**University of Waterloo**  
**SENATE**  
**Notice of Meeting**

**Date:** Monday 16 June 2014  
**Time:** 3:30 p.m.  
**Place:** Needles Hall, Room 3001

**OPEN SESSION**

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<td>3:30</td>
<td><strong>Motion</strong>: To approve or receive for information by consent items 1-4 below.</td>
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<td></td>
<td>1. Minutes of the 20 May 2014 Meeting</td>
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<td>2. Reports from Committees and Councils</td>
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<td>a. Executive Committee</td>
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<td>b. Graduate &amp; Research Council</td>
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<td>c. Undergraduate Council</td>
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<td>3. Report of the President</td>
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<td>a. Recognition and Commendation</td>
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<td>4. Reports from the Faculties</td>
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<td>5. Early Issuance of Degree</td>
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**Regular Agenda**

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<tr>
<td>3:35</td>
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<td>4:00</td>
<td>9. Research Presentation: Professor Irene Goldthorpe, Electrical &amp; Computer Engineering and Nanotechnology</td>
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<td>10. Report of the President</td>
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<td>11. Q&amp;A Period with the President</td>
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<td>4:45</td>
<td>13. Report of the Vice-President, University Research</td>
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<td>5:05</td>
<td>15. New Degree Hoods</td>
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<td>5:15</td>
<td>16. Other Business</td>
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## CONFIDENTIAL SESSION

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<td>17. Minutes of the 20 May 2014 Meeting</td>
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<tr>
<td>5:25</td>
<td>18. Business Arising from the Minutes</td>
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<td>5:30</td>
<td>19. Report from the Nominating Committee for Honorary Degrees</td>
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<td>5:40</td>
<td>20. Other Business</td>
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*JLAtad*  
5 June 2014  
Logan Atkinson  
University Secretary & General Counsel
University of Waterloo
SENATE
Minutes of the Tuesday 20 May 2014 Meeting


Guests: Mario Coniglio, Donna Ellis, Steven Furino, Peggy Jarvie, Cathy Newell Kelly, Jennifer Kieffer, Carlos Mendes, Chris Read, Helen Réthoré, Marilyn Thomson, Dave Wallace

Secretariat & Office of General Counsel: Logan Atkinson, Tracy Dietrich


*regrets

Organization of Meeting: Feridun Hamdullahpur, chair of Senate, took the chair, and Logan Atkinson, secretary of Senate, acted as secretary. Atkinson advised that due notice of the meeting had been given, a quorum was present, and the meeting was properly constituted.

OPEN SESSION

Consent Agenda
Senate heard a motion to approve or receive for information by consent items 1-6 below.

1. MINUTES OF THE 21 APRIL 2014 MEETINGS
Senate approved the minutes of the meeting as distributed.

2. REPORTS FROM COMMITTEES AND COUNCILS
   Graduate & Research Council. Senate received the report for information.

   Honorary Degrees Committee [news release at senators’ places]. Senate received the new release for information.

   Undergraduate Council [all motions effective 1 September 2015]
   • Faculty Regulation, Faculty of Environment. Senate approved a new Faculty of Environment regulation concerning eligibility for a second Bachelor of Environmental Studies degree as presented in the report.

   • Faculty Regulation, Faculty of Engineering. Senate approved amendments to the Faculty of Engineering’s regulation regarding examinations and promotions as presented in the report.
• Faculty Regulation, Faculty of Environment. Senate approved amendments to the Faculty of Environment’s regulation regarding letters of permission as presented in the report.

The remaining item in the report was received for information.

3. REPORT OF THE PRESIDENT
Recognition and Commendation. Senate received the report for information.

4. REPORT FROM THE FACULTIES
Senate received the reports for information.

5. REPORT OF THE COU ACADEMIC COLLEAGUE
Senate received the report for information.

6. COMMITTEE/COUNCIL APPOINTMENTS [revised report at senators’ places]
Senate approved the following appointments:
• COU Academic Colleague/Colleague Alternate: Marios Ioannidis (chemical engineering) as COU Academic Colleague, replacing Dan Brown, term 1 July 2014 to 30 June 2016; John Garcia (public health & health systems) as COU Academic Colleague Alternate, replacing Marios Ioannidis, term 1 July 2014 to 30 June 2017.

• Faculty Policy Drafting Committee: Kelly Anthony (public health & health systems) and George Freeman (electrical & computer engineering).

• Graduate & Research Council: Samantha Shortall (pharmacy) as the science graduate student representative, replacing Maya D’Alessio, term to 30 April 2015.

Guild and Freeman. Carried.

Regular Agenda

7. BUSINESS ARISING FROM THE MINUTES
Exceptions to Policy 40, The Chair. Senate heard a motion to approve exceptions to Policy 40 as presented in the report.

McBoyle and Porreca.

McBoyle explained the rationale for the proposed policy exceptions, and indicated that there is no procedure for rotating the chair through the participating units and institutions. There was some discussion of eligibility for serving as chair, respecting tenure and rank.

The motion carried.

8. REPORTS FROM COMMITTEES AND COUNCILS
Executive Committee
• Roster of Graduands. Senate heard a motion to delegate approval of the roster to the Executive Committee for its 2 June 2014 meeting.

Freeman and Peers. Carried.
Graduate & Research Council
- Environmental Health Sciences Field, Master of Public Health, Public Health & Health Systems, Faculty of Applied Health Sciences. Senate heard a motion to approve the new Environmental Health Sciences field of the Master of Public Health program as presented in the report.

Horton and Garcia. Carried.

- Master of Architecture, Architecture, Faculty of Engineering. Senate heard a motion to approve changes to the Master of Architecture program as presented in the report.

Horton and Sullivan. Carried.

- English Language Proficiency Requirements, Graduate Studies Calendar. Senate heard a motion to approve amendments to the English language proficiency requirements as presented in the report.

Horton and Leat. Carried.

Long Range Planning Committee
- New Academic Department, Faculty of Environment. Senate heard a motion to approve the transformation of the Centre for Knowledge Integration into the Department of Knowledge Integration within the Faculty of Environment, effective 1 September 2014, as presented in the report.

McBoyle and Roy.

The centre currently has five faculty members and 125 students. There will be very little cost impact in this transformation.

The motion carried.

Undergraduate Council [all motions effective 1 September 2015]
- International Trade Minor, Political Science, Faculty of Arts. Senate heard a motion to approve a new minor in international trade as presented in the report.

Peers and Porreca. Carried.

- Bioinformatics Option, Bachelor of Mathematics, Computer Science, Faculty of Mathematics. Senate heard a motion to approve a new option in bioinformatics under the Bachelor of Mathematics plan as presented in the report.

Richter and Freeman. Carried.

- International Trade Specialization, Arts & Business, Dean of Arts, Faculty of Arts. Senate heard a motion to approve the inactivation of the International Trade Specialization.

Peers and Porreca. Carried.

- Honours Bioinformatics Option, Bachelor of Computer Science; Honours Bioinformatics and Honours Biology and Bioinformatics, Bachelor of Science, Computer Science, Faculty of Mathematics. Senate heard a motion to approve the inactivation of the Bachelor of Computer
Science (Honours Bioinformatics Option) plan, the Bachelor of Science (Honours Bioinformatics) plan and the Bachelor of Science (Honours Biology and Bioinformatics) plan, and the inactivation of bioinformatics as a first-year admission plan.

Richter and Freeman. Carried.

9. TEACHING PRESENTATION
Coniglio introduced Associate Dean Steve Furino, Faculty of Mathematics. Furino reported on his work in online mathematics education, and the experience of the Faculty of Mathematics in MOOCS, specifically in relation to the Master of Mathematics for Teachers offered by the faculty exclusively online. The program is growing impressively, with plans developing to assess learning outcomes and student engagement in particular. The faculty is moving toward offering additional online courses, including some key courses in core areas. The School of Computer Science is working to develop online offerings as well, especially in CS Circles, an online platform which helps users to learn the programming language Python.

In response to a question, Furino advised that there is as yet no measure of comparative success for students doing online study and those doing study through the conventional classroom, but plans are underway to compile those comparisons as the offerings mature.

10. REPORT OF THE PRESIDENT
Hamdullahpur offered a special welcome to new and returning senators. He then presented a broad report covering a number of items, including: a report on the upcoming provincial election and a summary as to the significance of the election for the university and for the sector more generally; federally, the Building Canada Fund is intended to help the sector in its infrastructure needs, to the extent of 1/3 of any project budget; a portion of the federal program will be dedicated to projects where the province is also a participant; communication and cooperation between the federal and provincial levels on these initiatives is unclear; U15 colleagues met with the Prime Minister on Wednesday 14 May 2014; Prime Minister expressed appreciation for the work of the U15 in research and development, but indicated that industry ought to be doing more; special mention was made of our university’s international relations, experiential learning and industry collaborations; the two ad hoc board committees and the reasons why these committees have been established were addressed, with emphasis on the fact that there are no decision making powers associated with these committees, they will perform advisory roles only, and provide as broad a perspective as possible on issues in support of the president; mini town hall meetings on aspects of the strategic plan have been successful, with the idea to get feedback on many of the issues being discussed with respect to the implementation plan; summary of recent trip to China, with emphasis on strategic relationships with Chinese institutions, for both research and other academic purposes, and a meeting with the Chinese Ministry of Education; summary of the partnership with the Université de Bordeaux and the current visit by a delegation from that institution; the recent Town and Gown Symposium, an opportunity to show the university’s commitment to the success of the local municipality.

Slides used in his presentation may be seen at https://uwaterloo.ca/secretariat-general-counsel/sites/ca.secretariat-general-counsel/files/uploads/files/president_140520.pdf

11. Q&A PERIOD WITH THE PRESIDENT
University of Saskatchewan issues were reviewed by Hamdullahpur in the context of this institution’s commitment to academic freedom. Hamdullahpur commented on expectations for publication of the Canada Excellence Fund qualification criteria, and on further discussion of the relationship with the Confucius Institute and the university’s attempt to fully understand the value proposition and the commitment to academic freedom and integrity. A committee has been struck to help identify the next vice-president, university relations, and the first meeting is pending; an announcement on an
interim appointee is expected within days. Burt asked about the possibility of having an
undergraduate student serve on the nominating committee, and Hamdullahpur advised that he would
take this under advisement.

12. REPORT OF THE VICE-PRESIDENT, ACADEMIC & PROVOST

Changes to Policy 59, Reduced Workload to Retirement. Senate heard a motion to approve
changes to Policy 59: (i) as presented in the report, and (ii) by deleting the last sentence of the first
paragraph in item 2 of the policy.

McBoyle and Porreca. Carried.

Note: Subsequent to the meeting, a housekeeping change has been made to Policy 59: change from
“Canada Customs and Revenue Agency” to “Canada Revenue Agency” (item 2, 1st bullet; item 3,
4th para.).

New Policy 30, Employment of Graduate Student Teaching Assistants. Senate received the new
policy for information.

Working Group on a Fall Term Break. Senate heard a motion to approve the establishment of a
working group on the issues and potential impact of a fall term break.

McBoyle and Porreca. Carried.

Undergraduate Admissions Update. Darling presented a summary of offers, confirmations and
acceptances to date, with some projections of final numbers based on experience over the past several
years.

There was some discussion about the relationship between numbers of offers extended, and the
relative percentage of scholarship offers.

Slides used in his presentation may be seen at https://uwaterloo.ca/secretariat-general-

13. REPORT OF THE VICE-PRESIDENT, UNIVERSITY RESEARCH

Dixon did not report.

14. OTHER BUSINESS

There was no other business.

Senate convened in Confidential Session.

Logan Atkinson
University Secretary & General Counsel

21 May 2014
FOR INFORMATION

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Lists of Candidates for Degrees, Diplomas and Certificates
At its 2 June 2014 meeting, the Executive Committee, on behalf of Senate, approved the lists of candidates for degrees, diplomas and certificates as recommended by the faculty councils and the associate provost, graduate studies, and authorized the chair, the registrar and the associate provost, graduate studies to add to or change the lists of candidates for degrees, diplomas and certificates as approved at the meeting of the Executive Committee on 2 June 2014.

Note: At its 20 May 2014 meeting, Senate delegated approval of the roster of graduands to the Executive Committee for its 2 June 2014 meeting.
Senate Graduate & Research Council met on 12 May 2014, and agreed to forward the following items to Senate for information. These items are recommended for inclusion in the consent agenda.

Further details are available at: https://uwaterloo.ca/secretariat/committees-and-councils/senate-graduate-research-council

FOR INFORMATION

RENEWAL OF CENTRES AND INSTITUTES

Interdisciplinary Centre on Climate Change
Under the current direction of Daniel Scott, the Interdisciplinary Centre on Climate Change has been active in carrying out its founding mission “…to advance research on climate change through an interdisciplinary approach; understanding the physical basis of climate change, its impacts on biophysical and human systems, and adaptation and mitigation strategies in response to changes” since its inception in 2008.

With 60 members coming from 14 departments and schools across all faculties at the university and externally, the centre has created the first university-based research centre on climate change in Ontario. The centre has carried out considerable outreach activity including lectures, seminars, speaking engagements and the Interdisciplinary Climate Change Workshop which attracts attention from faculty at prominent universities in Canada and worldwide. This combines with prolific research activity among members, innovative educational development which includes the Master of Climate Change program, and the formation of partnerships with government departments, agencies, non-governmental organizations, private sector partners, and the local community.

In recognition of the achievements and future plans of the centre, on behalf of Senate council approved its renewal for a five-year term ending May 2019.

Water Institute
First established in 2009 to increase the university’s profile as a centre of excellence in water research and teaching, the Water Institute has played an important role to coordinate, facilitate and promote communication toward its founding vision to become an internationally recognized centre of excellence in integrated water management.

Under the current direction of Robert Gillham, the institute has grown its complement of faculty members to 138 professors from 18 departments, representing all faculties at the university. In addition, the institute engages with hundreds of graduate students and postdoctoral fellows, as well as dozens of external partners. This considerable base has promoted the development of the institute’s research capacity beyond its strong starting position at inception, such that the institute has contributed directly to securing more than $18 million in research funding. This complements the collaborative activity and outreach of the institute that includes support of interdisciplinary workshops, proposal development with internal/external partners, organization of a major research symposium, seminars and distinguished lectures. The Water Institute developed the graduate-level Collaborative Water Program, with substantial support from the RBC Foundation and the participation of eight departments.

With a solid record and substantial foundation upon which to continue its leading role in water management, on behalf of Senate council approved the institute’s renewal for a five-year term ending May 2019.

Waterloo Research Institute in Insurance, Securities and Quantitative Finance
Under the direction of Thomas Coleman, the Waterloo Research Institute in Insurance, Securities and Quantitative Finance (WatRISQ) brings together specialists in actuarial science, computer science, econometrics, finance and...
statistics to promote excellence in the science and practice of risk management through its teaching, research and outreach activities.

WatRISQ supports a robust and high-profile research program with more than 40 faculty members drawn from three faculties, as well as approximately 150 graduate students associated with the institute. WatRISQ also maintains industry linkages through its corporate members and its program of industrial and institutional research support. Research and training activity includes involvement in various meetings and symposia, an active seminar series, dozens of visits from leading researchers, and playing a founding role in the Global Risk Institute. WatRISQ anticipates the launch of an online certificate program in quantitative risk management in the near future.

For the institute’s clear commitment to research, education activity and the formation of effective strategic partnerships nationally and internationally, on behalf of Senate council approved the institute’s renewal for a five-year term ending May 2019.

PROGRAM REVIEWS

Department of Sociology and Legal Studies – Programs in Sociology
On behalf of Senate, council reviewed the programs in sociology offered by the Department of Sociology and Legal Studies in accordance with the university’s Institutional Quality Assurance Framework.

Based on the material presented in the Final Assessment Report (Attachment 1), and the report of the reading subcommittee formed by council to review in depth the self-study and program materials, as well as to request additional information and provide recommendations, the programs were found to be of good quality.

University of Waterloo/Conrad Grebel University College – Master of Theological Studies
Council reviewed a report following up the two year report on the Master of Theological Studies program offered conjointly between the university and Conrad Grebel University College. Based on the material presented in the report which provided additional information requested by council, the report was accepted by council with direction to forward the report to Senate for information (Attachment 2).

CURRICULAR MODIFICATIONS
On behalf of Senate, council reviewed and approved new courses, course changes, and minor changes to admissions requirements for the Faculty of Arts (School of Accounting and Finance); Faculty of Engineering (architecture); and Faculty of Mathematics (computer science; pure mathematics).

SCHOLARSHIPS AND AWARDS
On behalf of Senate, council approved the creation of the Hira and Renu Ahuja International Graduate Scholarship, the Lalit Chugh and Hira Ahuja International Graduate Scholarship, and the Ping Yang Memorial Graduate Scholarship.

Sue Horton
Associate Provost, Graduate Studies

George Dixon
Vice President, University Research
Final Assessment Report
Sociology (BA, MA, PhD)
April 2014

Review Process

The review covers four undergraduate programs: the Bachelor of Arts (Honours, and Honours Co-op), and the three and four year general Bachelor’s programs in Sociology, and two graduate programs: the Master’s and the PhD in Sociology. The Department also took over the administration of the undergraduate programs in Legal Studies in 2009, and changed its name to the Department of Sociology and Legal Studies. Legal Studies will be reviewed separately in the near future, but in view of the close connections between the programs will be reviewed along with Sociology in future review cycles.

The self study was prepared by the Chair of the Department, with assistance from the Associate Chair for Undergraduate Studies in Sociology and the Associate Chair for Graduate Studies. The draft was discussed by the Undergraduate Committee, and circulated for review to the 19 faculty members (at the time) with primary teaching responsibility in Sociology (and to four retired faculty). The couple of faculty members in Legal Studies were not involved.

The external review was undertaken by Dr. Kelly Hannah-Moffatt, Professor, Vice-Dean Undergraduate at the University of Toronto at Mississauga, and Director of the Centre of Criminology and Sociolegal Studies and Dr. Rick Linden, Professor and Associate Dean, Research in the Faculty of Arts, University of Manitoba as well as Director of the Criminology Research Centre. The site visited occurred on October 7 and 8 2013. The internal reviewer was Dr. Monica Barra from the Department of Chemistry.

The previous undergraduate review of the undergraduate program (2006/7) resulted in four major recommendations. Two of these (regarding allowing non-Honours students to participate in co-op and to obtain specializations) are not within the Department’s jurisdiction and could not be implemented. One (regarding the online program) was implemented, and one (the provision of research funding for Honour’s essays) was already in place. Other recommendations (for curricular reform) were overtaken by events, namely the move of the Legal Studies program into the Department, which requires a more major curriculum review.

The previous graduate review (2007) made five recommendations:

- augment the core faculty (which at the time numbered only 13) (which has happened), and succession planning (still to be done);
- establish a fast track from the Master’s to the PhD (done);
- review the program fields (still to be done);
- improve the socialization of students to the program (done: students now are assigned interim advisors on entry into the program, and regular student progress reports were instituted); and
- make the intermediate statistics course a requirement for Master’s students (done).
The remaining two actions (succession planning and review of the fields) have not yet been undertaken, in view of the substantial and unexpected changes which occurred (two retirements, four new faculty from opportunity appointments, staff turnover, and the integration of Legal Studies into the Department). However, following the external review, the Department brought forward changes to the undergraduate curriculum, and further work is ongoing.

Characteristics of the Programs

Academic Programs Offered

The undergraduate BA in Sociology is offered in four formats (described above). There are also two specializations available:
- Crime and Deviance
- Business and Technology

The Master’s program is offered in three formats:
- Course Work MA (8 courses)
- Research Report MA (6 courses and a major research paper)
- Thesis MA (4 courses and a thesis)

The sub-specialization in Community Research Methodology is in the process of being cancelled.

The PhD program currently offers four fields:
- Social Inequality
- Crime and Deviance
- Interpretive Sociology
- Work and Technology

The Department plans to update the fields, with the retirement of key faculty previously teaching in the Work and Technology field, and given a desire to redefine the Interpretive Sociology field. Five courses are required in the PhD program, beyond the Master’s level, as well as a professional development seminar. On average about two students per year graduate with the PhD.

