

FOR INFORMATION	PUBLIC	OPEN SESSION	
то:	Academic Board		
SPONSOR: CONTACT INFO:	Sioban Nelson, Vice-Provost, Academic Programs (416) 978-2122, <u>vp.academicprograms@utoronto.ca</u>		
PRESENTER: CONTACT INFO:	See above		
DATE:	November 7, 2017 for November 23, 2017		
AGENDA ITEM:	8		

ITEM IDENTIFICATION:

Semi-Annual Report on the Reviews of Academic Units and Programs, April – September 2017

JURISDICTIONAL INFORMATION:

"The Committee...has general responsibility...for monitoring, the quality of education and the research activities of the University. In fulfilling this responsibility, the Committee works to ensure the excellent quality of academic programs by...monitoring reviews of existing programs....The Committee receives annual reports or such more frequent regular reports as it may determine, on matters within its purview, including reports on the ...[r]eviews of academic units and programs." (*Committee on Academic Policy and Programs (AP&P) Terms of Reference, Sections 3, 4.9*)

Within the Accountability Framework for Cyclical Review of Academic Programs and Units, the role of AP&P is to undertake "a comprehensive overview of review results and administrative responses." AP&P "receive[s] semi-annual program review reports including summaries of all reviews, identifying key issues and administrative responses," which are discussed at a "dedicated program review meeting with relevant academic leadership." (*Policy for Approval and Review of Academic Programs and Units*). AP&P's role is to ensure that the reviews are conducted in line with the University's policy and guidelines; to ensure that the Office of the Vice-President and Provost has managed the review process appropriately; to ensure that all issues relative to the quality of academic programs have been addressed or that there is a plan to address them; and to make recommendations concerning the need for a follow up report.

The compendium of review summaries is forwarded, together with the record of the Committee's discussion, to the Agenda Committee of the Academic Board, which determines whether there

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are any issues warranting discussion at the Board level. The same documentation is sent to the Executive Committee and the Governing Council for information.

GOVERNANCE PATH:

- 1. Committee on Academic Policy and Programs [for information] (November 2, 2017)
- 2. Agenda Committee of the Academic Board [for information] (November 14, 2017)
- 3. Academic Board [for information] (November 23, 2017)
- 4. Executive Committee of the Governing Council [for information] (December 5, 2017)
- 5. Governing Council [for information] (December 14, 2017)

PREVIOUS ACTION TAKEN:

Governing Council approved the *Policy for Approval and Review of Academic Programs and Units* in 2010. The *Policy* outlines University-wide principles for the approval of proposed new academic programs and review of existing programs and units. Its purpose is to align the University's quality assurance processes with the Province's Quality Assurance Framework through establishing the authority of the University of Toronto's Quality Assurance Process (UTQAP).

The Semi-Annual Report on the Reviews of Academic Units and Programs (October 2016 – March 2017) was previously submitted to the Committee on Academic Policy and Programs on March 29, 2017.

HIGHLIGHTS:

External reviews of academic programs and units are important mechanisms of accountability for the University and a vital part of the academic planning process. Academic reviews are critical to ensuring the quality of our programs through vigorous and consistent processes that assess the quality of new and existing programs and units against our international peers.

Summaries of the external review reports and the complete decanal responses for ten external reviews of units and/or academic programs are being submitted to AP&P for information and discussion. Of these, one was commissioned by the Vice-President and Provost and nine were commissioned by the Dean. The signed administrative responses from each Dean highlight action plans in response to reviewer recommendations.

Overall, the themes raised in these reviews echoed those in previous compendia: the excellent quality of our programs, the talent and high calibre of our students, and the impressive body of scholarship produced by our faculty. In addition, this set of reviews highlighted programs' innovative and creative curriculum, and ongoing efforts to build and renew curriculum.

As always, the reviews noted areas for development. These included encouragement to think more strategically about curriculum and the resources needed to better support research, experiential learning, and career opportunities for undergraduate students. Reviewers also noted that graduate student time to completion rates, while improving, require continued support.

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Additional reviews of programs are conducted by organizations external to the University. Reviews of academic programs by external bodies form part of collegial self-regulatory systems to ensure that mutually agreed-upon threshold standards of quality are maintained in new and existing programs. A summary listing of these reviews are presented in the Appendix.

FINANCIAL IMPLICATIONS:

Not applicable.

RECOMMENDATION:

This item is for information and feedback.

DOCUMENTATION PROVIDED:

Compendium of Reviews of Academic Programs and Units, April - September 2017



OFFICE OF THE VICE-PROVOST, ACADEMIC PROGRAMS

Reviews of Academic Programs and Units

April - September 2017

Report to the Committee on Academic Policy and Programs November 2, 2017

Reviews of Academic Programs and Units

April - September 2017

Report to the Committee on Academic Policy and Programs

November 2, 2017

1 Provostial Reviews

Faculty of Applied Science and Engineering

• No programs, not a UTQAP review

2 Decanal Reviews

Faculty of Arts and Science

- Canadian Studies programs
 - o Undergraduate: Canadian Studies, B.A. (Hons.): Major, Minor, Specialist
- Cognitive Science programs
 - o Undergraduate: Cognitive Science, B.A., B.Sc. (Hons): Major
- Equity Studies program
 - o Undergraduate: Equity Studies, B.A. (Hons.): Major
- Sexual Diversity Studies programs
 - o Undergraduate: Sexual Diversity, B.A., (Hons): Specialist, Major and Minor
- Department of Statistical Sciences
 - Undergraduate: Actuarial Science, B.Sc. (Hons.): Major; Applied Statistics, B.Sc. (Hons): Specialist; Statistics, B.Sc. (Hons.): Major, Minor, Specialist; Statistics and Mathematics, B.Sc. (Hons): Specialist
 - Graduate: Statistical Sciences, M.Sc., Ph.D.

Faculty of Medicine

- Department of Immunology
 - Graduate: Immunology, M.Sc., Ph.D.
 - Undergraduate: Immunology, B.Sc. (offered through the Faculty of Arts and Science)

University of Toronto Mississauga

- Department of Chemical and Physical Sciences
 - Undergraduate: Astronomical Sciences, B.Sc., (Hons.): Specialist; Astronomy, B.Sc., (Hons.): Major; Biological Chemistry, B.Sc., (Hons.): Specialist; Biomedical Physics, B.Sc., (Hons.): Specialist; Chemistry, B.Sc., (Hons.): Specialist, Major, Minor; Earth Science, B.Sc., (Hons.): Specialist, Major, Minor; Environmental Geosciences, B.Sc. (Hons.):

Specialist (offered with UTM Department of Geography); Geology, B.Sc., Hons.: Specialist; Physics, B.Sc., Hons.: Major, Minor

- Department of Historical Studies
 - Undergraduate: Classical Civilization, B.A., (Hons.): Major, Minor; Diaspora and Transnational Studies, B.A., (Hons.): Major, Minor; History, B.A., (Hons.): Specialist, Major, Minor; History and Political Science, B.A., (Hons.): Specialist (offered with Dept. of Political Science); History of Religions, B.A., (Hons.): Specialist, Major, Minor; Latin American and Caribbean Studies: Minor; South Asian Civilizations: Minor; Women and Gender Studies, B.A.: Major, Minor
- Department of Management
 - Undergraduate: Commerce, B.A., (Hons.): Major; Commerce, B.Com.: Specialist; Commerce, Accounting, B.Com.: Specialist; Commerce, Finance, B.Com.: Specialist; Commerce, Marketing, B.Com.: Specialist; Management, B.A., (Hons.): Major; Management, Management Stream, B.B.A.: Specialist; Management, Human Resource Management and Industrial Relations Stream, B.B.A.: Specialist

Appendix I: Externally-commissioned reviews of academic programs, April - September 2017

Review Summary

Programs(s) Reviewed:	n/a
Division/Unit Reviewed OR Division/Unit Offering Program(s):	Faculty of Applied Science & Engineering
Commissioning Officer:	Vice-President and Provost
Reviewers (Name, Affiliation):	 Professor David C. Munson, Jr., President- elect, Rochester Institute of Technology; former Robert J. Vlasic Dean of Engineering, University of Michigan Professor Indira Samarasekera, Distinguished Fellow in Residence, Liu Institute for Global Issues, UBC; former President and Vice Chancellor, University of Alberta
Date of Review Visit:	January 31-February 2, 2017

Previous Review

Date: May 5-6, 2010

Summary of Findings and Recommendations

1. Undergraduate Studies

The reviewers observed the following strengths:

- Steady increase in entering averages
- The establishment of the Engineering Communication Program places an emphasis on communication skills

The reviewers identified the following areas of concern:

- Curriculum is demanding and not very flexible
- Engineering Communication Program needs a mechanism to assess its effectiveness and more consistency across disciplines, e.g., with respect to grading

The reviewers made the following recommendations:

- Revise the curriculum to address program demands and to ensure greater flexibility
- Invigorate the Engineering Summer Internship Program to increase participation and consider increasing opportunities for undergraduate student research experiences
- Review academic counselling activities for both first-year and upper-year students in the context of changing student needs

2. Graduate Studies

The reviewers observed the following strengths:

- In excellent shape
- Expanded enrolment in graduate programs, and in particular the PhD and MEng
- Significant enhancements made in the MEng program

The reviewers identified the following areas of concern:

• Long funding period encourages longer time-to-completion

The reviewers made the following recommendations:

- Address relatively high time-to-completion
- Direct some of the current effort and resources on the MASc degree toward the PhD program

3. Research

The reviewers observed the following strengths:

- Thriving research enterprise; funding, publication and citation rates are outstanding when judged against international standards
- An Associate Chair, Research has been established in most departments

The reviewers made the following recommendations:

- Increase industry-funded research and facilitate the transfer of research results to the market place
- Ensure that a critical mass of faculty are interested and resourced for the newly established centres and institutes

4. Organizational Structure and Resources

The reviewers observed the following strengths:

- Well-received administrative structural changes
- Multiple initiatives have enhanced the Faculty's diversity at all levels,
- Excellent faculty hires
- Strong collaborative relations with a number of other Faculties

The reviewers made the following recommendations:

• Dean's budget director and departmental budget administrators should hold regular meetings to facilitate the success of the new budget model.

