project Coordinator helped engineering identify items to incorporate into its roadmap toward Indigenization. These items included organizations that provide education and courses appropriate for faculty and administration members, and experiential learning associated with sites such as the Ska-Nah-Doht Longhouse, which would tie in with the design aspect of the program curricula in engineering. An additional item discussed was approaching Professional Engineers Ontario, the profession's governing body in Ontario, to identify opportunities for promoting the development of resources for engineering programs in the province. Additionally, documenting the Faculty's development of and progress along its roadmap will become part of the reporting process for both IQAP and the Canadian Engineering Accreditation Board.

The focus on Indigenous content in the undergraduate engineering programs at Windsor is led by the example of Canada's engineering establishment, which met in 2009 in Montreal and developed a guiding document for the engineering profession. The meeting was hosted by the Canadian Engineering Leadership Forum, which brought Canadian engineers together with experts from a broad range of sectors and disciplines to consider key trends, critical issues, and future projections for engineering in Canada. Among the areas addressed are the recruitment and representation of women, Indigenous Peoples, and other underrepresented groups in the profession.

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With respect to this proposal, the Bachelor of Engineering Technology – Biomedical Stream is a 3-semester degree completion program. It includes the course GENG 3130 Engineering Economics in its first semester. This course is the designated Year 3 common-core engineering course for the inclusion of a module on Indigenous content. The learning outcome assessment associated with this teaching module is one input for the graduate attribute associated with Ethics and Equity for engineering's external accreditation process. Specifically, the assessment considers the identification of equity issues within the engineering profession and Canadian society, with an emphasis on the role of Indigenous Peoples.

B.3 Changes to Program Name and Degree Designation/Nomenclature (QAF Section 2.1.1; Ministry section 1)

Explanation of the appropriateness of the proposed new name and degree designation for the program content and current usage in the discipline

Currently, there are four pathways to complete the Bachelor of Engineering Technology at the University of Windsor. Depending on the pathway selected, the name of the degree appears as:

Bachelor of Engineering Technology (General)
Bachelor of Engineering Technology (Mechanical)
Bachelor of Engineering Technology (Civil)
Bachelor of Engineering Technology (Mechatronics)

The name of the proposed degree for the new stream will appear as: Bachelor of Engineering Technology (Biomedical)

B.4 DEMAND FOR THE MODIFIED PROGRAM

B.4.1 Expected Impact of the Proposed Changes to Student and Market Demand

Describe the tools and methodology used to conduct the market assessment in support of the proposed program revisions. Provide Quantitative evidence of student and market demand for the revisions to the program, both within and outside the local region (e.g., responses/statistics from surveys, etc.).

Medical technology in Canada has made rapid advancement in recent decades, which has led to a large demand for new and innovative medical technologies to improve prevention, diagnosis, and treatment of illnesses. To help meet the demand, cutting-edge technologies should be leveraged to devise efficient and cost-effective methods in healthcare industry. The BEngTech Biomedical program aims to teach students to apply higher-level engineering technology principles within this healthcare context.

Currently, three colleges in Ontario offer students biomedical-focussed three-year diplomas.

- St. Clair College in Windsor enrolls about 100 students.
- Durham College in Toronto enrolls about 150 students.
- Centennial College in Toronto enrolls about 180 students.

The Faculty of Engineering has organized several information sessions with these colleges and would expect a steady-state enrollment of 20-30 students in the program.

B.4.1.1 Percentage of Domestic and International Students (Ministry section 5)

Expected proportion (percentage) of domestic and international students. For graduate programs, identification of undergraduate or master's programs from which students would likely be drawn.

Current and graduated BEngTech students consists almost entirely of domestic students. The majority of these students are from Ontario Colleges. About half of the currently enrolled students are returning to university to complete the program during evenings and weekends as working professionals. The Faculty of Engineering has recently hired a staff member, who will work with Ontario colleges to develop sustainable enrollment streams, identify new areas, and who will cultivate pathways with promising non-Ontario colleges, particularly those whose students have graduated from Windsor's programs. International enrollment will be pursued within the context current

Windsor initiatives and also with an outreach toward internationally trained engineers, who need limited additional training to achieve professional licensure in engineering.

B.4.2 Estimated Enrolments (QAF section 2.1.9; Ministry section 5; Senate Co-op Policy)

Provide details on projected enrolments for the revised program in the following tables. For Co-op programs: normally an annual intake of a minimum of 20 students is required for new co-op programs or programs with other experiential learning component.

Projected enrolment levels for the first five years of operation of the		Second Year of	Third Year of	Fourth Year of	Fifth Year of Operation (Steady-state enrolment
revised program.	Operation	Operation	Operation	Operation	overall)
(If the program is in operation, use					
actual and projected data.)					
Bachelor of Engineering	10	15	20-30	20-30	20-30
Technology (Biomedical)					
In the co-op/experiential learning	N/A				
stream (if applicable)					
For co-op options: projected	N/A				
number of international students					
enrolled in the co-op stream					

Annual projected student intake into the first year of the revised program: (this may differ from the "first year of operation" projected enrolments which could include anticipated enrolments from students transferring into the second, third, or fourth year of the program)	N/A
Annual projected student intake into the first year of the co-op/experiential learning version of the revised program: (this may differ from the "first year of operation" projected enrolments which could include anticipated enrolments from students transferring into the second, third, or fourth year of the program)	N/A

B.4.3 New Involvement in a Collaborative Program/Changes to Collaborative Program (QAF section 1.6)

If this is a new collaborative program with another college/university, or revision to a collaborative program, identify partners and institutional arrangements for reporting eligible enrolments for funding purposes.

N/A.

B.4.4 Evidence of Societal Need for the Revised Program (Ministry section 6)

Describe the tools and methodology used to assess societal need.

Elaborate on the

- 1) dimensions of (e.g., socio-cultural, economic, scientific, or technological),
- 2) geographic scope of (e.g., local, regional, provincial, or national), and
- 3) anticipated duration of, and trends in,

societal need for graduates of the modified program

Provide evidence that the proposed program revisions respond to societal need for graduates of the revised program and/or changes in the field, including sources of data and expert input or feedback collected to support this change in direction.

The Bachelor of Engineering Technology provides a seamless integration of CAAT three-year technology graduates into the university educational system and a pathway to enhance their educational qualifications. The program is

launched to comply with the RAE report (report of the former Premier), i.e., 3 semesters at University after 3 years of College.

According to Randstad.ca (11 May 2019), "In Canada, there are a little over 250,000 currently employed engineers. Experts estimate that by 2020, approximately 95,000 of those engineers will reach retirement. With engineering programs churning out approximately 12,000 new engineers each year, there simply isn't enough talent to replace retiring engineers." While not field-specific, this broad statement can be applied to both engineering and engineering technology.

One aspect of the BEngTech programs is that they can be used to fill educational gaps of internationally trained engineers, which are assessed when those engineers apply to register as Professional Engineers (PEng) in Ontario. The Faculty of Engineering has worked in the past with community organizations that focus on the needs of the technically-trained immigrants, and can expand those efforts. The recent Faculty of Engineering staff hire will address this need.

B.4.5 Duplication (Ministry section 7)

List similar programs offered by other institutions in the Ontario university system. Resources to identify similar programs offered in Ontario include www.electronicinfo.ca, www.electronicinfo.ca/einfo.php, and www.oraweb.aucc.ca/showdcu.html. Also, list similar programs in the geographically contiguous area, e.g., Michigan/Detroit.

The Faculty of Engineering has identified no similar degree-completion program focused on the biomedical field in Ontario.

B.4.5.1 Demonstrate that Societal Need and Student Demand Justify Duplication (Ministry section 7)

If the revised program is similar to others in the system, demonstrate that societal need and student demand justify the duplication. Identify innovative and distinguishing features of the revised program in comparison to similar programs.

N/A.

B.5 RESOURCES

[The resource impact of a proposal is almost never neutral. Note: Proposers must also complete and submit the attached **Budget Summary** (Appendix A) with the revised program proposal.]

B.5.1 Resources Available

Courses in support of the program already exist within the Faculty of Human Kinetics, the BEngTech Mechatronics Stream, as well as the BASc programs in Electrical, Industrial, and Mechanical Engineering. Additionally, the University has granted a faculty hire in the biomedical area.

B.5.1.1 Available Faculty and Staff Resources (QAF sections 2.1.7, 2.1.8, 2.1.9 and 2.1.10)

Describe, in general terms, all faculty and staff resources (e.g., administrative, teaching, supervision) from all affected areas/departments currently available and actively committed to support the program change(s). Please do not name specific individuals in this section.

The Faulty of Human Kinetics has been approached and has indicated that it can accommodate the expected enrollment in KINE-1800 Fundamental Mechanics of Human Motion and KINE 2700 Research Design.

Five courses are shared with the BEngTech Mechatronics program.

Electrical, Industrial, and Mechanical Engineering instructors will accommodate the biomedical engineering students in 6 existing courses. Mechanical Engineering will host two special topics courses prior to the hiring of the Biomedical Engineering faculty member in in the Faculty of Engineering.

B.5.1.1a Faculty Members Involved in the Delivery of the Program

Complete the following table listing faculty members in the AAU offering the program as well as faculty members from other AAUs who are core to the delivery of the revised program. Indicate in the table the involvement of each faculty member in the revised and existing program(s) offered by the AAU.

This program will be housed in the Mechanical, Automotive, and Materials Engineering AAU. Faculty from other AAUs will contribute to the teaching in the program. Some category descriptions are not indicative of this interdisciplinary program and have been altered. The faculty members listed below are the ones who have most recently offered the courses indicated by the program curriculum.

Faculty Name and Rank (alphabetical)	Graduate Faculty member (for graduate programs only)	Program Affiliation: indicate faculty affiliation to the EXISTING program(s)	Program Affiliation: indicate faculty affiliation to the REVISED program
Category 1: Tenured Professors teaching exclusively in the AAU offering the program			
M. Wang		Industrial Eng.	Industrial Eng.
Category 2: Tenure-track Professors teaching exclusively in this AAU			
E. Kim		Industrial Eng.	Industrial Eng.
Category 3: Ancillary Academic Staff such as Learning Specialists Positions in this AAU			
S. Alirezaee		BEngTech - General and Mechatronics	BEng Tech – General and Mechatronics
Category 4: Limited-term Appointments teaching exclusively in this AAU			
Category 5: Tenure or tenure-track or LTA professors in other AAUs offering courses for this program			
R. Mucedere		Electrical Eng.	Electrical Eng.
M. Hassanzadeh		Electrical Eng.	Electrical Eng.
J. Wu		Electrical Eng.	Electrical Eng.
N. Azar		Kinesiology	Kinesiology
D. Pincivero		Kinesiology	Kinesiology
Category 6: Sessionals and other non-tenure track faculty			
Sessional/Faculty member prior to the new faculty hire		Engineering	Engineering
Category 7: Others			
New faculty hire		Engineering and BEngTech – Biomedical	Engineering and BEngTech – Biomedical

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B.5.1.1b Faculty Expertise Available and Committed to Supporting the Revised Program

Assess faculty expertise available and actively committed to supporting the revised program. Provide evidence of a sufficient number and quality of faculty who are qualified to teach and/or supervise in the revised program, and of the appropriateness of this collective faculty expertise to contribute substantially to the revised program. Include evidence (e.g., qualifications, research/innovation/scholarly record) that faculty have the recent research or professional/clinical expertise needed to:

- sustain the program
- promote innovation, and
- foster an appropriate intellectual climate.

The courses for the program Bachelor of Engineering Technology – Biomedical Stream comprise numbered courses offered in the Faculty of Engineering. Engineering faculty members have accommodated BEngTech students alongside the BASc students since the inception of the program. These faculty members have the expertise to support the proposed BEngTech Biomedical Stream as well as the existing accredited BASc programs in engineering.

A number of the courses for the BEngTech – Biomedical Stream are shared with the Mechatronics Stream; these courses are offered only for BEngTech students. Additionally, the two Kinesiology courses in the program are taught by regular instructors in the Faculty of Human Kinetics.

B.5.1.1c Extent of Reliance on Adjunct, Limited-term, and Sessional Faculty in Delivering the Revised Program

Describe the area's expected reliance on, and the role of adjunct, limited-term, and sessional faculty in delivering the revised program.

The steady-state delivery of the revised BEngTech program, has no particular reliance on adjuncts, limited-term, and sessional faculty. As noted, a sessional instructor or regular faculty can be used until the hire in Biomedical Engineering is complete.

B.5.1.1d Graduate Faculty Qualifications and Supervisory Loads (FOR GRADUATE PROGRAMS ONLY)

Explain how supervisory loads will be distributed, and describe the qualifications and appointment status of faculty who will provide instruction and supervision in the revised program.

N/A

B.5.1.1e Financial Assistance for Graduate Students (where appropriate) (FOR GRADUATE PROGRAMS ONLY)

Where appropriate to the revised program, provide evidence that financial assistance for graduate students will be sufficient to ensure adequate quality and numbers of students.

N/A

B.5.1.1f Other Available Resources (Ministry sections 3 and 4)

Provide evidence that there are adequate resources available and committed to the revised program to sustain the quality of scholarship produced by undergraduate students as well as graduate students' scholarship and research activities, including for example: staff support, library, teaching and learning support, student support services, space, equipment, facilities, GA/TA

BEngTech students are integrated into the Faculty of Engineering's 1700 undergraduate students, with access to all of the existing student resources. Laboratories are accommodated alongside the Mechatronics labs. The anticipated enrolment in the revised BEngTech program does not place an undue burden on current resources such as library, space, equipment, and GA/TA loads.

B.5.1.2 Resource Implications for Other Campus Units (Ministry sections 3 and 4)

Describe the reliance of the proposed program revisions on existing resources from <u>other</u> campus units, including for example: existing courses, equipment or facilities outside the proposer's control, external resources requiring maintenance or upgrading using external resources

Provide relevant details.

Two courses in the program are taught by the Faculty of Human Kinetics. Discussions with HK have indicated that it will be able to accommodate the expected enrollment in the BEngTech – Biomedical Stream within their current teaching loads.

B.5.1.3 Anticipated New Resources (QAF sections 2.1.7, 2.1.8 and 2.1.9; Ministry section 4)

List all **anticipated new resources** originating from within the area, department or faculty (external grants, donations, government grants, etc.) and committed to supporting the revised program.

None are anticipated.

B.5.1.4 Planned Reallocation of Resources and Cost-Savings (QAF section 2.1.7 and 2.1.9; Ministry section 4)

Describe all opportunities for <u>internal reallocation of resources and cost savings</u> identified and pursued by the area/department in support of the revised program. (e.g., streamlining existing programs and courses, deleting courses, etc.)

Because this new program stream draws from existing courses, its addition will not result in any significant reallocation of resources or cost savings.

B.5.1.5 Additional Resources Required - Resources Requested (QAF section 2.1.7 and 2.1.9)

Describe all **additional faculty, staff and GA/TA resources** (in all affected areas and departments) required to run the revised program.

Faculty:	One faculty hire in the biomedical area has already been approved
Staff:	N/A
GA/TAs:	N/A

B.5.1.5b Additional Institutional Resources and Services Required by all Affected Areas or Departments

Describe all **additional institutional resources and services** required by <u>all affected</u> areas or departments to run the revised program, including library, teaching and learning support services, student support services, space and facilities, and equipment and its maintenance.

Library Resources and Services:	N/A
Teaching and Learning Support:	N/A
Student Support Services:	N/A
Space and Facilities:	N/A
Equipment (and Maintenance):	N/A

C. Program Details

C.1 Admission Requirements (QAF section 2.1.2)

Describe new or changes to program-specific admission requirements, selection criteria, credit transfer, arrangements for exemptions or special entry, and alternative admission requirements, if any, for admission into the program, such as minimum average, additional language requirements or portfolios, recognition of prior work or learning experience (and how this will be assessed), etc.

The admissions requirements remain the same as for the current BEngTech – General Program.

• For Canadian Colleges (CAAT or equivalent), Graduating Cumulative Average of 70%.

- For international colleges (equivalent to CAAT's advanced diploma), Graduating Cumulative Average of 80% and minimum English language requirement as per University policy.
- For Canadian University degree holders who are seeking technology designation, 70%.
- For international university degree holders who are seeking technology designation, 80% and minimum English language requirement as per University policy.
- For individuals who have completed the equivalent of three years of an engineering degree from a recognized <u>international institution</u>, cumulative average of 80%, or first class honours, or equivalent; and minimum English language requirements as per University policy.

The 15 courses of the program are considered as the "final year" of the BEngTech degree, given that entering students have already completed a 3-year Advanced diploma.

C.1.1 Admission Requirements and Attainment of Learning Outcomes (QAF section 2.1.2)

Demonstrate that admission requirements for the revised program are sufficient to prepare students for successful attainment of the intended learning outcomes (degree level expectations) established for completion of the program.

The admissions requirements do not change from the existing program. As with the Civil, Mechanical, and Mechatronics Streams, it is expected that applicants have exposure to calculus as part of their college program. Students with a four-year degree in a technical subject in Science may be asked to take additional courses beyond the minimum requirements to meet the prerequisite of specific courses. Up to four courses in their original degree can be counted towards the BEngTech program, if deemed appropriate on a case-by-case basis.

C.2 Program Curriculum Structure/Program of Study (QAF sections 2.1.4 and 2.1.10)

Provide evidence of a program structure and faculty research that will ensure the intellectual quality of the student experience.

NB: For graduate programs, provide evidence that each graduate student in the revised program is required to take a minimum of two-thirds of the course requirements from among graduate-level courses. Include course requirements with course numbers and course names.

Identify in BOLD and STRIKETHROUGH the changes to program requirements.