Program Objectives

The department has four objectives cutting across all levels of study, as follows:
- To offer a comprehensive and high quality education in the full discipline of Sociology;
- To offer undergraduate courses which are current, topical and engaging as possible;
- To maintain a departmental culture of high expectations and rewards for productivity (measured in terms of publications and research grants); and
- To provide graduate students with the mentorship and encouragement needed to succeed professionally, in particular so they acquire the writing, presentational, and practical knowledge required to be competitive.

The objective of the Master’s program is to elevate the critical analysis skills of the students and their basic background knowledge of the discipline, particularly with regard to theory and methods. Students are expected to acquire the knowledge needed to undertake research on specialized topics at a superior level, which entails being able to grasp the often formidable complexity of social processes, problems, and institutions. Depending on the program chosen, students are being prepared for work in the public
or private sector, or for entry into a doctoral program. The objective of the PhD program is similar, but with higher expectations. The aim is for students to develop expertise and the professional skills and acumen to secure an academic position or other higher level position in the public or private sector.

Specific Learning Outcomes

The self study provides a summary of the undergraduate learning objectives, and maps them to the curriculum and the UDLEs; similarly the graduate learning objectives are mapped to the GDLEs.

Significant strengths of program

The program ranked seventh in Canada according the 2012 and 2013 QS rankings, even though faculty complement is modest relative to the higher-ranked departments.

Faculty

At the time of writing the self study, the Department had 15 tenure stream faculty members (with a sixteenth scheduled to start in July 2013). In addition there are two faculty members in the AFIW, and two long-term adjunct/sessional faculty who play a major role in teaching, administration and supervision in the programs. This does not include the faculty members in Legal Studies who may (as the program evolves) also play a role in graduate teaching and supervision particularly in the Crime/Deviance field.

Faculty members have won various awards since 2006 (the Harrison-White book award from the Mathematical Sociology section of the ASA; John Porter Tradition of Excellence Book Award - two; Outstanding Service Award of the CSA; one former Canada Research Chair). Four faculty serve as Editors/Associate Editors of journals, and others serve on numerous editorial boards, and are section editors for journals or series editors for book/publication series. Faculty members received about $450,000 a year in research grants since the last review, two-thirds of this from the Tri-Agency.

On average, faculty members publish about 1.3 articles per person per year, 0.6 book chapters, and make about 2 conference presentations/keynotes. They have collectively published 20 books over the 7 year period. The average supervisory load is 2 graduate students per faculty member, although there is considerable variance. Given the number of Honours students, the average number of Honours thesis supervisions is also 2 per faculty member per year on average.

Staff/Administration

There are three staff who serve as the Administrative Assistants for the graduate program, the undergraduate program in Sociology, and the undergraduate program in Legal Studies, respectively.

Students

Undergraduate
At the undergraduate level, there are approximately 200 majors in any given year (and given that majors are not declared until second year, this implies about 70 majors graduating per year). About half of these are in Honours. Nationally the number of Sociology majors has been declining, as new but related
disciplines have developed. There is a co-op version of the Honours program, which is modest in size. Sociology does an enormous amount of service teaching, with 5000 students enrolled in its courses per year, such that three quarters of the students in courses are not majors. Some of the service teaching is for Legal Studies, which has been growing, some is for cognate programs (e.g. in Applied Health Sciences, where there are some requirements for Sociology courses as well as a cross-appointed faculty member) and some is service more generally to the university.

For students in the General program, the entering averages are predominantly between 75% and 84%. For students in Honours, the median entering average is between 80% and 84%. Only 7% of the students are visa students, and 27% are male. Attrition and retention data were hard to read, since students can switch readily between closely related programs (Honours/Honours Co-op/General/Legal Studies).

The Co-op program is not large, but 95% of Sociology co-op students were evaluated as Good, Excellent or Outstanding by their employers. The top sectors for co-op employment over the period since the last review were public administration (29%), education services (25%), professional and technical services (13%) and amusement and recreational services (13%).

**Graduate**

The Master’s program graduates on average 6 students per year, with a median time to completion of two years. About 15% of Master’s students publish an article based on their research.

The Doctoral program has small numbers and hence the data on completion times are based on small samples. For those who graduated during the period, the completion times were around 6 years (cohort data) and even longer (flow-through data, recognizing the graduation of some students who had entered the program before the previous review). Of the seven who graduated since the last review, five published two or more articles or book chapters, and one co-authored an article and a book. Of these six, at the time of writing, two held faculty positions at universities, one was teaching on contract, and three held positions at research institutions. Since the self study was written, another four students graduated in 2013.

The self study did not include the usual data on student support. The Faculty of Arts provides guaranteed minimum funding for doctoral students for four years, usually a little above the university minimum requirement (currently just over $21,000/year). No information was provided about Master’s funding.

**Summary of programs’ strengths and challenges**

**Strengths**
- The reviewers commented that this is a strong program in transition, operating strong and academically sound programs
- The reviewers commented that student and faculty culture is collegial, and new faculty are playing an active role in revitalizing the program
- There are opportunities for synergy as the Legal Studies program is integrated into the Department’s strategic plan

**Challenges**
- There are additional likely retirements upcoming (although this also represents an opportunity)
● Gender balance – female-dominated discipline at the student level
● Large amounts of service teaching, and a declining trend for majors at the undergraduate level (although total majors are increasing in the Department, with the integration of Legal Studies)

Reviewers’ Recommendations/Departmental response regarding program enhancements
(paraphrased and abridged from both reports)
1. We recommend that the department conduct an off-site strategic planning exercise to clarify their plans for the future.
Response: the Department agreed to start planning for such an event for September 2014, using an outside location and a trained facilitator.
2. The department should conduct a thorough review of its undergraduate and graduate curricula. This review should entail:
   a. Identification of core streams/clusters;
   b. Rationalizing course offerings based on the core streams/clusters;
   c. Focusing graduate programs on the core areas in which the department has the greatest strengths (consider possible differentiation);
   d. Cancel the sub-specialization in Community Research Methodology (this supports the Department’s intention); and
   e. At both the undergraduate and graduate levels, the curriculum rationalization should clearly specify and articulate learning outcomes and degree level expectations.
Response: work has begun on curriculum rationalization and will continue at the retreat. The Department agrees with (d) and will simply move ahead to implementation.
3. The undergraduate specializations should be reviewed (as above), and then more broadly publicized to encourage undergraduates to enroll.
Response: The Department is indeed reviewing the specializations, however the need for additional publicity was based on a misunderstanding and is not thought to be necessary.
4. We recommend that the department’s graduate fields be reviewed during the curriculum review, to ensure they reflect the department’s current priorities and interests.
Response: agreed.
5. We recommend that part of the curriculum rationalization process include the development of a logical progression of undergraduate courses with 3rd and 4th year courses having prerequisites, to ensure that students have sufficient preparation for their upper-level courses.
Response: some changes have been made prior to the retreat, and more will be made following the retreat.
6. To address the issues arising from the heavy service teaching commitment, the department might consider offering sections of the first year course that are directed to students interested in social sciences and likely to major in sociology. This course could be taught and resourced differently (i.e., tutorials) and provide students with more substantive depth and writing. This would facilitate the early attraction of students into the Sociology major programs. A second strategy to increase the number of majors would be to increase the number of joint majors. In particular a joint major program with Legal Studies would build synergies within the department.
Response: the Department agrees with both suggestions, and is working to implement them.
7. While recognizing the difficulties in obtaining placements, we encourage the department to keep working on the co-op program and to also consider other options such as unpaid placements or experiential learning courses in order to provide students with experience in the world of work.
Response: the Department will follow up on this later (note however that these are options primarily for the non-coop students).

8. While recognizing budgetary restraints, we recommend that Sociology continue to be given new faculty positions to replace retiring faculty and that these hires be consistent with the department’s strategic plan.
Response: the Department agrees, but notes with concern that there is no office space with windows for new hires.

The Dean of Arts endorsed the Departmental response, and noted that future complement positions would be considered as part of the Department’s strategic plan.

<table>
<thead>
<tr>
<th>Two-Year Plan: Action steps</th>
<th>Who is responsible?</th>
<th>Who will provide resources?</th>
<th>Timeline</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Hold a retreat in spring 2014</td>
<td>Chair</td>
<td>Department</td>
<td>2014</td>
</tr>
<tr>
<td>2. Review undergraduate program, identify core streams/clusters, rationalize the course offerings, and articulate learning outcomes</td>
<td>Associate Chair Undergraduate, Sociology</td>
<td>n/a</td>
<td>2014-15</td>
</tr>
<tr>
<td>3. Review graduate program, review fields, and articulate learning outcomes</td>
<td>Associate Chair Graduate</td>
<td>n/a</td>
<td>2014-15</td>
</tr>
<tr>
<td>4. Review undergraduate specializations (currently 3)</td>
<td>Associate Chair Undergraduate, Sociology</td>
<td>n/a</td>
<td>2014-15</td>
</tr>
<tr>
<td>5. Review graduate fields (currently 4)</td>
<td>Associate Chair Graduate</td>
<td>n/a</td>
<td>2014-15</td>
</tr>
<tr>
<td>6. As part of undergraduate curriculum review, develop appropriate prerequisites for 3rd and 4th year courses</td>
<td>Associate Chair Undergraduate, Sociology</td>
<td>n/a</td>
<td>2014-15</td>
</tr>
<tr>
<td>7. Consider offering an enhanced first year course for potential majors</td>
<td>Associate Chair Undergraduate, Sociology</td>
<td>Chair</td>
<td>2014</td>
</tr>
<tr>
<td>8. Continue supporting co-op program and also consider experiential learning opportunities and unpaid placements</td>
<td>Associate Chair Undergraduate, Sociology</td>
<td>n/a</td>
<td>2014-16</td>
</tr>
<tr>
<td>9. Replace retirements in ways consistent with the Department’s strategic plan</td>
<td>Dean</td>
<td>Dean? Depends on plan</td>
<td>ongoing</td>
</tr>
</tbody>
</table>

n/a means not applicable

This report will go to Waterloo Senate Graduate and Research Council on May 12 2014, to Senate Undergraduate Council on May 13, and to Senate on June 16 2014.
Report of the Theological Studies (TS) Program

to the University of Waterloo Senate Graduate and Research Council

May 6, 2014

1. Introduction and Scope
This report responds to the discussion of the Theological Studies “Two Year Progress Report” by Senate Graduate and Research Council (SGRC) on September 9, 2013. The Council requested a report on two items: a) progress on the mission statement and goals, and b) how the program proposed to achieve the projected equilibrium of 40-50 students.

This report responds to those specific items and provides a brief update on some developments in the program.

2. Mission and Goals
The program has had productive discussions of mission and goals that were informed by rich resources available through the Association of Theological Schools (ATS) and the resources and guidance available through CTE. Most Theological Studies faculty are also members of the Religious Studies department and participated in a stimulating workshop organized by the RS department on outcomes and “the ideal student” facilitated by Veronica Brown of CTE in December 2013. The mission and goals reflect the mission, identity, and core values of Conrad Grebel University College and uWaterloo and utilize language used to describe the assessment of learning in the standards of the ATS.

Mission statement:
The mission of the Theological Studies program is to educate, equip, and form students through biblical, theological, historical, and pastoral study of Christianity in an Anabaptist-Mennonite and ecumenical context, for service to church and society.

Program Goals:
Throughout the TS program, students will

1. Develop skills in effective writing, speaking, reading, listening, and teaching.
2. Demonstrate knowledge of Christianity from a variety of disciplinary, theological, contextual, and experiential perspectives.
3. Engage scholarship in the relevant fields of theological studies through research and critical analysis of primary sources and contemporary scholarly debates.
4. Interpret Christian traditions in light of present contexts.
5. Engage issues of justice and peace, and attend to voices of the marginalized.
6. Nurture personal formation through practices such as self-reflection, openness to others, leadership training, faith development, and participation in a community of learning.
7. Enhance the capacity for life-long learning.
3. Program Enrollment
In the Appraisal Brief submitted to Graduate Studies in June 2010, the TS program projected an enrollment of forty to fifty students per year, with about half of these full-time and the other half part-time. This no longer seems to be a realistic or desirable goal. A more realistic goal is about 30 students which is about the present level.

a) The intake of new students in recent years has been closer to ten than to the fifteen to twenty that would be required to have an enrollment equilibrium of 40-50.
b) The graduate seminars are most effective with enrollments of six to twelve students. Higher program enrollments would significantly increase class size.
c) Some of the TS students are admitted into the Thesis Option. It is clear that we must limit the number of theses that any of our faculty are supervising at one time.
d) The new Master of Peace and Conflict Studies program which is also housed at Grebel has increased pressure on graduate student study and social space. Grebel’s current building project has directly addressed this need, but Grebel’s total institutional graduate student space capacity is in the 55-65 range.
e) Both of Grebel’s graduate programs are financially viable within the enrollment range projected here.
f) There are a number of common sources of applicants to the TS program: uWaterloo and Wilfrid Laurier undergraduates, graduates of universities and colleges that offer undergraduate theological studies programs, and local pastors and social service professionals. These continue to provide a good variety of students.
g) The program is fortunate to have some exceptionally strong students. During the past year two of the TS students held SSHRC awards and a third student was awarded a SSHRC for 2014-15.

4. Program Update
The Theological Studies (TS) program is currently in a leadership transition. From May 2006 to April 2014 Jim Pankratz, Dean and Associate Professor at Conrad Grebel University College also directed the TS program. As of May 1, Jeremy Bergen, Associate Professor of Religious Studies and Theology is the program Director and Graduate Officer. Pankratz will retire at the end of June 2014. His replacement as Dean will be Trevor Bechtel, whose teaching and research expertise is in religious and theological studies.

Grebel is well advanced in strategic planning for 2015-20 and will likely approve a new strategic plan in December 2014. The current articulation of mission and goals for the TS program is part of this larger process and will continue to be affected by it.

Report submitted by

Jeremy Bergen, Director/Graduate Officer, Theological Studies
Jim Pankratz, Dean
May 6, 2014
Senate Undergraduate Council met on 8 April 2014 and 13 May 2014, and on behalf of Senate approved new courses, course changes, course inactivations and other minor curricular changes. Council agreed to forward these items to Senate for information. As well, council has forwarded to Senate items related to changes to academic plans and regulations for approval. Council recommends that these items be included in the consent agenda. The items recommended for inclusion in the regular agenda are contained in a separate report.

Further details are available at: uwaterloo.ca/secretariat/committees-and-councils/senate-undergraduate-council

FOR APPROVAL [effective 1 September 2015]

CHANGES TO ACADEMIC PLANS

► Faculty of Engineering, Faculty of Mathematics

Software Engineering

1. **Motion:** To amend the software engineering plan as presented.
   (Note: strikethrough = deleted text, underline = new text)

   **Two Science Electives**
   Normally these courses are in the natural sciences, chosen from the list below. Alternate courses may be chosen in consultation with the SE Program Advisors.

   **Science Elective Courses:**
   BIOL 110, 130 (including 130L), 165, 239, 240, 273, CHE 161, CHEM 262 (including 262L), EARTH 121 (including 121L), 122, ECE 209, PHYS 234, 246, 263, 275, 334, 375, SCI 238, 250

   **Four Linkage Electives (LE)**
   At least one from each of the areas of Societal Issues, Humanities and Social Sciences, and Communications, as specified below. Students should be aware that these courses may have enrolment limits, or may not fit their schedules.

   **One course on Societal Issues:**
   CS 492, Complementary Studies Elective List A

   **One course on Communication:**
   ENGL 109, 119, 140R, 210E, 210F, SPCOM 100, 223, 324, 432

   **Two additional courses on Humanities and Social Sciences:**
   Complementary Studies Elective List C

   **Rationale:** These changes add an appropriate communications course, remove an engineering course to increase student exposure to other disciplines, and amend the elective list to allow a more appropriate exposure to courses in science.

► Faculty of Mathematics

Honours Applied Mathematics

2. **Motion:** To approve amendments to the honours applied mathematics plan as described.
   (Note: strikethrough = deleted text, underline = new text)

   Students in this plan must fulfill all the requirements in Table I and Table II. This must include at least 26 math courses, and the following specific requirements:
One of
MATH 237 Calculus 3 for Honours Mathematics
MATH 247 Calculus 3 (Advanced Level)

All of
AMATH 231 Calculus 4
AMATH 242/CS 371 Introduction to Computational Mathematics
AMATH 251 Introduction to Differential Equations (Advanced Level)*
AMATH/PMATH 332 Applied Complex Analysis
AMATH 342 Computational Methods for Differential Equations
AMATH 351 Ordinary Differential Equations 2
AMATH 353 Partial Differential Equations 1
PHYS 121 Mechanics
*AMATH 250 can be substituted with consent of the department

Three 400-level AMATH courses.

One Two additional 300- or 400-level AMATH courses.

Recommended course
AMATH/PMATH 331 Applied Real Analysis

A subject specialization consisting of four additional courses (2.0 units), all from any one department in the Faculties of Science or Engineering, or the department of Economics. (Alternatively, a set of four courses (2.0 units) from another department may be eligible, subject to approval by the Applied Mathematics undergraduate advisor.)

Five additional math courses: (some suggested courses are listed below)
MATH 239 Introduction to Combinatorics
MATH 249 Introduction to Combinatorics (Advanced Level)
CO 250 Introduction to Optimization
CO 255 Introduction to Optimization (Advanced Level)
CS 473 Medical Image Processing
CS 475 Computational Linear Algebra
PMATH 334 Introduction to Rings and Fields with Applications
PMATH 336 Introduction to Group Theory with Applications
PMATH 365 Elementary Differential Geometry
STAT 331 Applied Linear Models
STAT 333 Applied Probability

Rationale: Computational methods are increasingly more important and the faculty feels that any student who graduates with an undergraduate degree in applied mathematics should know the material offered in AMATH 342. Also, at present all mathematics students need 26 courses, and even though this is stated at the top of the page many students overlook it. This modification makes the requirements more explicit and also gives some specific suggestions as to what they might consider.

Faculty of Mathematics
Co-operative Mathematics/Teaching Plan

3. Motion: To approve amendments to the co-operative mathematics/teaching plan as described.
(Note: strikethrough = deleted text, underline = new text)

The co-operative Mathematics Teaching plan is an integrated one that is offered jointly by the Faculty of Mathematics at the University of Waterloo and the Faculty of Education at Queen's.
University. This plan combines academic studies in mathematics, co-op teaching experience in secondary schools, and professional training, with the graduate fully qualified as a secondary school mathematics teacher in Ontario and other work experience.

Students interested in this restricted-enrolment plan should enrol in the Honours Mathematics co-operative plan in year one, and will be considered for admission to Teaching in year two on the basis of an interview, satisfactory academic standing, and good standing in co-op.

Work-term arrangements in this option differ from other co-operative plans offered in the Faculty. (Consult the Study/Work Sequence section.) Details concerning this and the Faculty of Education component are available from the academic advisors or the co-ordinator for this option plan.

... Notes

1. Successful completion of the academic requirements for any of the departmental honours plans "X" in the Faculty of Mathematics whether leading to a Bachelor of Computer Science (BCS) or a Bachelor of Mathematics (BMath) degree will be accepted as a replacement for the math course requirements listed above, provided that "X" is not a Mathematical Studies plan. All requirements specified in Table II must be completed, however, even if the departmental honours plan provides exemptions from any of those requirements. Students who elect this option will be designated by a plan label such as "Honours 'X'/Teaching" rather than "Honours Mathematics/Teaching" (Since 3B and 4B courses are not normally offered in the spring term, it will be difficult to satisfy this alternative.)

2. The Bachelor of Education requirements are completed during an eight-month education study unit in the Faculty of Education at Queen's University in Kingston. This unit occurs in the fall and winter terms following completion of 3B.

3. The selection of courses required for the BMath Teaching plan must include a second teaching subject. Options for the second teaching subject are chosen from the subjects available at Ontario Faculties of Education in consultation with the Math/Teaching plan academic advisors, in one of the following disciplines: biology, chemistry, computer science, or physics. Eight courses (four units) are required to qualify for a second teaching subject.