Current Review: Documentation and Consultation

Documentation Provided to Reviewers

- Terms of Reference
- Self-Study and appendices (2016) that included: Previous External Review Report (2010) and Administrative Response; Academic Plan 2011-2016; Academic Plan Progress and Achievements; 2016 Annual Report of Performance Indicators; 2010 Catalogue of Advancement Priorities; Peer Institutions in the National Survey of Student Engagement (NSSE); Library Report; Student Services Statement; Graduate Degree Requirements, Curriculum Areas and Research Themes; List of FASE Research Centres and Institutes; FASE Organizational Chart
- Website links: *Towards 2030: The View from 2012;* The University of Toronto; The Vice-President and Provost; The Faculty of Applied Science & Engineering

Consultation Process

During the visit, the review team met with:

- Professor Cheryl Regehr, Vice-President and Provost; Professor Sioban Nelson, Vice-Provost, Academic Programs; Professor Elizabeth Smyth, Vice-Dean, Programs, School of Graduate Studies
- Professor Cristina Amon, Dean, Faculty of Applied Science & Engineering (FASE)
- FASE academic leadership team (Vice-Dean, Undergraduate; Vice-Dean, Graduate Studies; Vice-Dean, Research; Chair, First Year; Associate Dean, Cross-Disciplinary Programs)
- Chairs and directors of FASE academic units
- FASE associate chairs, undergraduate, graduate and research
- Pre-tenure and tenured FASE faculty
- FASE undergraduate and graduate student representatives
- FASE administrative staff and administrative leadership team
- FASE alumni representatives
- Deans of cognate Faculties (Arts and Science, Dentistry, Forestry, Management, Medicine, Public Health)
- FASE Professor Craig Simmons, Director of Translational Biology & Engineering Program (TBEP), including tour

Current Review: Findings and Recommendations

1. Teaching and Research (Items 1, 2, 3 & 4 from Terms of Reference)

The reviewers observed the following strengths:

Overall

- Outstanding faculty and student body
- Worldwide reputation for excellence in research and education

Undergraduate education

- Focused on training the "global engineer"
- Reasonably high quality of teaching
- Increased number of undergraduate research experiences and improved professional education
- Enormous improvements in diversity among the undergraduate student body in recent years; 40% women in the entering class "impressive" and the highest percentage that the reviewers have encountered at a public university
- Engineering software is available to students on laptops via virtual machines, a "best practice"
- Institute for Leadership Education in Engineering provides significant added value
- Engineering Communication Program is "forward-looking" and provides muchneeded offerings to students
- Programs in entrepreneurship are important and seem to be working well (The Hatchery, etc.)
- Introduction of an engineering business minor
- Orientation week builds student spirit
- FASE has embedded mental health counselors from the central counseling services at U of T, a "best practice"
- Students reported a positive culture and adequate social and research opportunities
- Students in Materials Science and Engineering reported being "pleased" with their relationships to faculty members

Graduate education

- "Outstanding" programs; the top in Canada and "highly" competitive internationally
- MEng program has grown "enormously", with flexibility in program offerings; future-oriented and able to serve the needs of industry
- The new collaborative specialization in engineering education is a "worthwhile addition"

- Some orientations are excellent for incoming graduate students
- Graduate student organizations seem to work well with the departmental administrations; departments fund social events and professional development events; Graduate Research Days are held for prospective students, and sometimes industry
- "Rare" and advantageous that each student has co-advisers from two different departments in the Centre for Aerial Robotics Research and Education

Faculty

- "Superb" quality of faculty; high tenure rates
- Pre-tenure are "very positive" about their experiences and support they receive
- "Outstanding job" in enhancing the number of honours and awards; received 20% of major national awards despite only 6% of the engineering faculty in Canada; "smart move" to dedicate a full-time staff position to supporting applications
- Good support provided for innovation in teaching

Research

- Outperforms Canadian peers on peer-reviewed funding, citations and international rankings
- Impressive increases from NSERC and Tri-Council agencies
- "Thriving" cross-disciplinary initiatives
- Strong partnerships received several successful external funds for joint efforts
- Increase in industry funding since last review
- "Laudable" that several faculty members conduct engineering education research despite the lack of Canadian funds available in this area
- Research start-up packages are "fairly comparable" to what is offered at other top universities in Canada and the U.S.

The reviewers identified the following areas of concern:

Undergraduate education

- Students reported an inconsistent commitment to teaching amongst faculty
- Students reported the appeals process is unclear
- "Surprising" that FASE is offering the business minor and some science and math courses itself rather than giving students the opportunity to learn from faculty from other divisions
- Few music practice spaces are available for engineering students taking music opportunities
- Course labs "too recipe-based"; students would like more "real-world" experience
- While improvements are underway, students expressed their unhappiness with the costs associated with and the matches available for placements supported by the Engineering Career Centre
- Commuter challenges impact students' quality of education

• Need for more flexibility with respect to U.S. applicants

Graduate education

- Time to completion is "unusually long" for PhDs
- In most departments, students do not know the value of their stipend when they begin a new academic year
- Reviewers were "surprised" to learn that SGS primarily relies on the various Faculties (e.g., FASE) to monitor and improve diversity, equity and inclusion among graduate students; varied quality of some orientations for incoming students
- Many students commute long distances, which "severely" cuts into available research time
- PhD students do not come to campus daily, creating a sense of "isolation" from their research group; MEng students reportedly have the least community

Faculty

- Some faculty in charge of large courses reported workload increases due to the "optimized" course scheduler
- Some tenured faculty members report an excessively high workload, but the reviewers felt that the teaching loads seem "reasonable" for a public university
- Faculty do not view positively the requirement to register as a professional engineer in Canada
- Reviewers noted some irregularity in the enforcement of the parental leave policy

The reviewers made the following **recommendations**:

Undergraduate education

- Most departments need a more cohesive approach to teaching design throughout the curriculum to ensure that connections are made from the first to upper years
- Apply some best practices in student-faculty relations from Materials Science and Engineering to other departments
- Reviewers support the current initiative to develop a minor in music for engineering students
- Collaborate more with Music, the Arts, and Architecture in the realm of creativity and design
- The Engineering Career Centre should continue to develop a more diverse set of student co-op positions [note that these are called Professional Experience Year internships in the Engineering Career Centre]
- Consider more flexibility in U.S. student admissions (e.g., use of online courses to meet requirements)

- To stimulate deeper student engagement, consider the student suggestion to form an advisory committee of commuters to provide advice and recommendations on how to better engage students
- To describe and measure impact, FASE needs better data on where its undergrads go upon graduation and what jobs they do

Graduate education

- Reduce average time-to-completion for PhD students
- Departments should learn and implement orientation best practices from one another
- Graduate students should be served by the FASE career fairs and Engineering Career Centre
- Departments should communicate better with their graduate students on the topic of professional licensure
- Institute additional programs to build community among graduate students that would provide a more holistic student experience and create stronger ties back to U of T after graduation
- Reviewers support more aggressive recruitment of Canadian PhD students
- Improve tracking of graduates
- To provide more funding transparency and certainty to PhD students, inform students of their stipend levels prior to the beginning of the school year
- Project teams would benefit by sharing common space and shop facilities in a single location; allows for enhanced student interaction and sharing of information and ideas
- U of T (and FASE) may benefit from more centralized support for best practices to monitor and improve diversity, equity and inclusion among graduate students

Faculty

- Investigate faculty reports of problems with the "optimized" course scheduler
- Strictly enforce a common policy for parental leave across all FASE departments

Research

- Continue to work on a "compelling research vision" in order to compete with the top schools in the U.S.; further grow interdisciplinary cross-faculty collaborations; brand U of T as the "go-to place" for solutions to major challenges and for leadership in ground-breaking innovations that will transform society
- Develop data on how FASE is faring with respect to its peers in terms of overall industry funding, creation of large scale industry consortia, etc.
- Regularly collect and analyze performance data compared to peers in the generation of intellectual property, licensing, and long-term performance of U of T spinoffs
- Consider data for the U of T medical school, because of the many joint commercialization activities possible

Overall

• Further work is needed to improve diversity in FASE with respect to underrepresented groups, including Indigenous peoples