Total courses: 15 courses

Degree requirements:

The students in the Biomedical stream are required to take 15 engineering courses according to the following schedule:

Semester 1 - Fall

KINE-1800 Fundamental Mechanics of Human Motion

KINE 2700 Research Design

GENG 3130 Engineering Economics

GENG-3500 Signals and Systems Analysis

Semester 2 - Winter

ELEC-2170 Digital Logic Design 1

GENG-4500 Artificial Intelligence and Machine Learning

INDE 3020 Health, Safety, and Human Factors

MECH 3221 Control Theory

MECH 3224 Engineering Measurements

Semester 3 – Summer

ELEC-4490 Sensor and Vision Systems

MECH 4240 Special Topics in Mechanical Engineering: Biomedical Signal Processing

MECH 4240 Special Topics in Mechanical Engineering: Biomedical Instrumentation and Certification

GENG-4800 Capstone Mechatronics

GENG 4600 Robotics

Courses used to calculate the major average are: All courses taken by the student during this program are included in the student's GPA.

Description of thesis option (if applicable): N/A

Provide requirements for the Co-op/Experiential Learning Component AND a description of how the program requirements differ for students who complete the experiential learning option and those who opt not to (if applicable). [If the co-op/experiential learning component is new (not part of the existing stand-alone program), a PDC Form B is required]: N/A

Explain how credit will be awarded for the experiential learning component (length of component, credit weighting, etc.): This program has no experiential learning component.

Guidelines for experiential learning/co-op work term reports: N/A
General length of experiential learning/co-op work term: N/A
Is the completion of the experiential learning/co-op component a requirement of the program? N/A

C.3.2 For All Program Proposals

C.3.2.1 New or Changes to Standing Required for Continuation in Program

Minimum average requirements for continuation in the program. Must conform to the regulations for standing required for continuation in the program described in the undergraduate and graduate web calendars [www.uwindsor.ca/calendars]. Specify new or changes to standing required for continuation in the experiential learning option or co-op option of the revised program, where applicable.

Because the program duration is only 3 semesters, students in the BEngTech programs are reviewed after each semester by the Engineering Academic Standing Committee. CGPA benchmarks remain consistent with existing BASC programs.

- A CGPA of 60% is required to remain in good standing.
- A CGPA less than 60% results in Academic Probation.
- A CGPA less than 55% results in a requirement to withdraw.

C.3.2.2 New or Changes to Standing Required for Graduation

Minimum average requirement to graduate in the program.

Must conform to the regulations for standing required for continuation in the program described in the undergraduate and graduate web calendars [www.uwindsor.ca/calendars].

Specify new or changes to standing required for graduation in the experiential learning option or co-op option of the revised program, where applicable.

A minimum CGPA of 60% is required for graduation.

C.3.2.3 New or Changes to Suggested Program Sequencing

Provide suggested program sequencing for each year of the revised program, ensuring that all pre-requisites are met in the sequencing.

Where applicable, provide work/study/placement sequencing for each year of the experiential learning/co-op version of the revised program. Please ensure that all pre-requisites are met in the sequencing.

For Co-op programs: The proposed work/study sequence or alternative arrangement should allow for year-round availability of students for employers (if appropriate) and, wherever possible, should meet the guidelines for co-operative education as set out by the Canadian Association for Co-operative Education (see Policy on Co-op Programs).

Because this is a new Stream of the BEngTech program, there are no issues associated with program sequencing.

C.4 NEW OR CHANGES TO LEARNING OUTCOMES (Degree Level Expectations) (QAF section 2.1.1, 2.1.3, and 2.1.6) COMPLETE THIS TABLE FOR UNDERGRADUATE PROGRAMS

In the following table, provide the specific learning outcomes (degree level expectations) that constitute the overall goals of the Combined program or Concurrent offering (i.e., the intended skills and qualities of graduates of this program). Link each learning outcome to the Characteristics of a University of Windsor Graduate" by listing them in the appropriate rows. A learning outcome may link to more than one of the specified Characteristics of a University of Windsor Graduate. All University of Windsor programs should produce graduates able to demonstrate each of the nine characteristics. Program design must demonstrate how students acquire all these characteristics. All individual courses should contribute to the development of one or more of these traits: a program in its entirety must demonstrate how students meet all of these outcomes through the complete program of coursework. Proposers are strongly encouraged to contact the Centre for Teaching and Learning for assistance with the articulation of learning outcomes (degree level expectations). For Combined Programs and Concurrent Offerings: The program learning outcomes would include the outcomes for the two standalone programs with a few additional outcomes to reflect the benefits of pursuing the two disciplines in an integrated manner. [For learning outcome A, the integration of knowledge can be within a program and between the two programs.]

For programs with an Experiential Learning or Co-op Option: Include learning outcomes for the program with a few additional outcomes highlighted to reflect the benefits of pursuing the experiential learning/co-op option.

Program Learning Outcomes (Degree Level Expectations) This is a sentence completion exercise. Please provide a minimum of 1 learning outcome for each of the boxes associated with a graduate attribute.	Characteristics of a University of Windsor Graduate	COU-approved Undergraduate Degree Level Expectations
At the end of this program, the successful student will know and be able to:	A UWindsor graduate will have the ability to demonstrate:	
Combine and apply engineering and medicine concepts to improve diseases prevention, diagnosis, and treatment.	A. the acquisition, application and integration of knowledge	1.Depth and Breadth of Knowledge 2.Knowledge of Methodologies 3. Application of Knowledge 5.Awareness of Limits of Knowledge
Conduct research in the field of Biomedical engineering technology to recognize new challenges, evaluate previous solutions, and propose innovative solutions to tackle current barriers.	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)	 Depth and Breadth of Knowledge Knowledge of Methodologies Application of Knowledge Awareness of Limits Knowledge

Program Learning Outcomes (Degree Level Expectations) This is a sentence completion exercise. Please provide a minimum of 1 learning outcome for each of the boxes associated with a graduate attribute.	Characteristics of a University of Windsor Graduate	COU-approved Undergraduate Degree Level Expectations
At the end of this program, the successful student will know and be able to:	A UWindsor graduate will have the ability to demonstrate:	
Design solutions for complex, open-ended engineering technology problems. (also relevant to H) Design systems, components, or processes to meet specified needs while considering the constraints of health and safety risk assessment, legislative/regulatory standards, cultural, societal, economic, and environmental considerations. (also relevant to E and H)	C. critical thinking and problem-solving skills	 Depth and Breadth of Knowledge Knowledge of Methodologies Application of Knowledge Awareness of Limits of Knowledge
	D. literacy and numeracy skills	Communication Skills Awareness of Limits of Knowledge
Outline the roles and responsibilities of the professional engineer in society, especially the primary role of protection of the public and the public interest.	E. responsible behaviour to self, others and society	5. Awareness of Limits of Knowledge6. Autonomy and Professional Capacity
Summarize and explain complex engineering activities to both the profession and to society at large. (also relevant to D) Demonstrate the ability to produce or deliver written reports, design documentation, effective presentations, as well as the ability to both give and effectively respond to clear instructions. (also relevant to D)	F. interpersonal and communications skills	4. Communication Skills 6. Autonomy and Professional Capacity
Work independently and/or collaboratively as a leader or member of diverse teams in multidisciplinary settings.	G. teamwork, and personal and group leadership skills	Communication Skills Autonomy and Professional Capacity
Design solutions for complex, open-ended engineering problems. (also relevant to A, B, and C)	H. creativity and aesthetic appreciation	Knowledge of Methodologies Application of Knowledge Autonomy and Professional Capacity
lindependently gather, evaluate, and synthesize information from a variety of sources to address gaps in knowledge. (also relevant to B, C, and E)	the ability and desire for continuous learning	6. Autonomy and Professional Capacity

C.4.1 Revised Program Structure and Regulations Ensure Learning Outcomes Can be Met

Describe how the revised program's structure and regulations ensure that the specified learning outcomes can be met by successful students.

The proposed changes focus on one specific area, but do not alter the learning outcomes of the program.

C.4.2 Impact of Experiential Learning Component on Attainment of Learning Outcomes

For programs with a proposed experiential learning or co-op component: describe how the experiential learning/co-op component changes the emphasis or the means of achieving the intended learning outcomes for the program.

N/A

C.4.3 Mode of Delivery (QAF section 2.1.5)

Demonstrate that the proposed modes of delivery are appropriate to meet the new or revised program learning outcomes. Discuss online vs. face-to-face (e.g., lecture, seminar, tutorial, lab) modes of delivery, as well as specialized approaches intended to facilitate the acquisition of specific skills, knowledge, and attitudes.

The program is designed for in-class instruction and laboratories. Courses have been taught online during covid.

C.5 Student Workload

Provide information on the expected workload per course credit (3.0) of a student enrolled in this revised program. (For assistance with this exercise, proposers are encouraged to contact the Centre for Teaching and Learning.)

Expected Workload per 3.0 Course	Average Time per week the Student is Expected to Devote to	
Credit/Week	Each Component Over the Course of the Program	
Lectures	Three hours	
Tutorials	Two hours	
Practical experience		
Service or experiential learning		
Independent study		
Reading and work for assessment, including	Two hours	
meeting classmates for group work/project		
assignments		
(essays, papers, projects, laboratory work, etc.)		
Studying for tests/examinations	One hour	
Other: [specify]		
Compare the student workload for this program with other similar programs in the AAU:		
This workload is per course is the same as for BASc and Honours Certificate Students.		

D. MONITORING AND EVALUATION (QAF section 2.1.6)

Describe and explain the appropriateness of the proposed methods of assessing student achievement given the new or revised intended learning outcomes and degree level expectations.

A mix of assignments, testing, projects, reports, and group presentations can be used to assess learning outcomes. These methods all remain available with the addition of the Biomedical Stream.

D.1 Plan for Documenting And Demonstrating Student Performance Consistent with Learning Outcomes

Describe the plan for documenting and demonstrating student performance level and demonstrate its consistency with the new or revised stated learning outcomes and degree level expectations.

Learning outcomes are assessed as part of each undergraduate class offered by the Faculty of Engineering per agreement of all three of its AAUs.

E. NEW OR REVISIONS TO EXPERIENTIAL LEARNING/CO-OP COMPONENT ONLY (Senate Co-op Policy)

N/A

*5.1.1a: Engineering – Minor Program Changes (Form C)

Item for: Approval

Forwarded by: Program Development Committee

MOTION: That the degree requirements for Bachelor of Applied Science programs be changed in accordance

with the program/course change forms.^

^Subject to approval of the expenditures required.

- The changes have been approved by the Faculty of Engineering Coordinating Council and the Program Development Committee.
- Supporting documentation for the proposed changes can be accessed by contacting the University Secretariat at ext. 3325, or through the April 19, 2022 Combined Program Development Committee PDF meeting file posted on the PDC website at: http://www.uwindsor.ca/secretariat/377/pdc-agendas-and-minutes. To access this particular item, go to item 5.1.

*5.1.1b: English and Creative Writing – Minor Program Changes (Form C)

Item for: Approval

Forwarded by: Program Development Committee

MOTION: That the degree requirements for Honours English, Honours English and Creative Writing, Combined

Honours English and, Combined Honours and Creative Writing be changed in accordance with the

program/course change forms.^

^Subject to approval of the expenditures required.

- The changes have been approved by English and Creative Writing Council, the Faculty of Arts, Humanities, and Social Sciences Coordinating Council, and the Program Devleopment Committee.
- Supporting documentation for the proposed changes can be accessed by contacting the University Secretariat at ext. 3325, or through the April 19, 2022 Combined Program Development Committee PDF meeting file posted on the PDC website at: http://www.uwindsor.ca/secretariat/377/pdc-agendas-and-minutes. To access this particular item, go to item 5.2.

*5.1.1c: Kinesiology (Graduate) – Minor Program Changes (Form C)

Item for: Approval

Forwarded by: Program Development Committee

MOTION:

That the Master of Human Kinetics (Sport Management Stream) and Master of Human Kinetics (Applied Human Performance Stream) be renamed Master of Human Kinetics (Sport Management and Leadership Specialization) and Master of Human Kinetics (Applied Human Performance Specialization) and that the degree requirements be changed in accordance with the program/course change forms.^

^Subject to approval of the expenditures required.

- The changes have been approved by the Faculty of Human Kinetics Council, the Faculty of Graduate Studies Council, and the Program Devleopment Committee.
- Supporting documentation for the proposed changes can be accessed by contacting the University Secretariat at ext. 3325, or through the April 19, 2022 Combined Program Development Committee PDF meeting file posted on the PDC website at: http://www.uwindsor.ca/secretariat/377/pdc-agendas-and-minutes. To access this particular item, go to item 5.3.

*5.1.1d: Kinesiology – Minor Program Changes (Form C)

Item for: Approval

Forwarded by: Program Development Committee

MOTION: That the degree requirements for the undergraduate programs in Kinesiology be changed in accordance with the program/course change forms.^

^Subject to approval of the expenditures required.

- This changes have been approved by the Faculty of Human Kinetics Council and the Program Development Committee.
- Supporting documentation for the proposed changes can be accessed by contacting the University Secretariat at ext. 3325, or through the April 19, 2022 Combined Program Development Committee PDF meeting file posted on the PDC website at: http://www.uwindsor.ca/secretariat/377/pdc-agendas-and-minutes. To access this particular item, go to item 5.4.

*5.1.1e: Mathematics and Statistics (Graduate) – Minor Program Changes (Form C)

Item for: Approval

Forwarded by: Program Development Committee

MOTION: That the admission requirements for MSc in Mathematics and Statistics (Mathematics Field and

Statistics Field), the Master of Actuarial Science (MActSc), and the PhD in Mathematics and Statistics

be be changed in accordance with the program/course change forms.^

^Subject to approval of the expenditures required.

Rationale/Approvals:

- The proposed changes have been approved by the Department of Mathematics and Statistics Council, the Science Program Development Committee (SPDC) (as delegated by the Faculty of Science Coordinating Council), the Faculty of Graduate Studies Council, and the Program Development Committee.
- Supporting documentation for the proposed changes can be accessed by contacting the University Secretariat at ext. 3325, or through the April 19, 2022 Combined Program Development Committee PDF meeting file posted on the PDC website at: http://www.uwindsor.ca/secretariat/377/pdc-agendas-and-minutes. To access this particular item, go to item 5.5.

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*5.1.1f: BFA in Film Production – Minor Program Changes (Form C)

Item for: Approval

Forwarded by: Program Development Committee

MOTION: That the degree requirements for the BFA in Film Production be changed and applied retroactively

to Fall 2021, in accordance with the program/course change forms.^

^Subject to approval of the expenditures required.

- The changes have been approved by the Department of Communication, Media and Film Council, the School of Creative Arts Council, the Faculty of Arts, Humanities, and Social Sciences Coordinating Council, and the Program Devleopment Committee.
- Supporting documentation for the proposed changes can be accessed by contacting the University Secretariat at ext. 3325, or through the April 19, 2022 Combined Program Development Committee PDF meeting file posted on the PDC website at: http://www.uwindsor.ca/secretariat/377/pdc-agendas-and-minutes. To access this particular item, go to item 5.6.

*5.1.1g: Sociology and Criminology – Minor Program Changes (Form C)

Item for: Approval

Forwarded by: Program Development Committee

MOTION: That the degree requirements for Honours Criminology, Combined Honours Criminology, General

Sociology, Honours Sociology, Combined Honours Sociology, Combined Honours in Sociology and Criminology, Minor in Sociology, and Minor in Anthropology be changed in accordance with the

program/course change forms.^

^Subject to approval of the expenditures required.

- The changes have been approved by the Department Sociology and Criminology Council, the Faculty of Arts, Humanities, and Social Sciences Coordinating Council, and the Progrma Devleopment Committee.
- Supporting documentation for the proposed changes can be accessed by contacting the University Secretariat at ext. 3325, or through the April 19, 2022 Combined Program Development Committee PDF meeting file posted on the PDC website at: http://www.uwindsor.ca/secretariat/377/pdc-agendas-and-minutes. To access this particular item, go to item 5.7.

*5.1.1h: Visual Arts – Minor Program Changes (Form C)

Item for: Approval

Forwarded by: Program Development Committee

MOTION: That the program requirements for the BFA in Visual Arts and the Combined BA in Visual Arts be

changed in accordance with the program/course change forms.^

^Subject to approval of the expenditures required.

Rationale/Approvals:

- The changes have been approved by the School of Creative Arts Council, the Faculty of Arts, Humanities, and Social Sciences Coordinating Council, and the Program Development Committee.
- Supporting documentation for the proposed changes can be accessed by contacting the University Secretariat at ext. 3325, or through the April 19, 2022 Combined Program Development Committee PDF meeting file posted on the PDC website at: http://www.uwindsor.ca/secretariat/377/pdc-agendas-and-minutes. To access this particular item, go to item 5.8.

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*5.1.1i: Engineering – New Course Proposals (Form D)

Item for: Approval

Forwarded by: Program Development Committee

MOTION: That the following courses be approved:^

GENG-1101. Engineering I

GENG-1102. Engineering Graphics **GENG-1201.** Cornerstone Design

^Subject to approval of the expenditures required.

- These courses have been approved by the Faculty of Engineering Coordinating Council and the Program Development Committee.
- Supporting documentation for the proposed changes can be accessed by contacting the University Secretariat at ext. 3325, or through the April 19, 2022 Combined Program Development Committee PDF meeting file posted on the PDC website at: http://www.uwindsor.ca/secretariat/377/pdc-agendas-and-minutes. To access this particular item, go to item 5.9.

*5.1.1j: Engineering (Graduate) – New Course Proposal (Form D)

Item for: Approval

Forwarded by: Program Development Committee

MOTION: That the following course be approved:^

GENG 8060. Strategic Entrepreneurial Management

^Subject to approval of the expenditures required.

- This course has been approved by the Faculty of Engineering Coordinating Council, the Faculty of Graduate Studies Council, and the Program Development Committee.
- Supporting documentation for the proposed changes can be accessed by contacting the University Secretariat at ext. 3325, or through the April 19, 2022 Combined Program Development Committee PDF meeting file posted on the PDC website at: http://www.uwindsor.ca/secretariat/377/pdc-agendas-and-minutes. To access this particular item, go to item 5.10.