Rationale: Effective with the 2015 intake class, the Faculty of Education at Queen’s University will implement the Premier of Ontario’s new four-term Bachelor of Education degree. As a result of the change imposed, Queen’s is dropping all concurrent-education plans, which includes the Waterloo mathematics/teaching plan.

FOR APPROVAL

CHANGES TO FACULTY REGULATIONS

Faculty of Mathematics
Mathematics Course Definition

4. Motion: To approve amendments to the definition of a mathematics course as described, effective 1 September 2014.
(Note: strikethrough = deleted text)

Courses with one of these prefixes: ACTSC, AMATH, CO, CS, MATBUS, MATH, PMATH, and STAT. Any course that is cross-listed with a course having one of these prefixes is also considered a math course, regardless of the label under which it is taken. The following courses, with content very similar to courses offered in the Mathematics Faculty, are also considered to be math courses: ECE...
Every math course is worth 0.5 units.

Rationale: The faculty has found it to be increasingly difficult to maintain an accurate list of courses outside of the faculty “...with content very much similar to courses offered in the Mathematics Faculty”. This simpler rule is expected to provide a sufficient degree of accuracy for major average (MAV) calculations. The faculty requests an effective date of 1 September 2014 to align with the implementation of the faculty’s new MAV rule.

Faculty of Mathematics
Regulations on Probation and Reduced Course Load

5. Motion: To approve amendments to the faculty regulations on probation and reduced course load as described, effective 1 September 2015.
(Note: strikethrough = deleted text, underline = new text)

Probation - Must raise overall program average
The student is not currently meeting the Faculty’s standards. The student is restricted to a maximum course load of 2.0 units for the subsequent academic term. If enrolled in a co-op plan, the student will normally be suspended from the Co-operative Education and Career Action (CECA) employment process during his or her next academic term.

Course Load

- The standard course load is five courses per term (2.5 units). A student may take up to 2.75 units without special permission.
- Students who have a cumulative average of 80% or more and are in Excellent standing have a maximum course load of 3.0 units. Honours co-op students should not enrol in six courses with a view to graduating in fewer than eight terms, because co-op students must complete at least eight full-time terms to graduate with an honours degree.
- If a student has courses with INC (incomplete course work) grades on his/her record, the total unit weight of those courses and the courses enrolled for the current term may not normally exceed 3.25 units. A student may obtain permission from an academic advisor to exceed this limit if an INC will not be completed in the current term because the course is not offered.
- In the term after a student’s first 1A term in the Faculty of Mathematics, the following rules apply:
  - Each failed course will reduce his/her course load by 0.5 units.
  - Each INC beyond the first will reduce the maximum course load by an additional 0.5 units.
  - No student’s maximum course load will be restricted in this way to less than 1.0 units. In that case, the student’s academic advisor may permit the student to enrol in 1.5 units.
  - Any student with a CAV less than 60% will have a maximum course load of 2.0 units.
  - If more than one of the preceding rules apply to a student, then the maximum course load is the minimum of those specified.
- If, during a student’s first 1A term in the Faculty of Mathematics, a student fails one or more courses and has a CAV of less than 65%, then the student’s course load for the following term will be reduced to 2.0 units. Students who will likely be required to withdraw and are also enrolled in the subsequent term may continue in a non-degree term enrolled in a maximum of 2.5 units.

Rationale: The faculty is not enforcing the probation restriction, and the new course load rule is intended to be easier to implement, simpler to understand, and will reduce the number of petitions.
Faculty of Mathematics
Faculty Regulation – Averages for Students

6. Motion: To approve amendments to the faculty regulation on averages for students as described, effective 1 September 2015.
   (Note: strikethrough = deleted text)

   Notes:
   1. Courses taken in fall 2013 or later cannot be excluded.
   2. A passed course may be repeated at most once unless an academic advisor has given prior approval. Failing grades less than 32 and grades of DNW (did not write exam), FTC (failure to complete), NMR (no mark reported), and WF (withdraw/failure) are counted as 32 for average-calculation purposes.

   Rationale: This regulation is not enforced by the faculty.

Faculty of Science
Faculty Regulations – Pharmacy – Information for Graduates

7. Motion: To approve amendments to the Faculty of Science’s regulation regarding information for graduates in pharmacy as described, effective 1 September 2015.
   (Note: strikethrough = deleted text, underline = new text)

   Information for Graduates

   A degree in pharmacy does not in itself confer the right to practice pharmacy. To acquire this right, university graduates in pharmacy must be registered licensed in accordance with the requirements legislation of the province in which they wish to practice.

   Application for Readmission to Doctor of Pharmacy Bridging Program

   A graduate of the University of Waterloo Honours Co-operative Bachelor of Science in Pharmacy (BScPhm) program may apply for readmission to the Doctor of Pharmacy bridging program academic plan. Students interested in this opportunity must commence the bridging program within three years of their date of graduation from the BScPhm program, or by September 2017, whichever is latest. Deadlines for applying for readmission are July 1st, November 1st, and March 1st for Fall, Winter and Spring terms, respectively. For details, students should consult the Director of Admissions, Professional Relations and Undergraduate Affairs, School of Pharmacy.

   Rationale: The PharmD bridging program is an option available to BScPhm graduates wishing to upgrade their degree to a PharmD. There is a limited time to apply post BScPhm and complete the bridging program.

FOR INFORMATION

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ACADEMIC PROGRAM REVIEW REPORTS

Final Assessment Report – East Asian Studies – Please see Attachment #1.
Final Assessment Report – Social Work – Please see Attachment #2.
CURRICULAR MODIFICATIONS
Changes consisting of course inactivations and minor academic plan changes were approved of behalf of Senate for the Faculty of Arts (School of Accounting & Finance; classical studies; drama & speech communication; economics) and the Faculty of Mathematics (applied mathematics; pure mathematics) effective 1 September 2014.

Changes consisting of new courses, course changes and minor program changes were approved on behalf of Senate for the Faculty of Engineering (biomedical engineering) and the professional development program effective 1 January 2015.

Changes consisting of new courses and course changes were approved on behalf of Senate for the Faculty of Arts (arts; digital arts communication; drama and speech communication) effective 1 May 2015.

Changes consisting of new courses, course changes, course inactivations and minor program changes were approved on behalf of Senate for the Faculty of Arts (School of Accounting & Finance); Faculty of Engineering (biomedical engineering; complementary studies requirements; English language proficiency requirements; examinations and promotions); Faculty of Mathematics (applied mathematics; combinatorics & optimization; computer science; mathematical business; statistics & actuarial science); Faculty of Science (earth and environmental sciences; general science; honours science; physics & astronomy; psychology; science and aviation; science and business) effective 1 September 2015.

Mario Coniglio
Associate Vice-President, Academic
Final Assessment Report for
East Asian Studies Program

Introduction
East Asian Studies is an interdisciplinary program committed to offering its students engaging, interactive, and challenging courses that develop an understanding of East Asian cultures and proficiency in East Asian languages (Chinese, Korean, Japanese; from Program Mission Statement). The program’s home is Renison University College (University of Waterloo).

Although a relatively young and small program, East Asian Studies (EAS) enjoys a high profile, both within the university and within the greater community. The EAS program has a strong presence in research and publications both domestically and internationally (e.g., reputable books, prestigious research grants, invited talks, government consultations etc.). It is a participant in an excellent international network of scholars and institutions and contributes significantly to internationalization of Renison University College and the University of Waterloo.

Self-study process
This self-study is the first review of the EAS program and was a cooperative effort of EAS staff, faculty members, and alumni under the direction and coordination of the Director and her assistant. A survey of EAS alumni was distributed on May 2, 2013, with the aid of the University of Waterloo Alumni Affairs Office. With the assistance of the University of Waterloo’s Centre for Teaching Excellence, a workshop was held for EAS faculty and instructors to introduce the UW UDLEs and to discuss program outcomes and goals. The site visit was conducted November 7, 2013; the review team report was received November 29, 2013. The review team members were Prof. Brian Dixon (Department of Biology), Prof. Martin Ross (Department of Earth and Environmental Sciences) and Prof. Elizabeth Weckman (Department of Mechanical and Mechatronics Engineering). The responses and implementation plan from program director and endorsement by the Principal of Renison were received February 27, 2014. The implementation strategy with timelines, responsibilities and resource needs assessment is found at the end of this report.

Program History
The program enrolled its first students in 1990, although the first language course offerings were in place by fall 1989, when 35 students registered in introductory courses in Japanese and East Asian Culture. Today EAS offers 39 credit courses serving more than 1000 students each year. Courses cover a range of areas in the social sciences and humanities, with an inter/multi-disciplinary nature, including culture, literature, history, political science, international relations, and religious studies.

The Renison College Certificate in EAS was first offered in 1997, becoming the Renison College Diploma in EAS in 2004/2005. The EAS Diploma became available only to non-degree/post-
degree students in 2009/2010 when the EAS Minor and Option were introduced for degree students. The Option was inactivated in Fall 2012 along with all other Faculty of Arts options. Diplomas in Chinese Language and Japanese Language became available in 2009-2011, replaced in 2011 by certificates for students registered in degree programs at the University of Waterloo. A new Korean Language Certificate became available in 2011. Diplomas remain available for non-degree/post-degree students, according to Faculty of Arts practice.

The Confucius Institute was officially opened on May 3, 2007 and is an integral part of the East Asian Studies program. This non-profit organization dedicated to the promotion and development of Chinese language, culture, studies, and business.

As of 2013, programs in East Asian Studies are offered at many levels at various institutions in Canada (Toronto, UBC, McGill, Victoria, Alberta, Ottawa). UW offers EAS only as a Minor, Diploma or Certificate and it is unique in offering a Korean Language Certificate. In comparison to the other institutions, the number of faculty teaching in the East Asian Studies program at the University of Waterloo is very low – there are only three faculty members.

Program administration and resources
The EAS Program is part of Renison University College, and its Director reports directly to the Principal and Vice-Chancellor of Renison University. The Director oversees all the programs and represents EAS publicly. A part-time Assistant to the Director of EAS provides administrative support for the program. In addition, the Academic Dean (previously the Administrative Dean), along with the Renison Registrar’s Office, provides academic advising to EAS students.

EAS works closely with three departments at UW: Religious Studies, History, and Political Science. EAS faculty are cross-appointed and affiliated with them and contribute to their graduate programs. EAS also collaborates with the Balsillie School of International Relations and the Centre for International Governance Innovation (CIGI) for some research projects.

In addition to having access to UW's physical and electronic library system, the EAS program is also supported by the Lusi Wong Library at Renison. Renison has one computer lab – the Donald Choi Multimedia Lab. There are also 8 computers available for student use in the library.

Office space is tight - increasing numbers of classes have meant increased numbers of teaching staff. All faculty and staff are accommodated, either in single or shared office spaces.

Programs offered and objectives
The programs offered are the following:

- East Asian Studies Minor
- East Asian Studies Diploma
- Diploma in Chinese Language
- Diploma in Japanese Language
- Certificate in Chinese Language
- Certificate in Japanese Language
- Certificate in Korean Language
In addition to credit course offerings, EAS also offers non-credit courses each term in Chinese and Japanese language, which are taken by faculty, staff, students, and people in the local community.

The above credentials (minor, diplomas, certificates) are constituted from various combinations and numbers of courses. Courses are currently offered at the first (9 courses), second (19 courses), and third (11 courses) year level. There are no courses offered at the fourth year level. The specific courses are clearly indicated in the calendar descriptions of the various programs. Minimum cumulative averages for the courses also vary according to credential. EAS has the second largest percentage of class enrollment at Renison (19% vs. 50% for Social Development Studies).

In total, 103 East Asian Studies credentials have been awarded to students from 1998-2013. To date, the highest number of East Asian degrees awarded has been EASIA Studies Diplomas (40), followed by EASIA Studies Certificates (14) and EASIA Minors (13). In the span time covered by the self study, credentials awarded have ranged from 5-13/year.

The EAS curriculum is designed to develop specific skills in critical thinking, problem solving, interpersonal relations, and leadership. Students learn not only to communicate effectively in a second language, but also to think analytically about East Asian cultures. Skills developed in the EAS program allow students to develop a solid foundation from which they could build a career in East Asia and interact in a highly globalized world.

The program encourages students to take advantage of overseas exchange programs and study abroad opportunities. Agreements currently exist with universities in Japan, Korea, and China. EAS courses help to prepare students who go on these exchanges by raising their cultural awareness and providing a linguistic foundation for communicating in foreign languages.

Students

Participation in EAS programs is campus-wide. The number of students enrolled in EAS culture and language courses has shown relative growth for the past seven years, from about 1000 to a noticeable peak of nearly 1800 students enrolled in all EAS courses in 2012/13. This year also saw a peak in the numbers of students enrolled in EASIA, JAPAN, and KOREA courses. Class size varies depending on the subject matter. Some courses are seminars, designed for smaller group discussions with approximately 10 students whereas other classes have much larger enrolment numbers close to 100.

The entrance average from high school for students who have received a degree/diploma/certificate in EAS is 83.6%. Alumni who responded to the survey show a wide diversity of post-graduation career paths (e.g., administrative assistant, ESL school manager, software developer, economist, engineer, corporate account executive, case manager).
Faculty

EAS is currently supported by three tenured faculty members (two associate professors and one full professor - from Political Science, History and Religious Studies). All three are established scholars with international recognition in the field of their expertise.

Two of these members have numerous involvements with professional and community organizations related to Asian studies and culture. There are three language coordinators (China, Japan, and Korea), and a special project coordinator, all of whom hold renewable contracts, and a number of full-time and part-time instructors with term contracts. Three coordinators and one sessional instructor currently hold adjunct faculty appointments.

There are no tenured/tenure-track faculty members teaching East Asia language courses in the program - all language instructors are on contract. They are, however, dedicated and excellent educators, as proven by continuous popularity of their courses and outstanding results of speech contests in provincial, national, and even international levels. The Confucius Institute regularly sponsors visiting instructors to teach EAS and Chinese language courses.

The standard teaching load for Renison faculty is five courses per academic year. The Director as well as one of the tenured faculty in the program have reduced teaching loads due to their administrative responsibilities. Teaching associates (staff) within the EAS program are not bound by the same teaching loads, with some teaching only one course per academic year, and others teaching as many as nine.

Program quality indicators and strengths

The EAS program demonstrates its high quality in several ways:

- The demand for EAS courses is high and continues to grow.
- Although faculty numbers dedicated to the program are small (3), those individuals are recognized successful scholars in their discipline.
- Student evaluations of their instructors (faculty and contract) are consistently very positive, rating high for Japanese instructors (4.63), the Korean instructor (4.68), Chinese instructors (4.38), and East Asian Studies instructors (4.11).
- Students’ overall evaluation of the courses shows that Japanese and Korean courses were graded most positively, with an overall average grading of 4.51 on a 5.0 scale for Japanese courses and 4.53 for Korean courses. Chinese courses were graded 4.29 and East Asian Studies courses were graded 3.96 on a 5.0 scale.
- Of the sixteen EAS alumni who responded to the survey, half indicated that they chose the EAS program to pursue their interests. Also, half responded that they would definitely recommend this university to someone considering an EAS program and 62% rated the quality of their academic experience as very good.
- Students registered in Renison’s Japanese language courses have established a reputation for their excellent performances at the annual speech contest in Ontario and at the national finals.
• The Korean content of this program is unique among counterparts elsewhere, but is somewhat vulnerable as it relies on only one adjunct faculty.

• The reviewers commented that “Librarians have done excellent work identifying methods and technology for identifying and cataloguing non-English works.”

Challenges and opportunities for program improvement and enhancement

• A pressing challenge is to meet the high demand for language courses because there is insufficient budget available. Ad-hoc arrangements are made every year to add sections to meet the demand for language courses. The program wishes to secure an annual budget to offer extra sections regularly.

• EAS would like to offer more courses at the 300 and 400 levels and eventually offer an EAS major, but is currently unable to due to limited budgetary and faculty resources.

• The program reviewers commented that “the diversity of this interdisciplinary program, and those that teach it, were such that they could not derive consistent and clear UDLEs during their self-study for this report.”

• The program reviewers commented that students “currently get some extended proficiency in East Asian studies through the “culture” courses; however, the students felt that more courses on socio-economics and international relations would also be a benefit. One of the three tenured faculty felt international business courses would be a good addition.”

• The reviewers commented that “The physical resources for the East Asian Studies program are a key limiting factor in the delivery and management of the program.”

• The program’s heavy reliance on sessional instructors makes it excessively vulnerable to funding reductions.
**External reviewers’ report, program response and implementation plan**

The reviewers recognize EAS to be a “very strong program delivering high quality education”. With current physical and human (teaching and administrative) resources, high demand for EAS programs is not satisfied due to both space limitations and lack of permanent teaching staff. The reviewers further note that “the largest student enrollment and demand is in the area that is almost solely taught by non-permanent staff.”

The reviewers made 4 recommendations for program improvement:

**Recommendation 1:** Consolidate the program (“build our strength”) by making some teaching staff permanent and increasing time for the “program coordinator” Laura MacKenzie.

**Program response:**

1) Long-term contracts will be offered to four coordinators in the program starting in Fall 2014.

2) The program wishes to increase Laura MacKenzie’s time at EAS up to 35 hours/week, thereby converting her position to full time at Renison, if her schedule allows. She will be given a new title, such as “program officer” or “program co-coordinator,” that will reflect her job responsibilities more appropriately, as soon as coordination is made with other relevant units. Both proposed changes to her working hours and her title should take place sometime in 2014.

**Recommendation 2:** Identify plans to increase space and teaching support as required (both for lectures and tutorials), particularly for accommodating student demand.

**Program response:**

EAS’ budget situation is expected to improve in the coming years. Renison University College will receive enhanced funding through the FUAC equity agreement starting from the next academic year (2014). The program hopes to make use of this budget increase to help stabilize and develop the EAS program.

1) In December 2013, the Renison Board approved the construction of a new building to increase office and classroom space for the college, next to the current East Asian Studies area. The building is expected to be ready in 2015. With the construction of the new building, we expect that there will be more office space available for EAS program, as well as more additional classrooms.

2) EAS has received additional funds that have been used to cover the cost of additional sections to eliminate/reduce the long waiting lists for 2014-2015. EAS will hire a new faculty member who can support the Korean program area. In 2015 EAS expects to hire long-term regular tutor(s) or lecturer(s) for the Korean Language Program.
**Recommendation 3:** Develop a unified plan for expanding the program beyond its current level in a specific area of focus (Socioeconomic? Cultural? Exchanges? Business?). Given the uniqueness the program has in offering Korean content, expansion of that component should be considered very seriously. Collaborative expansion capitalizing on other initiatives should also be considered.

**Program response:**

1) The development of the EAS program as a whole must be done in a way that addresses the student demand. The following upper level Chinese language courses are currently being proposed: CHINA 410R (“Selected Readings in Classical Chinese”) and CHINA 460R (“Creative Writing in Chinese”). Preparation to offer more upper level Japanese and Korean Language courses is currently under way. The actual offerings will be decided based on demands, such as pre-enrollment and budget.

2) Besides the regular language courses, it would also be desirable for us to expand our offerings of Korean language-related courses, such as “Korean for Business,” “Korean Literature in Translation,” and “Korean in Mass Media.”

3) EAS is currently proposing two upper level culture (Social Science and Humanities) courses titled “Cold War in East Asia” (EASIA 377R) and “Chinese Culture through Films” (EASIA 320R). Plans are being made to propose a “Politics and Diplomacy of Contemporary China”* course (to be coordinated with the Political Science Department) or another 3rd year course with a focus on China.

**Recommendation 4:** After all of the above and only then, consider what it will take to change this into a major program.