2. Organizational Structure and Resources (Item 5 from Terms of Reference)

The reviewers observed the following strengths:

- New Centre for Engineering Innovation and Entrepreneurship, currently under construction promises to be a "vital addition" to FASE
- Good quality of space for research labs and student offices; Ted Rogers Centre for Heart Research is particularly "impressive"
- The Dean has "wisely" set aside faculty positions for cross-disciplinary hiring
- Hiring of teaching stream faculty is a "welcome innovation"
- Enthusiastic staff
- Strong cohesion among the department chairs; consensus that FASE is running well; optimism about the future
- FASE is in "good financial health"; the new budget model is unanimously viewed as a success
- Opening of the shop in the Department of Mechanical and Industrial Engineering has been very helpful to a number of student project teams
- High demand for enrolment
- The Academic Plan has been helpful to the Communications Office

The reviewers identified the following areas of concern:

- Space is in short supply to accommodate both faculty labs and office space for graduate research students; "biggest constraint on hiring more faculty"
- Department chairs felt that U of T core research facilities generally are not up to the standard of those in top U.S. universities
- Reviewers remarked that a lack of student engagement may result in reduced allegiance to U of T and negatively impact fundraising
- Some faculty reported that it is difficult to attract top PhD students, given Toronto's high cost of living and the weaker Canadian dollar

The reviewers made the following recommendations:

- Reviewers supported the proposed centre for engineering education to address gaps in research and practice in engineering education, common at nearly all universities
- Lab courses should receive extra weight (compared to lecture classes) in the FASE budget model

- Conduct a study on core facilities to determine how a small number of such facilities, shared by a large number of research teams, can be supported in a sustainable way, perhaps through industry partnerships
- Build a sizable endowment for the long term to guard against potential downturns and other financial threats
- Communicate more strongly to government, influencers and opinion makers, measures on commercialization, companies started by alumni, alumni contributions, and major accomplishments of research impact
- To build the FASE profile and "brand", establish a Presidential Visiting Committee, or expand the Dean's Advisory Committee
- Pursue every path to have a naming gift in place in time for the building opening of the Centre for Engineering Innovation and Entrepreneurship

3. Internal and External Relationships (Items 6 & 7 from Terms of Reference)

The reviewers observed the following strengths:

- Dean provides leadership throughout Canada in thinking about the future of engineering as a field and its implications on how engineering education and academic research ought to develop
- Cognate Deans "highly complimentary" about Dean Amon's collaborative abilities, ease of working with FASE
- The Centre for Global Engineering and the Institute for Sustainable Energy offer opportunities for student teams to contribute to engineering solutions in the developing world

The reviewers made the following recommendations:

- Work toward further integration of student body and academic programs with the rest of campus
- Respond to the enormous growth in master's programs by offering better career service to industry, enhancing university-industry relations



Cristina Amon, Dean

October 12, 2017

Professor Sioban Nelson Vice-Provost, Academic Programs Simcoe Hall University of Toronto

Dear Sioban

I write in response to your letter of August 30, 2017 regarding the January 31 - February 2, 2017 external review of the Faculty of Applied Science and Engineering, commissioned by the Vice-President and Provost.

The review process is a valuable exercise that affords us the opportunity to take stock of the state of our Faculty. We are extremely pleased with the reviewers' positive assessment of our Faculty, including our outstanding faculty and student body and worldwide reputation for excellence in research and education.

Below I address the issues raised by the reviewers and outlined in your request for an administrative response.

Teaching and Research – Undergraduate and Graduate Education

1. The reviewers noted undergraduate student concerns regarding the costs of [PEY] placements and the lack of availability of matches in some disciplines; they recommended better support for student placements and career services in all disciplines, including for graduate students.

The Faculty created a new position of Academic Director of the Engineering Career Centre (ECC) in 2016 to begin the process of restructuring it, specifically, to add professional development prior to the Professional Experience Year (PEY) internship program. To build a comprehensive professional development program for students, the ECC has partnered with the Institute for Leadership Education in Engineering (ILead) to address areas such as developing PEY learning outcomes, creating and delivering PEY programming for students, and redesigning PEY evaluation methods and tools. In addition, the Academic Director launched the inaugural PEY EDGE Conference in September 2017, where returning PEY students can share their experiences on a variety of topics.

An Interim Director of the ECC has recently been appointed and tasked with reviewing and improving the operational aspects of the ECC's PEY program. To address the lack of availability of internship placements in some of our disciplines, we are creating a position to proactively

engage with existing and new industry partners to develop a broader selection of placement opportunities, both in Canada and abroad. This position will also collaborate with the FASE directors of corporate, government, international and foundation partnerships to leverage existing external relationships to market the PEY opportunity to partners that don't currently participate.

We recognize the need to provide better professional development and improved and more diverse placement opportunities for our graduate students, and have begun to expand placement opportunities for students in the Institute of Biomaterials and Biomedical Engineering's (IBBME) Master of Engineering and Master of Health Science in Clinical Engineering programs. To better meet the demand for graduate internships, IBBME hired a business development specialist in September 2017 to initiate a pilot project to search for placements opportunities for students. We will work with the ECC to extend this initiative to students in all our professional graduate programs.

While we believe the PEY internship fee is reasonable and certainly comparable to the fees of co-op placements at peer institutions, we acknowledge that some students have felt their expectations of the program have fallen short. As part of an overall review of our financial allocation for the ECC, we will also review the placement fee structure.

Short-term goals (within 1 year):

- Review the administrative operations and budget model of the ECC to ensure alignment with emerging professional development priorities.
- Appoint a full-time, continuing ECC Director.
- Create a new position in the ECC to focus on external relationships.
- Implement new professional development opportunities for undergraduate students and develop learning outcomes to better define and assess the value and attributes of experiential learning.

Medium-term goals (1-2 years):

- Foster partnerships to enhance the services provided by the ECC, including ILead, alumni, the *You're Next Career Network* (YNCN), and the University Career Centre.
- Further develop internship placement opportunities through the new position in the ECC, and connect with industrial liaison officers at the Faculty and departmental levels.
- Expand the breadth of international PEY internship opportunities.
- Expand professional development and internship opportunities to other graduate disciplines.
- Create an optional APS 1.0-1.5 FCE course for MEng students in some programs that includes an internship.

Long-term goals (3-5 years):

- Assess the impact of improvements made to the ECC's administrative operations and budget model.
- Build new relationships with industry, government and international partners to ensure that students across all disciplines have appropriate internship opportunities.

• Extend optional graduate internships to students in all graduate professional programs (MEng) in the Faculty.

2. To provide transparency and certainty to students regarding funding, the reviewers strongly recommended that all students be informed of their stipend levels prior to the start of the academic year.

The Faculty communicates minimum guaranteed stipend levels on our website, and has made significant efforts over the last two years to encourage academic units to communicate to their students their average funding levels and the funding sources that combine to make stipends. It is currently not possible to advise all students of their total stipend levels, above the minimum, prior to the start of the academic year because not all TA assignments are finalized at that time. We will endeavor to accelerate the assignment of teaching assistantships across the Faculty in order to provide this information to students in a more timely manner. We will also explore the development of template funding letters with the School of Graduate Studies in order to facilitate these communications.

Short-term goals (within 1 year):

- Work with graduate units to accelerate the assignment of TA positions.
- Work with graduate units to identify mechanisms to provide annual individualized funding information to each funded student.

Medium-term goals (1-3 years):

- Monitor that the process of assigning TA positions in academic units is done as timely as possible.
- Continue to work with graduate units on annual individualized funding information.

3. The reviewers recommended reducing average time-to-completion for PhD students, a concern raised in the previous external review.

Over the last several years, trends for the average PhD time-to-completion have been affected by the practice of many academic units to promote fast-tracking and direct-entry into their PhD program. This accounts for more than 30 percent of our students and may contribute to the inflation of average time-to-completion. We will survey students and professors to better understand and address this and other trends that may impact time-to-completion.

A key aspect of PhD student supervision that can decrease time-to-completion are mandatory annual supervisory committee meetings, where student progress can be assessed and formally documented and remediation measures can be recommended. However, monitoring and compliance with these meetings have traditionally been uneven across our academic units. The recent introduction of progress trackers – whether provided through an SGS pilot project or developed by FASE graduate units – has helped units automate and monitor compliance.

Short-term goals (within 1 year):

• Ensure that all academic units comply with the requirement for annual supervisory committee meetings for PhD students.

• Analyse the PhD time data to understand the impact of that fast-tracking and direct entry may have on the average time-to-completion.

Medium-term goals (1-2 years):

- Ensure that all academic units adopt a progress tracker to make the process of determining PhD student progress accurate and efficient.
- Survey students and professors to understand and address the impact of any additional factors on time-to-completion.

Long-term goals (3-5 years):

- Decrease the average PhD time-to-completion by 10 percent.
- Support PhD students' research in ways that can positively affect their time-tocompletion. This can include facilitating their use of library resources, thesis writing, statistical experimental design, and data analysis.

4. The reviewers made a number of suggestions around tracking the [employment] outcomes of graduates of the Faculty's undergraduate and graduate programs.

We agree with the reviewers' recommendation that we increase our efforts to track the employment outcomes of our students. We will use and expand on several recent initiatives to better collect and analyse this data on an ongoing basis.