*5.1.1k: Communication, Media, and Film and School of Creative Arts – New Course Proposal (Form D)

Item for: Approval

Forwarded by: Program Development Committee

MOTION: That the following course be approved, effective retroactively to Fall 2021:^

FILM-4105. Film Production VI

^Subject to approval of the expenditures required.

- This course has been approved by the Department of Communication, Media and Film Council, the School of Creative Arts (SOCA) Council, the Faculty of Arts, Humanities, and Social Sciences Coordinating Council, and the Program Development Committee.
- Supporting documentation for the proposed changes can be accessed by contacting the University Secretariat at ext. 3325, or through the April 19, 2022 Combined Program Development Committee PDF meeting file posted on the PDC website at: http://www.uwindsor.ca/secretariat/377/pdc-agendas-and-minutes. To access this particular item, go to item 5.11.

*5.1.1|: Mathematics and Statistics – New Course Proposal (Form D)

Item for: Approval

Forwarded by: Program Development Committee

MOTION: That the following course be approved:^

STAT-4700. Biostatistics

^Subject to approval of the expenditures required.

- This course has been approved by the Department of Mathematics and Statistics Council, Science Program Development Committee (SPDC) (as delegated by the Faculty of Science Coordinating Council), and the Program Development Committee.
- Supporting documentation for the proposed changes can be accessed by contacting the University Secretariat at ext. 3325, or through the April 19, 2022 Combined Program Development Committee PDF meeting file posted on the PDC website at: http://www.uwindsor.ca/secretariat/377/pdc-agendas-and-minutes. To access this particular item, go to item 5.12.

*5.1.1m: Kinesiology (Graduate) – New Course Proposals (Form D)

Item for: Approval

Forwarded by: Program Development Committee

MOTION: That the following courses be approved:^

KINE-8300. Skeletal Muscle Pathophysiology

KINE-8310. Healthy Aging

KINE-8630. RStudio for Data Science

^Subject to approval of the expenditures required.

- These courses have been approved by the Faculty of Human Kinetics, the Faculty of Graduate Studies Council, and the Program Development Committee.
- Supporting documentation for the proposed changes can be accessed by contacting the University Secretariat at ext. 3325, or through the April 19, 2022 Combined Program Development Committee PDF meeting file posted on the PDC website at: http://www.uwindsor.ca/secretariat/377/pdc-agendas-and-minutes. To access this particular item, go to item 5.13.

*5.1.2: Political Science – Request for Waiver of Course Deletions

Item for: Approval

Forwarded by: Program Development Committee

MOTION: That the Request for Waiver of Course Deletions for the following courses be approved:

POLS-2510. Classical Political Thought POLS-3210. The Legislative Process POLS-3240. Public Infrastructure

POLS-4640. International Political Economy

Rationale/Approvals:

 The request has been approved by the Department of Political Science Council, the Faculty of Arts, Humanities, and Social Sciences Coordinating Council and the Program Development Committee.

Areas that wish to request a waiver of a course deletion should forward a 'Request for a waiver of the course deletion' to PDC. Following a positive review of the request, the course will be removed from the published Calendar, and placed into a two-year course bank, as per the Senate resolution of March 21, 2002.

Request for Waiver of Course Deletion

1. Faculty, Department, and Program Title

Faculty of Arts Humanities and Social Sciences, Department of Political Science, General/Honours Political Science programs

2. Course Number and Title

POLS-2510 Classical Political Thought

POLS-3210 The Legislative Process

POLS-3240 Public Infrastructure

POLS-4640 International Political Economy

3. Credit hours, Total Contact hours and Delivery format

All of the courses are 3.0 credit hours, total contact 36, delivery form: in person or online.

4. Calendar Description(s)

POLS-2510. Classical Political Thought

An introduction to the history of political thought from the ancient Greeks to the end of the Middle Ages. Topics may include human nature, justice, natural law, and the relationship between Church and State. (Prerequisites: POLS-1000 and one of POLS-1300 or POLS-1600.)

POLS-3210. The Legislative Process

An introduction to representative democracy, parliamentary behaviour, and legislative process. May include roleplaying exercises and a simulation of the Federal House of Commons.

POLS-3240. Public Infrastructure

This course examines the role of the public sector in the ownership and operation of major capital facilities for transportation, water, sanitation, electric power, health care and education. Topics include alternative funding mechanisms, environmental impacts and regulations, public consultation and the influence of political interest groups, and the role of infrastructure in the economy. The course also provides an introduction to analytical methods used to support infrastructure decision-making.

POLS-4640. International Political Economy

An overview of the major theoretical perspectives and issues in international political economy. Issues addressed may include: international trade, foreign investment and multinational corporations, international monetary institutions, and crisis and change in the international system. (Restricted to Semester 7 and 8 Political Science majors and Semester 7 and 8 International Relations majors.)

5. Pre/co/anti-requisites

These are noted in the course descriptions.

6. RATIONALE FOR KEEPING THE COURSE

6.1 The purpose of the course within the program of study.

POLS-2510 Several faculty members have indicated that the material covered in this class should be central to a Political Science degree.

POLS-3210 Several faculty have indicated that they may be willing to teach this course.

POLS-3240 The faculty member who teaches this course has a university position which, during the past five years, has not required him to teach. His current contract (2021-22) means that he will be teaching two classes per year starting in 2022 and for the foreseeable future. POLS-3240 will be taught in the 2022-23 academic year and a minimum of once every two years thereafter.

POLS-4640 The faculty member who teaches this course has indicated that he will integrate this class into his regular rotation of courses.

6.2 Student Demand for Course - a clear statement on the student demand for the course.

POLS-2510 had 71 and 59 students the last two times it was taught.

POLS-3240 had 22 and 31 students the last two times it was taught.

POLS-4640 had 17 and 15 students the last two times it was taught.

6.3 Relationship to Unit's Strategic Plan and the University's Strategic Plan.

The learning outcomes in each of these courses align with the characteristics of a University of Windsor graduate.

POLS-3240 The course deals with issues of immediate concern to the regional and local economy. The subject matter has practical implications that help build the relationship between the university and the wider community. In addition, the class is relevant to the department's emphasis on experiential learning through its Public Service Management Internship Practicum.

6.4 Explanation of why the course has not been offered over the past years.

POLS-2510 The two faculty members who taught this course are no longer in the department.

POLS-3210 The faculty member who regularly taught this course has left the department.

POLS-3240 See point 6.1

POLS-4640 The faculty member who teaches this course has had one or two course releases over the past four years (graduate chair and SSHRC). This, combined with the fact that he teaches two required classes, has limited the number of courses he can teach.

6.5 Whether the course will be offered in Fall 2022. If not, why will it not be offered?

POLS-2510 No faculty member has offered to teach this course in Fall 2022 or Winter 2023. The department head has agreed to an overall review of Political Science classes. This will involve determining whether we will be in a position to offer this class more consistently moving forward.

POLS-3210 May be offered in Fall 2022 if the department secures a one-year extension to an LTA position. Two faculty members have expressed an interest in offering this course in 2023-24 but for various reasons cannot do so in the upcoming academic year.

POLS-3240 Will be offered in Fall 2022

POLS-4640 Will not be offered in 2022-23. The faculty member who will teach the course is on sabbatical. The course will be offered in 2023-24 as part of his course load.

7. RESOURCE IMPLICATIONS

POLS-2510 Will require a sessional stipend or LTA extension in the short term

POLS-3210 None

POLS-3240 None

POLS-4640 None

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*5.1.3: Education (Graduate) – Course Learning Outcomes

Item for: Information

Forwarded by: Program Development Committee

This package includes the following course learning outcomes:

EDUC-8030. The Psychology of Learning and Teaching

EDUC-8320. Administration and Leadership of the School

EDUC-8370. Language Arts in the Elementary School

EDUC-8380. The Arts and Education

EDUC-8400. Language, Culture, and Society Formerly

EDUC-8430. Special Education and Language Acquisition

EDUC-8580. Psychology of Learning Problems

EDUC-8600. Politics of Education

EDUC-8650. Sociological Aspects of Education

EDUC-8660. Interpersonal Relationships in Education

EDUC-8795. Final Project Semin

EDUC-8930. Educational Research Internship

EDUC-8030. The Psychology of Learning and Teaching Also known as: The Psychology of Learning and Teaching

Formerly known as: The Psychology of Learning and Teaching

Learning Outcomes

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Critically analyze how cognitive theory and research is applied to educational practice.	A. the acquisition, application and integration of knowledge
	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
	C. critical thinking and problem-solving skills
Reflexively assess how Western behavioural and cognitive perspectives of learning have impacted Indigenous academic development. (Also applies to F, I.)	D. literacy and numeracy skills
Research and critically disseminate current cognitive strategy training, metacognition, motivation, informational processing and learning differences. (Also applies to E, F, G, I.)	
Critically analyze current psychological theories and cognitive perspectives towards learning, understanding and teaching.	
From a race-conscious perspective, critically analyze how behaviourism, behavior modification, and cognitive behavior modification has impacted learning and teaching. (Also applies to I.)	E. responsible behaviour to self, others and society
Disseminate current research theory into the brain and learning.	
	F. interpersonal and communications skills
	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation

the ability and desire for continuous learning

EDUC-8320. Administration and Leadership of the School Learning Outcomes

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Examine the problems and possibilities inherent to transformational change.	A. the acquisition, application and integration of knowledge
Compare collaborative leadership strategies to foster equity, reconciliation and social justice. (Also applies to E.)	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
Analyze leadership methods that provide an account of school attainment. (Also applies to G.)	
Critically analyse methods of community engagement with the school. (Also applies to G.)	C. critical thinking and problem-solving skills
	D. literacy and numeracy skills
Describe methods and theories of developing school relationships and capacity-building.	E. responsible behaviour to self, others and society
Identify one's own style of leadership, its strengths and limitations. (Also applies to G, I.)	F. interpersonal and communications skills
	G. teamwork, and personal and group leadership skills
Review current school leadership practices that develop innovative programming. (Also applies to I.)	H. creativity and aesthetic appreciation
	I. the ability and desire for continuous learning

EDUC-8370. Language Arts in the Elementary School Also known as: Language Arts in the Elementary School Formerly known as: Language Arts in the Elementary School

Learning Outcomes

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Analyze important educational literacy theories within a socio-political context. (Also applies to D, F.)	A. the acquisition, application and integration of knowledge
Critically disseminate global definitions of literacy and its definitional aspects, role and function within a 21st Century context.	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
Critically examine literacy from a race-conscious and Indigenous perspective. (Also applies to E, G.)	C. critical thinking and problem-solving skills
Evaluate primary and secondary literacy research sources. (Also applies to D, F, I.)	
	D. literacy and numeracy skills
	E. responsible behaviour to self, others and society
	F. interpersonal and communications skills
	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation
	I. the ability and desire for continuous learning

EDUC-8380. The Arts and Education Formerly known as: 80-538

Learning Outcomes

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will
	have the ability to demonstrate:
Critically discuss the nature and importance of aesthetic and cultural theory in education.	A. the acquisition, application and integration of knowledge
Analyze historic art practices and their impact on current learning and pedagogy in the arts. (Also applies to C.)	
Analyze how the arts have contributed to the construction of meaning in society and education (Also applies to C.)	
Critically assess arts-based educational research and modes of research dissemination and representation. (Also applies to B, C, F.)	
Formulate what (and who) becomes possible/knowable through alternate forms of knowledge co-construction in education. (Also applies to C, E.)	
Investigate educational research through the medium of art, and identify critical questions in arts education. (Also applies to B, C.)	
	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
Critically examine how theories of art disrupt and re-dress notions of truth in education.	C. critical thinking and problem-solving skills
	D. literacy and numeracy skills
Reflexively experience art as both audience, creator and race-conscious educator.	E. responsible behaviour to self, others and society
	F. interpersonal and communications skills

	G. teamwork, and personal and group leadership skills
Employ creative and aesthetic tools to co-construct meaning and honour Indigenous voices in education.	H. creativity and aesthetic appreciation
	I. the ability and desire for continuous learning

EDUC-8400. Language, Culture, and Society Formerly known as: 80-540

Learning Outcomes

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Critically analyze current critical social language theory that has influenced the development of educational multiliteracies.	A. the acquisition, application and integration of knowledge
Reflexively disseminate how literacy and language theories have been developing in response to social praxis, classroom pedagogy, school board policies, and government supports for literacy and second language acquisition. (Also applies to F.)	
Investigate and critically analyze the value of applied theoretical resources that would empower educators to teach from race-conscious and Indigenous perspectives.	
Critically analyze multimodal pedagogical tools as educational cultural artifacts for adult and non-traditional learners.	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
Critically investigate and disseminate current New London Group discussions from a paralinguistic and multilinguistic perspective.	C. critical thinking and problem-solving skills
Critically investigate evidence of knowledge transfer between L1 and L2 in the acquisition and development of applied literacy and numeracy skills.	D. literacy and numeracy skills
Analyze and invent creative literacies within a multiliteracies' theoretical framework through the design and implementation of applied multimodal pedagogical tools. (Also applies to C,H,I.)	E. responsible behaviour to self, others and society
	F. interpersonal and communications skills
	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation

the ability and desire for continuous learning

EDUC-8430. Special Education and Language Acquisition Formerly known as: 80-543

Learning Outcomes

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Identify and analyze key linguistic-oriented learning needs that may arise in an educational setting.	A. the acquisition, application and integration of knowledge
Analyze current research and resources that support the facilitation of differentiated instruction, formal and informal, in response to the multicultural and multilingual educational settings of diverse communities.	
Critically reflect on a variety of major theories & philosophical underpinnings that have influenced & given shape to various shifts in research, practice & policy in relation to language acquisition (LA) & special education (SE). (Also applies to B.)	
Interrogate individual and collective beliefs, assumptions, & experiences around matters of language acquisition & special education.	
Develop original scholarly work in language acquisition & special education. (Also applies to D.)	
Analyze the parameters of a range of differentiated instructional strategies (and programs) that set out to support a variety of learning needs, and re-dress social and political inequities.	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)

Apply core theoretical principles of second language acquisition and equity when identifying areas of strength and need in an educational and/or institutional approach to language-oriented instruction.	C. critical thinking and problem-solving skills
Critically assess core research and current principles of second language acquisition and equity to forward change and address inequities in social educational need.	
Constructively assess scholarly work with respect to language acquisition & special education from a race-conscious and Indigenous perspective.	
	D. literacy and numeracy skills
Respond constructively to pedagogic and socio-political issues in the implementation of both formal, informal and non formal language acquisition processes.	E. responsible behaviour to self, others and society
Clearly identify different social factors that influence research, policy & practice in the area of language acquisition & special education.	
Critically appraise scholarship on language acquisition & special education policy, practice, & research with respect to the hidden values, assumptions, & entrenched beliefs of the field.	
	F. interpersonal and communications skills
Utilize global research teams and group leadership skills in the term-limited research into theories of educational learning needs.	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation
	I. the ability and desire for continuous learning

EDUC-8580. Psychology of Learning Problems Also known as: Psychology of Learning Problems Formerly known as: Psychology of Learning Problems

Learning Outcomes

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Recognize how theories and research in development, learning and motivation are related to educational practice. (Also applies to D, F.)	A. the acquisition, application and integration of knowledge
Identify various theories of learning problems and learning disabilities. (Also applies to B, D.)	
Develop a deep and meaningful analysis and knowledge about a particular interest area related to learning problems and learning disabilities. (Also applies to C.)	
Critically assess scholarly texts on learning problems and learning disabilities and use them to aid one's professional development. (Also applies to D, E, I.)	
Describe the nature of learning problems and learning disabilities.	B. research skills, including the ability to define problems and access, retrieve
Reflect on and assess one's professional practices from a race-conscious perspective as a means of professional development, adapting accordingly and where appropriate. (Also applies to A, E, G, I.)	and evaluate information (information literacy)
Recognize how student diversity impacts learning and the learning environment from a race-conscious perspective. (Also applies to E, G.)	C. critical thinking and problem-solving skills
	D. literacy and numeracy skills
	E. responsible behaviour to self, others and society
	F. interpersonal and communications skills

Collaborate with peers in the development, critique, and assessment of learning problems. (Also applies to D, F.)	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation
	I. the ability and desire for continuous learning

EDUC-8600. Politics of Education Also known as: Politics of Education Formerly known as: Politics of Education

Learning Outcomes

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Critically review the conceptual research frameworks used to examine the politics of education, the scope of policy analysis and the precarious and complex nature of the policy process from race-conscious and Indigenous perspectives. (Also applies to D, F.)	A. the acquisition, application and integration of knowledge
Integrate multidimensional perspectives to comprehend, compare and critically assess educational practices that are influenced by dominant political ideologies. (Also applies to B, C, D, E, F, G.)	
Analyze and evaluate key past and present influences on contemporary politics of education, and propose changes to re-dress inequities formed by institutional racism. (Also applies to C, E.)	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
Critically analyze the dominant political contexts and the ensuing policy debates that are currently informing and reforming education in different global jurisdictions. (Also applies to A, E.)	C. critical thinking and problem-solving skills
Critically assess the literature that describes the implications of the different socio-political contexts in which educators operate. (Also applies to D.)	
	D. literacy and numeracy skills
Query the social and institutional contexts of educational politics and policy. (Also applies to A, D.)	E. responsible behaviour to self, others and society
	F. interpersonal and communications skills
	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation

I. the ability and desire for continuous learning

EDUC-8650. Sociological Aspects of Education Also known as: Sociological Aspects of Education Formerly known as: Sociological Aspects of Education