**Program response:**

EAS will continue to work on developing and expanding upper level and fourth year course offerings for a future EAS major, including the development of a required capstone course at the 400 level. Fourth year course offerings may include “Honours Seminar in Special Topics,” “Special Studies,” and “Senior Honours Essay/Thesis.”
## Implementation Strategy with timelines, responsibilities, and resources required

<table>
<thead>
<tr>
<th>Timeline</th>
<th>Recommendations</th>
<th>Responsibility</th>
<th>Resources Required</th>
</tr>
</thead>
</table>
| September 2014 | 1. Consolidate the program (“build our strength”) by making long /definite-term contracts with some teaching staff and increasing time for the “program co-ordinator” Laura MacKenzie. | • Director  
• Renison Principal | • Admin Support  
• Funding for additional staff work hours |
| 2014-2015 | 2. Identify plans to increase space and teaching support as required (both for lectures and tutorials), particularly for accommodating student demand. | • Director  
• Renison Principal | • Space availability  
• Funding for additional hires and increased teaching hours |
| 2014-2017 | 3. Develop a unified plan for expanding the program beyond its current level in a specific area of focus (Socioeconomic? Cultural? Exchanges? Business?). Given the uniqueness the program has in offering Korean content, expansion of that component should be considered very seriously. Collaborative expansion capitalizing on other initiatives should also be considered. | • Director | • Admin Support |
| 2016-2018 | 4. After all of the above and only then, consider what it will take to change this into a major program. | • Director | • Admin Support  
• Funding for additional hires |
Final Assessment Report for
Bachelor of Social Work (BSW) Program

Previous program review
The Board of Accreditation of the Canadian Association of Schools of Social Work (CASSW\(^1\)) granted candidacy to the Bachelor of Social Work (BSW) program in January 1999, interim accreditation in July 2000, and full accreditation in January 2002. The previous review of the BSW program occurred in 2007, concurrently with its CASSW accreditation review. The program was re-accredited for a four-year period, and following receipt and assessment of a progress report in 2009, CASSW’s Board of Accreditation\(^2\) moved to grant re-accreditation to the full seven years (until January 2014).

Three key issues were identified in the 2007 review:
1) The need for additional full time faculty and staff resources (two full time tenure track positions and an increase in support staff allocated to the School of Social Work - SSW).

**Result:** The interim 2009 progress report indicated the hiring of two full-time professors and the administrative assistant workload was increased from 0.5 FTE to full-time, and the Assistant to the Administrative Assistant increased from 0.25 to 0.5 FTE. Since then, with the introduction of the Master of Social Work program, and continued growth of the BSW program, two more faculty positions were created. The School is currently searching for an additional faculty member. Administrative support has increased to 2.5 FTE.

2) The need for a structural change that provides the SSW with greater oversight and responsibility for determining the curriculum and content of courses offered in the prerequisite BSW courses within the Social Development Studies (SDS) program and a hiring protocol which assures that the School has a major voice in recommending new faculty to be hired within SDS:

**Result:** Effective decision-making changes and protocols were established. Several new SWREN courses were introduced since 2009.

---

\(^1\) currently Canadian Association Social Work Education - CASWE

\(^2\) currently Commission on Accreditation – COA
3) The need for increased research and scholarly work from SSW faculty.

**Result:** The increase in the number of faculty in the SSW has resulted in significantly increased research and scholarly work over levels at the time of the previous program review.

The Board of Accreditation review in 2007 review also made eight recommendations:

1) **That greater responsibilities for budget management and performance reviews of faculty and staff within the SSW be delegated to the Director of the School.**

**Result:** Changes were made during the 2008/2009 academic year to provide clear responsibility to the Director of SSW for the allocation of funds from the School’s budget. The Director now also works closely with the Director of Finance to prepare the annual budgets for the BSW program and the Master of Social Work (MSW) program introduced in 2012.

2) **That efforts be made to increase the level of diversity among faculty and students.**

**Result:** In 2007, males were proportionately more prominent in the tenured and full-time positions. Since 2006 more women than men have been hired in tenured and tenure-track positions as well as in sessional contract positions. Greater balance has also been achieved in age, sexual orientation, ability, racial, and ethnic diversity.

3) **That continued efforts be made to ensure general consistency in content and assignments within courses that have multiple sections, including prerequisite SDS courses.**

**Result:** Effective coordination has been achieved as a result of increased collaboration and communication among instructors within the School and with the Department of SDS.

4) **That the content of courses taught as BSW prerequisites in the SDS Program and courses taught in the BSW program be further reviewed to ensure that overlap is minimized.**

**Result:** There is an annual review of the social work prerequisite courses by the Director of SSW and the Chair of SDS.

5) **That the current curriculum be reviewed to ensure adequate coverage of content pertaining to francophone realities and Canadian social welfare policy.**
Result: In recognition of the importance of understanding practice innovations from Quebec, course syllabi now sometimes contain literature about experiences in Quebec. Six courses in the BSW program include content on social welfare policy and one prerequisite course focuses on Canadian social welfare policy (SOCWK 300R).

6) That continued efforts be made to ensure adequate classroom space for SSW students, and that the feasibility of locating offices for SSW faculty in a common area be further explored.

Result: The School’s new MSW program in August 2012 acted as a catalyst for a new construction project at Renison University College to house the SSW. This new wing includes two classrooms, offices for faculty and staff, a meeting room, and a small student lounge. SSW faculty and staff are now housed together in a common area that includes a number of other non-SSW Renison faculty as well.

7) That an evaluation system be designed or that ongoing monitoring of the current practicum arrangements for part-time students be conducted to assess the effectiveness of innovations introduced to the practicum experience of these students.

Result: A new process involving the Field Education Coordinator and an online practicum reporting system was developed that recognized part-time students’ advanced learning goals, including placement opportunities that acknowledge their previous experience and that offer fitting challenges to increase their practice abilities.

8) That policies affecting student progress in the program, specifically in relation to failures of the same course more than once, be reviewed and clearly communicated to students.

Result: The School’s policies related to failed course grades and unsatisfactory ratings in the Practicum are described in the BSW Resource Manual and BSW Practicum Manual, respectively, which are available on the School’s Field Education webpage and in print. All of the policies are reviewed with the students during their orientation and students are required to sign that they have read the manuals.

Process for conducting the current self-study
The current self-study was submitted by the School of Social Work to the Commission on Accreditation (COA), Canadian Association for Social Work Education (CASWE) for applying for re-accreditation of its Bachelor of Social Work (BSW) program. This exercise also provided an opportunity to simultaneously conduct our own institutional cyclical
program review. The self-study was written by the Director of the School of Social Work, Dr. Susan Cadell in consultation with her faculty members and administrative and social work staff for field positions. The self-study was also informed by the work of the Schools’ Curriculum Committee, Admissions Committee, Community Advisory Committee, and Practicum Committee. Student input (full-time and part-time) was obtained via course evaluations and various surveys over the period of time between reaccreditations. Specifically for the self-study, two surveys in the fall of 2012 were sent to graduates of the BSW program (graduating classes of 2007–2011, with 65 responses) and to various community agencies to gather feedback (33 responses).

The site visit was conducted on October 21-22, 2013. The review team included two assessors representing the CASWE’s COA (Dr. Ross Klein, Memorial University, Newfoundland and Dr. Siu Ming Kwok, Kings University College, London) and a University of Waterloo faculty member (Dr. Nancy Walte, School of Pharmacy). The review team’s report was received on November 11, 2013, and the School’s response and implementation plan were received on March 4, 2014. The Principal of Renison University College indicated his endorsement of the plan on March 5, 2014, adding that the addition of full time faculty will require approval of the Renison Board of Governors.

Characteristics of the program

Historical review
The Honours Bachelor of Social Work (BSW) program was established at Renison University College in 1997 as a post-degree professional program. Its first class of 25 students entered the program in September 1998. The part-time stream was launched in Fall 2004 with six student entrants.

Program objectives
The BSW program aligns with Renison University College’s mission statement and strategic plan, and the University of Waterloo’s Sixth Decade Plan. The objectives are also consistent with the School’s mission and the mission of CASWE and are reflective of the CASWE Core Learning Objectives for Students (CLO’s).

The curriculum at the Baccalaureate level (BSW curriculum) provides students with knowledge and skills for generalist practice. The BSW program objectives are the following:

- to prepare students for ethical, critically reflective, anti-oppressive, competent and accountable social work practice
to ensure academic excellence not only through small class sizes, regular curriculum and program reviews, but also by adherence to the accreditation standards set by the CASWE.

- to create and maintain learning opportunities with a variety of communities through student field practice and collaborative initiatives.

- to promote academic accessibility through the development of online, distance education and part-time studies in addition to the regular full-time program.

- to contribute to social work knowledge through research, publication and other scholarly activities.

**Academic program**

The SSW provides a post-BA, Honours Bachelor of Social Work program through its regular stream (10 months, full-time) as well as a part-time stream for students who normally complete their degree requirements over three years. There is no co-op stream. The courses are the same for each program version with the part-time program offering greater flexibility for when the coursework and field component are accomplished. BSW students must complete 44 one-semester courses (30 at the BA level, ten of which are social work prerequisites, and 14 at the BSW level). Therefore 24 out of the total of 44 courses are social work-related. The BSW practicum requires the student to complete a 240-hour field placement in each term for a total of 720 practicum hours, exceeding the minimum CASWE requirement of 700 hours.

Each year two cohorts of approximately 30 full time students enroll. Class sizes typically range from 30-35 students. Full time and part time students are enrolled together in some elective courses. Part-time students have many choices available through on campus, multimodal means and at flexible times (weekends, evenings, intensive formats).

The SSW has established well-supported field practicum procedures and has worked out a rigorous process of recognizing previous work experience. The intensive field education component of the BSW builds relationships with agencies and organizations around southern Ontario.

The expectations of academic proficiency and professional competence are identical in both programs. Graduates will have the knowledge, values, and skills necessary for an initial level of entry into professional practice, providing service to a broad range of populations at all systems levels. BSW degrees are awarded by the Faculty of Arts.

In order to ensure courses are high quality, SSW has since the 2002/2003 academic year, used the Standards of Accreditation and, more recently, the new Core Learning
Objectives (CLO’s) to carry out an analysis of each course (prerequisites and BSW level), based on the course outlines, stated course objectives, texts, assignments and reading lists. These analyses served to highlight areas of strength, gaps, inconsistencies among different sections of the same course, and areas for updating. Students are evaluated through a variety of means in all courses. Using standard course evaluation questionnaires, students have rated their BSW courses favourably with scores for the last two academic years above 4.0 (out of 5).

International learning opportunities have been developed in the last few years, including a reciprocal term exchange with a School of Social Work in India\(^3\), a short-term experience of 10 days in Mexico (SWREN - 427R International Learning Experience) and establishment of a “3+1+1” China project whereby students who have completed three years of undergraduate study in China, can then attend Renison University College to complete the BSW prerequisites in one year and then can apply to complete the BSW program requirements in their final year.

**Students**

There are currently 58 students in the BSW program full time, 63 students in the part-time BSW, which makes the school small to medium compared to similar programs in other institutions. These numbers have been relatively steady since 2007. From fall 2007 to fall 2011, the BSW enrolled an average of 56 new students into first year full-time program along with a 3-5 students continuing from a previous year. Total enrollment in the BSW from the 2007/2008 to 2011/2012 academic years ranged from 40 (2007/2008) to 65 (2008/2009), averaging 55 students. The number of students who graduated in the 2007/2008 to 2011/2012 academic years averaged 50. Retention averages 97\(^4\)%.

Admission to the BSW programs (both full-time and part-time) requires the completion of an undergraduate degree with at least a B average, at least 6.0 units (12 courses) in the social sciences, including ten specific prerequisite courses or their equivalents. Most of these courses are taught by Social Work faculty in SDS. Applicants must also demonstrate sufficient practical experience and personal suitability as evidenced by

\(^3\) This program is being terminated because it did not fulfill its goals.

\(^4\) This figures differs from the 91% derived from retention information in the self-study. The 91% figure includes students as having left the full-time program after one year, when in fact they are continuing on. Based on 4 years of 98% retention and 1 year of 93%, the true retention rate is 97%.
three letters of reference and a personal statement. Students also submit a CV/ résumé, citizenship information (if applicable) and proof of English language competency. Overall admission averages for full time (FT) and part time (PT) students are as follows:

<table>
<thead>
<tr>
<th>Year</th>
<th>Full-time BSW</th>
<th>Part-time BSW (both fall and winter entry each year)</th>
</tr>
</thead>
<tbody>
<tr>
<td>2012</td>
<td>76.1%</td>
<td>76.8%</td>
</tr>
<tr>
<td>2011</td>
<td>75.6 %</td>
<td>74.0</td>
</tr>
<tr>
<td>2010</td>
<td>77.3%</td>
<td>74.4</td>
</tr>
<tr>
<td>2009</td>
<td>76.6%</td>
<td>76.6</td>
</tr>
<tr>
<td>2008</td>
<td>75.0%</td>
<td>74.7</td>
</tr>
<tr>
<td>2007</td>
<td>75.3%</td>
<td>74.6 (fall only)</td>
</tr>
</tbody>
</table>

SSW accepts students with a lower than 75% overall average if they have done considerably better in their last 10-14 courses and their reader application scores are high based on the full application process.

The part-time program admits an average of 11 new students each term, although the numbers have varied widely from 5 in the winter 2010 term to 19 in the fall 2011 term. Total enrollment in the part-time program for the fall 2007 to winter 2012 terms ranged from 60-75 students, averaging 67 students. With 19 new students in the fall 2011 term and 17 new students in the winter 2012 term, the 2011/2012 academic year saw the highest number of new enrollments in to the part-time program.

Male students in the program are a small minority (2010/2011 4.6% males; 2011/2012 1.8% males) which reflects the profession quite well. There are currently only 2 visa students in the program. Discussions are underway to increase recruitment strategies to reach out to underrepresented groups.

Faculty and staff
The full-time professoriate in the time interval covered by the self-study includes 1 full professor (School Director), 2 associate professors, 4 assistant professors and 1 adjunct assistant professor. Five of these faculty are now allocated fully to SSW and one is allocated primarily to Renison’s undergraduate SDS. The BSW program also utilizes a contingent of part-time/sessional faculty many of whom are completing their doctoral studies in social work. All faculty members are female with one exception. There is only one impending retirement, and because that individual is currently on administrative leave, she is not included in the faculty complement reported. There are 2.5 FTE administrative support staff (one of whom coordinates the part-time program) plus a full-time Field Education Coordinator for the BSW program, a full-time MSW Program
Coordinator, and a part-time MSW Practicum Coordinator. Academic advisement in the BSW program is currently provided by Director for the full-time BSW students. Part-time advisement is provided by the BSW part-time advisor who is also the School Administrator.

Although a relatively small school, faculty CVs clearly show a solid history of research (projects total $9M in last 7 years), extensive scholarship, teaching, leadership and service to the academy, professional organizations/associations and to the community. All faculty have expertise in at least 2 of the possible 4 fields of social work identified (individuals and groups, community, policy and health). Their strong record of scholarship is demonstrated in the lifetime summary of the members, which includes 45 chapters in books, 2 invited peer-reviewed articles, 71 articles in refereed journals, 248 refereed conference papers and presentations, 83 invited papers and presentations, 45 workshops and 52 working and technical papers.

Faculty and professional staff are fully competent to fulfill their duties and contribute to the overall quality of the school and both the BSW and MSW programs. The SSW normally offers 27 courses each year, and most faculty having a teaching load of 5 courses, slightly higher that the Faculty of Arts average teaching load of 4 courses. The director has a reduced teaching load of 2 courses.

**Insights from surveys**

The alumni survey gathered data from BSW graduates of the graduating classes of 2007 – 2011. Responses were received from 65 graduates. At the time of participating in the survey, 64% of alumni were employed in a social work capacity, 13% were unemployed and 11% were continuing students. The majority (42%) of alumni responding to the survey were employed in child welfare settings; 14% were employed in mental health settings and an equal percentage (4.8%) were employed in counselling agencies, government settings and community health. Twenty-one out of 42 respondents rated their job satisfaction as a 4 out of 5 (highest).

Survey respondents were asked to provide feedback about how the BSW program could better support its graduates. There was some consensus that Renison should provide alumni with ongoing job searching support, by creating a website specifying a list of job opportunities and openings available, hosting alumni events and providing a platform for social networking to occur. Alumni also suggested that instead of referring students to Graduate Services on Waterloo campus, having knowledgeable personnel at Renison to assist with post-graduate preparations such as résumé writing, career planning, and job searching can be beneficial for students.
Agencies that responded to the survey rated students and graduates of the BSW program between 3.0 and 3.8 on a 5-point scale (5 is highest) in all categories that were queried. Most agencies (86%) responding to the survey indicated they would hire more BSW graduates from Renison University College.

**Summary of program strengths and weaknesses**

*Strengths of Program*

- Quality of program: The reviewers noted the following: “...students are given clear learning objectives (as required for accreditation) and course assignments are appropriate for the course level (compared to other schools of social work).
- Quality of field program
- Quality of instructors (teaching, scholarship), administrators and staff
- Accessibility of faculty
- Suitable class sizes (~30 students)

*Challenges/Weaknesses of Program*

- Insufficient number of regular faculty to deliver and administer the program
- Inconsistencies between multiple sections of the same course continues to be a challenge. Part of the problem is that almost 50% of courses are being taught by 23 sessionals.
- Two of the nine CASWE core learning objectives were identified as relatively weak by students and alumni: participation in policy analysis and development, and engaging in organizational and society systems’ change.
- Students and alumni felt there should be greater content on macro practice and better integration of theory and practice.
- Small number of regular faculty
- Gender imbalance and need for higher diversity for both instructors and students
- A number of elements of the Social Work field program are out of compliance with accreditation standards (discussed in the following section)

**Review team report, program response and implementation plan**

Several elements in the Social Work field program were out of compliance with accreditation standards. The re-accreditation report stated three requirements must be met:

**Requirement 1:** That the School of Social Work formally convey to students the parameters of responsibility in the process of locating, arranging, and implementing a field placement. Difference parameters based on the location of the desired placement (e.g., a placement in Toronto or out-of-province) should also be stated.
**Response:** We recognize the importance of this clarification. Work has been underway for some time to consolidate and simplify both BSW student and the field manuals. We will make sure that the manuals accurately reflect the parameters of responsibility.

<table>
<thead>
<tr>
<th>Action</th>
<th>Deadline</th>
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<tbody>
<tr>
<td>Create a separate field document that clearly outlines procedures. This will be inserted into the manual and will be highlighted at orientation.</td>
<td>May 1, 2014 for insertion into the 2014/2015 manual</td>
</tr>
<tr>
<td>Inform the students about this issue at the information session prior to beginning the BSW as well as orientation.</td>
<td>May 1, 2014 for the BSW field information session later that month</td>
</tr>
<tr>
<td>We will add a section to our website with Frequently Asked Questions and address one question to this issue.</td>
<td>June 1, 2014</td>
</tr>
<tr>
<td>Procedures will be reviewed by the Director of Program and Field and the Director of the School and revised as necessary, in consultation with CASWE COA.</td>
<td>September 1, 2015</td>
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</table>

**Requirement 2:** That the School of Social Work set minimum standards for frequency and type of contact between the Faculty Field Consultants and agency-based field instructors.

**Response:** We recognize that these standards are inconsistently communicated in the field manual and the contracts of the part-time Faculty Field Consultants. We are grateful that this requirement has underlined the need to be clearer about these requirements with both the Faculty Field Consultants and our agency-based field instructors.

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<tr>
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<tbody>
<tr>
<td>We will clarify the field manual and the yearly contracts with our Faculty Field Consultants so that the standards are consistent.</td>
<td>May 1, 2014</td>
</tr>
<tr>
<td>We will be clearer with the yearly contracts with our Faculty Field Consultants to reflect these standards and verbally verify that they understand what it is that they</td>
<td>July 1, 2014 when the Faculty Field Consultants</td>
</tr>
</tbody>
</table>
are agreeing to do at the time of signing. | sign their contracts
---|---
The Director of Program and Field, who supervises the Faculty Field Consultants, will monitor the process throughout the 10 months of field placement | Ongoing September to June every year
Procedures will be reviewed by the Director of Program and Field and the Director of the School and revised as necessary, in consultation with CASWE COA. | September 1, 2015

**Requirement 3:** That the School of Social Work have a formal policy with regard to the protocol for supervision of field agency supervisors who do not possess a BSW (Section 3.2.22 of the CASWE Accreditation Standards).