These initiatives include our first exit survey of undergraduate students, conducted this spring. It has yielded a wealth of information on students' future employment plans, and we will refine and repeat it annually. Our new U of T Engineering CONNECT platform has now been rolled out Faculty-wide, allowing all our alumni to continuously update their career information. The School of Graduate Studies' extensive graduate employment dataset, the *Ten Thousand PhDs* project, includes information on U of T PhD students from 2000 to 2015, and has provided us with information on the distribution of our PhD graduates across multiple employment sectors and locations.

Short-term goals (within 1 year):

- Analyse data collected in U of T Engineering CONNECT to better understand the employment outcomes of our alumni across all academic units.
- Keep in touch with graduates through our Alumni office on an ongoing basis.

Medium-term goals (1-2 years):

- Continue to refine and administer the exit survey of undergraduate students.
- Analyse the data collected through the *Ten Thousand PhDs* project to better understand where our graduate master's and PhD students are employed.

Long-term goals (3-5 years):

• Elevate and complete the tracking of our undergraduate alumni to a University-wide initiative for the benefit of all Faculties at U of T.

5. The reviewers suggested ways to build community and support deeper engagement of undergraduate and graduate students, many of whom are commuters.

Although approximately half of our first-year undergraduate class commutes to the University, we have no clear evidence that commuting significantly interferes with their ability to engage in our rich engineering community. The Faculty does, however, appreciate that commuting is a barrier to community engagement for some students, and we agree that more can be done to support their curricular and co-curricular experience.

To address this, we will partner with the Engineering Society to create a committee where concerns of commuting students can be raised, and we will gather input on students' commuting experience through Town Hall meetings and focus groups. We will also explore how we can use our spaces to build community and support the inclusion of commuting students in curricular and co-curricular experiences.

On the graduate side, we have launched a professional development program for our PhD students and postdocs called *Opportunities for PhDs: Transitions, Industry Options, Networking, and Skills* (OPTIONS). This includes a series of 11 workshops, held weekly, where students can share ideas about career pathways and professional skills with alumni, career management experts and professors, plus additional signature events that focus on developing networking skills. We will evaluate the success of the OPTIONS program and extend it to include workshops on additional career pathways.

Short-term goals (within 1 year):

- Develop a Commuting Student Advisory Committee in partnership with the Engineering Society to address issues of particular relevance to commuting students.
- Make specific efforts to better understand the experience of commuting engineering students through Town Hall meetings and focus groups.
- Monitor and evaluate the recently launched OPTIONS program and extend the program to offer additional career pathway-specific workshops.

Medium-term goals (1-2 years):

• Explore how our spaces can be used more effectively to build community and support the inclusion of commuting students in curricular and co-curricular experiences.

Teaching and Research – Faculty

6. The reviewers flagged an issue around consistent approaches to parental leave across departments and urged the Faculty to ensure that policy is understood and applied consistently.

While we are not aware of any specific instance where the parental leave policy was being applied in an inconsistent manner in the Faculty, we will take action to communicate this policy clearly to academic and administrative managers. Managers will also be encouraged to seek support through the Faculty's Human Resource office in applying this policy. In addition, we will review all parental leaves through our HR office on an annual basis to ensure the policy is followed appropriately.

Short-term goals (within 1 year):

• Communicate policy to all academic and administrative managers in the Faculty.

Medium- to long-term goals (1-5 years):

• Review all parental leaves annually to ensure adherence to policy.

Relationships

7. The reviewers noted that cognate Deans appreciated FASE's collaborative style, but identified further opportunities for students and programs to benefit from interaction and integration with other divisions.

To prepare our students for the ever-changing landscape of the engineering profession, we offer interdisciplinary undergraduate minors and certificates, many of which involve other Faculties. Our students can also take Arts and Science minors in disciplines such as math, economics and geography, among others, and professors in Faculties such as Arts and Science teach courses in several of our Engineering Science streams. At the graduate level, we partner with other Faculties to offer collaborative specializations such as in Engineering Education with OISE, Psychology and Engineering with the Faculty of Arts and Science, and Biomedical Engineering with the Faculties of Medicine, Arts and Science, and Dentistry. We will continue to explore the development of new interdisciplinary programs.

We collaborate extensively with other divisions on the research front, with many of our research institutes and centres enjoying strong ties with other U of T Faculties. Notable interdivisional collaborations include Medicine by Design, which involves researchers and clinicians from the Faculties of Applied Science and Engineering, Arts and Science, Medicine, and Pharmacy and partner hospitals, and the Translational Biology and Engineering Program, which brings together researchers and their students from the Faculties of Applied Science and Engineering, Dentistry, and Medicine. We will expand our interdisciplinary research initiatives by continuing to support EMHSeed, an internal funding program that provides seed funding for cross-disciplinary collaborative research in partnership with the Faculty of Medicine and affiliated hospitals, and will continue to support cross-disciplinary research as synergies arise.

Short-term goals (within 1 year):

• Develop an Engineering Science stream and a minor in Machine Intelligence to launch in 2018, with elective courses taught by the Arts and Science departments of Computer Science, Statistics, and Mathematics.

Medium-term goals (1-3 years):

- Work with the Faculty of Music to develop a new minor and certificate in Music.
- Build upon our interdisciplinary research initiatives by continuing to support EMHSeed.

8. The reviewers encouraged departments to share best practices to support engagement and student-faculty interaction across undergraduate and graduate programs.

While there are a number of ways in which students can engage with their instructors and the Faculty, we acknowledge that the effectiveness of these opportunities can be improved and that new avenues can be created.

To enable student feedback to be acted upon in a timely manner, we will make a concerted effort to encourage more faculty to implement the SpeakUp platform, which was developed by the Engineering Society to allow "real-time" course-related feedback via mid-term course evaluations. The Faculty launched the *Meet Your Professor* event during the 2017 first-year orientation to enable students to meet and mingle with their fall-term professors in an informal setting. We will evaluate and refine this event, and continue to offer it in future orientations. Our recent review of maker spaces identified the types of spaces available to our students that can support prototyping and hands-on learning. We will use this information to support student collaboration and engagement by allowing better access to and awareness of these facilities.

The School of Graduate Studies recently developed graduate supervision guidelines for professors, which clearly set out quality standards and expectations regarding graduate supervision within departments. We will promote these guidelines throughout our Faculty. We have worked with our graduate student associations to organize an annual Graduate Career Fair, which is attended by industry partners and students seeking internships or permanent positions after graduation. We will build on the success of the fair by increasing the number of companies in attendance in the next two years.

Short-term goals (within 1 year):

- Promote the SGS graduate supervision guidelines in our Faculty.
- Evaluate the success of the *Meet Your Professor* orientation event and refine it for future years.
- Facilitate the sharing of best practices across the Faculty (including student clubs) to foster student engagement across academic units, and to increase the number of informal gatherings of students and faculty.

Medium-term goals (1-3 years) goals:

- Encourage more faculty members to implement midterm course evaluations through the SpeakUp platform.
- Use the outcome of the maker spaces report to improve awareness, coordination and access to fabrication spaces, and consider the design and ergonomics of spaces within the Faculty as a means of encouraging student-faculty interactions.
- Grow the size of the annual Graduate Career Fair by 20 percent (number of companies attending the fair) over each of the next two years.

Resources

9. The reviewers made a number of recommendations to enhance the Faculty's profile and "brand".

The reviewers recommended that we increase our efforts to more strongly build our profile, increase our visibility, and better articulate our impact on society and the economy. They also recommended that we continue to develop a compelling research vision and build a case for large-scale initiatives in areas of strength or emerging opportunity.

We will sharpen our research focus on global challenges in water, energy, human health and the environment by developing transformative technologies in sustainability, data science, robotics, artificial intelligence, health technology and advanced materials and manufacturing. As stated in our response to recommendation 7, we will expand our interdisciplinary research initiatives by building on the success of EMHSeed, an internal funding mechanism for cross-disciplinary research between our Faculty and the Faculty of Medicine and our affiliated hospitals.

We will strengthen the advisory boards within our departments, institutes and extradepartmental units by more closely involving industry representatives. This will enhance the visibility and impact of our research, education and innovation, and the relevance and profile of our Faculty.

Our Strategic Communications group is integral to the development and communication of our Faculty's vision and brand, and they will continue to focus their efforts on increasing the visibility of our multidisciplinary, collaborative and innovative research initiatives. We will work with communicators within our Faculty and at the University level to ensure the consistency of our messaging, and will expand our network of media contacts and influencers in key geographic regions. To build upon the success of our marketing strategies, our Strategic Communications group will increase the understanding of key stakeholders and the Faculty's strengths and academic priorities.

The University's brand marketing team will undertake a comprehensive, multi-stakeholder assessment of the University brand health in 2017. We will use these findings to consider whether further Faculty-level market research on perceptions and beliefs is necessary for more informed marketing strategies.

Short-term goals (within 1 year):

- Adopt a campaign-based model of marketing and communications to enhance the visibility of the Faculty.
- Develop an intranet platform to facilitate and enhance internal communication and consistency of messaging.
- Focus our research activities on addressing global challenges through the development of transformative technologies.