Learning Outcomes

Learning Outeense	Ohamataniation of a University (
Learning Outcomes At the end of the course, the cureosoful student will know and be	Characteristics of a University of Windsor Graduate
At the end of the course, the successful student will know and be able to:	The University of Windsor graduate will have the ability to demonstrate:
Examine the perspectives of academics, educators, and policymakers in moving from theory to policy to practice, and the implications of change. (Also applies to B.)	A. the acquisition, application and integration of knowledge
Critically analyze the definitions of key terminology in the sociology of education from a race-conscious perspective. (Also applies to D.)	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
Review and critique a range of historical, Indigenous and contemporary critical sociological theoretical perspectives. (Also applies to B, D, E.)	C. critical thinking and problem-solving skills
Critically compare and contrast global scholarly perspectives in the field. (Also applies to A, D.)	
	D. literacy and numeracy skills
Analyze connections between educators, learners and broader socio-political structures. (Also applies to F, G.)	E. responsible behaviour to self, others and society
Reflexively connect sociological aspects of education, equity, and social justice towards reconciliation in institutional settings.	
	F. interpersonal and communications skills
	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation
Analyze recent theoretical research and perspectives related to sociological aspects of education. (Also applies to A, D.)	I. the ability and desire for continuous learning

EDUC-8660. Interpersonal Relationships in Education Also known as: Interpersonal Relationships in Education

Formerly known as: Interpersonal Relationships in Education

Learning Outcomes

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
	A. the acquisition, application and integration of knowledge
Analyze and reflect upon current educational knowledge of interpersonal ethnographies in education. (Also applies to C, D, F.)	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
Critically assess one's professional practices within racial institutional structures. (Also applies to E, G, I.)	C. critical thinking and problem-solving skills
Critically assess scholarly texts on interpersonal relationships within an educational context and use them to aid one's professional development. (Also applies to E, F, I.)	
	D. literacy and numeracy skills
Delineate interpersonal relationships in education from a race-conscious perspective and their impact on educational systems. (Also applies to A, D.)	E. responsible behaviour to self, others and society
	F. interpersonal and communications skills
Disseminate and reciprocally share the development, critique, and assessment of interpersonal relationships from a race-conscious perspective in education. (Also applies to C, F.)	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation
Critically examine current theoretical research frameworks of interpersonal relationships as related to educational practice. (Also applies to C, F.)	I. the ability and desire for continuous learning

EDUC-8795. Final Project Seminar Also known as: Final Project SeminarFormerly known as: Final Project Seminar

Learning Outcomes

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will
aue iu.	have the ability to demonstrate:
Identify and consolidate scholarly topics that were explored during their graduate experience and that is of particular interest to them.	A. the acquisition, application and integration of knowledge
(Also applies to D, F.)	
Demonstrate the ability to organize and prioritize scholarly knowledge in relation to their own scholarly and practice-oriented needs.	
(Also applies to D, F.)	
Apply reflection and problem-solving skills acquired during their graduate experience.	B. research skills, including the ability to define problems and access, retrieve
(Also applies to C, D.)	and evaluate information (information literacy)
Critique a body of relevant scholarly and current research	
literature. (Also applies to D.)	
Reflexively analyze student colleagues' work in an incisive and	C. critical thinking and problem-solving
supportive manner. (Also applies to F, G.)	skills
Demonstrate the skills required to conduct and annotate a critical	D. literacy and numeracy skills
literature review. (Also applies to B.)	
Describe and analyze and educational policy and practice	E. responsible behaviour to self, others
through a race-conscious process. (Also applies to B, C.)	and society
	F. interpersonal and communications skills
	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation

the ability and desire for continuous learning

EDUC-8930. Educational Research Internship Formerly known as: 80-793

Learning Outcomes

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Employ research methodologies, and justify the exploration of a specific research question or topic.	A. the acquisition, application and integration of knowledge
Assess the relevant literature concerning a particular research question or topic and determine how to develop it through the use of appropriate educational research practices.	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
Demonstrate skills of inquiry, reflection, and problem-solving acquired during their master's program. (Also applies to C.)	
Apply master's program learning to a specific issue or topic of educational significance.	
Critique a body of scholarly and professional literature relevant to a specific issue or topic from a race-conscious perspective. (Also applies to C.)	
Relate issues of educational policy or practice to current theoretical educational research.	
Challenge underlying assumptions so that previously undiscovered problems may be acknowledged and addressed.	C. critical thinking and problem-solving skills
	D. literacy and numeracy skills
Cooperate with research colleagues, supervisors and the community within which the research is being conducted in such a manner that all participants potentially benefit from the new knowledge generated by the research (also applicable to G). (Also applies to G.)	E. responsible behaviour to self, others and society
Assemble and organize information in such a manner that the student is able to propose particular steps to address educational problems that are evident as a result of the data analyzed in the applied, participatory research.	F. interpersonal and communications skills

	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation
Assimilate findings for each research question in a manner appropriate to the equity, diversity and commitment to Indigenous reconciliation.	I. the ability and desire for continuous learning
Critically identify how educational research is connected to themes studied during the MEd program and identify potential pathways for continuing this line of inquiry.	
Consolidate and expand elements of knowledge from the master's program.	

*5.1.4: Nursing (Graduate) – Course Learning Outcomes

Item for: **Information**

Forwarded by: Program Development Committee

This package contains the following learning outcomes:

NURS-8500. Pathophysiology for Nurse Practitioners

NURS-8520. Primary Health Care Nurse Practitioner Roles and Responsibilities

NURS-8570. Advanced Health Assessment and Diagnosis I

NURS-8580. Advanced Health Assessment and Diagnosis II

NURS-8610. Therapeutics in Primary Health Care I

NURS-8620. Therapeutics in Primary Health Care II

NURS-8870. Integrative Practicum in Primary Health Care

PDC Submission Package

Created 2022-03-15 by Sherry Morrell (morrells@uwindsor.ca)

The programs, courses, and curriculum maps listed below are stored in the university's *Curriculum Mapping System*.

Submitters: Please upload this document into the PDC Electronic Approval Workflow as a placeholder for your course and program learning outcomes, and curriculum maps.

Reviewers: Please use the link below to review these materials.

Review materials in the Curriculum Mapping System

https://ctl2.uwindsor.ca/cuma/pdc/pkg/352b4290-c8bd-4c77-a3b7-8a3ebf27e4f1

Faculty Council approval: The submitter has declared that the appropriate Faculty Council has reviewed and approved this submission.

Courses

- 1. NURS-8500. Pathophysiology for Nurse Practitioners
- 2. NURS-8520. Primary Health Care Nurse Practitioner Roles and Responsibilities
- 3. NURS-8570. Advanced Health Assessment and Diagnosis I
- 4. NURS-8580. Advanced Health Assessment and Diagnosis II
- 5. NURS-8610. Therapeutics in Primary Health Care I
- 6. NURS-8620. Therapeutics in Primary Health Care II
- 7. NURS-8870. Integrative Practicum in Primary Health Care

NURS-8500. Pathophysiology for Nurse Practitioners Formerly known as: NURS-8500

Learning Outcomes

Last Updated: September 01, 2022

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Synthesize knowledge of the pathophysiology of disorders affecting the musculoskeletal, cardiovascular, respiratory, endocrine, reproductive, renal, integumentary, gastrointestinal and nervous systems.	A. the acquisition, application and integration of knowledge
Analyze and interpret diagnostic and imaging tests based on pathophysiological concepts. (Also applies to B, C.)	
Use pathophysiological concepts to explain epidemiological and geographic disease patterns. (Also applies to B, C, F.)	
Explain environmental and occupational factors that influence disease progression. (Also applies to B, C, E, F.)	
Discuss the role of genetics in preventing and assessing risk factors for diseases. (Also applies to B, C, F.)	
	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
	C. critical thinking and problem-solving skills
	D. literacy and numeracy skills
	E. responsible behaviour to self, others and society
	F. interpersonal and communications skills

G. teamwork, and personal and group leadership skills
H. creativity and aesthetic appreciation
I. the ability and desire for continuous learning

NURS-8520. Primary Health Care Nurse Practitioner Roles and Responsibilities Formerly known as: NURS-8520

Learning Outcomes

Last Updated: September 01, 2022

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Articulate the core competencies of the advanced practice nurse as researcher, educator, leader, collaborator and change agent. (Also applies to C, F.)	A. the acquisition, application and integration of knowledge
Critically appraise frameworks and research relevant to advanced practice nursing. (Also applies to B, C.)	
Articulate the role and scope of practice of the primary health care nurse practitioner. (Also applies to E, F.)	
Critically examine and identify legal and ethical issues in advanced practice nursing, including the concepts of responsibility, accountability, and potential liabilities related to independent and inter-professional practice (Also applies to C, E.)	
Describe Primary Health Care related concepts.	
Recognize how health care policy decisions are made in Canada and how this impacts PHCNP practice. (Also applies to B, C, E, G.)	
Apply Canadian Nurse Practitioner Core Competencies pertaining to cultural safety and humility in relation to the Truth and Reconciliation Commission, the National Inquiry of Missing and Murdered Indigenous Women and Girls and the United Nations Declaration on the Rights of Indigenous Peoples (Also applies to C, E.)	
	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)

C. critical thinking and problem-solving skills
D. literacy and numeracy skills
E. responsible behaviour to self, others and society
F. interpersonal and communications skills
G. teamwork, and personal and group leadership skills
H. creativity and aesthetic appreciation
I. the ability and desire for continuous learning

NURS-8570. Advanced Health Assessment and Diagnosis I

Formerly known as: NURS-8570. Advanced Health Assessment and Diagnosis I

Learning Outcomes

Last Updated: September 01, 2022

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Conduct assessments utilizing evidence-informed and best practices (Also applies to C, F.)	A. the acquisition, application and integration of knowledge
Perform a comprehensive health history utilizing diagnostic reasoning frameworks (Also applies to C, F.)	
Demonstrate advanced physical assessment skills based on client needs (Also applies to C, F.)	
Formulate a provisional diagnosis and diagnostic plan through the synthesis of health assessment data (Also applies to B, C, F.)	
Select and interpret diagnostic and screening tests based on assessment findings (Also applies to B, C, E, F, G.)	
	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
	C. critical thinking and problem-solving skills
	D. literacy and numeracy skills
	E. responsible behaviour to self, others and society
Communicate assessment findings and diagnoses	F. interpersonal and communications skills
Collaborate and consult with members of the health care team (Also applies to G.)	

G. teamwork, and personal and group leadership skills
H. creativity and aesthetic appreciation
I. the ability and desire for continuous learning

NURS-8580. Advanced Health Assessment and Diagnosis II Formerly known as: NURS-8580

Learning Outcomes

Last Updated: September 01, 2022

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Conduct assessments on specific populations utilizing evidence-informed and best practices. (Also applies to C, F.)	A. the acquisition, application and integration of knowledge
Perform a comprehensive health history on specific populations utilizing diagnostic reasoning frameworks. (Also applies to C, F.)	
Demonstrate advanced physical assessment skills on specific populations based on client needs (Also applies to C, F.)	
Formulate a provisional diagnosis and diagnostic plan on selected populations through the synthesis of health assessment data (Also applies to B, C, F.)	
Select and interpret diagnostic and screening tests on selected populations based on assessment findings (Also applies to B, C, E, F, G.)	
	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
	C. critical thinking and problem-solving skills
	D. literacy and numeracy skills
	E. responsible behaviour to self, others and society

Communicate assessment findings and diagnoses with selected populations	F. interpersonal and communications skills
Collaborate and consult with families, communities and members of the health care team. (Also applies to G.)	
	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation
	I. the ability and desire for continuous learning

NURS-8610. Therapeutics in Primary Health Care I

Formerly known as: NURS-8610

Learning Outcomes

Last Updated: September 01, 2022

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Formulate and evaluate comprehensive plans of care based on critically appraised therapeutic frameworks for clients with common episodic conditions (Also applies to B, C, E, F.)	A. the acquisition, application and integration of knowledge
Appraise current research and best standards of practice for clients with common episodic conditions and belonging to specific populations across the lifespan. (Also applies to B, C.)	
Provide safe and effective pharmacological interventions by synthesizing concepts of basic clinical pharmacology. (Also applies to B, C, E, F.)	
Appraise the implications of the federal and provincial legislation prescriptive authority of the PHC-NP for clients with common episodic conditions and/or belonging to specific populations across the lifespan. (Also applies to B, C, E, F.)	
Demonstrate proficiency in prescribing and in writing complete prescriptions for clients with common episodic conditions and belonging to specific populations across the lifespan. (Also applies to C, D, E, H.)	
Educate clients about pharmacological and non-pharmacological interventions, adverse drug effects, interactions, and client responses to these, for various categories of drugs. (Also applies to B, C, F, I.)	

(Also applies to C, G.)

Decide the need for referral and consultation with other health care providers for clients with common episodic conditions and

across the lifespan.

B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
C. critical thinking and problem-solving skills
D. literacy and numeracy skills
E. responsible behaviour to self, others and society
F. interpersonal and communications skills
G. teamwork, and personal and group leadership skills
H. creativity and aesthetic appreciation
I. the ability and desire for continuous learning

NURS-8620. Therapeutics in Primary Health Care II Formerly known as: NURS-8620

Learning Outcomes

Last Updated: September 01, 2022

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Formulate and evaluate comprehensive plans of care based on critically appraised therapeutic frameworks for clients with complex or chronic conditions (Also applies to B, C, E, F.)	A. the acquisition, application and integration of knowledge
Appraise current research and best standards of practice for clients with complex or chronic conditions. (Also applies to B, C.)	
Provide safe and effective pharmacological interventions by synthesizing concepts of basic clinical pharmacology and pharmacotherapeutics for clients with complex or chronic conditions. (Also applies to B, C, E, F.)	
Appraise the implications of the federal and provincial legislation and prescriptive authority of the PHC-NP for clients with complex or chronic conditions. (Also applies to B, C, E, F.)	
Demonstrate proficiency in prescribing and in writing complete prescriptions for clients with complex or chronic conditions. (Also applies to C, D, E, H.)	
Decide the need for referral and consultation with other health care providers for clients with complex and chronic conditions. (Also applies to C, G.)	
Evaluate the outcomes of client education related to pharmacological and non-pharmacological interventions, adverse drug effects, interactions, and expected client responses, for various categories of drugs. (Also applies to C, D, E, F, I.)	

B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
C. critical thinking and problem-solving skills
D. literacy and numeracy skills
E. responsible behaviour to self, others and society
F. interpersonal and communications skills
G. teamwork, and personal and group leadership skills
H. creativity and aesthetic appreciation
I. the ability and desire for continuous learning

NURS-8870. Integrative Practicum in Primary Health Care Formerly known as: NURS-8870

Learning Outcomes

Last Updated: September 01, 2022

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Provide primary healthcare to diverse populations across the lifespan demonstrating synthesis and integration of knowledge of research, theory, philosophy, ethics, clinical care, education and leadership. (Also applies to B, C, E, F, G.)	A. the acquisition, application and integration of knowledge
Formulate comprehensive plans of care for individuals, families and communities based on current best knowledge, theory, available resources, client preferences and clinician experience. (Also applies to B, C, E, F, G, H.)	
Deliver effective and appropriate primary healthcare in accordance with regulations, standards and principles guiding the primary healthcare nurse practitioner scope of practice. (Also applies to C, E, F.)	
Evaluate the impact of the primary health care nurse practitioner on individual, family, community and health care organization outcomes. (Also applies to C, E, F, G.)	
Influence healthcare and client outcomes through critical analysis of the role of the primary healthcare nurse practitioner to model quality improvement. (Also applies to A, C, E.)	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
	C. critical thinking and problem-solving skills
	D. literacy and numeracy skills
	E. responsible behaviour to self, others and society
	F. interpersonal and communications skills
	G. teamwork, and personal and group leadership skills

H. creativity and aesthetic appreciation
I. the ability and desire for continuous learning

University of Windsor Senate

*5.1.5:	Master of Human Kinetics in Sport Management – Program Learning Outcomes
Item for:	Information
Forwarded by:	Program Development Committee
See attached.	

Master of Human Kinetics- Sport Management Program Learning Outcomes

Last Updated: February 23, 2018

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:	OCGS-approved Graduate Degree Level Expectations
Apply conceptual, theoretical, and/or methodological perspectives to current problems and/or new insights in Sport Management & Leadership	A. the acquisition, application and integration of knowledge	Depth and breadth of knowledge Research and scholarship Level of application of knowledge Awareness of limits of knowledge
Navigate a variety of systems and tools to access and extract relevant knowledge and information in various formats Appraise and synthesize ideas gathered from multiple sources and organize them in meaningful ways	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)	2. Research and scholarship 3. Level of application of knowledge 6. Awareness of limits of knowledge

Challenge knowledge assumptions and inferences by exploring and questioning alternative and/or competing perspectives Develop well-reasoned conclusions and generate innovative solutions to complex Sport Management & Leadership issues	C. critical thinking and problem-solving skills	 Depth and breadth of knowledge Research and scholarship Level of application of knowledge Professional capacity/autonomy Awareness of limits of knowledge
Select and apply appropriate data analysis techniques as required by a research design	D. literacy and numeracy skills	Research and scholarship Level of communication skills
Identify and adhere to the UWindsor REB, the most current version of TCPS and academic integrity standards when conducting scholarly, professional and/or research work	E. responsible behaviour to self, others and society	4. Professional capacity/autonomy 6. Awareness of limits of knowledge
Communicate clearly and effectively for a variety of audiences and purposes in both oral and written formats	F. interpersonal and communications skills	5. Level of communication skills
Engage collaboratively and respectfully with peers, university personnel and community organizations Exercise initiative and personal responsibility and accountability	G. teamwork, and personal and group leadership skills	4. Professional capacity/autonomy 5. Level of communication skills

Recognize that knowledge is constructed in and translated through different cultural, social, and political, contexts	H. creativity and aesthetic appreciation	Research and scholarship
political, cortexts		Professional capacity/autonomy
		6. Awareness of limits of knowledge
Interpret and evaluate complex ideas and issues in Sport Management & Leadership as an active and aware global citizen	I. the ability and desire for continuous learning	Professional capacity/autonomy

University of Windsor Senate

*5.1.6: Economics (Graduate) – Course Learning Outcomes

Item for: **Information**

Forwarded by: Program Development Committee

This package includes the following course learning outcomes:

ECON-8010. Microeconomic Theory I

ECON-8020. Macroeconomic Theory

ECON-8030. Microeconomic Theory II

ECON-8040. Macroeconomic Theory I

ECON-8160. Labour Economics

ECON-8310. Industrial Organization

ECON-8410. Econometric Theory

ECON-8420. Econometric Theory II

ECON-8430. Applied Econometrics

ECON-8810. Mathematical Economics

ECON-8820. Selected Topics in Economic Theory

ECON-8900. Regional Economics

ECON-8910. Urban Economics

ECON-8960. Major Paper

PDC Submission Package
Department of Economics

Learning Outcomes for Graduate Courses in ECONOMICS

The initial version of the learning outcomes for each individual course was developed by faculty members who normally teach that particular course or have expertise in that area. Then these documents went through multiple revisions in which a specialist in program development was involved.