**Response:** We recognize the importance of meeting this standard.

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<tbody>
<tr>
<td>Draft the policy in February 2014 during field review day with field education coordinators, full-time faculty, the Director of Program and Field and the Director of the School.</td>
<td>March 1, 2014</td>
</tr>
<tr>
<td>The policy will then be shared with the Practicum committee for feedback and revisions.</td>
<td>April 1, 2014</td>
</tr>
<tr>
<td>The policy will be formally approved at a School of Social Work meeting.</td>
<td>May 1, 2014</td>
</tr>
<tr>
<td>The policy will be included in the 2014/2015 BSW Practicum Manual.</td>
<td>June 15, 2014</td>
</tr>
<tr>
<td>Policy will be reviewed by the Director of Program and Field and the Director of the School and revised as necessary, in consultation with CASWE COA.</td>
<td>September 1, 2015</td>
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</tbody>
</table>
The review team made seven recommendations related to curriculum (including field education) and resources:

**Recommendation 1:** A formal structure be established for the process to be followed for revision or change of a social work course in SDS whereby the School of Social Work actively participates in those changes (Section 2.17 of the CASWE Accreditation Standards).

**Response:** This is an important issue that has been raised before. We recognize that the formal structure is needed in case the current climate of cooperation changes.

<table>
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<tr>
<td>The Chair of SDS and the Director of the School of Social Work have already begun to meet with the Dean to discuss options. A draft procedure will be developed.</td>
<td>March 1, 2014</td>
</tr>
<tr>
<td>The procedure will then be presented to SDS and School of Social Work meetings.</td>
<td>May 1, 2014</td>
</tr>
<tr>
<td>The procedure will then be presented to Academic Council for feedback and revisions. Approval will be sought.</td>
<td>June 1, 2014</td>
</tr>
<tr>
<td>The procedure will be reviewed by the Director of the School and the Dean and revised as necessary, in consultation with CASWE COA.</td>
<td>September 1, 2015</td>
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**Recommendation 2:** A formal structure of collaboration be established (a common curriculum committee, for example) for the purpose of mutual understanding of social work courses in SDS versus the School of Social Work, and how these courses fit together as a curriculum.
**Response:** This is an important issue that has been raised before. We recognize that the formal structure is needed in case the current climate of cooperation changes.

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<td>September 1, 2015</td>
</tr>
</tbody>
</table>

**Recommendation 3:** That the School of Social Work hire a senior social work academic (Associate or junior-Full Professor) who is able to support and mentor junior colleagues.

**Response:** This is recognized as an urgent need. When we were hiring in 2013, we advertised for an assistant or associate professor but were unable to hire at the associate level. When the MSW program was approved in partnership with AHS, an agreement was made to seek a faculty member who would be joint between the School and the AHS. This could be senior level position.

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<tbody>
<tr>
<td>Continue trying to establish a hiring committee and advertisement for a joint appointment between AHS (51%) and School of Social Work (49%). This is being done by the Director of the School and the Dean.</td>
<td>ongoing</td>
</tr>
<tr>
<td>Hire for August 1, 2015. The Director of the School is responsible for overseeing this process.</td>
<td>May 1, 2015</td>
</tr>
</tbody>
</table>
**Recommendation 4:** That the School of Social Work hire one additional tenure stream faculty member in order to reduce the large reliance on sessionals/per-course instructors.

**Response:** Hiring an additional full-time faculty member would help reduce the number of sessionals and would improve the ratio of our course offerings by full-time faculty in relation to part-time faculty.

<table>
<thead>
<tr>
<th>Action</th>
<th>Deadline</th>
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</thead>
<tbody>
<tr>
<td>Seek approval from the Principal to hire a full time tenure track faculty member</td>
<td>September 15, 2014</td>
</tr>
<tr>
<td>Establish a hiring committee. The Director of the School is responsible for overseeing this process.</td>
<td>October 15, 2014</td>
</tr>
<tr>
<td>Hire for August 1, 2015</td>
<td>May 1, 2015</td>
</tr>
</tbody>
</table>

**Recommendation 5:** That the School of Social Work continue to work to standardize course content and student learning across multiple sections of the same course.

**Response:** We recognize the need for this activity.

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<th>Action</th>
<th>Deadline</th>
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<tbody>
<tr>
<td>The Director is actively working with individual instructors, both PT and FT, to encourage them to work together to ensure standardization of content and assignment.</td>
<td>ongoing</td>
</tr>
<tr>
<td>We have begun to hold orientation sessions with new part-time faculty (FT faculty and School staff are included). Feedback on the first one in September 2013 informed us that the creation of community helps with the motivation of part-time faculty to work together</td>
<td>September 2013 and ongoing</td>
</tr>
<tr>
<td>The School is working on implementing a more complete course outline template that includes School policies, such as professional conduct and late submission policies, along with the required University policies.</td>
<td>April 1, 2014 for implementation in Fall 2014</td>
</tr>
</tbody>
</table>
A model for teaming PT instructors with FT instructors for purposes of standardization is under development. Approval will be sought from the Dean. April 1, 2014 for implementation in Fall 2014

Procedures will be reviewed by the Director of Program and Field and the Director of the School and revised as necessary in consultation with CASWE COA. September 1, 2015

**Recommendation 6:** That the School of Social Work undertake an evaluation with students to determine what they are learning in what courses (and what they are not learning), perceived overlap between courses, and to ensure adequate macro-practice content per Core Learning Objectives for Students #7 and #8.

**Response:** We recognize the need for this activity. Current practice of getting feedback from students verbally to a fellow student who sits on the curriculum committee is in revision already as we recognize the need for better mechanisms. The model of PT and FT faculty teaming, as described above, will aid in ensuring adequate macro practice coverage.

<table>
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<tr>
<th>Action</th>
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<tbody>
<tr>
<td>Feedback form and questions have been drafted and circulated to full-time faculty.</td>
<td>February 1, 2014</td>
</tr>
<tr>
<td>Faculty will provide feedback on questions and form.</td>
<td>March 1, 2014</td>
</tr>
<tr>
<td>Feedback form will be finalized during March 2014 BSW Curriculum meeting.</td>
<td>April 1, 2014</td>
</tr>
<tr>
<td>Form will be circulated to students for data collection. Special attention will be paid to macro coursework.</td>
<td>May 1, 2014</td>
</tr>
<tr>
<td>Review process will be undertaken again yearly.</td>
<td>Ongoing</td>
</tr>
<tr>
<td>Procedures will be reviewed by the Director of Program and Field and the Director of the School and revised as necessary and revised as necessary in consultation with CASWE COA.</td>
<td>September 1, 2015</td>
</tr>
</tbody>
</table>
**Recommendation 7:** That the School of Social Work ensure policies and practices with full-time students and part-time students are the same. Where they must vary, this should be clearly stated in the Student Manual and in admission materials.

**Response:** We appreciate this recommendation as principally providing an opportunity to revisit the practice of the Reduction of Hours for part-time BSWs. The field documents being created in response to Requirements 1 and 3 will aid in this process of clarification to students as well.

<table>
<thead>
<tr>
<th>Action</th>
<th>Deadline</th>
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<tbody>
<tr>
<td>Review policies and practices to ensure that they are the same with full-time students and part-time students. Change as necessary.</td>
<td>May 1, 2014</td>
</tr>
<tr>
<td>Discussion of elimination of the practice of Reduction of Hours for part-time BSWs will occur at a School of Social Work meeting. Discussion of any other inconsistencies found. Approval will be sought for any changes made.</td>
<td>June 1, 2014</td>
</tr>
<tr>
<td>Procedures will be reviewed by the Director of Program and Field and the Director of the School and revised as necessary and revised as necessary in consultation with CASWE COA.</td>
<td>September 1, 2015</td>
</tr>
</tbody>
</table>
FOR INFORMATION

Recognition and Commendation

A professor of accounting at the University of Waterloo since 1981, Howard Armitage has been named Ontario’s top entrepreneurial educator by Startup Canada. Armitage, now the special advisor to the president on entrepreneurship, as long recognized the powerful role budding entrepreneurs play in building the Canadian economy. He was founding director of Waterloo’s Conrad Business, Entrepreneurship and Technology Centre (CBET) and its MBET program. At the graduate level, Armitage designed an experience-based program to correspond with the stages of entrepreneurial venture and commercialization process. The award recognizes Armitage’s leading role in shaping post-secondary entrepreneurship education in Canada. “We are so proud of Howard’s achievement,” says Mark Weber, current director of CBET. “Like the entrepreneurs he is so passionate about teaching, Howard has always dreamed big and worked tirelessly to make new things happen in the marketplace and the world. Fortunately, one of his biggest dreams was the transformation of how we train entrepreneurs to be significant contributors at the heart of Canada’s innovation economy.” National winners of the Startup Canada awards will be announced in late May. [2 May 2014 Daily Bulletin]

Professor Ken Davidson of the Department of Pure Mathematics is the recipient of the 2014 Canadian Mathematical Society (CMS) David Borwein Distinguished Career Award. The award recognizes individuals who “have made a sustained outstanding contribution to the advancement of mathematics.” Davidson has been a member of the Pure Mathematics department since 1978, and was designated a university professor in 2007. “Ken Davidson has made sustained contributions of exceptional quality to all aspects of a career as a mathematician in Canada,” said CMS President Keith Taylor. “His continuing scientific creativity and intellectual leadership bring honour to CMS and the country.” Davidson has published well over 100 refereed publications in the areas of operator theory, non-self-adjoint operator algebras and C*-algebras and his research in these areas has garnered attention worldwide. He is also the author of two research monographs and a real analysis textbook. “Ken Davidson is a highly respected, world-class researcher who has many deep, substantial, accomplishments to his credit and he hasn’t slowed down,” said Ronald Douglas of Texas A&M University in his nominating letter. “He has played a critical role in the field of operator theory and operator algebras in Canada, the United States and worldwide.” [12 May 2014 Daily Bulletin]

Theresa Libby, managerial accounting professor at the University of Waterloo since 2010, will be presented with the 2014 L.S. Rosen Outstanding Educator Award at this year’s President’s Luncheon at the annual Canadian Academic Accounting Association (CAAA)’s conference. The award was established in 1983 to honour Professor L.S. Rosen, the founding president of CAAA, and recognizes the recipient’s contribution to Canadian accounting education over a sustained period of time through excellence in teaching, educational innovation, publications, guidance for students, and involvement in professional and academic societies and activities. The citation for the award describes Libby as “an exceptional, dedicated, caring, friendly and effective teacher.” As the director of the PhD program and acting graduate officer for the School of Accounting and Finance, Libby is currently an associate editor at Management Accounting Research and a consulting editor at Contemporary Accounting Research. [6 May 2014 Daily Bulletin]
REPORT OF THE DEAN OF APPLIED HEALTH SCIENCES TO SENATE
June 16, 2014

FOR INFORMATION

A. APPOINTMENTS/REAPPOINTMENTS

Probationary-term Appointment
OREMUS, Mark, Associate Professor, School of Public Health and Health Systems, July 1, 2014 – June 30, 2017. BA (Political Science), McGill University, 1990; MA (Public Policy and Public Administration, Political Science), Concordia University, 1993; Diploma in Management (Applied), McGill University, 1995; MA (Epidemiology and Biostatistics), McGill University, 2000; PhD (Epidemiology and Biostatistics), McGill University, 2005. Dr. Oremus’ research expertise is in the areas of mental health, aging, and chronic disease epidemiology. He is a good fit within the school’s strategic plan.

Adjunct Appointments
Graduate Supervision
ELTON-MARSHALL, Tara, Assistant Professor, School of Public Health and Health Systems, July 1, 2014 – May 31, 2015.

TSUJI, Leonard, Professor, School of Public Health and Health Systems, May 1, 2014 – April 30, 2015.

Adjunct Reappointments
Undergraduate Instruction
DREWERY, Dave, Lecturer, Department of Recreation and Leisure Studies, May 1, 2014 – August 31, 2014.

TORABIAN, Pooneh, Lecturer, Department of Recreation and Leisure Studies, May 1, 2014 – August 31, 2014.

Graduate Supervision
CRAVEN, Catharine, Assistant Professor, Department of Kinesiology, July 1, 2013 – June 30, 2014.

STEWART, Shannon, Assistant Professor, School of Public Health and Health Systems, May 1, 2014 – April 30, 2015.

Special Appointments
Undergraduate Instruction
GOOYERS, Chad, Lecturer, Department of Kinesiology, May 1, 2014 – August 31, 2014.

MAINLAND, Mike, Lecturer, Department of Recreation and Leisure Studies, May 1, 2014 – August 31, 2014.

WILSON, Wade, Lecturer, Department of Recreation and Leisure Studies, May 1, 2014 – August 31, 2014.
Graduate Instruction

**BOSCART, Veronique**, Lecturer, School of Public Health and Health Systems, May 1, 2014 – August 31, 2014.

**Postdoctoral Fellow to Research Appointment**

**VIDT, Meghan**, Department of Kinesiology, May 1, 2014 – April 30, 2015.

**Postdoctoral Fellow to Research Reappointment**

**SCHRYER, Emily**, Department of Recreation and Leisure Studies, May 1, 2014 – August 31, 2014.

**Change in Appointment**

**TYAS, Suzanne**, Associate Professor, change from joint appointment between School of Public Health and Health Systems (75%) and Psychology (25%) to School of Public Health and Health Systems (100%), effective July 1, 2014.

**B. ADMINISTRATIVE APPOINTMENT**

**MOCK, Steven**, Interim Director, People & Populations Using Leading-edge Science for Aging Resilience (P³ULSAR), Faculty of Applied Health Sciences, July 1, 2014 – October 31, 2016.

Susan J. Elliott
Dean, Faculty of Applied Health Sciences
A. APPOINTMENTS/REAPPOINTMENTS

Tenured Appointments

RASMUSSEN, Ann Marie  (BA 1976 University of Oregon, PhD 1985 Yale University), Professor, Department of Germanic & Slavic Studies, effective January 1, 2015 and holder of the designation of the Right Honourable John G. Diefenbaker Memorial Chair in German Literary Studies for an initial five years (renewable). Dr. Rasmussen’s career started in the Deutsches Seminar at the University of Berne as assistant professor. In 1988, Dr. Rasmussen accepted a position as assistant professor in the German Department at Duke University. Here, she was promoted to associate professor in 1995 and to full professor in 2010. During her years at Duke, she held a number of administrative appointments including chair of the German department and chair of the Executive Committee of the Graduate Faculty. From 2002 until 2009 Dr. Rasmussen envisioned, initiated and implemented the Carolina-Duke Graduate Program in German Studies, which was successfully launched in August 2009. Her research interests embrace medieval literature and culture from the twelfth century to the Reformation in the sixteenth century. Dr. Rasmussen has published four books and over thirty articles combining gender studies with a variety of other approaches including manuscript studies, the anthropology of gift-giving, visuality studies and most recently, material culture. She is currently completing an interdisciplinary study of medieval badges and designing her next undertaking: a digital humanities geo-referencing project on the late medieval saints’ cult known as The Holy Kinship. Her references acknowledge her determination and accomplishments and support her candidacy for the Diefenbaker Chair in German Literary Studies. She is recognized by her peers and students to be an excellent mentor, advisor, teacher and administrator as well as a cherished colleague, collaborator and researcher.

YOUNG, Vershawn  (BA 1995 Southern Illinois University, MA 1998 Northeastern Illinois University, MEd 1999 Loyola University, PhD 2003 University of Illinois at Chicago), Associate Professor, Department of Drama & Speech Communication, July 1, 2014. While pursuing his PhD, Dr. Young held positions at public schools in Chicago as resource teacher and associate principal and then as senior executive consultant at an educational consulting firm. His university teaching career began in 2003 as assistant professor at the University of Iowa in the African American Studies Program (departments of English, Rhetoric, and Theatre) and in 2009 he was promoted to associate professor. In 2010 Dr. Young accepted a position as associate professor in the Department of English and the African American Studies Program at the University of Kentucky. He has affiliations in American Studies, Gender and Women’s Studies, Social Theory and Theatre. Dr. Young is an expert of the contemporary African American experience. He is particularly interested in issues dealing with African American language, literature, gender (masculinity), and performance/performativity. He is the author and/or editor of three books including two recent collected volumes, the first in African American literary and performance studies and the second in sociolinguistics and literacy. Dr. Young is currently completing a book about black men, gender anxiety, and the American Dream, which focuses on Barack Obama, playwright August Wilson, and director/producer Tyler Perry. His referees have the utmost regard and respect for Dr. Young as an innovative intellectual, scholar and performance artist who engages, inspires and connects with his colleagues, students and audiences.

Probationary-term Appointments

NGUYEN, Kim  (BS 2002 Old Dominion University, PhD 2008 University of Iowa), Assistant Professor, Department of Drama & Speech Communication, May 1, 2014 to June 30, 2017. Following an appointment at Oregon State University, Dr. Nguyen came to the University of Waterloo in summer
2013 as a definite-term assistant professor. Her research analyzes the intersection of rhetorical analysis and cultural studies to explore how subjects imagine and practice agency. She has published in journals including the *Journal of Communication Inquiry* and *Howard Journal of Communication*, and will teach in the area of public communication with a focus on rhetoric, culture, and communication theory.

**SAVARESE, John** (BA 2005 New York University, MA 2009 PhD 2012 Rutgers University), Assistant Professor, Department of English Language & Literature, July 1, 2014 to June 30, 2017.

Dr. Savarese, prestigious ACLS new faculty fellow and visiting assistant professor, Department of English, UC Berkeley, is a scholar of British romantic poetry whose many articles have appeared in premier international journals. He will contribute to graduate and undergraduate instruction in romantic literature to English students, to the delivery of writing instruction to students in the mathematics faculty, and to the research accomplishments, scholarly profile, and academic networking of the Department of English Language & Literature.

**Probationary-term Reappointments**

**BARRICKMAN Nancy** (BA 1997 University of Colorado, MS 2001 Colorado State University, MA 2002 Colorado State University, PhD 2008 Duke University), Assistant Professor, Department of Anthropology, July 1, 2014 to June 30, 2017.

**LIU Jennifer** (BA 1991 University of California-Berkeley, MA 2002 San Francisco State University, PhD 2008 University of California-Berkeley and San Francisco), Assistant Professor, Department of Anthropology, July 1, 2014 to June 30, 2017.

**SCHOLER, Abigail** (BA 2000 Gettysburg College, MA 2005 MPhil 2007 PhD 2009 Columbia University), Assistant Professor, Department of Psychology, July 1, 2014 to June 30, 2017.

**Continuing Lecturer Appointments**

**KRAFT, Deborah** (BBA 1980 Wilfrid Laurier University, MTAX 2005 University of Waterloo), Lecturer, School of Accounting and Finance, July 1, 2014. Ms Kraft has been a faculty member and director of the MTax program for seven of the past eight years. During her absence in 2007 she was director of professional development and corporate secretary at the Canadian Tax Foundation. Her teaching interests are in the taxation of private corporations and the integration of new learning strategies to enhance student success. In 2012 she was named a fellow of the Financial Planning Standards Council in recognition of her contributions to the industry. Ms Kraft will continue to contribute to the School of Accounting and Finance by leading the development of the MTax learning model and growing the MTax program.

**PSUTKA, Donna** (BMath 1981 University of Waterloo), Lecturer, School of Accounting and Finance, July 1, 2014. Ms Psutka arrived at the School of Accounting and Finance in 1997 with a Chartered Accountant designation and 17 years of practical experience in public practice (Ernst & Young, previously Clarkson Gordon). She was director of the SAF Master of Accounting Program from 2002 to 2008 and has been the director of the Accounting and Financial Management program since 2008. She teaches AFM 101 Introductory Financial Accounting to first-year SAF students. Ms Psutka is actively involved in the delivery of academic coaching resources, first-year transition initiatives, and initiatives that support student retention.

**ROBINSON, Linda** (BComm 1982 University of Manitoba), Lecturer, School of Accounting and Finance, July 1, 2014. Ms Robinson joined the School of Accounting & Finance in September 2003 as a lecturer teaching in the areas of Audit and Forensic Accounting. Prior to joining SAF she was a professional accountant, initially as an auditor but later specialized in forensic accounting. In her final ten years in practice she held the position of partner. Her service to the profession has included assistance to CPA Ontario Professional Conduct Committee, as one of the authors of the Standard Practices for IFA (Investigative and Forensic Accounting) Engagements, and the IFA competency map.
Ms Robinson’s ongoing service to SAF is as director of the Centre for Accounting Ethics and as director of the Fellowship program.