• Continue internal EMHSeed funding to support collaborative research involving the Faculty of Applied Science and Engineering, the Faculty of Medicine, and affiliated hospitals.

Medium-term goals (1-2 years):

- Our Strategic Communications group will develop a quantitative and qualitative understanding of key stakeholders to improve marketing activities, and train and support their staff in ways to stay abreast of the Faculty's strengths and academic priorities.
- Expand the Faculty's network of media contacts and influencers in key geographic regions.
- Develop a Faculty brand around interdisciplinarity, collaboration and innovation.
- Review the advisory boards of FASE departments, institutes and EDUs with the aim to enhance industry engagement.

Long-term goals (3-5 years):

• Develop a robust, quantitative reporting cycle that reflects the impact of marketing and communications activities against benchmark data provided by market research.

Diversity

10. The reviewers commended the enormous improvements made in diversity among the undergraduate student body. They noted that further work is needed with respect to other underrepresented groups, including indigenous peoples.

Over the past decade, the Faculty has significantly increased both gender and cultural diversity within our undergraduate student population and our professoriate, with the percentage of both female undergraduate students and members of our faculty nearly doubling over this time. We have also worked hard to increase our reputation as a premier destination for undergraduate studies, and this has resulted in an over 300 percent increase in applications from international students since 2007.

While we will continue our successful efforts to increase gender diversity and inclusion in our Faculty in the coming years, we will also focus on increasing representation from Indigenous, Black and other communities underrepresented in engineering programs. For example, we will consider key recommendations of the *Eagle's Longhouse: Engineering Indigenous Initiatives Steering Committee*, which we established in 2017 with members from across the Faculty and the Oneida Nation to recommend immediate and ongoing actions to improve the relationship between the Faculty and Indigenous communities.

Short term goals (within 1 year):

• Continue our successful efforts of increasing gender diversity in our Faculty, and work toward increasing representation from Indigenous, Black and other underrepresented communities.

- Act upon key recommendations from the Eagle's Longhouse steering committee. These include establishing an Indigenous Engineering Office, and expanding our admissions pathways to make them more accessible for students with non-traditional backgrounds.
- Build upon our outreach and programming efforts to strengthen relationships with underrepresented communities.
- Establish U of T Engineering scholarships for Indigenous students.
- Partner with the American Indian Science and Engineering Society's recently-founded Canadian Indigenous Advisory Council to grow our Indigenous network and hiring pool, and support the first AISES meeting to be held in Canada in February 2018.

Medium- and long-term goals (1-5 years):

- Maintain efforts to increase gender diversity and representation from Indigenous, Black and other underrepresented communities.
- Review our admissions process to mitigate barriers to admission for students who have followed non-traditional pathways.

Thank you for the opportunity to respond to the report of the external review team. Their comments and recommendations have helped sharpen the vision and future priorities for the Faculty of Applied Science and Engineering.

Sincerely

astina Jusy

Cristina Amon Dean

cc: Daniella Mallinick, Director, Academic Programs, Planning and Quality Assurance Cora McCloy, Acting Coordinator, Academic Planning and Reviews Caroline Ziegler, FASE Governance and Programs Officer

UTQAP Review Summary

Program(s) Reviewed:	Canadian Studies, B.A., (Specialist, Major and Minor), review of programs only (program housed in University College)
Division/Unit Offering Program(s):	Faculty of Arts and Science
Commissioning Officer:	Dean David Cameron, Faculty of Arts and Science
Reviewers:	 Professor Matthew Evenden, PhD, Associate Dean of Research and Graduate Studies, Chair of Canadian Studies, University of British Columbia
	2. Professor Christl Verduyn, PhD, FRSC, Director, Centre for Canadian Studies and former Davidson Chair in Canadian Studies, Mount Allison University
Date of review visit:	April 26, 2017

Previous Review

Date: 2005

Summary of Findings and Recommendations:

1. Undergraduate Programs (Canadian Studies, Specialist, Major, Minor)

The reviewers observed the following strengths:

- Strong curriculum, including courses in Asian Canadian issues, Black Canadian history
- Enrolment growth; now the largest program at University College
- Active student union
- Moving towards dedicated space in the College

The reviewers identified the following areas of concern: n/a The reviewers made the following recommendations: n/a

2. Graduate Programs (n/a)

3. Faculty/Research

The reviewers observed the following strengths:Increased faculty resources (e.g., named Chair; shared tenure-stream position)

The reviewers identified the following areas of concern: n/a The reviewers made the following recommendations:

• University College (UC) should continue to prioritize faculty complement in all UC programs

4. Administration

The reviewers observed the following strengths:

- Previous challenges around declining enrolments and limited profile and resources have been addressed
- Establishment of six funded student awards

The reviewers identified the following areas of concern: n/a

The reviewers made the following recommendations:

• University College (UC) should attend to succession planning for all UC program directors

Last OCGS Review(s) Date(s): n/a

Current Review: Documentation & Consultation

Documentation Provided to Reviewers:

Terms of Reference; Self-Study; Faculty CVs.

Consultation Process:

The reviewers met with the Dean, Faculty of Arts & Science; Vice-Dean, Academic Planning and Strategic Initiatives; University College Vice-Principal; the Director of the program; program faculty; faculty from cognate departments; Business Officer and staff; and undergraduate students.

Current Review: Findings & Recommendations

1. Undergraduate Program

Canadian Studies, B.A., (Specialist, Major and Minor)

The reviewers observed the following strengths:

- Objectives (mission, scope/priorities, learning outcomes/degree level expectations)
 - Objectives consistent with the academic plans of the Faculty of Arts and Science (FAS) and University, and with the five educational competencies identified by FAS
 - Program has coherent academic rationale and appropriate course learning outcomes and degree objectives
- Admissions requirements
 - Admission requirements (completion of 4 full course equivalents and no subjectspecific prerequisites) are "entirely appropriate" for an interdisciplinary program
- Curriculum and program delivery

- Structure and curriculum requirements are appropriate to the academic rationale, degree objectives and course learning outcomes; the number of required courses for the Specialist, Major, Minor, and Asian Canadian Minor options is comparable to those of other programs in the country
- Program delivery via core and complementary 'support' courses is consistent structure of other Canadian Studies programs
- Canadian Studies linked to other University College programs by introductory courses that provide first year students with unique learning opportunities (small classes; real-life experience through community connection) in line with program objectives of connecting classroom learning and community applications, and developing critical problem-solving skills
- Core interdisciplinary courses on key topics expose students to a variety of methodological and theoretical frameworks, consistent with programs elsewhere
- Non-core program content is provided by complementary courses offered though departments or colleges, consistent with programs elsewhere
- Curriculum (both core and complementary courses) reflects both key and new areas in the field
- Program develops multidisciplinary knowledge of Canada and critical skills that prepare students for wide variety of careers, even for students who end up working outside of Canada
- Asian Canadian program:
 - reflects an important dimension of Canada's population and demographics, and represents an innovation both in content and delivery
 - delivered in a community-engagement format (capstone and independent study courses) in keeping with good practices in peer programs
- Program offers students excellent opportunities for learning beyond the classroom and engaging in scholarly research
 - Fourth-year capstone courses involve students in research projects and community engagement that build skills in developing materials such as questionnaires, applying for grants, learning about ethics protocols, in producing "real-life" outcomes
 - Annual student undergraduate conference allows students to learn to organize and run a conference, and/or to present their research in a public forum.
 - Undergraduate student journal ImagiNATIONs is an impressive outcome and evidence of that students have the opportunity to experience the work of being editors and referees, with faculty guidance
 - Barker Fairley Distinguished Visitor program and other University College visiting speaker events provides Canadian Studies and other University College Students the opportunity to meet and interact with notable individuals
- Assessment of learning

- Methods of assessment of students' achievement of learning outcomes and degree objectives are appropriate and effective
- Quality indicators
 - High quality teaching
 - Completion rates and times are normal
 - Entry average across all program options is increasing (from over 80 in 2008 to 86 in 2015)
 - o Steady rise in enrolments in Asian Canadian Studies
 - Students are "extremely positive" about their educational experience; value program's smaller class sizes and increased student-faculty interaction, praising availability and presence of instructors; appreciate the program's flexible structure, interdisciplinary courses, 'real-world' relevance of course materials, and their experiences in the annual conference and student journal
 - Most sessional instructors have PhDs in relevant fields and teaching experience; several have published important work
- Students (interaction, performance, remediation)
 - Students have the opportunity to discuss, debate and interact with their peers and instructors in class as well as outside of class
- Student funding
 - o Several bursaries support Canadian Studies students with financial need
- Support (orientation, advising/mentoring, student services)
 - Acting director and director on leave have been visible and valued presences in the program
 - o Students can access advising and other services at University College
- Faculty resources
 - Core courses are delivered by tenure-stream faculty members; program leadership has historically taught core courses
- Physical resources (facilities / space / equipment)
 - Teaching and study spaces are available and appropriate

The reviewers identified the following **areas of concern:**

- Curriculum and program delivery
 - Established and new areas of study covered by 'support courses' are not always offered, leading to potential curricular gaps, a situation not unique to U of T
 - Support courses tend to reflect the interests of faculty in contributing departments, introducing a "reactive" dimension to course content
 - Courses created as part of time-limited initiatives to support community engagement and digital initiatives may not be sustainable
 - Students report that only a small number of students have participated in the student journal and annual conference
- Enrolment (Student/faculty/ ratio, class size)
 - Declining enrolments, reflecting trends in the humanities and social science