The current version incorporates changes proposed by CTL.

ECON8010. Microeconomic Theory I

Learning Outcomes Last Updated: January 27, 2022

Learning Outcomes	Characteristics of a University of
At the end of the course, the successful student will know and be	Windsor Graduate
able to:	The University of Windsor graduate will have the ability to demonstrate:
Explain and analyze the behaviors of economic agents, consumers, and producers (Also applies to C, D.)	A. the acquisition, application and integration of knowledge
Define and solve optimization problems of consumers and producers	B. research skills, including the ability to define problems and access, retrieve
(Also applies to C, D, I.)	and evaluate information (information literacy)
Aggregate individual behaviors to understand the market equilibrium and its welfare properties	C. critical thinking and problem-solving skills
(Also applies to D.)	SKIIIS
Explain the aggregate economy from the perspective of individuals' decision making	D. literacy and numeracy skills
(Also applies to F.)	
	E. responsible behaviour to self, others and society
Interpret and communicate the results of economic analyses clearly and precisely	F. interpersonal and communications skills
(Also applies to D, I.)	Stand
	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation
	I. the ability and desire for continuous learning

ECON-8020. Macroeconomic Theory I

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Analyze macroeconomic relationships using analytical tools and theoretical models used in modern macroeconomics (Also applies to D, I.)	A. the acquisition, application and integration of knowledge
Explain and discuss empirical implications and policy issues associated with macroeconomic interactions (Also applies to E, G.)	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
Apply basic research methods in economics, including research design, data analysis, and interpretation (Also applies to D, I.)	
Evaluate the recent contributions in the empirical and theoretical macroeconomics literature (Also applies to I.)	C. critical thinking and problem-solving skills
Identify economic problems, evaluate problem-solving strategies, and develop science-based solutions (Also applies to G, H.)	
Explain and evaluate models of business cycle fluctuations (Also applies to C.)	D. literacy and numeracy skills
Analyze and compare theories using numerical methods and programming (Also applies to C, I.)	
	E. responsible behaviour to self, others and society
Interpret and communicate the results of economic analyses clearly and precisely (Also applies to D, I.)	F. interpersonal and communications skills
	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation

I. the ability and desire for continuous learning

ECON-8030. Microeconomic Theory II

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Identify and explain the latest developments in microeconomic theory (Also applies to I.)	A. the acquisition, application and integration of knowledge
Draw inferences from the results of microeconomic analyses and determine how they apply to economic policy matters (Also applies to E.)	
Create economic models of human decisions with incomplete information and multiple participants (Also applies to C.)	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
Analyse and evaluate the design of incentive mechanisms (Also applies to H.)	C. critical thinking and problem-solving skills
Identify asymmetric information issues in economic situations and construct corresponding Bayesian game models of the economic problems (Also applies to C, H.)	D. literacy and numeracy skills
Analyse and solve game-theoretic models (Also applies to C.)	
Interpret microeconomic results and provide policy recommendations (Also applies to E, G, I.)	
	E. responsible behaviour to self, others and society
Interpret the results of game-theoretic analyses and communicate them clearly and concisely (Also applies to D.)	F. interpersonal and communications skills
	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation

I. the ability and desire for continuous learning

ECON-8040. Macroeconomic Theory II

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Develop and appraise quantitative macroeconomic models (Also applies to C.)	A. the acquisition, application and integration of knowledge
Analyze quantitative macroeconomic models using computational tools (Also applies to D.)	
Analyze macroeconomic policy, the role of government policy in the economy, and policy transmission mechanisms using quantitative and computational macroeconomic models (Also applies to C, D, E, G.)	
Examine and evaluate relevant articles in academic journals and relate them to economic policy issues (Also applies to C, I.)	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
Set up models appropriate for macroeconomic problems and employ the appropriate quantitative techniques to solve them (Also applies to D, G, H, I.)	
Evaluate the recent contributions to research in the area of quantitative economics (Also applies to I.)	C. critical thinking and problem-solving skills
Discuss and formulate macroeconomic policy recommendations based on the quantitative evaluation (Also applies to E, G, H.)	
Analyze macroeconomics problems by choosing appropriate quantities and computational tools.	D. literacy and numeracy skills
Critically appraise and formulate potential extensions of models, limits and applications of theories (Also applies to C, H, I.)	

Model and analyze the impacts of fiscal and monetary policies on consumers and society.	E. responsible behaviour to self, others and society
Evaluate and compare how macroeconomic policies can affect different members of society.	
Interpret the results of quantitative analyses and communicate them clearly and concisely.	F. interpersonal and communications skills
Take positions in discussions of competing theories or economic policies and make compelling arguments in favor of those supported by evidence (Also applies to G, H.)	
	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation
	I. the ability and desire for continuous learning

ECON-8160. Labour Economics

Learning Outcomes

Last Updated: January 27, 2022

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Analyze labour market interactions between firms and workers using job search theoretic models.	A. the acquisition, application and integration of knowledge
Evaluate the recent contributions to research in the area of labour economics (Also applies to I.)	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
Analyze labour market data to draw empirical implications on key labour market indicators such as unemployment and job vacancies (Also applies to D, E.)	
Formulate labour market problems and policies by using job search theoretic models (Also applies to H.)	C. critical thinking and problem-solving skills
Evaluate models using numerical simulations (Also applies to C.)	D. literacy and numeracy skills
Interpret results in the main labour economics models and provide policy recommendations (Also applies to E, G, I.)	
	E. responsible behaviour to self, others and society
	F. interpersonal and communications skills
	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation
	I. the ability and desire for continuous learning

ECON-8310. Industrial Organization

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Solve problems related to market power and market failures (Also applies to C.)	A. the acquisition, application and integration of knowledge
Examine and evaluate articles in academic journals and relate them to economic policy issues (Also applies to C, I.)	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
Analyze economic markets and link those to real-life cases, such as antitrust cases (Also applies to I.)	C. critical thinking and problem-solving skills
Make policy recommendations based on formal economic models (Also applies to E, G.)	
Employ and solve economic models related to market power and market failures (Also applies to C.)	D. literacy and numeracy skills
Model and analyze the impacts of market power on consumers and society.	E. responsible behaviour to self, others and society
Communicate the results of an economic analyses clearly and concisely, orally and in writing.	F. interpersonal and communications skills
Contribute as a productive member of an economic analysis team.	G. teamwork, and personal and group leadership skills
Propose mathematical solutions in a concise and formal manner.	H. creativity and aesthetic appreciation
	I. the ability and desire for continuous learning

ECON-8410. Econometric Theory I

Learning Outcomes At the end of the course, the successful student will know and be able to: Implement basic regression analysis techniques, such as Least Squares (LS) (Also applies to D.)	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate: A. the acquisition, application and integration of knowledge
Apply advanced tools including, but not limited to, Instrumental Variables (IV) and Generalized Method of Moments (GMM) estimations (Also applies to D.)	
Analyze econometric models while identifying approaches and strategies for model specification and data modelling.	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
Detect and solve methodological problems encountered in econometric modelling from either theoretical or empirical perspective. Identify and solve estimation problems such as unbiasedness, inconsistency and inefficiency.	C. critical thinking and problem-solving skills
Provide clear scientific arguments to solve problems (Also applies to F.)	D. literacy and numeracy skills
Use statistical tools and econometric software to improve the accuracy of analyses (Also applies to I.)	
Use evidence-based techniques to solve econometric problems.	E. responsible behaviour to self, others and society
Interpret results and apply them to create guidelines for policy decisions.	F. interpersonal and communications skills
Work collaboratively and productively as a member of economic analysis teams.	G. teamwork, and personal and group leadership skills
Explain existing econometric theory and identify fruitful avenues for the use of theory.	H. creativity and aesthetic appreciation

Formulate relevant issues encountered in business/economics sections of newspapers and accessible general economics journals as econometric problems, propose several alternative estimation procedures, and discuss advantages and possible weaknesses of each of them.

I. the ability and desire for continuous learning

ECON-8420. Econometric Theory II

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Explain and apply theoretical econometric methods used in empirical analyses.	A. the acquisition, application and integration of knowledge
Select appropriate statistical and econometric methods to analyze and test economic relationships (Also applies to D, E.)	
Collect data from Statistics Canada website and various online data centers.	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
Apply appropriate statistical and econometrics methods to different types of data and models (Also applies to D, G.)	
Apply econometric models to analyze economic data.	C. critical thinking and problem-solving skills
Estimate, test economic theories, and make predictions.	
Read and replicate empirical analyses from academic journal papers (Also applies to I.)	D. literacy and numeracy skills
Manage data and estimate econometric models by using modern computer software (Also applies to I.)	
	E. responsible behaviour to self, others and society
Present and interpret the estimates of econometrics models and communicate them clearly and concisely	F. interpersonal and communications skills
	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation
	1

Formulate relevant issues encountered in business/economics sections of newspapers and accessible general economics journals as econometric problems, propose several alternative estimation procedures, and discuss advantages and possible weaknesses of each of them.

I. the ability and desire for continuous learning

ECON-8430. Applied Econometrics

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:
Apply a set of statistic tools and research designs useful in conducting high-quality empirical research on topics in applied microeconomics and related fields (Also applies to B, D, I.)	A. the acquisition, application and integration of knowledge
Explain and apply methods for estimating causal effects.	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
Define relevant questions, access and analyze data in policy evaluations.	
Critically evaluate the recent literature in applied econometrics (Also applies to I.)	C. critical thinking and problem-solving skills
Interpret and perform linear and non-linear regression analyses	D. literacy and numeracy skills
Apply regression analyses with panel data, with binary dependent variables and multivariate dependent variables	
Apply various identification strategies to identify causal effects	
Use econometric software for data management and statistical analyses (Also applies to I.)	
	E. responsible behaviour to self, others and society
Interpret empirical results and communicate them clearly and concisely	F. interpersonal and communications skills
Work collaboratively and productively as a member of economic analysis teams.	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation

Formulate relevant issues encountered in business/economics sections of newspapers and accessible general economics journals as econometric problems, propose several alternative estimation procedures, and discuss advantages and possible weaknesses of each of them.

I. the ability and desire for continuous learning

ECON-8810. Mathematical Economics

Learning Outcomes Last Updated: January 27, 2022

Learning Outcomes At the end of the course, the successful student will know and be able to: Apply advanced mathematical techniques that are widely used in advanced economic theories (Also applies to I.) Explain the mathematical concepts and methods used by professional economists.	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate: A. the acquisition, application and integration of knowledge
Express economic ideas in the language of mathematics (Also applies to F, I.)	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)
Analyse economic models using formal mathematical methods (Also applies to D, I.)	C. critical thinking and problem-solving skills
Identify properties of sets, convex sets, vector and topological spaces, convex and concave functions.	D. literacy and numeracy skills
Explain important theorems (E.g., Fixed-Point Theorem, Implicit Function Theorem, Envelope Theorem, etc.).	
Employ mathematical techniques to analyse and solve economic problems (Also applies to C.)	
	E. responsible behaviour to self, others and society
Interpret the results of mathematical analyses and communicate them clearly and concisely.	F. interpersonal and communications skills
	G. teamwork, and personal and group leadership skills
	H. creativity and aesthetic appreciation
	I. the ability and desire for continuous learning

ECON-8820. Selected Topics in Economic Theory

Learning Outcomes Last Updated: April 05, 2022

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:				
Formulate and evaluate problems in modern economic theory (e.g., cost or surplus sharing theory, time series modeling and forecasting, workers' job search behaviors and firms' job posting strategy). Apply particular economic theories or methods (such as cooperative games in collective decision-making problems, analysis and forecast of macroeconomic or financial time series, or directed search and endogenous job separations) to specific economic problems.	A. the acquisition, application and integration of knowledge				
Develop and use theories and approaches to address theoretical and/or practical issues (such as fairness and equity versus economic efficiency in collective decision problems, or estimating and implementing time series models, e.g., ARIMA and GARCH processes, using real data). Calibrate models using labour market data or other data and analyze the sources of the rise and fall of the aggregate variables such as unemployment. (Also applies to E.)	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)				
Analyze economic models of social choice problems using cooperative game theory models and/or axiomatic approaches. Analyze macroeconomic and financial data sets using time-series modeling, identification, estimation, and model adequacy checking. Formulate labour market problems by selecting the appropriate modelling tools within the labour search-and-matching framework.	C. critical thinking and problem-solving skills				
Identify necessary tools (e.g., axioms, properties of allocation methods, cooperative games, concept of the core, coalition sets, Shapley value, Box-Jenkins approach, correlogram, auto-correlation function) to solve relevant problems. Apply important theorems (e.g., the Shapley value characterization theorem), and times series methods to evaluate properties of economic models. Interpret labour market dynamics using the labour search-and-matching framework and draw policy implications. Formulate and solve models using numerical simulations.	D. literacy and numeracy skills				
	E. responsible behaviour to self, others and society				

Interpret and clearly and concisely communicate the results of the cooperative game theory or axiomatic analyses. Accurately interpret and explain the results of analyses and identify their relevance to policymaking decisions.	F. interpersonal and communications skills
	G. teamwork, and personal and group leadership skills
Explain existing economic theories as they pertain to specific topics and identify potential developments, ramifications, and avenues for future research. (Also applies to I.)	H. creativity and aesthetic appreciation
	I. the ability and desire for continuous learning

ECON-8900. Regional Economics

Learning Outcomes Last Updated: April 05, 2022

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:				
Analyze problems in regional economics using analytical tools and theoretical models (Also applies to C.)	A. the acquisition, application and integration of knowledge				
Use analytical tools to approach regional development issues (sectoral or economy-wide) including the use of regional development incentives in the private and public sectors.					
Gather and interpret regional policy data and regional indicators from national databases and use these data to shape critiques that include reflections on sustainable development issues in the regions and on strengthening local benefits (Also applies to E, G.)	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)				
Explain and discuss empirical implications and policy issues associated with regional economics (Also applies to E, F.)	C. critical thinking and problem-solving skills				
Search, analyze and synthesize regional data and information (Also applies to B, I.)	D. literacy and numeracy skills				
Explain and evaluate models of regional economics (Also applies to C.)					
Analyze models of regional economics using empirical methods (Also applies to C.)					
	E. responsible behaviour to self, others and society				
Communicate information, ideas, problems and solutions regarding regional issues to both general and informed/knowledgeable audiences.	F. interpersonal and communications skills				
Express complex concepts of regional economic policy and assessment of regional differences to a general audience.					
	G. teamwork, and personal and group leadership skills				

	H. creativity and aesthetic appreciation
Formulate relevant issues encountered in general economics journals in terms of advanced theories in regional economics.	I. the ability and desire for continuous learning

ECON-8910. Urban Economics

Learning Outcomes Last Updated: January 27, 2022

Looming Outcomes	Characteristics of a University of				
Learning Outcomes At the end of the course, the successful student will know and be	Characteristics of a University of Windsor Graduate				
able to:	The University of Windsor graduate will have the ability to demonstrate:				
Analyze urban economic problems using analytical tools and theoretical models (Also applies to C, D.)	A. the acquisition, application and integration of knowledge				
Locate, recognize, and evaluate context and circumstances where more complex urban problems may occur.	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information literacy)				
Explain and discuss empirical implications and policy issues associated with urban economics (Also applies to E, F, G.)	C. critical thinking and problem-solving skills				
Explain and evaluate models.	D. literacy and numeracy skills				
Analyze models using empirical methods.					
	E. responsible behaviour to self, others and society				
Collaborate to identify, discuss, and solve current urban problems (Also applies to C, G.)	F. interpersonal and communications skills				
	G. teamwork, and personal and group leadership skills				
	H. creativity and aesthetic appreciation				
Regularly read accessible articles in general economics journals to stay informed. After the reading, formulate the relevant economic issue in terms of the advanced theories studied in the course.	I. the ability and desire for continuous learning				

ECON-8960. Major Paper

Learning Outcomes Last Updated: January 27, 2022

Learning Outcomes At the end of the course, the successful student will know and be able to:	Characteristics of a University of Windsor Graduate The University of Windsor graduate will have the ability to demonstrate:					
Formulate and investigate theoretical and empirical questions in economics.	A. the acquisition, application and integration of knowledge					
Apply economic theory to real economic policy issues.						
Empirically test the validity of theory using real data.						
Identify standard sources for theoretical and empirical research material in economics.	B. research skills, including the ability to define problems and access, retrieve and evaluate information (information					
Summarize existing theoretical and empirical research on economic issues.	and evaluate information (information literacy)					
Apply appropriate theoretical and empirical models to specific economics and policy issues.	C. critical thinking and problem-solving skills					
Draw conclusions on the validity of economic theory and make policy recommendations based on formal economic models and data (Also applies to G.)						
	D literacy and numerous skills					
Retrieve, organize and interpret theoretical and empirical information.	D. literacy and numeracy skills					
Present theoretical and empirical information in both descriptive and analytical formats (Also applies to F.)						
Assess the impact of alternative economic policies on groups and classes of economic agents.	E. responsible behaviour to self, others and society					
Objectively identify 'winners' and 'losers' for proposed economic policies.						
Recognize and express the importance of ethical conduct expected of economic professionals.						