**VERT, Dave** (BBA 1983 Wilfrid Laurier University), Lecturer, School of Accounting and Finance, July 1, 2014. Mr. Vert joined the School of Accounting and Finance in 2006 after spending 22 years in public accounting practice. As both a Chartered Professional Accountant and a Chartered Business Valuator, Mr. Vert has developed particular expertise in the rendering of independent opinions of business values, quantifying economic damages and resolving disputes involving a variety of financial matters. He was SAF’s MAcc program director from 2008 to 2013 and currently lectures in MAcc and senior undergraduate courses in Business Valuations and Public Accounting Practice.

**Definite-term Appointments**

**BLAIR, Garvin** (BBA 1989 Wilfrid Laurier University, MBA 1993 University of Western Ontario), Lecturer, School of Accounting and Finance, July 1, 2014 to June 30, 2015. Mr. Blair joins the finance area of SAF. He received his Chartered Financial Analyst designation in 1997. Previously, Mr. Blair was a managing director in the mergers & acquisitions group at National Bank Financial from 2002 to 2013. Prior to that, he worked in mergers & acquisitions at Deutsche Bank from 1993 to 2002. He has a wealth of experience in financial markets, capital raising and mergers & acquisitions for both public and private companies across a wide variety of geographies and industry sectors. Mr. Blair will contribute to the School of Accounting and Finance by strengthening teaching in the finance area.

**DADEY, Bruce** (BA 1985 University of Manitoba, BEd 1989 University of Alberta, MA 1995 University of Waterloo, PhD 2006 University of Waterloo), Lecturer, Department of English Language & Literature, May 1, 2014 to April 30, 2017. Dr. Dadey, an accomplished and successful instructor of business communication and technical writing courses, is an established scholar of multimodal communication. He will contribute to undergraduate instruction in business writing and communication, technical communication, and rhetoric and professional writing. Dr. Dadey will also have a key leadership role in training, supporting, managing, overseeing, and evaluating the many graduate teaching assistants who help deliver English courses on campus and online.

**HAYES, Frank** (BBA 1977 University of New Brunswick, MBA 1983 University of Alberta), Lecturer, School of Accounting and Finance, May 1, 2014 to June 30, 2015. Mr. Hayes joins the finance area of SAF. He is a Chartered Professional Accountant (CPA, CMA) in Ontario. Mr. Hayes brings extensive experience in corporate finance, particularly for technology companies, gained as president of Stanley Software Finance Inc., and from prior roles as treasurer of Toromont Industries and account manager at a Canadian bank. Prior to joining Waterloo, he was also a lecturer in finance in the MBA program at Rotman School of Management at University of Toronto since 2008. Mr. Hayes will contribute to the School of Accounting and Finance by strengthening teaching in the finance area.

**Visiting Appointment**

**BURIC, Helena**, Lecturer, Department of Germanic & Slavic Studies, September 1, 2014 to April 30, 2015.

**Adjunct Appointments**

**Instruction**

**ARNOLD, Brian**, Lecturer, School of Accounting and Finance, May 1, 2014 to August 31, 2014.

**HAMILTON, Craig**, Lecturer, Department of English Language and Literature, May 1, 2014 to August 31, 2014.

**Graduate Supervision**

**MARIN-DOMINE, Marta**, Associate Professor, Department of Sociology and Legal Studies, April 15, 2014 to December 31, 2015.
Adjunct Reappointments

Instruction

ADAMS, Russell, Lecturer, Department of Anthropology, May 1, 2014 to August 31, 2014.

AFROS, Elena, Lecturer, Department of English Language and Literature, May 1, 2014 to August 31, 2014.

CHAPUT, Louise, Lecturer, Department of French Studies, May 1, 2014 to August 31, 2014.

CORNING, Gail, Lecturer, Department of Drama and Speech Communication, May 1, 2014 to August 31, 2014.

DEMAN, Andrew, Lecturer, Department of English Language and Literature, May 1, 2014 to August 31, 2014.

EVANS, Natalie, Lecturer, Department of Philosophy, May 1, 2014 to August 31, 2014.

HARVIE, Jo, Lecturer, Department of Drama and Speech Communication, May 1, 2014 to August 31, 2014.

IV, Kieng, Lecturer, School of Accounting and Finance, May 1, 2014 to August 31, 2014.

LEE, Sharon, Lecturer, Department of Philosophy, May 1, 2014 to August 31, 2014.

MANNING, Thomas, Lecturer, School of Accounting and Finance, May 1, 2014 to August 31, 2014.

MCARLEY, Bruce, Lecturer, School of Accounting and Finance, May 1, 2014 to August 31, 2014.

MCNEILL, Angela, Lecturer, School of Accounting and Finance, May 1, 2014 to August 31, 2014.

MEINYKEVYCH, Viktoriya, Lecturer, Department of Germanic and Slavic Studies, May 1, 2014 to August 31, 2014.

NADOLNY, Daniel, Lecturer, Department of Psychology, May 1, 2014 to August 31, 2014.

PONG, Beryl, Lecturer, Department of English Language and Literature, May 1, 2014 to August 31, 2014.

SMITH, Larry, Associate Professor, Department of Economics, May 1, 2014 to April 30, 2015.

STACEY, Jeffery, Lecturer, Department of Drama and Speech Communication, May 1, 2014 to August 31, 2014.

STUMPF, Andrew, Lecturer, Department of Philosophy, May 1, 2014 to August 31, 2014.

TERZIAN, Sylvia, Lecturer, Department of English Language and Literature, May 1, 2014 to August 31, 2014.

THARMALINGAM, Pirapa, Lecturer, Department of Economics, May 1, 2014 to August 31, 2014.

VAN BRUWAENE, David, Lecturer, Department of Philosophy, May 1, 2014 to August 31, 2014.
Graduate Student to Part-time Lecturer Appointments

ABDULLA, Rosanne, Department of French Studies, May 1, 2014 to August 31, 2014.

ATÉGOMO YMELÉ, Martial, Department of French Studies, May 1, 2014 to August 31, 2014.

CHÉKÉTÉ, Godrick, Department of French Studies, May 1, 2014 to August 31, 2014.

HANCOCK, Michael, Department of English Language and Literature, May 1, 2014 to August 31, 2014.

JORDAN, William, Department of Philosophy, May 1, 2014 to August 31, 2014.

MCEWAN, Michael, Department of Philosophy, May 1, 2014 to August 31, 2014.

NELSON, Benjamin, Department of Philosophy, May 1, 2014 to August 31, 2014.

Graduate Student to Part-time Lecturer Reappointment

EVEN, Coleen, Lecturer, Department of French Studies, May 1, 2014 to August 31, 2014.

B. ADMINISTRATIVE APPOINTMENTS

BUSCH, Lutz-Alexander, Associate Chair, Undergraduate Studies, Department of Economics, September 1, 2014 to August 31, 2016.

COLLINGTON, Tara, Acting Chair, Department of French Studies, September 1, 2014 to June 30, 2015.

DOLMAGE, Jay, Associate Chair, Undergraduate Studies, Department of English Language and Literature, July 1, 2014 to June 30, 2017.

DOUCET, Mathieu, Associate Chair, Undergraduate Studies, Department of Philosophy, July 1, 2014 to June 30, 2017.

EIBACH, Richard, Associate Chair, Undergraduate Studies, Department of Psychology, July 1, 2014 to June 30, 2015.

LISTON, Maria, Chair, Department of Anthropology, May 1, 2014 to April 30, 2018.

MORRISON, Aimee, Associate Chair, Graduate Studies, Department of English Language and Literature, July 1, 2014 to June 30, 2017.

POIRIER, Guy, Chair, Department of French Studies, July 1, 2015 to June 30, 2019.

TURRI, John, Associate Chair, Graduate Studies, Department of Philosophy, July 1, 2014 to June 30, 2017.

WILSON, Jeff, Associate Chair, Graduate Studies, Department of Religious Studies, July 1, 2009 to August 31, 2014.

ADMINISTRATIVE APPOINTMENT DATE CHANGE

MACLEOD, Colin, Chair, Department of Psychology, change from January 1, 2012 to December 31, 2014 to January 1, 2012 to June 30, 2015.
ADMINISTRATIVE REAPPOINTMENTS

BOEHRINGER, Michael, Associate Chair, Graduate Studies, Department of Germanic and Slavic Studies, December 1, 2014 to June 30, 2016.

MCCLINCHEY, Barry, Associate Chair, Undergraduate Studies (Sociology), Department of Sociology and Legal Studies, July 1, 2014 to June 30, 2015.

NILSEN, Elizabeth, Associate Chair, Graduate Studies, Department of Psychology, May 1, 2014 to December 31, 2014.

PARK, Robert, Associate Chair, Graduate Studies, Department of Anthropology, July 1, 2014 to June 30, 2015.

RYAN, Robert, International Exchange Officer, Dean of Arts Office, July 1, 2014 to June 30, 2015.

SCHMENK, Barbara, Associate Chair, Undergraduate Studies, Department of Germanic and Slavic Studies, July 1, 2014 to December 31, 2014 and July 1, 2015 to June 30, 2016.

ADMINISTRATIVE REAPPOINTMENT DATE CHANGE

BOEHRINGER, Michael, Associate Chair, Graduate Studies, Department of Germanic and Slavic Studies, change from July 1, 2012 to June 30, 2014 to July 1, 2012 to August 31, 2014.

C. SABBATICAL LEAVE DATE CHANGE
For Approval by the Board of Governors

MICHELA, John, Associate Professor, Department of Psychology, change from January 1, 2014 to December 31, 2014, 85% salary to January 1, 2014 to June 30, 2014, full salary.

[Signature]
Douglas M. Peers
Dean, Faculty of Arts
FOR INFORMATION

A. APPOINTMENTS/REAPPOINTMENTS

Probationary-term Appointments

ALUMUR ALEV, Sibel, Assistant Professor, Department of Management Sciences, September 1, 2014 – June 30, 2017. PhD Bilkent University, Turkey 2009; MS Bilkent University 2004; BS Middle East Technical University, Turkey 2001. Dr. Alumur Alev expertise is in the area of applied operations research. Her research focuses on the optimization of supply chain based on location of hubs. She has several years of experience as a professor and a researcher in Turkey. She is an excellent fit with the department and will be able to teach undergraduate courses in management engineering as well as graduate courses in the MASC and PhD programs.

YU, Aiping, Associate Professor, Department of Chemical Engineering, May 1, 2014 – June 30, 2017. PhD University of California 2008; MSc East China University of Science & Technology, Shanghai, China 2002; BS Nanjing University of Technology, Nanjing, China 1997. Dr. Yu brings to the Chemical Engineering department new and complementary strengths in the area of carbon nano-materials for energy storage and conversion devices, in particular supercapacitor. Dr. Yu is already an accomplished researcher with an h-factor of 23 and has written an authoritative book on supercapacitor. This position fills the last chemical engineering position associated with the Nanotechnology Engineering program, and in the area of energy, a priority thrust in the Chemical Engineering department.

Probationary-term Reappointments


BASU, Dipanjan, Assistant Professor, Department of Civil & Environmental Engineering, July 1, 2014 – June 30, 2017. PhD Purdue University 2006; MSc Indian Institute of Technology, India 2001; BSc Jadavpur University, India 1997.

LEE, Hyung-Sool, Assistant Professor, Department of Civil & Environmental Engineering, July 1, 2014 – June 30, 2017. PhD Arizona State University 2009; MEng Inha University, South Korea 2000; BEng Inha University 1998.

Probationary-term Appointment Date Changes


BASU, Nandita, Assistant Professor, Department of Civil & Environmental Engineering and Department of Earth & Environmental Sciences, Faculty of Science, change from January 1, 2013 – June 30, 2016 to January 1, 2013 – June 30, 2017.

Definite-term Appointments

MAHABADI, Sayed Alireza K., Research Assistant Professor, Department of Mechanical & Mechatronics Engineering, May 1, 2014 – April 30, 2019. PhD University of Waterloo 2012; MS Sharif University of Technology, Iran 2002; BS Sharif University of Technology 1999.
Dr. Mahabadi’s areas of expertise are vehicle dynamics and control, and mechanical design and optimization. The department is heavily involved in vehicle research, and Dr. Mahabadi will join Prof. Amir Khajepour’s research team to expand their capacity in this area.

**NEALE, Adam**, Lecturer, Department of Electrical & Computer Engineering, August 15, 2014 – August 14, 2017. PhD candidate University of Waterloo; MASc University of Waterloo 2010; BASc University of Waterloo 2008. Mr. Neale has expertise in digital integrated circuit design. In particular, in his PhD he has investigated design and implementation of novel error correcting codes for memory applications.

**Visiting Appointments**


**CAO, Yongfeng**, Scholar, Department of Systems Design Engineering, September 1, 2014 – August 31, 2015.

**FARAMARZI, Shamsolzaman**, Researcher, Department of Mechanical & Mechatronics Engineering, May 1, 2014 – November 1, 2014.


**HUANG, Zhuo**, Scholar, Department of Management Sciences, September 15, 2014 – September 14, 2015.

**JEONG, Yeong Ho**, Professor, Department of Electrical & Computer Engineering, August 1, 2014 – July 31, 2015.

**KUYUMCIYAN Christophe**, Scholar, Department of Chemical Engineering, May 1, 2014 – September 15, 2014.

**LAZZARONI, Edoardo Filippo**, Scholar, Department of Chemical Engineering, October 1, 2014 – March 15, 2015.


**NUNO AYON, Jose de Jesus**, Scholar, Department of Civil & Environmental Engineering, March 1, 2014 – December 1, 2014.


**TRINIDAD, Josh**, Scholar, Department of Chemical Engineering, April 14, 2014 – August 31, 2014.
UHM, Sangho, Scholar, Department of Mechanical & Mechatronics Engineering, August 6, 2014 – August 5, 2015.

Visiting Reappointments
LIU, Guihua, Scholar, Department of Chemical Engineering, April 1, 2014 – February 15, 2015.


Adjunct Appointment
Graduate Supervision
BOYBAY, Muhammad Said, Assistant Professor, Department of Mechanical & Mechatronics Engineering, April 1, 2014 – March 31, 2017.

Adjunct Reappointment
Graduate Supervision and Research
UYSAI, Murat, Associate Professor, Department of Electrical & Computer Engineering, May 1, 2014 – April 30, 2017.

Special Appointments
Undergraduate Instruction
HASSEL, Katharina, Lecturer, Department of Chemical Engineering, April 1, 2014 – August 31, 2014.

YEGANEH, Hojatollah, Lecturer, Department of Electrical & Computer Engineering, May 1, 2014 – August 31, 2014.

Graduate Instruction
KREM, Slamah, Lecturer, Department of Civil & Environmental Engineering, May 1, 2014 – August 31, 2014.

Special Reappointments
Undergraduate Instruction
GRIFITTHS-FULTON, Karl, Lecturer, Department of Systems Design Engineering, May 1, 2014 – August 31, 2014.

Graduate Instruction
ALLARKHIA, Minna, Lecturer, Department of Management Sciences, May 1, 2014 – August 31, 2014.

Cross Appointments
BASU, Dipanjan, Assistant Professor, Department of Civil & Environmental Engineering to the Department of Earth & Environmental Sciences, May 1, 2014 – April 30, 2016.

Cross Reappointments
THOMPSON, Russell, Associate Professor, Department of Physics and Astronomy to the Department of Chemical Engineering, May 1, 2014 – April 30, 2017.

B. ADMINISTRATIVE APPOINTMENTS
GAUDET, Vincent, Associate Chair, Undergraduate Studies, Department of Electrical & Computer
Engineering, September 1, 2014 – April 30, 2016.

KENNINGS, Andrew, Associate Chair, Undergraduate Studies, Department of Electrical & Computer Engineering, May 1, 2014 – August 31, 2014.

ADMINISTRATIVE REAPPOINTMENT
SPARKES, Doug, Associate Director, MBET Program, Conrad Business, Entrepreneurship and Technology Centre, Office of the Dean of Engineering, May 1, 2014 – April 30, 2015.

Pearl Sullivan
Dean, Faculty of Engineering
FOR INFORMATION

A. APPOINTMENTS

Adjunct Appointments

Graduate Supervision

LEMIEUX, Christopher, Assistant Professor, Department of Environment and Resource Studies, May 1 2014 to April 30, 2015.

WHITTINGTON, Peter, Assistant Professor, Department of Geography and Environmental Management, May 1 2014 to April 30, 2017.

Special Appointments

Instruction

ASHPOLE, Sara, Lecturer, School of Environment, Enterprise and Development, May 1, 2014 to August 31, 2014.

CRAIG, Brian, Lecturer, Department of Environment and Resource Studies, May 1 2014 to August 31, 2014.

HERREMANs, Irene, Lecturer, School of Environment, Enterprise and Development, May 1, 2014 to August 31, 2014.

HOOYKAAS, Amanda, Lecturer, Faculty of Environment, September 1, 2014 to December 31, 2014.

KAY, Paul, Lecturer, Department of Environment and Resource Studies, May 1, 2014 to August 31, 2014.

PHAN, Thang Chau, Lecturer, School of Environment, Enterprise and Development, May 1, 2014 to August 31, 2014.

WOODCOCK, Thomas, Lecturer, Faculty of Environment, September 1, 2014 to December 31, 2014.

Change in Appointments

McCARThY, Daniel, Associate Professor, partial transfer from the School of Environment, Enterprise and Development (49%) and the Department of Environment and Resource Studies (51%) to the Department of Environment and Resource Studies (100%), effective May 1, 2014.

QUILLEY, Stephen, Associate Professor, partial transfer from the School of Environment, Enterprise and Development (49%) and the Department of Environment and Resource Studies (51%) to the Department of Environment and Resource Studies (100%), effective May 1, 2014.

B. ADMINISTRATIVE APPOINTMENTS

FRAYNE, Bruce, Director, International Development Program, School of Environment, Enterprise and Development, July 1, 2014 to June 30, 2017.
SINGH, Simron, Director, Development Practice Master’s Program, School of Environment, Enterprise and Development, July 1, 2014 to June 30, 2017.

ADMINISTRATIVE REAPPOINTMENTS

LYNES, Jennifer, Director, Environment and Business Program, School of Environment, Enterprise and Development, January 1, 2013 to December 31, 2015.

OELBERMANN, Maren, Associate Chair, Graduate Studies, Department of Environment and Resource Studies, July 1, 2014 to June 30, 2017.

André Roy
Dean, Faculty of Environment
A. APPOINTMENTS/REAPPOINTMENTS

Tenured Appointment

LAU, Chi Lau (BSc 2000 The Chinese University of Hong Kong, MSc 2003 PhD 2006 University of Toronto), Associate Professor, David R. Cheriton School of Computer Science, August 1, 2015. From 2007 to 2012 he was an assistant professor at the Chinese University of Hong Kong and since 2013 has been an associate professor at the same university. Dr. Lau’s research interests are in theoretical computer science, particularly the design and analysis of algorithms and algorithmic graph theory. His work is very well known, appearing in the highest-quality journals and conferences related to theoretical computer science. Several of his results are considered to be important breakthroughs in the area. Dr. Lau will add significant strength to the algorithms and complexity group and his expertise will also benefit other research groups, such as symbolic computation.

Probationary-term Appointments

BLAIS, Eric (BMath 2002 University of Waterloo, MSc 2006 McGill University, PhD 2012 Carnegie Mellon University), Assistant Professor, David R. Cheriton School of Computer Science, September 1, 2014 – June 30, 2017. Since completing his PhD, he has been the Simons postdoctoral fellow with the theory of computation group of the Computer Science and Artificial Intelligence Laboratory at the Massachusetts Institute of Technology. Dr. Blais’ research interests are in theoretical computer science, particularly in complexity theory. His work has included a focus on the complexity of boolean functions and on sublinear-time algorithms. He is interested in the interplay between computer science, combinatorics, and information theory (as an undergraduate at Waterloo he completed a minor in combinatorics and optimization). Dr. Blais will add significant strength to the algorithms and complexity group, complementing the research work currently taking place.