- Faculty resources
 - Current program director is not involved in teaching courses
 - Leaves can prevent tenure-stream faculty members from offering core courses

The reviewers made the following recommendations:

- Curriculum and program delivery
 - Establish more predictable schedule of course offerings and instructors to better support students and part-time instructors
 - Consider working with Indigenous Studies to reserve spaces in Indigenous Studies courses that could ideally be listed as a program requirement in Canadian Studies
- Enrolment (Student/faculty/ ratio, class size)
 - Enrolments may be supported by making the program more visible in the academic calendar, on the web and social media; by continuing to prioritize participation by the director and faculty in student activities; by targeting students who have already taken optional courses in the program; and by connecting with advisors in other units
- Student funding
 - Other donations to support students in need would be welcome
- Program Development
 - Courses on the Jewish Canadian and Italian Canadian experiences could provide important options for students in Canadian Studies and beyond

2. Graduate Program

(n/a)

3. Faculty/Research

The reviewers observed the following strengths:

- Research
 - National and international profile of director's and faculty members' scholarly achievements and reputations within Canadian Studies and cognate disciplines
- Faculty
 - o "Excellent" quality faculty
 - Instructors report positively on their teaching experience, including the opportunity to teach in smaller classes using non-lecture-based approaches, and the enthusiasm and academic engagement of their students
 - Creation of the Richard Charles Lee Chair in Chinese Canadian Studies
 - "Sufficient" faculty complement, though leaner than what would be found in a department

The reviewers identified the following areas of concern:

- Faculty
 - Small complement places pressure on tenure-stream faculty; leaves risk having impact on program

The reviewers made the following recommendations:

- Faculty
 - Consider opportunities for secondments from and joint appointments in the teaching-stream with cognate units to provide greater stability
 - Consider redefining the director role to include teaching

4. Administration

The reviewers observed the following **strengths**:

- Relationships
 - o "Strong and positive" faculty, student and staff morale
 - Students, faculty, and administrative staff express pride and a sense of achievement in the program
- Organizational and financial structure
 - Staff are knowledgeable, energetic and dedicated, capably navigating busy periods
 - Complex structure is supported by long history of Faculty-college cooperation, the college's experience with administrative processes, and the guidance of the college's leadership
- Planning / Vision
 - Program has benefited from donations to support faculty and courses
- Reputation / Profile
 - Program "presents a profile of national dimension" and is "ideally positioned, within one of Canada's leading universities and in Canada's largest city, to compare with other programs in the country"

The reviewers identified the following areas of concern:

- Relationships
 - Students and faculty would like more connections with other units and programs, and within the program
 - Limited connections to other units through director and continuing faculty
- Organizational and financial structure
 - Risk that changing finances, donors and non-permanent instructors can influence course topics more than a curriculum committee informed by developments in the field
- Planning / Vision

- Program faces a long-range rebuilding challenge given expected retirements, planned leaves, and end of director's term
- Reputation / Profile
 - Students, faculty and staff wish the program had a more prominent profile to support its sustainability

The reviewers made the following **recommendations**:

- Relationships
 - Consider building connections to other units through having faculty from other units teach Canadian Studies courses, sit on advisory committee, or attend program events
 - Engage with colleagues in Indigenous Studies
 - Consider developing connections with colleagues at OISE, UTM and UTSC
 - Connect with Chairs in cognate departments to identify areas of common interest and highlight complementarity of Canadian Studies and other programs
 - o Explore synergies with other University College based programs
 - Consider connecting with other Ontario Canadian Studies programs, by promoting U of T events through these programs, collaborating on workshops, conferences or other activities to support students' professional development
 - To sustain morale, encourage greater participation from outside the program in the program's courses and events
 - Program could be more active in national Canadian Studies Network
- Organizational and financial structure
 - Consider reviving the program advisory committee and scheduling gatherings of part-time and continuing instructors
 - Consider creating a (possibly not-for-credit) summer program for international students at University College, drawing on existing resources
 - There may be additional advancement opportunities to support the program; "unfettered" donations could support initiatives to integrate colleagues from cognate units
- Planning / Vision
 - Consider engaging in early planning for the appointment of the next director

ADMINISTRATIVE RESPONSE – Appended



David Cameron, FRSC Dean

October 12, 2017

Professor Sioban Nelson Vice-Provost Academic Programs University of Toronto

Re: Review of Canadian Studies

Dear Sioban,

Along with the faculty, staff and students of Canadian Studies, I am pleased with the external reviewers' assessment of Canadian Studies and its undergraduate programs: Canadian Studies, B.A., Hons. (Specialist, Major, Minor); Asian Canadian Studies, B.A., Hons. (Minor). The reviewers complimented Canadian Studies on being "well in step with current efforts for innovative and creative program delivery and content" and that "the curriculum reflects both key and new areas in the field" in its undergraduate courses and programs.

The quality of this program notwithstanding, as per your letter dated September 21, 2017, the review report raises a number of issues and challenges. I am writing to address the areas of the review report that you identify as key. The response to these items is separated into immediate- (current-3 months)/medium- (3-12 months)/longer- (12+months) term action items for Canadian Studies, where appropriate. Canadian Studies has discussed the reviewers' comments through consultation with various groups and has begun to implement changes where appropriate and that are consistent with the Canadian Studies mission.

1. Curriculum and Program delivery

The reviewers were concerned that reliance on cognate units to offer 'support courses' creates potential for curricular gaps or unpredictable patterns in course offerings and suggested ways to strengthen partnerships with cognate departments as well as with OISE, UTM, and UTSC.

While reviewers suggested more engagement with cognate programs, and other University of Toronto units, there are structural difficulties working with UTM and UTSC. Nevertheless, the Program Director will reach out to them for representation on the program's Canadian Studies Advisory Board. Overall, however, the unit sees the greatest need in building strong networks and collaborations with other units on the St. George campus. Several successful such initiatives have already borne fruit. For example:

- The program has recently been successful in negotiating an endowment to permit it to add an Italian Canadian Studies course to the offerings;
- The past three years have seen expansion of course offerings including: a topics course on the Canadian Arctic, Asian Canadian Space and Place, Digital Tools in a Canadian Context, and an upper-level course on Canada-United States Relations, a course made possible by an endowment shared with the Department of History;
- The Asian Canadian Studies Program is actively building cooperative arrangements and a growing scholarly network in cognate departments. The Asian Canadian Studies Research Network includes tri-campus scholars from Arts and Science, plus scholars from Education and Social Work. In addition, through the Richard Charles Lee Chair in Chinese Canadian Studies, Professor Lisa Mar engaged in a wellattended and well-received public event, "Envisioning Chinese Canadian Studies: A Conversation About Community-Engaged Teaching and Research," that demonstrated the program's links to other university units;
- In large measure through the efforts of Professor Mar, Robarts Library has decided to hire an Asian Canadian Studies Librarian. This new position will contribute to building the Asian Canadian Studies minor program as well as the Canadian Studies Program more broadly.

Immediate-term:

Plans are already underway for the development of new courses, including an oral history research course on Toronto Chinese Canadian populations.

Starting in the Fall, 2017 term, the program will schedule meetings with a Canadian Studies Advisory Committee and the Asian Canadian Studies Advisory Committee together with program instructors, both part-time and regular.

The program has asked CIE (the Centre for International Experience) to inform international students of the benefits of taking courses with Canadian Studies.

The reviewers suggested that with the growth in Indigenous Studies there may be opportunities to connect on course offerings which may benefit both Indigenous Studies and Canadian Studies.

Immediate-term:

The Program Director has already contacted Indigenous Studies to discuss the possibility of spaces for Canadian Studies students in ABS201Y1 Introduction to Indigenous Studies: Foundations, History, and Politics. Under discussion is the possibility of a curricular change so that a course on Canadian indigeneity would be required.

2. Profile and Enrolment

While the reviewers praised the high quality of the teaching and learning experience in Canadian Studies, they noted its declining enrolments and provided several suggestions to raise the profile of the program.

The program likely saw a small dip in enrolment due to the two-year absence of Prof. Emily Gilbert from the program. Her return, and the appointment of a new Director for Canadian Studies, will both provide an opportunity for seeking a renewal of the program.

Immediate-term:

Issues of visibility are inherent in the complexity of program delivery across the University of Toronto and it is often difficult for smaller programs to raise their profiles. A number of initiatives have been instituted. For example:

The online calendar now includes a distinct entry for Canadian Studies. In the past, courses were found only through the University College entry; as a result, some students believed, erroneously, that the Canadian Studies courses were available only to University College students. This is a small change but one that has the potential to significantly increase students' awareness of the program.

Asian Canadian Studies and Canadian Studies are now actively engaged in developing new public relations tools (brochure, website, social media) that will more clearly reflect program and student diversity as well as what students find most exciting about a critical eye on Canada and a community-engaged approach.

The Program Director will be more pro-active in promoting student opportunities to write short pieces for the weekly Canadian Studies Newsletter which is sent to Program students and is accessible online.