Communicate research results in verbal and written form.	F. interpersonal and communications skills			
Critique related work previously published in journals.				
Demonstrate high level interpersonal and communications skills when the presenting results.				
	G. teamwork, and personal and group leadership skills			
Structure and present economic arguments in a formal and concise manner.	H. creativity and aesthetic appreciation			
Explain gaps in a specific area of economics literature and propose ideas of how these can be addressed in the future.	I. the ability and desire for continuous learning			

*5.1.7: Economics – Articulation Agreement (Anshan Institute) – Deletion

Item for: Information

Forwarded by: Program Development Committee

Rationale:

- In 2002 the University of Windsor and Anshan Institute of Iron and Steel Technology (China) established an articulation agreement to encourage students from the Anshan University of Science and Technology to transfer easily to the University of Windsor to complete an honours degree in Economics.
- The Registrar's Office recently informed the University Secretariat that this Articulation Agreement was terminated effective 2006.
- Considering this, the following will be removed from the undergraduate calendars: "Anshan will accept students into a program leading to a degree granted by that institution. This program will be designed so as to provide the Anshan students with the option of transferring to the University of Windsor, to complete 10 or more University of Windsor credits and to be granted a University of Windsor Bachelor of Arts (Economics) or Bachelor of Arts (Honours Economics). Students who complete at least one year of an undergraduate program at Anshan University of Science and Technology, with a GPA of 7.0 (C+) or its equivalent at Anshan University, can apply for admission to an undergraduate program in Economics at the University of Windsor. Transferring students whose native language is not English must complete an English Proficiency Test administered by either the Calendar English Language Institute of the University of Michigan or, Test of English as a Foreign Language (TOEFL)."

*5.2.1:	Office of Open Learning Annual Report (2020-2021)
Item for:	Information
Forwarded by:	Academic Policy Committee
See attached.	

Office of Open Learning Annual Report to the Academic Policy Committee: 2020-21

1. Executive Summary

A. Introduction

The Office of Open Learning (OOL) provides leadership in the design, development, and delivery of effective online, open, and hybrid learning opportunities for all learners. OOL fosters a teaching and learning environment that empowers educators and learners to explore, innovate, and excel in their fields, and which recognises and utilises the power of a highly connected digital world. Underpinned by scholarly practice and with a focus on openness, equity, and accessibility, we advocate for, explore, and implement the emerging technologies and pedagogical approaches our institution needs to be on the leading edge of educational practice. This leadership has been critical during the pandemic, and is aligned with the institutional mission and Strategic Mandate Agreement (SMA), and the provincial Virtual Learning Strategy's three pillars of Being the future, Being a lifelong learner, and Being a global leader.

B. Goals and Objectives of Reporting Year

1. Provide an exceptional undergraduate experience:

- a. COVID Pandemic Support
- b. Champion Open Educational Practices (OEPs)
- c. Students as Partners
- d. Supporting current and emerging educational technologies
- e. Microcredentials
- f. Accessibility and universal design
- g. Indigenisation and anti-racist practice
- h. Developing critical digital literacies

2. Pursue strengths in research and graduate education:

a. Support and encourage the scholarship of open, online teaching and learning

3. Recruit and retain the best faculty and staff:

- a. Grant funding support
- b. Developing capacity in online, open, hybrid and technology-rich teaching and learning
- 4. Engage and build the Windsor and Essex County community through partnerships
- 5. Promote international engagement

C. Successes

COVID Pandemic Support: Continued to play a critical role in supporting the campus during the pandemic, while maintaining existing commitments

- Successfully supported the transition to almost 100% online teaching and learning in F20/W21 terms
- Welcomed at least 1,939 participants in 140 courses, workshops and invited events, as well as open
 events where participants were not required to register; co-facilitated an additional 23 workshops in
 collaboration with CTL
- Provided approximately 3,300 consultations with faculty, sessional instructors, GAs/TAs, students and externals
- **eCampus Ontario grants:** Supported the development and submission of **52 grant applications** for eCampus Ontario's Virtual Learning Strategy Grants, with **19 successful** in receiving a total of **\$1.447m in funding** (37% success rate compared to provincial average of approx. 25%)
- **Student Partners:** OOL supported projects directly employed at least **201 student partners** in 2020-21, including 60 co-op students (funded by \$302,302 subsidy from the Federal Government's Student Work

- Placement Program (SWPP)), 12 Ignite and part-time students, 12 peer-assisted learning sessions leaders, and 117 student partners who worked on eCampus Ontario funded projects
- Jointly awarded, with CTL, the 2021 Team Impact Award, recognising COVID support provided by OOL
- Initiated review of the Learning Management System (LMS) with CTL and ITS
- Rapidly developed a large series of open digital resources, many co-created by student partners, to support faculty and students transitioning to online teaching and learning. These included a blog and podcast series, interviews with leading experts in online teaching and learning from around the world, explainer videos for various technologies, websites, open eBooks, and short documents exploring principles of online and open learning
- Collaborated with CTL, ITS, and the Provost' office to develop hundreds of FAQs, wiki pages, and a new Teaching Online website introducing instructors and students to online learning
- Rapidly identified and procured additional cloud-based technologies to extend capacity in core functional areas, including video/lecture recording (YuJa), accessibility support (Panorama), and online assessment (BetterExaminations)
- Strongly advocated for ethical, compassionate, and equitable use of technology and online pedagogies
- OOL staff contributed to multiple UWindsor, provincial, national and international committees and initiatives supporting the pandemic reponse
- In collaboration with ITS, developed a live chat support line staffed by co-op students deployed in the first few weeks of term
- OOL staff and students collaborated with CTL to staff the Bb Café virtual drop-in support centre
- Supported and sponsored Indigenisation and anti-racism events with the Faculty of Law
- Continued to expand and support **ePortfolio** use, with **6,214** users and **5,583** sites launched; hosted 32 workshops with 519 attendees and 49 drop in sessions
- Continued to expand PALS sessions online during the pandemic, including in graduate level courses in Engineering, both firsts for Supplemental Instruction globally; 600 unique students participated in PALS sessions in the reporting period (360% increase over 2019-20); Invited to present our online PALS/SI model to the National Centre for Canadian SI
- Over 120 microcredentials offered primarily through Continuing Education now approved for OSAP eligibility
- Since Feb 2020, OOL has hosted a weekly meeting of online learning centre directors and staff to support provincial planning, sharing of best practices, problem solving, and community building
- Contributed to UWindsor reputation by presenting scholarly work at 13 local, national and international conferences, 12 invited presentations/keynotes, 5 peer-reviewed publications, over 40 open publications, membership of 18 external committees and boards, and 25 grants.

D. Challenges

- Sustained high demand for OOL's services in response to the COVID-19 pandemic, including the initial
 emergency remote teaching, subsequent transitions to online teaching, and planning for the new hy-flex
 mode
- Supporting the development, submission and management of a large number of provincially-funded projects with tight deadlines during the pandemic
- Limited capacity in some key staffing areas were exacerbated by the COVID pandemic demand; key skill sets needed include instructional design (failed searches), application programming, VR/3D media/game development, video production (PT role temporarily filled), graphic design, web/UI/UX-development. Reliance on short-term contract hires and student labour continues to be a problem for capacity, consistency and quality service provision.
- a. Multiple failed searches for online learning professionals due to the tight employment market in this sector as a result of expanded hiring at all institutions and inability to hire remote employees
- Lack of space in our current building to house all OOL, CTL, and QA staff. Additionally, no specialized space on campus for rapid development of eLearning content.
- No formally adopted institutional definitions of course delivery modes

2. Report

A. Area's Goals and Objectives and the University's Strategic Plan

Over the course of the reporting period, the Office of Open Learning's focus has primarily been drawn to supporting three major institutional needs: 1. COVID pandemic support; 2. Preparing for a return to campus, including supporting the hy-flex initiative, and; 3. Securing external funding for online, technology-enabled, and open teaching and learning with the return of provincial government support for these activities through the Virtual Learning Strategy (VLS) and other funding programmes. These activities are largely over an above our planned activity for the 2020-21 reporting period, and necessitated a reprioritisation of resources allocated to some planned goals.

1. Provide an exceptional undergraduate experience:

- a. Support the campus during the COVID-19 pandemic
 - Provided enhanced support for design and development of online and hybrid learning at scale
 - Worked with the Deans to develop a tiered support model, identify critical or challenging courses that required an additional level of support for transition to online in F20; one-on-one support with instructional design, development and post-launch support
 - Live chat, Bb Café, TeamDynamix ticket support (with CTL and ITS), faculty and department-based drop in support sessions
 - Developed web resources including Online Learning in a Hurry website, <u>Fundamentals of Effective</u>
 Online Teaching Practice, <u>Quick Guide to Teaching Online</u>, <u>12 Key Ideas</u>: An Introduction to Teaching
 <u>Online</u>, <u>Teaching with MSTeams</u>, <u>Students Helping Students</u> website, <u>Learning to Learn Online</u> eBook;
 created dozens of online training/support videos for technologies such as the virtual classroom, MS
 Teams, BetterExaminations Blackboard, YuJa, BetterExaminations, and more;
 - Online sprints, workshops (both open to the campus and bespoke in collaboration with departments and faculties), extended and intensive courses, and a communities of practice to support online instruction
 - Co-developed (with CTL and ITS) web resources on all aspects of online teaching and learning and technology to support it, including Wiki pages, hundreds of FAQ answers, and the UWindsor Teaching Online website.
 - Led the procurement, implementation and support for additional educational technologies addressing
 identified gaps in service for online instruction, including YuJa (a powerful video creation and
 management system), Panorama (an accessibility support tool), and BetterExaminations (online
 assessment creation and management tool), in collaboration with CTL, ITS and other stakeholders
 - YuJa: Offered six workshops to 64 participants (Jan-Jun, 21), plus an ongoing monthly community of practice on educational media; steady growth and adoption across campus
 - Panorama still in testing and rollout phase with integration to Blackboard QA. Panorama features a visualizer to indicate the accessibility health of files uploaded to the Blackboard and provide automatically generated accessible alternative file formats
 - BetterExaminations piloted with limited courses in F20 and W21 with integration to Blackboard anticipated for F21
 - Hired 60 co-op students with \$324,302 in external funding from the federal government's Student Work
 Placement Program (SWPP), as well as 12 part-time and Ignite students to provide increased support for
 instructors and students transitioning to online learning and teaching. Students provided technical and
 general support, tested course elements, provided feedback on course designs, developed resources,
 collaborated on and co-facilitated workshops and presentations, found and created open educational
 resources to support teaching and learning
 - Hy-flex: Collaborated with ITS and CTL on design of classroom technology, technical and pedagogical training for faculty and hy-flex TAs, and ongoing support for hy-flex teaching and learning
 - Supporting the safe and effective return to campus through collaboration on space, technology and pedagogical innovation
 - OOL staff served on 12 committees, taskforces, and working groups related to the pandemic response

- Assisting faculties to begin planning for post-pandemic evolution of teaching and learning
 - Planning, with collaboration from SSHRC Future Challenges Division, a Futures Challenges Institute for Higher Education for fall 2022
 - Delivered sessions on post-COVID higher education for Board of Governors, Faculty of Science, Executive Leadership Team, Provost' Council, Associate Deans' Council

b. Champion and model the use of Open Educational Practices (OEPs) in all aspects of our work

- OOL provides support for open publishing, especially in the provincially hosted eCampus Ontario
 Pressbooks and H5P open libraries
 - Most of the eCampus funded projects will use Pressbooks to house final resources for sharing and include:
 - https://ecampusontario.pressbooks.pub/ecoindigenousbusinesstopics/
 - https://ecampusontario.pressbooks.pub/universaldesign/
 - https://ecampusontario.pressbooks.pub/businessagreements/
 - https://ecampusontario.pressbooks.pub/psychoactivesubstances/
 - https://ecampusontario.pressbooks.pub/deathanddying/
 - https://ecampusontario.pressbooks.pub/dataanalytics/
 - https://ecampusontario.pressbooks.pub/techadapt/
 - https://ecampusontario.pressbooks.pub/inclusivehealth/
 - https://ecampusontario.pressbooks.pub/globaledd/
- Redeveloping existing OERs, including <u>Graduate Approaches to Qualitative Research</u> and <u>Writing Skills</u> for <u>Human Services Professionals</u> in Pressbooks to improve portability, discoverability, and develop internal capacity in open publishing
- Support resources developed in Pressbooks and shared openly include: <u>BetterExaminations at the University of Windsor</u>, <u>Teaching with MSTeams</u>, <u>12 Key Ideas</u>: <u>An Introduction to Teaching Online</u>; <u>Making Open Educational Resources</u>: <u>A Guide for Students by Students</u>, <u>Engaging Students in an Online Era</u>
- Consulted with eCampus Ontario to develop the Ontario Open Library functionality to enable enhanced tracking of UWindsor produced OER adoption and impact
- Open licencing and use of OERs included in all OOL workshops and courses developed in 2020-21, modelling open pedagogies and practices to the campus community

c. Engaging with Students as Partners in the educational enterprise

- Enhanced opportunities for engaging student partners in all areas of our core work through meaningful experiential learning opportunities:
 - OOL was awarded the inaugural *Unsung Hero of the Year Award* for 2020 by the Office of Experiential learning for our work with 60 co-op students.
 - Students developed numerous resources for their peers and faculty (as noted above), facilitated workshops in Welcome Week and other venues, and were critical to the successful transition to online learning.
 - Students employed as Online Learning Assistants (in OOL) or as Digital Rovers within the faculties and departments with support and training from OOL
 - Students also developed technical documentation (8 articles and 6 videos) for YuJa and an open eBook for BetterExaminations
 - In addition, worked with 117 students on Virtual Learning Strategy projects
- Continue to expand and refine Peer Assisted Learning Sessions (PALS):
 - 12 students were employed as Peer Assisted Learning Sessions (PALS) leaders to design and deliver peer-based Supplemental Instruction (SI) sessions in a range of challenging undergrad and graduate courses in engineering, economics, chemistry and physics.
 - Online PALS was offered in 8 courses during the reporting period, including expanding into the M.Eng. program for the first time in Summer 2020, with the largest uptake of any courses to date (408 unique students); PALS was discontinued in undergraduate Statistics due to low participation.

- 600 unique students (1603 participants) attended PALS sessions (131 in S20, 255 F20, and 214 W21 an increase of over 360% from the previous year);
- Currently working to revise REB approval for administrative access to data to allow better evaluation of the program.

d. Educational technologies

- In collaboration with ITS and CTL, initiated a review of the Learning Management System (LMS) as Blackboard has announced they will no longer support our self-hosted instance as of 2023, and would require us to move to their cloud-based services and next generation system. The campus community will have the opportunity to provide extensive feedback on their experience with the LMS to shape the direction of the future of our digital learning and teaching hub.
- OOL provides primary support for Blackboard Collaborate. COVID precipitated a massive increase in Collaborate usage. Key data includes: 192,565 Collaborate sessions were launched from 1 July, 2020 30 June, 2021 (a 455% increase over the same period in 2019-20); 167,067 hours of activity (600% increase) with 1,443,585 non-unique attendees (783% increase); 33,563 hours of recordings (1,142% increase) were created across 33,917 files (734% increase) accounting for at least 5,697 GB* (934% increase); there were at least 608,948 recording views*; highest number of recordings in a day was 349 (218% increase), maximum attendees in any one session was 489 with the maximum number of attendees using the system at any given time of 3506 and a daily maximum of 21,477 users^ (354% increase).
 - *Does not include data for recordings that were deleted after use.; ^not unique users, as some students will attend multiple classes in a day.
 - There were 340 (201% increase over 2019-20) specific Collaborate tickets submitted to Team Dynamix (although this does not capture mis-tagged or compound tickets) and OOL staff provided approximately 267 web-conferencing consultations/support during the reporting period (Note: neither of these statistics captures drop-in sessions in the Bb Café).
- WordPress ePortfolios continue to grow to support SMA3 targets
 - OOL staff facilitated 32 ePortfolio workshops with approximately 421 students attending; 49 ePortfolio drop-in sessions, and 47 ePortfolio consultations. There were 738 new users and 765 new ePortfolios created during the reporting period. There are currently 5,583 WordPress ePortfolio sites in the system, with a total of 6,214 users signed up.
 - A new onboarding process was piloted in 2020 for students transferring from the collaborative nursing program
- While Zoom is not officially supported on campus, OOL provides limited support for the 6 faculties and departments that have adopted Zoom as their preferred webconferencing solution.
- Delivered numerous workshops on Blackboard Collaborate, H5P, Pressbooks, Zoom, Online examination strategies, video creation and developed two ongoing communities of practice centred on the new YuJa video and BetterExaminations online assessment platforms
- Promoting ethical, critical use of educational technologies that respect privacy, safety, accessibility and sound, evidence-informed pedagogies: consulted with departments, faculties, individual instructors on selection of safe, ethical technologies
 - Provided review of contracts, privacy statements, accessibility reviews for tools
- eCampus Ontario Sandbox Technology Pilots
 - eCampus Ontario provided limited sandbox licences for Pivot Interactives (Virtual Reality (VR) labs), Hypothes.is (social annotation), Kahoot for Education, and Miro (online collaboration tool); OOL supported the application, initial setup, licence distribution, and reporting on these projects
- Virtual, Augmented, and Extended Reality in teaching (openly licenced for use by anyone):
 - Supporting two Virtual Learning Strategy projects developing extended reality (XR) learning environments (myWatershed and OpenGenLab)
 - Three projects creating simulations in nursing, biomedicine, and engineering
 - One project creating remotely accessible robots for teaching in electrical engineering