LAW, Edith (BSc 2000 University of British Columbia, MSc 2005 McGill University, PhD 2012 Carnegie Mellon University), Assistant Professor, David R. Cheriton School of Computer Science, September 1, 2014 – June 30, 2017. Since completing her PhD, she has been a postdoctoral fellow in the Center for Research on Computation and Society at Harvard University. Dr. Law’s research interests are in human-computer interaction, human computation, and crowdsourcing. With her PhD supervisor, she literally wrote the book on human computation (Human Computation, Law and von Ahn, Morgan Claypool, 2011). She was the primary initiator of the series of workshops, now a separate conference, on human computation held in conjunction with the Association for the Advancement of Artificial Intelligence conference. Dr. Law’s work will strengthen the human-computer interaction group and also be valuable to the groups in artificial intelligence and health informatics.

RICHARDS, Gregor (BSc 2008 Portland State University, PhD exp 2014 Purdue University), Assistant Professor, David R. Cheriton School of Computer Science, September 1, 2014 – June 30, 2017. Mr. Richard’s research interests are in programming languages, particularly dynamic languages. His work has included extensive analysis of the way languages such as JavaScript are used in practice and how the use of those languages could be improved to create better, more maintainable code. Mr. Richards will strengthen the programming-languages group and, more generally, the computer-systems facet of the school, which has been one of its historic strengths.
**Definite-term Appointment**

KNOLL, Carolyn (BSc Hons 2007 Queen’s University, MMath 2009 PhD 2013 University of Waterloo), Lecturer, Office of the Dean, May 1, 2014 – August 31, 2015. Dr. Knoll will teach undergraduate courses, participate in school outreach visits and development of CEMC online teaching resources.

**Definite-term Reappointments**


**Visiting Appointments**


KATSURAGAWA, Keiko, Researcher, David R. Cheriton School of Computer Science, May 1, 2014 – April 30, 2015.


**Adjunct Appointments**

*Instructor*

FLORI, Cecilia, Lecturer, Dept. of Pure Mathematics, May 1, 2014 – August 31, 2014.

FRITZ, Tobias, Lecturer, Dept. of Pure Mathematics, May 1, 2014 – August 31, 2014.

*Research*


**Adjunct Reappointments**

*Instructor*


ROBERTS, Collin, Lecturer, David R. Cheriton School of Computer Science, May 1, 2014 – August 31, 2014.

**Graduate Student to Part-time Lecturer Appointment**

DOR-ON, Adam, Dept. of Pure Mathematics, May 1, 2014 – August 31, 2014.

**Graduate Student to Part-time Lecturer Reappointment**

B. ADMINISTRATIVE REAPPOINTMENTS

MORTON, Andrew, Director, Software Engineering Program, David R. Cheriton School of Computer Science, July 1, 2015 – June 30, 2016.

C. RESIGNATION
TIP, Frank, Professor, David R. Cheriton School of Computer Science, effective June 22, 2014.

D. RETIREMENT
NG, Chetat, Professor, Dept. of Pure Mathematics, effective August 31, 2014.

E. SABBATICAL LEAVE
BROWN, Daniel, Associate Professor, David R. Cheriton School of Computer Science, January 1, 2015 – December 31, 2015, with 85% salary.

F. SPECIAL LEAVE
TESKE-WILSON, Edlyn, Associate Professor, Dept. of Combinatorics and Optimization, September 1, 2014 – August 31, 2015. This is an unpaid leave.

Ian P. Goulden
Dean, Faculty of Mathematics
A. APPOINTMENTS/REAPPOINTMENTS

Probationary-term Appointment

YAKYMCHUK, Christopher, Assistant Professor, Department of Earth and Environmental Sciences, September 1, 2014 to June 30, 2017. [B.Sc., Dalhousie University (2008); M.Sc., Queen’s University (2010); Ph.D., University of Maryland (expected June 2014).] Mr. Yakymchuk’s research focuses on unravelling the tectonic history of present-day to Archean-age mountain belts and their evolution by using applied metamorphic petrology, structural geology, geochemistry, and geochronology. Much of his current interests lie in understanding the production, transport, and emplacement of melt in gneiss domes and implications for mineral exploration.

Probationary-term Reappointment

MURPHY, Graham K., Assistant Professor, Department of Chemistry, July 1, 2015 to June 30, 2018. [B.Sc., University of Victoria (2001); Ph.D., University of Alberta (2006)].

Adjunct Appointments

Graduate Supervision

FLANAGAN, John G., Professor, School of Optometry and Vision Science, June 1, 2014 to May 31, 2017.

GUILMETTE, Carl, Assistant Professor, Department of Earth and Environmental Sciences, May 1, 2014 to April 30, 2017.

HANLEY, Jacob, Professor, Department of Earth and Environmental Sciences, May 1, 2014 to April 30, 2017.

HOFFMAN, Kari L., Associate Professor, Department of Biology, May 1, 2014 to April 30, 2017.

LERI, Francesco, Associate Professor, Department of Biology, May 1, 2014 to April 30, 2017.

Graduate Supervision and Instruction

BADEA, Ildiko, Associate Professor, School of Pharmacy, May 1, 2014 to April 30, 2017.

Adjunct Reappointments

Graduate Supervision

GOULD, William D., Professor, Department of Earth and Environmental Sciences, February 1, 2014 to January 31, 2017.

PARKER, Beth L., Professor, Department of Earth and Environmental Sciences, May 1, 2014 to April 30, 2017.

Graduate Supervision and Research

CULLEN, Anthony P., Professor, School of Optometry and Vision Science, September 1, 2014 to August 31, 2017.

SCHIRMER, Kristin, Professor, Department of Biology, June 1, 2014 to May 31, 2017.
WATSON, Susan B., Professor, Department of Biology, July 1, 2014 to June 30, 2017.

Special Appointments

Undergraduate Instruction
FAIZAL, Mir, Lecturer, Department of Physics and Astronomy, September 1, 2014 to December 31, 2014 and May 1, 2015 to August 31, 2015.

ROBERT-KAPEL, Noella, Assistant Clinical Professor, School of Pharmacy, April 1, 2014 to August 31, 2015.

Special Reappointment

Undergraduate Instruction
BOHLOULI-ZANJANI, Parisa, Lecturer, Department of Physics and Astronomy, May 1, 2014 to August 31, 2014.

Cross Appointments

BASU, Dipanjan, Assistant Professor, Department of Civil and Environmental Engineering to the Department of Earth and Environmental Sciences, May 1, 2014 to April 30, 2016.

LEUNG, Debbie, Associate Professor, Department of Combinatorics and Optimization to the Department of Physics and Astronomy, April 1, 2014 to March 31, 2017.

Cross Reappointments

AUCOIN, Marc G., Associate Professor, Department of Chemical Engineering to the Department of Biology, June 1, 2014 to May 31, 2017.

SCOTT, Matthew, Assistant Professor, Department of Applied Mathematics to the Department of Biology, June 1, 2014 to May 31, 2017.

Staff to Part-time Lecturer Appointment

MERCER, Kathryn, School of Pharmacy, May 1, 2014 to August 31, 2014.

Staff to Part-time Lecturer Reappointment


Student to Part-time Lecturer Appointment

HOSSEINZADEH KHALIGH, Hadi, Department of Physics and Astronomy, May 1, 2014 to August 31, 2014.

Student to Part-time Lecturer Reappointment

DELANEY, Keith, Department of Earth and Environmental Sciences, May 1, 2014 to August 31, 2014.

B. ADMINISTRATIVE APPOINTMENT

POWER, William, Chair, Department of Chemistry, September 1, 2014 to August 31, 2018.

ADMINISTRATIVE REAPPOINTMENT

CHEN, Zheng-Yi (Jeff), Chair, Department of Physics and Astronomy, May 1, 2014 to August 31, 2016.

C. RESIGNATION

GUILMETTE, Carl, Assistant Professor, Department of Earth and Environmental Sciences,
D. RETIREMENT
FLANAGAN, John, Professor, School of Optometry and Vision Science, effective June 1, 2014.

E. SABBATICAL LEAVE
For Approval by the Board of Governors
WARNER, Barry, Professor, Department of Earth and Environmental Sciences, September 1, 2014 to August 31, 2015, 100% salary.

T.B. McMahon
Dean, Faculty of Science
FOR INFORMATION

Early Issuance of Degree

<table>
<thead>
<tr>
<th>Name</th>
<th>Degree</th>
<th>Degree Date</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ismail Bayezit</td>
<td>PhD – Mechanical Engineering</td>
<td>23 May 2014</td>
</tr>
</tbody>
</table>

The above student has been approved for early issuance of his degree to support his employment outside of Canada. The graduate student completed his degree requirements in May 2014. The degree will be issued according to the Senate directive which delegates to the president, the registrar, and the associate provost, graduate studies authority to grant a degree/diploma/certificate when circumstances necessitate outside the normal schedule for such approvals by Senate.

Sue Horton
Associate Provost,
Graduate Studies
FOR INFORMATION

Council of Ontario Universities
Report of the Academic Colleague

The academic colleagues met on 20-21 May in Toronto. I attended the working dinner on the 20th, but not the discussion on the 21st, due to teaching. My summary of the discussion on the 21st comes from the COU notes.

The discussion on the 20th was devoted to questions of identity authentication and academic integrity for online courses. Colleagues reported their own experiences, which in some cases were particularly apropos. For example, the colleague for Ryerson is the university’s director of E-Learning.

The general experience across Ontario is that students commit academic integrity violations roughly as often for on-line courses as for classroom courses. There was discussion of honour codes (which exist at the Royal Military College, for example), and how they do help at some institutions. One interesting area for discussion is to view academic misconduct as a learning opportunity, rather than just “throwing the book” at students who have committed a violation; this approach is becoming more common at universities across the province.

On the 21st, discussion focused on the 2014 Ontario election, which will have occurred by the time of the June Senate meeting. Suffice to say that COU is attempting to have some influence over the discussion of higher education policy matters in the election, while remaining neutral and willing to work with all parties.

Also, the initiatives in the Ontario budget, and a number of pieces of proposed legislation, are not relevant unless they are reintroduced after the election. These legislative changes include oversight of the university sector by the provincial ombudsman’s office, as well the groundwork to some possible changes to public sector pensions.

Also on hold is discussion of changes to the funding model for Ontario universities and approvals of new programs by the Ministry of Training, Colleges and Universities.

The other major topic of discussion was the research MTCU is currently doing on three-year degrees offered by community colleges. It is unclear that students will be enthusiastic about such programs if offered, though the colleges would very much like to offer degrees, rather than diplomas. One concern is over accreditation, since a Bachelor’s degree might mean something very different depending on its source, and in particular, three-year community college Bachelor’s degrees are not likely good preparation for advanced degrees.

The meeting concluded with election of colleagues to the various committees of COU. Given that my term on Senate ended 30 April 2014, my term as Waterloo’s COU colleague also is coming to an end, and the university will appoint a new colleague for 2014-2015.

Dan Brown
Academic Colleague
Council of Ontario Universities
Senate Graduate & Research Council met on 12 May 2014, and agreed to forward the following items to Senate for approval. These items are recommended for inclusion in the regular agenda.

Further details are available at: https://uwaterloo.ca/secretariat/committees-and-councils/senate-graduate-research-council

FOR APPROVAL

AMENDMENTS TO GRADUATE STUDIES CALENDAR – REVISIONS TO REGULATIONS FOR MASTER’S THERSES

1. Motion: To amend the regulation for the author’s declaration for master’s theses as follows:

   (Note:strikeout = deleted text, underline = new text)

   Doctoral and master’s theses can take various forms. The traditional thesis is a sole-authored document with various chapters (acceptable in all Departments/Schools). Some theses consist of a collection of papers which are published or submitted for publication (accepted in some but not all Departments/Schools). Some theses involve co-authored material (accepted in some but not all Departments/Schools). Students should consult with their Department/School prior to embarking on a thesis project, to understand clearly the form(s) permitted in their Department.

   1. All theses must still have the same form, i.e. one single bibliography, continuous pagination.

   2. For the thesis which is not a sole-authored document the University requirements are that the student has made the major contribution to the work, to the satisfaction of the examination committee. The student will include a Statement of Contributions in the thesis. Best practice is that co-authors do not form the majority of the examining committee for doctoral theses or, the reading or examining committee for master’s theses.

   The thesis must contain one of the two following statements on the Author’s Declaration page:

   EITHER: “I hereby declare that I am the sole author of this thesis. This is a true copy of the thesis, including any required final revisions, as accepted by my examiners.

   I understand that my thesis may be made electronically available to the public.”

   OR for doctoral theses: “This thesis consists of material all of which I authored or coauthored: see Statement of Contributions included in the thesis. This is a true copy of the thesis, including any required final revisions, as accepted by my examiners.

   I understand that my thesis may be made electronically available to the public.”

   Rationale: The amended regulation reflects the increased prevalence of collaborative work at the master’s level, and provides appropriate language for candidates with which to make the required author’s declaration for their thesis.

   /mg George Dixon      Sue Horton
   Vice-President, University Research      Associate Provost, Graduate Studies
Senate Undergraduate Council met on 13 May 2014, and agreed to forward the following items to Senate for approval. Council recommends that these items be included in the regular agenda. Items recommended for inclusion in the consent agenda are contained within a separate report.

Further details are available at: uwaterloo.ca/secretariat/committees-and-councils/senate-undergraduate-council

FOR APPROVAL [effective 1 September 2015]

CHANGES TO ACADEMIC PLANS

Faculty of Science
International Joint Education Programs

1. **Motion**: To approve the addition of the Honours Psychology plan to the existing China 2+2 agreement between the University of Waterloo and Shandong Normal University, China, with an initial cap of admitting five students per year, and to approve amendments to the calendar text as presented.  
   (Note: deleted text = strikeout; new text = underlined)

   **International Joint Education Programs**
   The Faculty of Science has partnered with several universities in China to offer a joint undergraduate program whereby students spend the first two years at their Chinese university and the final two years at the University of Waterloo. Students who complete the "2+2" program are awarded BSc degrees by both the University of Waterloo and the Chinese university. Current 2+2 programs in Science include: Biology, Biochemistry, Biomedical Science, Chemistry, Earth Sciences, Environmental Science, Mathematical Physics, Materials and Nanoscience, and Physics, Psychology, and Science and Business. The 2+2 Program is currently available only to international students at the partner Chinese universities.

   **Rationale**: The university has enjoyed a successful 2+2 program with Shandong Normal University since 2012, and that university is home to one of the pre-eminent psychology programs in China. There is mutual interest in extending the existing 2+2 agreement into that subject area. Additional amendments are included to update the calendar text to reflect programs that were previously added to the agreement.

UNDERGRADUATE ADMISSION REQUIREMENTS

2. **Motion**: To approve amendments to the undergraduate admission requirements for 2015 as detailed in attachment #1.

   **Rationale**: A motion to deactivate the bioinformatics admissions category was brought forward to the May 2014 meeting of Senate from the Faculty of Mathematics, and this motion will appropriately amend the 2015 admission requirements.

Mario Coniglio
Associate Vice-President, Academic
Ontario Secondary School Applicants presenting the Ontario High School Curriculum

Ontario secondary school (OSS) students who will be completing the Ontario high school curriculum must present the Ontario Secondary School Diploma (OSSD) including a minimum of six grade 12 U or M courses. These courses must include all required courses as specified for each program.

An overall average of 80% on the best six grade 12 courses including the required courses is normally the minimum for consideration. Higher averages are required for admission to programs in which the demand for places by qualified applicants exceeds the number of places available. The actual minimum averages required for these programs are determined each year on the basis of the number and qualifications of applicants and the number of available spaces.

In some programs, applicants may be considered for early conditional admission based on factors that include their grade 11 academic record, their grade 12 record to date, and other factors noted under "Other Documentation" in the chart.

The University reserves the right to withdraw conditional offers of admission if the applicant fails to meet the requirements specified above or any specific conditions stated on the offer of admission.
## Admission Requirements and Recommendations for Year One Programs 2015

<table>
<thead>
<tr>
<th>Faculty/Program</th>
<th>Requirements</th>
<th>Recommendations</th>
<th>Other Documentation</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Undergraduate first-year entry programs</td>
<td>All required courses are OSS Grade 12 U courses unless otherwise specified and must be included in the required set of 6. Required courses are included in the calculation of the admission average. Programs requiring prior university studies: Requirements are as listed.</td>
<td>Undergraduate first-year entry programs: Courses listed are OSS Grade 12 U courses unless otherwise specified and are not required for admission but are recommended because students may find this preparation useful during their university studies. Programs requiring prior university studies: Recommendations are as listed.</td>
<td>Information which is used in addition to course requirements is detailed below when applicable. The appropriate information will be requested when an application is acknowledged.</td>
<td></td>
</tr>
</tbody>
</table>

### Applied Health Sciences

#### All Programs

All programs require six Grade 12 U or M courses including specified courses.

#### Health Promotion

**Regular and Co-op**

- Any Grade 12 U English
- A final grade of at least 75% is normally required.
- Additional U or M courses for a total of six.

Those not admitted to the co-op program are automatically considered for the corresponding regular program. Limited admission to co-op is also available in Year Two. The first co-op work term begins in Year Two.

### Health Studies

**Regular and Co-op**

- Biology
- Chemistry
- A final grade of at least 70% is normally required in each of the above required courses.
- Additional U or M courses for a total of six

For students considering the Pre-Health Professions Specialization:
- Advanced Functions
- English (ENG4U)

Special consideration is given on the basis of strength in Biology and Chemistry. Those not admitted to the co-op program are automatically considered for the corresponding regular program. The first co-op work term begins in Year Two.

### Kinesiology

**Regular and Co-op**

- Advanced Functions
- Chemistry
- One of Biology or Physics
- A final grade of at least 70% is normally required in each of the above required courses.
- Additional U or M courses for a total of six

Admission Information Form (AIF) is required.

Special consideration is given on the basis of strength in Advanced Functions, Chemistry, and Biology or Physics.

Those not admitted to the co-op program are automatically considered for the corresponding regular program. The first co-op work term begins in Year Two.

### Recreation and Leisure Studies

**Regular and Co-op**

- Any Grade 12 U English
- A final grade of at least 70% is normally required.
- Additional U or M courses for a total of six

For all students:
- from Arts, Business Studies, Canadian and World Studies, Classical Studies, French as a Second Language, Interdisciplinary Studies, International Language, or Social Sciences and Humanities courses.

For students considering the Therapeutic Recreation program:
- Biology or Exercise Science

For students considering the Recreation and Business program:
- Grade 12 M Principles of Financial Accounting

Applicants should be aware that, although this is a social science program, courses in research methods and statistics are included in the curriculum. Writing skills are important. Involvement in extracurricular activities is an important factor in admission decisions.