The program will continue to work with the Canadian Studies Student Union to promote the program within FAS. The CSSU is pivotal in word-of-mouth promotion of the program. It provides information to first year students about the Program and its offerings. The Union's academic, social, and outreach activities create a spirit of friendship and community among the undergraduate students; the Union has a table every year during orientation week and is creating an official CDN student Facebook group to help connect students who might not otherwise have known about the CSSU.

Medium-term:

The Program Director is exploring the possibility of contacting graduates of Canadian Studies, using multiple platforms, to gather information about their fields of employment.

This information, once available, would give prospective students a clearer sense of the opportunities that are opened with a degree in Canadian Studies.

Longer-term:

The program will continue to submit applications related to university-wide initiatives to increase community engagement and digital initiatives.

3. Relationships

The reviewers outlined a range of ways that Canadian Studies may build connections with other universities and/or the national Canadian Studies organization to enhance the program, e.g., to promote events, support student professional development, etc.

The program is happy to continue to build networks and collaborations through the national Canadian Studies Network, and other, neighbouring programs.

4. Faculty

The reviewers noted that the Canadian Studies faculty complement is small but sufficient, but that it faces rebuilding challenges as the current Director's term ends and teaching staff retire.

Medium-term:

Once a new Director is identified, FAS will work with this individual to support them in promoting the Canadian Studies program.

5. Resources to Support the Program

The reviewers commended Canadian Studies on its fundraising success and suggested further ways to attract funding.

Immediate to Medium-term:

The reviewers' suggestions are appreciated. The program Director will continue to pursue fundraising opportunities.

Longer-term:

The reviewers recommended the creation of a summer program for international students at University College; this is an intriguing possibility, and will be considered in longer-term planning for the program.

To conclude, I appreciate that the external reviewers identified Canadian Studies' strengths and noted a few areas for development. Canadian Studies has already begun to move forward with plans to address the recommendations as presented by the reviewers.

Sincerely,

David Comment

David Cameron, Dean and Professor of Political Science

cc. Donald Ainslie, Principal, University College Christina Kramer, Acting Vice-Principal, University College Poppy Lockwood, Vice-Dean, Academic Planning and Strategic Initiatives

UTQAP Review Summary

Programs(s) Reviewed:	Cognitive Science, B.A., (Major) B.Sc. (Major) (review of programs only - programs housed in University College)
Division/Unit Reviewed OR Division/Unit Offering Program(s):	Faculty of Arts and Science
Commissioning Officer:	Dean David Cameron, Faculty of Arts and Science
Reviewers (Name, Affiliation):	 Professor Andrew Brook, Chancellor's Professor of Philosophy and Cognitive Science, Department of Philosophy, Carleton University Professor John Connolly, Chair, Department of Linguistics and Languages, McMaster University
Date of Review Visit:	March 23-24, 2017

Previous Review

Date: November 2006

Summary of Findings and Recommendations

1. Undergraduate Programs

Cognitive Science, B.A. (Major); B.Sc. (Major)

The reviewers observed the following strengths:

- Program draws on "pre-eminent" departments
- Well-designed program
- Provides a broad and rigorous program
- Increasing enrolment
- Enthusiastic and intelligent students

The reviewers identified the following areas of concern: n/a

The reviewers made the following recommendations:

• Expand the program to include more neuroscience in its core offerings

Faculty/Research

The reviewers observed the following strengths:

• Dedicated and effective teachers

The reviewers identified the following areas of concern: n/a

The reviewers made the following recommendations:

• Commit long-term to teaching the program's core courses

Administration

The reviewers observed the following strengths: n/a The reviewers identified the following areas of concern: n/a

The reviewers made the following recommendations:

- Seek a new director from among faculty in an established department
- Provide stable, ongoing funding, primarily for the instructors who are currently doing the core teaching in the program
- Consider adding a Graduate Diploma in Cognitive Science
- Develop new leadership, involving tenured faculty in the most relevant departments of philosophy, psychology, and computer science

Last OCGS review(s) date(s): n/a

Current Review: Documentation and Consultation

Documentation Provided to Reviewers

Terms of Reference; Self-Study; Faculty CVs.

Consultation Process

The reviewers met with the Dean, Faculty of Arts and Science, and Vice-Dean, Academic Planning and Strategic Initiatives; the Principal and Vice-Principal, University College; Program Director; program faculty; faculty of cognate departments; staff; and undergraduate students.

Current Review: Findings and Recommendations

1. Undergraduate Program

Cognitive Science, B.A. (Major); B.Sc. (Major)

The reviewers observed the following strengths:

- Curriculum and program delivery
 - o Impressive work in curriculum building
 - o Excellent and detailed curriculum plan
- Enrolment
 - Strong enrolment growth (150 to 350 students)
- Students
 - Able and mostly enthusiastic students; strong support from the student group
- Program administration
 - o Dedicated and adequate number of support staff

The reviewers identified the following areas of concern:

- Curriculum and program delivery
 - Difficult to create integrated, well-rounded curriculum given dependence on courses from other units
 - o Limited number of student research opportunities
 - No co-op education or internship element to the program

- Quality indicators
 - Concerns over NSSE scores in academic advising and "enriching academic experience"
- Enrolment
 - Could grow enrolment possibly by 200-250 additional students if resources were available
- Support
 - Dependence on student group to support student mentoring, workshops, conferences, etc.
- Outreach/promotion
 - Promotion is challenging given small size of program

The reviewers made the following recommendations:

- Curriculum and program delivery
 - Reviewers affirmed detailed plans (in self-study) for curriculum review/renewal
 - Add co-op education/internship opportunities for students, possibly through the new Vector Institute, which could "add an important intellectual and recruiting dimension to the program"
 - Support research opportunities for students
 - Enable the offering of more tutorials per term
 - Offer 400-level bridge courses between Cognitive Science and each of Linguistics and Neuroscience
 - Offer more building blocks (background) courses to support work in computer science and linguistics
 - o Address the reviewers' course-specific suggestions
- Students
 - Recognize the hours that senior students put into mentoring more junior students
- Program administration
 - Current faculty recommended that Cognitive Science graduates be offered instructor opportunities in this program during their PhD studies
- Outreach/promotion
 - Work with the Faculty of Arts and Science to promote Cognitive Science

2. Graduate Program

(n/a)

3. Faculty/Research

The reviewers observed the following **strengths**:

- Faculty
 - Largely satisfied in their positions; able to achieve their objectives

The reviewers identified the following **areas of concern**:

- Faculty
 - Faculty associated with the program do not conduct research on site at University College; limits research opportunities for students
 - Program has very limited dedicated faculty resources (two teaching stream faculty whose majority appointments are elsewhere; seconded Director)

The reviewers made the following recommendations:

- Faculty
 - Increase faculty resources available to program through cross-appointments (one hire is currently underway between Cognitive Science and Computer Science), especially in the areas of linguistics and neuroscience
 - Take gender and issues of representation into account in faculty hiring

4. Administration

The reviewers observed the following strengths:

- Relationships
 - Good support from four supporting units: Psychology, Computer Science, Linguistics, Philosophy
 - Strong support from University College

The reviewers identified the following areas of concern:

- Planning/vision
 - No tracking of alumni placements/employment
 - "Surprising", "disappointing" that there is no graduate program in Cognitive Science despite U of T being home to some of the most important researchers in the world

The reviewers made the following recommendations:

- Planning/vision
 - Track alumni placements/employment
 - Reviewers affirmed supporting units' aspirations for a graduate offering in Cognitive Science that would draw on institutional strengths in the discipline
 - Program Director should have more direct access to the Dean of the Faculty of Arts and Science to determine ways to increase the program's visibility and help raise its profile.

Administrative response—appended



David Cameron, FRSC Dean

October 12, 2017

Professor Sioban Nelson Vice-Provost Academic Programs University of Toronto

Re: Review of Cognitive Science

Dear Sioban,

Along with the faculty, staff and students of the Cognitive Science Program at University College, I am pleased with the external reviewers' assessment of Cognitive Science and its undergraduate programs: Cognitive Science, B.A., Hons. (Major); Cognitive Science, B.Sc., Hons. (Major). The reviewers complemented Cognitive Science for "the ongoing, impressive work of curriculum building and curriculum renewal" of its undergraduate programs and courses.

The quality of this program notwithstanding, as per your letter dated September 21, 2017, the review report raises a number of issues and challenges. I am writing to address the areas of the review report that you identify as key. The response to these items is separated into immediate- (current-3 months)/medium- (3-12 months)/longer- (12+months) term action items for the Cognitive Science, where appropriate. Cognitive Science has discussed the reviewers' comments through consultation with various groups and has begun to implement changes where appropriate and that are consistent with Cognitive Science's mission.

1. Curriculum and Program delivery

The reviewers reported that the Cognitive Science program faces difficulties in creating integrated, well-rounded curriculum as it depends on courses from other units. They affirmed the program's plans for curriculum renewal, which could also address some of the students' concerns around the need for more building block and bridging courses.