e. Supporting Accessibility, Equity, Diversity and Inclusion

- Co-leading (with Mohawk College) a \$200,000 grant project with 10 universities and colleges across
 Ontario developing an open educational resource on <u>Universal Design for Learning (UDL) for Inclusion</u>,
 Diversity, Equity, and Accessibility (IDEA)
 - Creating content for a microcredential to be implemented locally to address UDL and Accessibility for Ontarians with Disabilities Act (AODA) accessible education training compliance requirements
 - Includes first resource on relationship between Indigenous pedagogies and Universal Design (coauthored by Jaimie Kechego (CTL) and Lorie Stolarchuk (OOL))
 - OHREA and CTL also collaborating at UWindsor
- Supporting two projects developing open resources to support learning about LGBTQS+ in healthcare, and a new course on Empowering Bystanders Against Anti-Black Racism
- Support the rollout of *Equatio*, *Read&Write* accessibility tools:
- Consult with faculty, OHREA and SAS on UDL and accessible course design, support for learners with diverse abilities, especially during the transition to online learning
- Collaborate with OHREA, CTL, SAS, ITS, PAC, and others on institutional infrastructure to support AODA compliance, e.g. video captioning, accessible documents, web accessibility, training
- Participated in University-wide committees addressing equity, accessibility, inclusivity, and diversity
 including the Accessible Information and Communications Committee (AICC), WUFA Racial Justice
 Committee, UWindsor Pride Committee, Employment Equity Coordinating Committee (EECC), Training
 and Education Subcommittee
 - Collaborated with OHREA and Student Services to deploy Equatio and Read&Write and provide training; 8 workshops offered.
 - Leading procurement, implementation, and support of Panorama (with ITS, CTL) LMS accessibility support tool
 - Identifies accessibility issues with content in course sites within Blackboard
 - Provides automatic generation of accessible alternative files where appropriate
- Offered professional development workshops on accessible document creation, accessible teaching, Universal Design for Learning, accessible online education, including invited workshops in the Accessibility Awareness Days
- Developed resources for captioning, including videos and workshops

f. Indigenisation and decolonisation

- Ongoing commitment to TRC Calls to Action number 62 by supporting:
 - Gikinoo'amaadiwag (They teach each other) Cross-Cultural Instructional Skills Workshop (GCCISW) (funded in 2020 through CTL with Lorie Stolarchuk as project lead and team member; Ashlyne O'Neil as project team member)
- Successful eCampus Ontario Virtual Learning Strategy (VLS) project (Universal Design for Learning (UDL) for Inclusion, Diversity, Equity, and Accessibility (IDEA) noted above) includes an Indigenous Pedagogies module co-authored by OOL and CTL staff including extensive video production and oral storytelling
- Supporting VLS project Digital Storytelling of Indigenous Business Topics in Canada
 - Led by Russell Evans, Indigenous Scholar in Odette School of Business
 - Will create up to 15 openly licenced video vignettes with Indigenous entrepreneurs and business owners telling their stories through an Indigenous lens
- Supported and sponsored two Faculty of Law Indigenous scholars workshops: 1. Agnutmaqan (Stories) from Mi'kma'ki: A Conversation with Mi'kmaq Water and Land Protectors, Dorene Bernard and Tara Lewis and 2. Agnutmaqan (Stories) from Mi'kma'ki: A Conversation with Mi'kmaq Water and Land Protectors, Dorene Bernard and Tara Lewis and 2. Black-Indigenous Solidarity Panel
- Application for institutional admission to <u>LocalContexts</u> Traditional Knowledge Labels project, which provides Indigenous communities with tools to manage their intellectual and cultural property
- Provided extensive support for Faculty of Law's transition of the required Indigenous Legal Orders course to online and hy-flex modes

- Strong commitment by OOL staff to actively participate in learning opportunities including workshops, sessions, and open courses on Indigenisation and decolonisation, including the Resisting Pedagogies Community of Practice
- Pilot project testing the capabilities of the Mukurtu open Indigenous content management system for potential use in Indigenous knowledge projects

g. Digital Literacy

- Critical digital literacy is a theme that runs through all of OOL's programming, including workshops, courses, design sprints, and funded projects. Some examples from the reporting period include:
- Domain of One's Own (DoOO)
 - A <u>Domain of One's Own (DoOO)</u> is an approach to providing students, faculty and staff with the opportunity to own their own web domain, developing their digital presence and making possible a wide range of liberating practices that allow learners to explore digital ecosystems and their own digital presence. These spaces are productive, creative, and often focus on creation and sharing of knowledge in the digital age
 - This system would support students to develop authentic critical digital literacies and provide a space for them to own and develop their digital identities that will be critical differentiators for them as they leave the institution and enter the job market
 - Piloted a small Domain of One's Own (DoOO) project with OOL co-op students to inform a request for eCampus Ontario resources for a provincial DoOO system
- ePortfolios: provide access to and support for WordPress ePortfolios where students can creatively develop their own digital portfolio to represent their learning journey and in the professional programs, such as nursing and education, progress towards competence in their discipline.
 - There are currently 5,583 WordPress ePortfolio sites in the system, with a total of 6,214 users
- All of OOL's student partners (201 students) have been working remotely during the reporting period and have been learning and practicing critical digital communication, teamwork, digital research, and production skills

h. Committees and policy development

- OOL strongly represented on campus committees with staff sitting on 34 committees
- Consulted on institutional policies and guidelines, such as the Policy on Timing of Assessments for Asynchronous Online Courses (APC Subcommittee), LMS Archive and Retention Policies, LMS access policy, the Digital Learning Resources Policy, and temporary policy adjustments during the COVID pandemic
- Drafted working definitions of course delivery modes

2. Pursue strengths in research and graduate education:

- a. Scholarship of open, online teaching and learning:
 - Develop a new conference focused on online, open, and technology-enhanced teaching and learning issues: OOL planned to host a *Digital Futures in Education* conference (supported by SSHRC) in 2020 but this was forced to be postponed due to COVID restrictions and resource prioritisation. The event will be rescheduled for Fall 2022.
 - Continue to enhance the University of Windsor and OOL's profiles as provincial, national, and global leaders in the Scholarship of Online and Open Teaching and Learning (SoOOTL):
 - OOL supports the scholarship of online and open teaching and learning, encouraging and collaborating with faculty and students involved in our projects to co-present or co-publish on their SoTL work
 - Contributed to UWindsor reputation by presenting scholarly work at 13 local, national and international conferences, 12 invited presentations/keynotes, 5 peer-reviewed publications, over 40 open publications,
 - Members of 18 external committees and boards, and collaborators or leads on 25 grants related to teaching and learning.

- OOL staff are regularly called upon to consult with organisations provincially, nationally, and internationally in our areas of expertise. Some of these consultations in the reporting period have included, the Ontario Council of Universities, Ontario Council of Academic Vice-Presidents, the Ministry of Colleges and Universities, eCampus Ontario, the OECD Centre for Educational Research, the Canadian National Research and Education Network, SSHRC, the Ontario Ministry of Education, the Canadian National Centre for Supplemental Instruction, as well as a wide range of universities and colleges in Canada and abroad, and school boards.
- Developed multiple eBooks and other open resources outlined elsewhere in this report that support scholarly and critical approaches to technology-enabled pedagogy and course design
- Created Digital Design Team Drop-ins facilitated faculty drop-in sessions to discuss various issues in the design of technology-supported teaching
- Developed an online Instructional Skills Workshop, in collaboration with the CTL

3. Recruit and retain the best faculty and staff:

a. Grant funding

- External grants: Collaborated with faculty to develop and submit 52 applications to the eCampus Ontario Virtual Learning Strategy funding, with 19 ultimately being successful for a total of \$1.447m
 - OOL provides end to end support for faculty wishing to apply or develop ideas for provincial and other grant schemes related to online, open or technology-enabled practice
- OOL internal grants (OER ACE Grants) were reintroduced in 2019 and expanded in 2020. Six OER ACE grants worth a total of \$41,800 were awarded for projects in human kinetics, environmental science, medical biotechnology, microbiology, physics, and education to support adoption and creation of open educational resources (OERs), new online courses, simulations, and virtual labs
- Ministry of Colleges and Universities Training Equipment Renewal Fund (TERF) applied for an ommibus
 project costing approximately \$1.1m to redevelop multiple learning spaces into active and collaborative
 classrooms, and to upgrade some hy-flex classrooms to include audience microphones and a confidence
 monitor to help facilitate active engagement across the digital and physical spaces
- Applied to the Ontario Microcredentials Challenge Fund; projects were not successful in receiving funding, but one continued anyway and the other is preparing for future rounds
- OOL staff were invited to collaborate on one successful SSHRC Connections Grant (Teaching Culturally and Linguistically Diverse International Students in Open and Online Learning Environments: A Research Symposium), one New Frontiers in Research Fund (NFRF) grant (Personalized learning system through psychophysiological sensing and adaptation), and one CIHR Operating Grant (Addressing the Wider Health Impacts of COVID-19)

b. Certificate in Online and Open Learning (COOL)

- Intake for the COOL was temporarily suspended at the start of the COVID pandemic and replaced with a comprehensive suite of learning and development opportunities at scale to support the just-in-time learning needed to help faculty move beyond emergency remote teaching in preparation for a robust online experience for learners in the F2020 term
- COOL will be revised in light of the experiences and learning during the pandemic

c. Develop capacity in online, open, hybrid, and technology-rich teaching and learning

- Expand core programming to support the evolution of teaching and learning from emergency remote to more engaging and well-developed learning environments
 - Developed a completely new suite of workshops, sprint sessions, and supporting resources to encourage faculty to explore and evolve their pedagogies
 - 6-week course Exploring the Edges of Online Teaching and Learning completed by 20 faculty
 - Advanced courses and workshops in online pedagogies, following on from the introductory series earlier in the year (which were also repeated), had 75 registrations
- Champion contemporary, evidence-based learning space designs that enhance flexibility and support
 multiple pedagogical approaches, provide reliable access to educational technology, and help to
 facilitate active and technology-enabled learning

- OOL collaborated with ITS and CTL to design 19 new hy-flex classrooms and portable units (15 will be available) to facilitate the hybrid-flexible (hy-flex) teaching model
- Classrooms and mobile carts designed to be flexible, powerful, and platform agnostic so they are
 upgradeable, changeable, and facilitate instructors using the web-conferencing tool of their choice;
 the pandemic shift has required planning for technology that supports maximum flexibility in
 teaching spaces, including hybrid teaching for an eventual phased return to campus
- Also designed and facilitated training and support models for faculty and TAs teaching in hy-flex mode
- Ontario Government Teaching Equipment Renewal Fund (TERF) application will address critical shortage of learning spaces designed to support active and collaborative learning, and provide both upgrades to existing hy-flex rooms based on stakeholder feedback, and develop a prototype small hy-flex classroom
- Learning space design should involve all stakeholders, including instructors and students
- The Online Teaching Community of Practice met 9 times in the reporting period (225 formal registrants, but as an open community, attendees did not all register; most came to more than one session)
- Drafted <u>working definitions of course delivery modes</u>, which were shared openly with the broader academic community and used as the basis for a number of other institutions' definitions

d. Increase staffing capacity to support campus needs for OOL services in key skill areas

- Three limited-term AAS positions were hired in 2020-21 to support development of the Supplemental Instruction/PALS program, online program development, new technologies roll out and support, and other strategic digital projects; a PT media support role was also hired. All of these hires provided significant support in the rapid transition to online learning
- Additional staff were approved to be hired on a limited term basis to support the campus during COVID, but these resulted in failed searches in the current tight labour market for online learning professionals

4. Engage and build the Windsor and Essex County community through partnerships:

a. Microcredentials

- Microcredentials represent a potential means of engaging the community and alumni in lifelong learning and relationship building with the institution beyond traditional degree programming
- Cross-campus Microcredentials Working Group, chaired by the OOL Director, struck to explore
 opportunities for microcredential programming at UWindsor, a definition, and develop a draft
 framework
- The Ontario Government reviewed existing short programs at UWindsor and approved over 120 as eligible for OSAP support
- OOL staff sit on multiple provincial microcredential working groups, including COU, OCAV, eCampus
 Ontario, and HEQCO, as well as consulting with international groups including BCDiploma
 (microcredential issuing company based in France), UNESCO, and Microcredentials Sans Frontieres
- OOL staff invited to co-author a provincial Microcredential Toolkit with eCampus Ontario
- Submitted an application to the MCU Microcredentials Challenge Fund (unsuccessful) and working with several departments and groups on campus to develop potential microcredentials
- Delivered an invited session at the eCampus Ontario Microcredentials Forum

b. Sharing resources and knowledge

- New websites (uwinopenlearn.ca and studentshelpingstudents.ca) were created to enable cataloguing
 and sharing of open resources for both instructors and students to support them in online, open and
 hybrid learning and teaching, and to showcase projects, and open educational resources to the broader
 community
- Supporting student-led development of OERs that can be shared with the local community and beyond, including resources built for teachers to inform practice in educational technology (in partnership with Education)
- All OOL online workshops and events were open to the community, as are the resources we create

5. Promote international engagement:

- a. International Teaching Online Symposium
- Co-chair and support the successful SSHRC-funded <u>International Teaching Online Symposium</u>, led by Dr.
 Clayton Smith from the Faculty of Education
 - Over 600 registrants from over 40 countries participated online June 17th-18th, 2021
 - Included opportunities for research sharing, professional development, and research collaboration by focusing on the needs of graduate students, faculty teaching international students, and those with an interest in the mainstreaming of online or open education.

b. Continue institutional membership in international organisations such as the Open Education Global Consortium

- UWindsor is an institutional member of the the Open Education Global (OEGlobal) Consortium and the International Consortium of Distance Educators (ICDE), memberships funded by the OOL
- OOL faculty and staff continue to be active in scholarship, often partnering with faculty and grad students to present their scholarship at local, national, and international conferences. The majority of conferences in the reporting period were cancelled or moved online, but the team presented at 8 conferences during the reporting period, as well as numerous invited presentations and workshops for local, provincial, national and international audiences
- OOL uses Twitter to communicate with and engage a professional audience of scholars and those
 interested in our work; OOL's Twitter presence for 2020-21: 51,871 impressions, average 4,323/mth,
 1,010 followers; OOL staff are also actively engaged in their own personal learning networks on this
 platform

B. Future Actions/Initiatives:

- **1. COVID Pandemic and Transition Support:** Support instructors, students, and administrators in planning which aspects of teaching and learning to revive, revise, and revolutionise as restrictions are lifted
 - Continue to support design and development of online, hybrid, and hy-flex learning environments at scale
 - Provide pedagogical support and training for instructors teaching hy-flex classes
 - Lead implementation of additional core educational technologies (YuJa and BetterExaminations), in collaboration with CTL, ITS and other stakeholders, to enhance teaching and learning
 - Support campus planning for effective, responsible, and safe return to campus

2. Funding for curricular innovation and exploration:

- Support campus partners to successfully apply for and complete externally funded (e.g. eCampus Ontario, Ministry of Colleges and Universities) teaching and learning focused grant projects
- Provide small internal grants to support open, online, and technology-enabled teaching

3. LMS Renewal:

- Provide leadership, in collaboration with ITS and CTL, to review the current LMS
- Provide leadership in development and implementation of a process to facilitate renewal of this critical system

4. Champion Open Practices:

- Champion and model Open Educational Practices (OEPs) in all aspects of our work
- Support open publishing e.g. open textbooks and other open educational resources (OERs)
- Curate and enhance visibility of existing UWindsor-created OERs
- Support and practice open scholarship

4. Students as Partners:

- Enhance opportunities for engaging student partners in all areas of our core work
- Continue to expand and refine Peer Assisted Learning Sessions (PALS)

5. Support digitally-enabled teaching and learning:

Evolve core programming to support digitally-enabled teaching and learning

Champion contemporary, evidence-based learning space designs that enhance flexibility and support
multiple pedagogical approaches, provide reliable access to educational technology, and help to facilitate
active, collaborative, and technology-enhanced learning

6. Educational technologies support and exploration:

- Promote and support ethical and critical use of educational technologies that respect privacy, safety, accessibility, and sound, evidence-informed pedagogies
- Monitor, review, explore and pilot technologies that address current, emerging, and future pedagogical needs
- Support and enhance existing educational technologies including Blackboard Collaborate, WordPress ePortfolios, Pressbooks open publishing system, H5P interactive learning tools, Blackboard Learn and others

7. Microcredentials:

- Engage Microcredentials Working Group and stakeholders to develop definition and framework for microcredentials at UWindsor
- Work with other units on campus to explore opportunities for offering new microcredentials
- Engage with provincial, national, and international groups in developing understanding of microcredentials

8. Equitable, Accessible, and Inclusive teaching and learning:

- Consult with and support instructors to develop equitable, accessible and inclusive learning designs
- Implement and support technology to facilitate accessible teaching practice
- Advocate for curricular approaches that improve access to education for all learners, regardless of their personal circumstances

9. Indigenisation:

- Model commitment to Indigenisation and responding to the TRC Calls to Action in our practice
- Continue to explore and support meaningful engagement in Indigenization and decolonization of curricula, teaching practices, spaces, and technologies

10. Scholarship of open and online teaching and learning:

Promote and support scholarly approaches to online and technology-enabled teaching and learning

11. Post-pandemic future of education:

- Assist campus stakeholders in envisioning, exploring, and planning for post-pandemic opportunities for evolving teaching and learning
- Contribute to the development of UWindsor's new strategic plan
- Develop a Future Challenges Institute exploring futures of higher education

C. Recommendations for Senate consideration

- 1. Critically examine outcomes of policy adjustments made during the COVID pandemic to identify any that may be adapted or adopted permanently.
- 2. Recommend APC develop an officially recognized, transparent set of definitions of course and program delivery modes, (e.g. on-campus, online asynchronous, online synchronous, hybrid, hy-flex, intensive, remote, lab-based, field-based) and pedagogical approaches (e.g. active learning, collaborative learning, flipped classroom, competency-based, problem-based, experiential learning, open, zero or low cost resources) that aligns with provincial and national reporting requirements. Course approval workflows should be designed to collect this information reliably and accurately so all stakeholders have high quality data on which to base decisions.
- 3. Support a process to define and recognize microcredentials as part of the institutional credential ecosystem, including appropriate approval and quality assurance processes.