Those not admitted to the co-op program are automatically considered for the corresponding regular program. Limited admission to co-op is also available in Year Two. The first co-op work term begins in Year Two.
### Admission Requirements and Recommendations for Year One Programs 2015

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<td><strong>Undergraduate first-year entry programs:</strong> All required courses are OSS Grade 12 U courses unless otherwise specified and must be included in the required set of 6. Required courses are included in the calculation of the admission average. <strong>Programs requiring prior university studies:</strong> Requirements are as listed.</td>
<td><strong>Undergraduate first-year entry programs:</strong> Courses listed are OSS Grade 12 U courses unless otherwise specified and are not required for admission but are recommended because students may find this preparation useful during their university studies. <strong>Programs requiring prior university studies:</strong> Recommendations are as listed.</td>
<td>Information which is used in addition to course requirements is detailed below when applicable. The appropriate information will be requested when an application is acknowledged.</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Arts (All Programs)</strong></td>
<td>All programs require six Grade 12 U or M courses including a Grade 12 U English.</td>
<td></td>
<td>When the Admissions Committee considers an application individually, it bases its decision on the overall average, the English grade, and information provided on the Admission Information Form. If Grade 12 courses are repeated, the highest grade attained will be used for making admission decisions. Renison University College and St. Jerome's University have the same admission standards as the University.</td>
<td></td>
</tr>
<tr>
<td><strong>Honours Arts Regular</strong></td>
<td></td>
<td>For Social Science programs such as Anthropology; Economics; Political Science; Psychology; Sexuality, Marriage, and Family Studies; Social Development Studies; or Sociology:  - Mathematics of Data Management</td>
<td>Admission Information Form (AIF) is strongly recommended.</td>
<td>Entry to General or Honours major programs, including departmental co-op, occurs following Year One, and is based on academic performance in Year One in relevant courses in the prospective major. Honours Arts Regular is offered through the University of Waterloo, Renison University College, and St. Jerome’s University.</td>
</tr>
<tr>
<td><strong>Arts and Business Regular and Co-op</strong></td>
<td>In addition to the requirement for all Arts programs specified above, a final grade of at least 70% in any Grade 12 U English is required.</td>
<td>For Economics: Calculus and Vectors is also recommended; however, students may decide to take an introductory calculus course in first year to acquire additional background.</td>
<td></td>
<td>Selection of the Honours major which is to be combined with Arts and Business occurs following Year One and is based on academic performance in the prospective major in Year One. Honours Arts and Business is offered through the University of Waterloo, Renison University College, and St. Jerome’s University. Those not admitted to the Co-op program are automatically considered for the corresponding Regular program.</td>
</tr>
<tr>
<td><strong>Global Business and Digital Arts Regular</strong></td>
<td>In addition to the requirement for all Arts programs specified above, a final grade of at least 75% in any Grade 12 U English is required.</td>
<td>- Mathematics of Data Management is strongly recommended</td>
<td>Admission Information Form (AIF) is strongly recommended.</td>
<td></td>
</tr>
<tr>
<td><strong>Social Development Studies Regular Renison University College</strong></td>
<td>In addition to the requirement for all Arts programs specified above, a final grade of at least 70% in any Grade 12 U English is required.</td>
<td>- Mathematics of Data Management</td>
<td>Admission Information Form (AIF) is strongly recommended.</td>
<td></td>
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## Admission Requirements and Recommendations for Year One Programs 2015

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<td>Undergraduate first-year entry programs: Courses listed are OSS Grade 12 U courses unless otherwise specified and are not required for admission but are recommended because students may find this preparation useful during their university studies. Programs requiring prior university studies:</td>
<td>Information which is used in addition to course requirements is detailed below when applicable. The appropriate information will be requested when an application is acknowledged.</td>
<td></td>
</tr>
<tr>
<td>Arts (Continued)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Accounting and Financial Management Co-op</td>
<td>▪ Any Grade 12 U English. A final grade of at least 75% is required. ▪ Advanced Functions ▪ Calculus and Vectors A final grade of at least 75% is normally required in each of the math courses listed above. ▪ Three other U or M courses</td>
<td>▪ Grade 12 M Principles of Financial Accounting ▪ Grade 12 U Mathematics of Data Management</td>
<td>Admission Information Form (AIF) is required. Accounting and Financial Management Admissions Assessment (AFMAA) is required.</td>
<td>Admission is based on secondary school or any post-secondary school achievement, the results of the AFMAA, and the Admission Information Form.</td>
</tr>
<tr>
<td>Arts and Mathematics</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Computing and Financial Management Co-op</td>
<td>▪ Advanced Functions ▪ Calculus and Vectors ▪ Any Grade 12 U English. A final grade of at least 75% is required. ▪ One other Grade 12 U course ▪ Two other U or M courses</td>
<td>▪ Grade 11 U Introduction to Computer Science ▪ Grade 12 M Principles of Financial Accounting</td>
<td>Admission Information Form (AIF), which includes a teacher reference, is strongly recommended. All applicants are encouraged to write the Euclid Mathematics Contest. Applicants not currently attending an Ontario Secondary School are strongly advised to write the Euclid contest to demonstrate that they have sufficient mathematical background. The Canadian Computing Competition is recommended.</td>
<td>In addition to a strong academic background, other factors considered in the admission process include performance in contests such as the Euclid Mathematics Contest and the Canadian Computing Competition, the number and variety of courses taken, involvement in extracurricular activities in the school and/or the community, and teacher recommendations. Those not offered admission to Computing and Financial Management may be considered for alternative programs in the Faculty of Mathematics.</td>
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### Admission Requirements and Recommendations for Year One Programs 2015

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<td>Engineering (Co-op)</td>
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<tr>
<td>Architecture Co-op</td>
<td>• English (ENG4U). A final grade of at least 75% is normally required.</td>
<td>• Grade 11 or 12 M Art courses</td>
<td>Interview</td>
<td>Applicants are selected for the interview on the basis of grade 11 marks and any interim or final OSS grade 12 marks available at the time interview selection occurs. Those selected for an interview are expected to come to the University. Admission is based on the results of the interview, the portfolio, the English précis-writing exercise, and secondary school achievement.</td>
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<tr>
<td></td>
<td>• Advanced Functions</td>
<td>• Independent arts studies</td>
<td>English précis-writing exercise</td>
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<td>• Calculus and Vectors</td>
<td>• Creative and cultural studies such as visual arts and history</td>
<td>Portfolio</td>
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<td>• Physics</td>
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<td>Admission Information Form (AIF) is required.</td>
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<td>A final grade of at least 70% is normally required in each of these courses.</td>
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<td>• Two other U or M courses</td>
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<tr>
<td>Biomedical Chemical Civil Computer Electrical Environmental Geological Management Mechanical Mechatronics Nanotechnology Systems Design Co-op</td>
<td>• Advanced Functions</td>
<td></td>
<td>Admission Information Form (AIF) is required.</td>
<td>In addition to a strong academic background, other factors which will be considered in the admissions process include involvement in extracurricular activities in school and/or in the community; evidence of an interest in engineering; and strong performance in mathematics, science, or engineering-related competitions. Those not offered admission to their first-choice program may be considered for other engineering programs that they specify on the Admission Information Form.</td>
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<tr>
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<td>• One other U or M courses</td>
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<tr>
<td>Engineering and Mathematics Software Engineering Co-op</td>
<td>• Advanced Functions</td>
<td>• Grade 11 U Introduction to Computer Science is highly recommended.</td>
<td>Admission Information Form (AIF) is required.</td>
<td>In addition to a strong academic background, other factors which will be considered in the admissions process include involvement in extracurricular activities in school and/or the community; evidence of interest in software engineering, additional OSS Grade 12 courses; and participation in mathematics, science, engineering, or programming competitions. All applicants are encouraged to write the Euclid Mathematics Contest. Those not offered admission to Software Engineering may be considered for other engineering programs that they specify on the Admission Information Form.</td>
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<tr>
<td></td>
<td>• Calculus and Vectors</td>
<td>• Grade 12 U Computer Science would be an asset.</td>
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<td>• One other U or M course</td>
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### Undergraduate first-year entry programs

All required courses are OSS Grade 12 U courses unless otherwise specified and must be included in the required set of 6. Required courses are included in the calculation of the admission average.

### Programs requiring prior university studies

Requirements are as listed.

### Undergraduate first-year entry programs:

Courses are included in the calculation of the admission average.

### Programs requiring prior university studies:

Recommendations are as listed.

---

### Environment

**Environment and Business Co-op**
- Any Grade 12 U English. A final grade of at least 70% is normally required.
- Five other U or M courses

**Recommendations**
- One Grade 12 U Mathematics
- One Grade 12 U Science
- Grade 12 M Principles of Financial Accounting
- Analysing Current Economics Issues

**Admission Information Form (AIF)**

Those not admitted to Honours Environment and Business Co-op are automatically considered for Honours Geography and Environmental Management.

The first co-op work term begins in Year Two.

### Environment and Resource Studies Regular and Co-op

- Any Grade 12 U English. A final grade of at least 70% is normally required.
- Five other U or M courses

**Recommendations**
- At least one Grade 12 U or M course from each of Canadian and World Studies or Social Sciences and Humanities or the Arts Mathematics or Science

**Admission Information Form (AIF)**

In accordance with the trans-disciplinary nature of ERS, we value flexibility and breadth of learning and experience.

Those not admitted to the co-op program are automatically considered for the corresponding regular program.

Limited admission to co-op is also available in Year Two. The first co-op work term begins in Year Two.

### Geography and Aviation Regular

- Any Grade 12 U English. A final grade of at least 70% is normally required.
- A Grade 12 U Mathematics. A final grade of at least 70% is required.
- Four other U or M courses

**Recommendations**
- One or more Grade 12 U or M Geography courses are strongly recommended.
- A second Grade 12 U Mathematics
- Earth and Space Science

**Admission Information Form (AIF)**

Program Briefing Session

Transport Canada Category 1 Medical Certification

Those not admitted to Honours Geography and Aviation are automatically considered for Honours Geomatics Regular.

### Geography and Environmental Management Regular and Co-op

- Any Grade 12 U English. A final grade of at least 70% is normally required.
- Five other U or M courses

**Recommendations**
- One or more Grade 12 U or M Geography courses are strongly recommended.
- A Grade 12 U Mathematics
- Earth and Space Science

**Admission Information Form (AIF)**

Those not admitted to the co-op program are automatically considered for the corresponding regular program.

Limited admission to co-op is also available in Year Two. The first co-op work term begins in Year Two.
## Admission Requirements and Recommendations for Year One Programs 2015

### Undergraduate first-year entry programs

All required courses are OSS Grade 12 U courses unless otherwise specified and must be included in the required set of 6. Required courses are included in the calculation of the admission average.

**Programs requiring prior university studies:** Requirements are as listed.

### Undergraduate first-year entry programs

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**Programs requiring prior university studies:** Recommendations are as listed.

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<td><strong>Regular and Co-op</strong></td>
<td>Any Grade 12 U English. A final grade of at least 70% is normally required.</td>
<td>A second Grade 12 U Mathematics. Grade 11 U Introduction to Computer Science is highly recommended. Grade 12 U Computer Science would be an asset.</td>
<td>Admission Information Form (AIF)</td>
<td>Those not admitted to the co-op program are automatically considered for the corresponding regular program. Limited admission to co-op is also available in Year Two. The first co-op work term begins in Year Two.</td>
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<td><strong>International Development</strong></td>
<td>Any Grade 12 U English. A final grade of at least 70% is normally required. Five other U or M courses</td>
<td>At least one Grade 12 U Science or Mathematics course. At least one Grade 12 U course in a second language</td>
<td>Admission Information Form (AIF) is required.</td>
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<td><strong>Knowledge Integration</strong></td>
<td>Any Grade 12 U English. A final grade of at least 75% is normally required. Any Grade 12 U Science. A final grade of at least 75% is normally required. Any Grade 12 U Mathematics. A final grade of at least 75% normally required. Three other U or M courses</td>
<td>Grade 12 U or M courses from the following: Canadian and World Studies Mathematics Science, preferably Biology or Earth and Space Science</td>
<td>Admission Information Form (AIF)</td>
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<td><strong>Planning Co-op</strong></td>
<td>Any Grade 12 U English. A final grade of at least 75% is required. Five other U or M courses</td>
<td>Grade 12 U or M courses from the following: Canadian and World Studies Mathematics Science, preferably Biology or Earth and Space Science</td>
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**Mathematics**

- Advanced Functions
- Calculus and Vectors
- Any Grade 12 U English
- One other Grade 12 U course.
- Two other U or M courses.

**Applications to all programs in Mathematics:**
- Grade 11 U Introduction to Computer Science

**Applications to Mathematics/Chartered Accountancy:**
- Grade 12 M Principles of Financial Accounting

**Admission Information Form (AIF) which includes a teacher reference. The AIF is required for Math/Chartered Professional Accountancy Math/Business Admin., Math/Financial Analysis and Risk Mgmt, Business Admin/Math, Double Degree/Business Admin/Computer Science Double Degree.**

For all other programs, the AIF is strongly recommended, especially for co-op programs.

All applicants are encouraged to write the Euclid Mathematics Contest. Applicants not currently attending an Ontario Secondary School are strongly advised to write the Euclid Contest to demonstrate that they have sufficient mathematical background.

For those applying to Computer Science, Business Administration and Computer Science Double Degree, the Canadian Computing Competition is recommended.

In addition to a strong academic background, other factors considered in the admissions process include performance in contests such as the Euclid Mathematics Contest and the Canadian Computing Competition, the number and variety of courses taken, involvement in extracurricular activities in the school and/or the community, and teacher recommendations.

Those not offered admission to their first choice program will be considered for other Mathematics programs.

The Faculty administers the English Language for Academic Studies program for those with exceptional mathematics skills who do not meet normal English language requirements.

Admission to the Mathematics/Co-op program occurs in Year Two after successful completion of Year One in either Honours Co-op Computer Science or Honours Co-op Mathematics.

Honours Business Administration and Mathematics Co-op is a double degree program offered jointly by Wilfrid Laurier University and Waterloo leading to BBA and BMath degrees.

Honours Business Administration and Computer Science Co-op is a double degree program offered jointly by Wilfrid Laurier University and Waterloo leading to BBA and BCS degrees.

**Bioinformatics**

- Advanced Functions
- Calculus and Vectors
- Any Grade 12 U English
- One of Biology or Chemistry
- One other U or M course.

- **Courses**
- **OSS Grade 12 U courses unless otherwise specified and must be included in the required set of 6. Required courses are included in the calculation of the admission average.**

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**Mathematics**

- Advanced Functions
- Calculus and Vectors
- Any Grade 12 U English
- One other Grade 12 U course.
- Two other U or M courses.

**Applications to all programs in Mathematics:**
- Grade 11 U Introduction to Computer Science

**Applications to Mathematics/Chartered Accountancy:**
- Grade 12 M Principles of Financial Accounting

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### Science

| Biotechnology/Chartered Professional Accountancy Co-op | Six Grade 12 U or M courses including | • Biology  
• Chemistry  
• Grade 12 M Principles of Financial Accounting | |
| Biotechnology/Economics Co-op | • Biology  
• Chemistry | |
| Honours Science Regular | • Any Grade 12 U English  
• Advanced Functions  
• Calculus and Vectors A final grade of at least 70% is normally required in each of these courses. | • Biology  
• Chemistry  
• Earth and Space Science  
• Physics | Admission Information Form (AIF) is strongly recommended. |
| Environmental Science Regular and Co-op | • Chemistry  
• Earth and Space Science  
• Physics | |
| Life Sciences Regular and Co-op | Two of  
• Biology  
• Chemistry  
• Earth and Space Science  
• Mathematics of Data Management  
• Physics One additional U or M course. | • Biology  
• Chemistry  
• Physics | |
| Physical Sciences Regular and Co-op | • Chemistry  
• Earth and Space Science  
• Mathematics of Data Management  
• Physics | • Biology  
• Chemistry  
• Physics | |
| Science and Aviation Regular | • Chemistry  
• Earth and Space Science  
• Physics | Admission Information Form (AIF) is strongly recommended.  
Program Briefing Session.  
Transport Canada Category 1 Medical Certification | The first co-op work term begins in Year Two for all Faculty of Science students. |
| Science and Business Regular and Co-op (All specializations) | • Chemistry  
• Grade 12 M International Business Fundamentals | Admission Information Form (AIF) is strongly recommended. | |
| Optometry Regular | Successful completion of at least three full years of university-level science with specific course requirements. | • Optometry Admissions Test (OAT)  
• Autobiographical Sketch  
• Essay  
• Optometrist and Academic References | Please refer to the School of Optometry website regarding required and recommended university-level courses. |
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<td>Pharmacy Co-op</td>
<td>Successful completion of at least two full years of university-level science with specific course requirements.</td>
<td>• Pharmacy Admission Information Form • Letter of Reference Form • Interview • Fundamental Skills Assessment</td>
<td>Please refer to the School of Pharmacy website regarding admission averages and required university-level courses. Secondary School applicants applying to Honours Science or Honours Life Sciences may also be considered for conditional admission to Pharmacy. Refer to School of Pharmacy website regarding requirements.</td>
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<tr>
<td>Independent Studies</td>
<td>Successful completion of at least one full year of university undergraduate with an overall university average of C (65%) or a minimum two years of community college studies with an overall average of B (75%) and a minimum of 70% in Grade 12 U English (or equivalent) is required.</td>
<td>Autobiographical Letter Interview Letters of Reference</td>
<td>Applicants should be capable of doing university-level work on their own and should be planning studies that can be done at the University of Waterloo.</td>
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<tr>
<td>Social Work - Regular Renison University College</td>
<td>Successful completion of either a three-year or a four-year undergraduate university degree with a B average and at least 6.0 units in the social sciences, including 10 specified courses from the Renison curriculum or their equivalents.</td>
<td>Letter of reference and personal statement which demonstrates sufficient practical experience and personal suitability are required.</td>
<td>Please refer to the Social Work website regarding required university-level courses.</td>
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FOR INFORMATION

Maintenance Program and Energy Conservation Efforts
Plant Operations is the University of Waterloo’s largest academic support department, with a gross budget of $40,000,000.00 and a staff of over 350 full-time employees. Plant Operations is responsible for the operation, repair and maintenance of over 60 major buildings with an area of approximately 8,000,000 gross square feet. Maintenance efforts are managed using a computerised maintenance management system, tracking some 20,000 work orders annually. This web hosted system tracks over 25,000 individual assets, which can represent either an entire building or an individual subsystem. This system is used as the basis for a preventive/predictive maintenance program and facilitates detailed analysis on asset reliability. The results of vibration testing, oil analysis, thermo graphic scans, insulation resistance and physical checks of equipment are logged and analyzed utilizing this system to prolong the life of existing equipment and identify areas where improvements can be achieved.

In addition, approximately 2000 discretionary minor renovation and improvement projects were undertaken by various sections in Plant Operations over the past year.

Plant Operations is working to lower energy use and reduce our environmental footprint on campus. The primary asset to assist in this effort is an extensive Building Automation System, which allows continuous monitoring of mechanical systems and environmental conditions in each building. Through this system occupancy scheduling, temperature setback and ramping routines, air quality measurements and load shedding strategies allow us to minimize our energy consumption.

Our energy consumption for this period was 1.79 GJ/m2. Natural Resources Canada reports Ontario average commercial/institutional use as 1.71; average Ontario university energy use is 2.59 GJ/m2.

Efforts in energy conservation include:
- Total cost of ownership is evaluated when making equipment selections for new construction and renovation projects.
- Building automation systems conserve energy by measuring carbon dioxide, temperature, and humidity to control the amount of outside air required for ventilation.
- Ventilation system schedules are determined by the expected usage of the area; fans are shut down during periods of minimal occupancy. Night time and weekend temperature adjustments are implemented.
- Electronic boiler controls optimize the combustion efficiency of major boiler systems.
- Boiler feed water pumps have had mechanical pressure controls replaced by VFDs.
- Central Plant air compressors have been replaced with variable speed drive units.
- Economizer installations recover waste heat from boiler exhaust. An extensive heat recovery system has been installed to allow condensing operation of the central boiler plant.
- Roofing projects include upgraded levels of insulation.
- Programs to upgrade single pane windows are currently underway.
- Induction lighting fixtures have been installed on roadways.
- Ongoing lighting retrofits use high-efficiency electronic ballasts and lamps, as well as occupancy sensors. High-efficiency lighting is mandated during renovations and for new construction projects.
- LED lighting is being utilized where economically viable.
- Power factor correction capacitor banks reduce loading on the incoming electrical feeders.
- Instantaneous water heaters have been installed in intermittent but high usage areas.
- Air to air heat recovery utilized on fume hood exhaust systems.
- Free cooling installations have been expanded throughout campus.
- Variable flow pumping and HVAC systems result in lower energy consumption.
- Air conditioning systems have been replaced with high-efficiency CFC-free equipment.
- Currently recruiting for an energy manager whose primary focus will be on conservation efforts.

Dennis Huber
Vice-President,
Administration & Finance
FOR APPROVAL

New Degree Hoods

Motion: To approve the following new degree hoods:

- **Bachelor of Global Business and Digital Arts (BGBDA):** Oxford Bachelor shape with green border and wine soutache braid trim – the same colours as the Master of Digital Experience Innovation (MDEI) hood.

- **Doctor of Pharmacy (PharmD):** black silk hood in the American style with gold lining and olive green boarder – similar in style to the Doctor of Optometry (OD) hood which has a seafoam green boarder.

Ray Darling
Registrar