5.3.1: Revisions to Bylaws 54 and 55 – Voluntary Withdrawal Deadline

Item for: Approval

Forwarded by: Senate Governance Committee and Academic Policy Committee

MOTION: That the proposed revisions to Bylaws 54 and 55 be approved.

Proposed Revisions

[revisions are in bold and strikethrough]

Bylaw 54:

- 2.6 For first-entry undergraduate programs, instructors must provide meaningful feedback to students on their incourse performance, constituting a minimum 20% of the final grade within the time periods given in 2.15 below. at least two (2) days prior to the voluntary withdrawal deadline. (see 2.15 below) Exemptions may be approved by the Dean of the Faculty offering the course, in which case the instructor shall provide a statement in the course syllabus explaining why the specific course is excluded.
- 2.15 For first-entry undergraduate programs, students may must withdraw from a course or courses up to the last day of classes for the term. within the withdrawal periods as indicated below. The withdrawal will be entered on the student's transcript as VW (Voluntary Withdrawal), which is defined as "Withdrawal in good standing. No academic credit".

In the second-entry Education and Law undergraduate programs, students must may withdraw from a course or courses within the withdrawal periods as indicated time periods given below.

Twelve-week course - within nine weeks of the beginning of term. (Not including Reading Week)

Eighteen-week course - within three weeks of the beginning of the second term.

Twenty-four-week course - within four weeks of the beginning of the second term.

Three-week course - within two weeks of the beginning of **the** session.

Six-week course - within four weeks of the beginning of **the** session.

Eight-week course - within five weeks of the beginning of **the** session.

For all other course lengths – within the first two-thirds into the beginning of the session.

The withdrawal will be recorded as a dropped course in the student's record but will not appear on the transcript.

Students are not permitted to withdraw from a course or courses after the appropriate designated withdrawal period. After the voluntary withdrawal period for a course, students remain registered and will be assigned grades as appropriate.

The student who wishes to drop a course or courses after the relevant withdrawal period based on medical or compassionate grounds shall follow the procedure outlined below (paragraph 2.18.2). An interview may be required.

The status of a student who withdraws from full-time studies is left to the decision of the Faculty and will be reported to the student through the Office of the Registrar.

Bylaw 55:

- 1.5 Instructors must provide meaningful feedback to students on their in-course performance, constituting a minimum 20% of the final grade, within the time periods given in 1.10 below at least two (2) days prior to the voluntary withdrawal deadline two-thirds into the term (see 1.10 below), with the exception of thesis, major paper, dissertation, internship, and practicum courses. Further exemptions may be approved by the Dean of Graduate Studies, upon recommendation from the AAU Head, in which case the instructor shall provide a statement in the course syllabus explaining why the specific course is excluded.
- 1.10 With the exception of graduate programs in the Faculty of Law, students may must withdraw from a course or courses up to the last day of classes for the term. within the withdrawal periods as indicated below. The withdrawal will be entered on the student's transcript as VW (Voluntary Withdrawal), which is defined as "Withdrawal in good standing. No academic credit".

In the Faculty of Law, students must may withdraw from a course or courses within the withdrawal periods as indicated time periods given below.

Twelve-week course - within nine weeks of the beginning of term. (Not including Reading Week)

Eighteen-week course - within three weeks of the beginning of the second term.

Twenty-four-week course - within four weeks of the beginning of the second term.

Three-week course - within two weeks of the beginning of **the** session.

Six-week course - within four weeks of the beginning of **the** session.

Eight-week course - within five weeks of the beginning of **the** session.

For all other course lengths – within the first two-thirds into the beginning of the session.

The withdrawal will be recorded as a dropped course in the student's record but will not appear on the transcript.

Students are not permitted to withdraw from a course or courses after the appropriate designated withdrawal period. After the voluntary withdrawal period for a course, students remain registered and will be assigned grades as appropriate.

A student who wishes to drop a course or courses after the relevant withdrawal period based on medical or compassionate grounds shall follow the procedure outlined below. (paragraph 1.11)

The status of a student who withdraws from full-time studies is left to the decision of the Dean of Graduate Studies and will be reported to the student through the Office of the Registrar.

Rationale:

- The proposal would allow students in first-entry undergraduate programs and all graduate programs except Law be permitted to voluntarily withdraw from courses up to the last day of classes for the term.
- Maintaining VW until the last day of classes alleviates stress and anxiety for students deciding whether to drop a course. This comes at no financial cost to the institution, and it does not impact the instruction of the course as has been seen over the past two years when this policy has been in place during the pandemic.
- In arriving at this proposal, the key considerations listed below were reviewed.

 The proposal has been reviewed by Deans Council, Finance, Institutional Analysis, the Registrar's Office, Student Awards and Financial Aid, the Academic Policy Committee, the SGC Bylaw Review Committee, and the Senate Governance Committee.

Key Considerations

1. Retaining VW on transcript

- The Deans Council has asked for the VW to be removed from the transcript, so the student doesn't need to explain this moving forward.
- The Registrar has explored the ability to use a "Drop/Retain" function in PeopleSoft so that while the VW will not be visible on the transcript, the retained record does show a record of enrolment which may be important for other issues such as study permit renewal. It is possible to retain a record of dropped classes while excluding the course from the transcript. Students and Staff will be able to see which courses have been dropped. The dates in which a course has been dropped is also recorded.
- Other institutions such as University of Guelph and University of Ottawa allow students to drop courses without notation on the transcript, while retaining the class drop record

2. Impact on Scholarships and Financial Aid

- A VW equates to a non-pass and would therefore impact a student's academic progress monitoring if a student doesn't have passing grades in a minimum of 60% of a full course load (40% for students with permanent disabilities)
- For OSAP purposes, 50% is a pass but for academic purposes, if a student elects to take a VW, it becomes a non-pass and could impact current and future eligibility
 - o If a student takes a VW past the end of term there is no impact on weeks of eligibility, but a possible impact to academic progress monitoring (see above re: 60%)
 - If a student takes a VW prior to the financial drop date or at any point within the term prior the end of study date, both weeks of eligibility and academic progress monitoring will be impacted depending on the remaining number of passed courses (can appeal being placed on OSAP probation or restriction if reasons for VW were extenuating)
- For renewable scholarship purposes, students would need to maintain the average in 60% of enrolled courses.
- While this remains to be confirmed, retaining a dropped course while removing the VW from the transcript will likely have the same OSAP and scholarship implications as noted above.

3. Study Permit

- Potential impact to PGWP as students must register full-time every semester excluding scheduled breaks. "If your leave, even authorized, exceeds 150 days, you may no longer be eligible for a PGWP".
 - o Student must resume studies within 150 days
- International students must comply with the condition of their study permit, one being that they need to show continuous progress towards their degree by registering either at a part- time or full-time course load. A gap in progress may affect their eligibility to renew their study permit.
- Students will be able to view and show course drops through Student self-service.

4. Impact on Government Reporting

- No impact to claim if the drop occurs after claim date and record retained.

5. Impact on Institutional Analysis Reporting

- Minimal impact - Initial discussions indicate that the record would need to be retained and have an effective date, which will be the case.

6. Impact on Student Finance (tuition)

- Given that the drop record will be retained, and there is a screen to be able to see dropped and registered courses, there should be no impact (subject to testing).

5.8: **Report of the Provost**

Item for: Information

Forwarded by: Patti Weir

1. SET Score Task Force

Information session held Friday, May 6, 2022.

2. International *Think tank*

Held March 23, 2022 and attended by 36 representatives of academic Faculties, student organizations, areas that facilitate international students and internationalization, staff, WUFA, senior administration, and international students.

Participants engaged in large group discussion, brainstorming activities on the pillars of the framework, and the mission and values associated with internationalization activities. Then SOAR (Strengths, Opportunities, Aspirations, and Results) approach was used to engage participants in a conversation to gather the information necessary to inform the development of the key components of the Framework.

The Internationalization Framework Think tank report has been produced and distributed back to participants for feedback prior to posting for feedback from the broader campus community.

Special thanks to Marcela Ciampa for facilitating this event and to the participants for their thoughtful insights.

3. LMS Review and Procurement

A preferred vendor was identified this week.

The process was based on a consultative process, with over 30 members in the <u>LMS Review committees</u> including specific Advisory Committees addressing Accessibility, EDDI, Security, with representation from faculty, students and staff.

Thanks to the extensive <u>campus community contributions</u> to the selection process including approximately 3000 contacts through: campus surveys; feedback following vendor presentations; testing out the vendors through Sandboxes; focus groups; and committee membership.

The next steps include final approval and procurement. The vendor will be confirmed through a public announcement as soon as we are legally allowed following contract negotiations.

Details are updated online at <u>LMS Review</u>. Additional details will be shared as we begin the implementation process.

4. Head Start

Lead by the Office of Student Experience in partnership with academic Faculties and student support offices, a total of six Head Start events will be held; five in-person and one virtual day. Changes for this year include greater involvement of student societies, engagement with the BIDE Institute, and full integration of sessions for General & Mature, Transfer, and Part-time students through the assistance and support of Academic Advising to make a truly inclusive event.

Friday, July 8th, 2022 – Science & Education Day Saturday, July 9th, 2022 – FAHSS & Education Day Friday, July 15th, 2022 – Nursing, HK & Business Day Friday, July 22nd, 2022 – Engineering Day Saturday, August 6th, 2022 – General & Mature, Transfer, Part Time Day Friday, August 13th, 2022 – online

5.8.:	1: O	ptional	Inclusion	on of Stu	ıdent Eva	aluations o	f Teaching	; in RTF	ond Per	formance	Review I	Processes
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Item for: Approval

Forwarded by: **Provost**

MOTION: That faculty members be allowed to choose whether to include SET scores in RTP and performance review processes, until the submission of the final report and recommendations of the SET Task Force to Senate.

Rationale:

- The SET Task Force is conducting an extensive review the Student Evaluations of Teaching and, as reported at the Senate Information Session, acknowledges that there are a number of concerns that need to be addressed. It is anticipated that a final report and recommendations will be submitted to Senate, through the Academic Policy Committee, by the end of the 2022-2023 academic year.
- While the SET Task Force completes its work, it would seem reasonable to extend the practice of allowing faculty members to choose whether to include SET scores in renewal, tenure, and promotion (RTP) and performance review processes, which was in place under the COVID-19 Emergency Academic Plan.

5.8.2: Enrolment Management Update

Item for: **Information**

Forwarded by: Chris Busch, AVP Enrolment Management

A. F22 enrolment update

	Applica	ants*	Adr	nits	Confirmations	
Category (new entrants)	F22	F21	F22	F21	F22	F21
Domestic - UG						
Tri-County Region	2,877	2,798	2,249	2,085	789	771
GTA	2,546	2,399	1,843	1,574	62	63
Ontario (Other)	2,160	2,198	1,560	1,434	114	119
Outside Ontario	497	571	219	218	29	35
Total - Domestic UG	8,080	7,966	5,871	5,311	994	988
Total - International UG	2,396	1,525	1,096	787	194	140
Graduate, Domestic	1,370	1,374	424	463	344	392
Graduate, International	5,974	6,020	2,888	2,781	2,180	2,168

B. Plan Your Program (first-year first term registration)

A vital conversion tactic to support our incoming undergraduate students is standing up comprehensive resources and services to help first-year first term (FYFT) course registration and guide new Lancers towards summer programming that will lead to their success.

Thanks to the tremendous support of our campus partners, we have stood up a refreshed <u>Plan Your</u>

<u>Program</u> website and are hosting a targeted series of on-demand content and live services titled <u>New Student</u>

<u>Registrations Days</u> from May 19 through June 1st.

This initiative helps in-coming student students understand:

- How to complete their course registration with confidence before the 101 Confirmation Deadline of June 1st
- · How to access help in person or live online, and
- How to access on-demand resources such as the updated registration guide, relevant KBAs on ask.uwindsor.ca and registration links to summer transition programs
- Encourages them to sign up for summer orientation programs such as *Head Start*, FAHSS's *Transform First Year*, Science's *PASS* program, and the *UWindsor Prep Program*.

A marketing campaign will drive admitted UG students to begin planning their academic journey and preparing to register for courses when the shopping cart opens on May 19th.

C. Fam Tour

The University of Windsor and St. Clair College have partnered to host an International Agent Familiarization Tour (FAM Tour) on May 9-12, 2022. A FAM Tour provides an opportunity to showcase our institution and region to the external organizations, commonly referred to as agents, who help promote the institution to prospective Lancers. This event provides agents with a chance to get a real sense of the university, meet the people who support their work, and build personal relationships, trust, and brand loyalty. Also, it enables them to promote the institution better by saying, "I've been there."

Agents will tour our teaching and research facilities, the City of Windsor, and meet with representatives from both institutions. Our goal is to provide a first-hand experience of UWindsor and highlight the many opportunities that UWindsor offers international students. We have about 60+ agents confirmed.

D. Convocation

During the construction of the Toldo Lancer Centre, the 117th University of Windsor Convocation ceremonies will be held at the Windsor Family Credit Union (WFCU) Centre. Planning is well underway as we are preparing to confer roughly 4,000 graduands, with an additional 1,200 previous graduands from the Classes of 2020 and 2021 also in attendance.

Staff are working feverishly under very tight timelines to ensure all students eligible to graduate are approved by May 25th, so their names may be included in the Convocation Guide. We encourage all faculty members to have grades submitted as soon as possible to assist in this endeavour. In addition, recruitment for volunteers to help at convocation will begin shortly.

As final plans are solidified, further communications will be sent to graduands and the University Community.

To learn more, please visit https://convocation.uwindsor.ca.

E. Early Leavers

We are interested in gaining a better understanding of retention, especially year 1 to year two attrition.

To help, we have engaged a third-party research firm to conduct a demographic profile analysis of full-time students who did not re-enroll over the last three years and survey "early leavers" to measure and track the decision-making process of students who decided to discontinue their studies and follow-up with students who participated in the survey to dig deeper into the responses and themes from the survey results.

We expect the research to be completed by late Spring/early Summer.

5.9: Report of the Vice-President, Equity, Diversity, and Inclusion

Item for: Information

Forwarded by: Clinton Beckford

- Application for the University Diversity, Indigeneity, and anti-Racism Professional Development Fund for the June competition is now open. The deadline for applications is May 15, 2022. Disbursement of awards will be made on June 15, 2022. Application form is available at vp-equity-diversity-inclusion/files/pd_funds_application_2022.pdf
- 2. Ms. Marcela Ciampa, Director Organizational Development and Training will be moving to the Office of the Vice-President, Equity, Diversity, and Inclusion as of May 16, 2022. This move is part of a larger strategy that centres equity and inclusion in the structures and systems of the University.
- 3. Ms. Daniella Beaulieu is moving to the Office of the Vice-President EDI on May 16, 2022, when she exits the role of Acting Vice-President of Human Resources. Daniella will have broad oversight over EDI strategic initiatives and external facing engagement. Daniella brings exceptional talent and expertise to the EDI portfolio as we build capacity in our office and execute on the institution's agenda.
- 4. The Office of the Vice-President, Equity, Diversity, and Inclusion joins our Asian community and our Jewish community in their celebrations of Asian Heritage Month and Jewish Heritage Month in May. Events commemorating both will be announced through the VP, EDI website and the University Daily News.
- 5. On Friday April 29, 2022, we hosted Dr. Annette Henry in our Distinguished Speaker Series. The topic was "Where there is no vision...: A discussion of anti-Black racism initiatives in the university". The recording of the presentation will be available soon. This was the last event for the 2021/22 school year. The series will return in Fall 2022.
- 6. Interviews and consultations for the EDID review will begin soon. Information on this process will be made available to the Senate and campus community as soon as possible.
- 7. The Implementation Oversight Committee (IOC) for the Anti-Black Racism Taskforce recommendations has begun its work. The IOC's role is to ensure accountability for the implementation of the ABR Task force recommendations of the task force and that the University honours its obligations as a signatory to the Scarborough Charter on Anti-Black Racism and Black Inclusion in Canadian Post-secondary Education.

5.10: Report of the Vice-President, Research and Innovation

Item for: Information

Forwarded by: Michael Siu

- 1. NSERC released results of its last round of competitions on April 7, 2022. For the University of Windsor, there were 33 new Discovery Grant (DG) awards totaling \$3,563K over five years; this sum also included six Discovery Launch Supplements to Early Career Researchers, as well as one Northern Research Supplement. Our DG success rate for 2022 stands at 61%, which compares well with our six-year average of 54% and the three-year average for medium-sized universities at 60%.
- 2. NSERC DG is intended as a grant-in-aid to support the applicant's research program (not for specific projects), despite the fact that the awarded amount is typically modest. By contrast, the NSERC Research Tools and Instruments (RTI) grants are designed to support specific pieces of tools needed for research; university support augmenting NSERC's maximum RTI funding (capped at \$150K) is typically considered advantageous for a given application when there is an established need for the requested instrument. There were five successful RTI applications for the University of Windsor announced in April, amounting to \$569K.
- 3. The following is a summary of the University of Windsor's SSHRC awards in 2021-22: Connection Grants, four for \$149K; Partnership Grant, one for \$2,489K; Partnership Engage Grants, three for \$71K; Insight Grants, two for \$192K; and Aid to Scholarly Journals grants, two for \$160K.
- 4. Dr. Matthew Krause, Associate Professor of Kinesiology, has accepted the appointment as Chair of the Research Safety Committee (RSC), effective July 1, 2022. Matt brings to the position significant experience in research safety. We thank Dr. Ken Drouillard, the outgoing RSC Chair for his outstanding leadership in and untiring dedication towards safeguarding the health and safety of the University community throughout the pandemic.