In their report, the reviewers indicated a preference for a stand-alone Cognitive Science department. This is not a vision shared by the Faculty, the College, the four stake-holder units (Philosophy, Psychology, Computer Science, and Linguistics), or the program leadership. We envision Cognitive Science not as a separate department, but as a strong, multidisciplinary unit with significant support from the four stake-holder departments. The program mandates include the facilitation of interactions among cognitive scientists working *across* units, the facilitation of student access to research and researchers *across* these units, and enhancement of the visibility of work already taking place in the unit within the world of cognitive science at large. Increasing the insularity of Cognitive

Science would not be effective in improving the learning experience or outcomes of students. Indeed, faculty involved in the program argue that students have better post-graduation employment prospects when they combine a Cognitive Science major with studies in a core discipline (e.g., Philosophy, Computer Science, Linguistics, or Psychology).

The Cognitive Science program has achieved enormous success as a hub where various researchers and students across campus and affiliated organizations gather and work on the same topics but through different disciplines.

Building on the multidisciplinary success of the program, the unit will examine the curriculum for gaps and seek additional opportunities for students.

Immediate-term:

The unit has already made specific changes to address student demands: it has increased enrolment in COG250Y, the introductory course, and started offering this course in the summer to provide students with additional flexibility. A new course, COG403 "Seminar in Cognitive Science" will be introduced in the Winter term, 2018 which expands research opportunities to students.

To ensure the ongoing quality of the program, the unit introduced admission requirements which require that students complete either COG250Y, or a combination of 1.5 FCE in CSC, LIN, PHL, PSY, with no more than 1 FCE from a single department. The unit will continue to manage the size of the program while improving the quality and suitability of students for interdisciplinary work.

Medium-term:

The unit will continue to work with four stake-holder departments (Computer Science, Linguistics, Philosophy, Psychology) to ensure that Cognitive Science program students have access to an appropriate range of key courses in these disciplines. The unit will continue to strengthen offerings in the computer science stream; two faculty members from Computer Science will be submitting new course proposals for COG in the next curriculum cycle to expand offerings in this popular area. The unit will continue to review curriculum offerings to examine options for cross-listed courses from cognate departments.

The reviewers were surprised at the absence of co-op or internship options and recommended supporting student experiential learning and improving recruitment by creating such opportunities, and increasing the number of research opportunities.

Immediate-term:

The unit has started to develop experiential learning initiatives for undergraduates in the program. The development of the senior seminar, COG403, and the Lego Robotics Lab were supported by an ATLAS (Advanced Teaching and Learning in Arts & Science) grant in 2013/2014. The Lab supports the introduction of robotics activities in various courses, and also serves as a lending library of robotic units to support student research in other courses and independent studies. In the winter term, 2018, the unit will be introducing an experiential learning course on problem solving, logistics, and decision-making with COG415 Cognitive Science in Practice, whereby students are placed within organizations and are asked to report on the real-world situations they encounter there, juxtaposing theory with practical application.

Medium to Longer-term:

The unit is already pursuing a number of opportunities to tap into University College's commitment to experiential learning. The Program Director has already begun meetings with significant industry stake-holders with an interest in Cognitive Science-trained students for experiential learning placements.

2. Faculty

The reviewers commended the new appointments underway, and supported further cross appointments as "urgent priorities", to provide further support for the program, including in the area of academic advising (much of which is currently undertaken by students) and alumni outcomes tracking.

Cognitive Science is a multidisciplinary program within the Faculty of Arts and Science. It is well-supported by University College and by the four stake-holder departments, each of which has made a commitment to continue supporting the program. To ensure a high quality of teaching in the undergraduate program, the stakeholder units are committed to providing access to key courses in the various streams and to provide faculty to teach core program courses. Indeed, because Cognitive Science is a multi-disciplinary unit, much of the curriculum is embedded in existing course offerings in the stakeholder departments, and these courses are taught by faculty members within these departments. In addition, however, the unit (through the College) holds three joint appointments with stakeholder departments.

Immediate-term:

The most recent of these cross-appointed hires, Prof. Yang Xu (51% CSC, 49% UC) will be arriving in Winter, 2018.

Academic advising is provided by the Program Director and by the Program Co-ordinator, not by undergraduate students. The Cognitive Science undergraduate student association, CASA (Cognitive Science and Artificial Intelligence Student Association), however, is very active within the program and informal peer mentoring is a valuable component in Cognitive Science. Such mentoring, however, does not take the place of faculty mentoring. The Program Director will work with the stakeholder units to ensure that students have access to appropriate advising and to mentoring from faculty.

Medium-Longer-term:

In responding to the reviewers' points, it is helpful to provide some context about the nature of the program and its place within Arts and Science. Cognitive Science is one of several multidisciplinary College programs in the Faculty of Arts and Science. Support for a multidisciplinary program is often not achieved most effectively through the allocation of new faculty lines isolated in that unit, but rather through the engagement of existing departments. In the case of Cognitive Science, each of the stakeholder units have made firm commitments to support teaching activities within the unit. Moreover, any consideration of new faculty appointments takes place through a formal process: units submit requests in the spring of each year, and these requests are considered by the Faculty Appointments Committee, which includes faculty representatives from across the three FAS sectors (the Humanities, Social Sciences, and Sciences) as well as the Colleges. After considering the full range of requests, the FAC makes recommendations to the Dean. Any request for additional faculty has an impact across the division, and as such, faculty appointments are considered not in isolation, but with respect to needs that exist across the Faculty. The unit is engaging in ongoing discussions with stakeholder units about potential future crossappointments. Requests for faculty appointments will be considered in due course by the Faculty Appointments Committee.

3. Program Development

The reviewers saw untapped potential in Cognitive Science, including potential for more visibility of the program, further enrolment growth at the undergraduate level, as well as for a graduate offering supported by the cognate units.

The program has grown, particularly in the Computer Science stream, in recent years. Arts and Science as a whole, however, is no longer in a period of growth at the undergraduate level. Indeed, given that the number of 18-20 year olds in the GTA is expected to decline over the next ten years, Arts and Science may see a reduction in undergraduate enrollments. It is unclear at this point what impact this demographic shift might have on the Cognitive Science program.

Immediate-term:

Following a period of sudden growth in the program, Cognitive Science became a Type 2 program in 2014 with enrollment controls. This will allow any growth to occur at a reasonable pace without straining the resources of the College or the stakeholder departments.

Recent growth suggests that the program is not suffering from a lack of visibility among students. The program has already achieved considerable visibility, both within FAS and in the larger Cognitive Science community, in part through the success of an impressive biennial conference (University of Toronto Interdisciplinary Symposium on the Mind) organized by the students in CASA. Building on this success, the program will continue to promote the visibility of Cognitive Science at U of T through the University College Advancement Office and consider ways that the FAS Advancement Office can also support these efforts.

Medium to Longer-term:

The possibility of a collaborative specialization at the graduate level is already under discussion with the stakeholder departments. A Steering Committee has been struck and will start consultation this year. This will involve extensive discussions among the four stakeholder departments, University College, the Faculty, and SGS.

To conclude, we appreciate that the external reviewers identified the Cognitive Science's strengths and noted a few areas for development. Cognitive Science has already begun to move forward with plans to address the recommendations as presented by the reviewers.

Sincerely,

David Comen

David Cameron, Dean and Professor of Political Science

cc. Donald Ainslie, Principal, University College Christina Kramer, Acting Vice-Principal, University College Poppy Lockwood, Vice-Dean, Academic Planning and Strategic Initiatives

UTQAP Review Summary

Programs(s) Reviewed:	Equity Studies, B.A., Hons. (Major, Minor), review of programs only (program housed in New College)
Division Offering Program(s):	Faculty of Arts and Science
Commissioning Officer:	Dean David Cameron, Faculty of Arts and Science
Reviewers (Name, Affiliation):	 Dr. Joyce King, Endowed Chair for Urban Teaching, Learning and Leadership, and Professor, Department of Educational Policy Studies, Georgia State University
	 Dr. Patience Elabor Idemudia, Professor and Graduate Chair, Department of Sociology, University of Saskatchewan
Date of Review Visit:	March 29, 2017

Previous Review

Date: January 11, 2008

Summary of Findings and Recommendations:

Undergraduate Programs

Equity Studies, B.A., Hons. (Major, Minor)

The reviewers observed the following strengths:

- Unique, excellent, and highly sought after interdisciplinary program
- Core courses reflect the best current pedagogy
- Impressive outreach activities; very strong emphasis upon community involvement

• Provides an excellent background for future graduate studies or careers in policy or public service

The reviewers identified the following areas of concern:

• Courses are "cobbled together" depending on availability

The reviewers made the following recommendations:

- Establish core courses that reflect a planned vision
- Increase the number of courses
- Strengthen areas of specialization beginning with disability studies
- Develop ways to improve profile as a major contributor to improving social

conditions in the greater Toronto area, and as a model for interdisciplinary studies

Faculty/Research

The reviewers observed the following strengths:

- Faculty have strong teaching and research records
- Sessional instructors have "strong credibility with the community"
- Excellent opportunities for interdisciplinary collaboration

The reviewers identified the following areas of concern:

• Growth in the program is unlikely given small number of tenure-stream appointments

The reviewers made the following recommendations:

• Increase faculty complement to ensure adequate administrative capacity and outreach for the program, including provision for "junior faculty who have both a commitment to community activism and a strong potential for research"

Administration

The reviewers observed the following strengths:

- Director is an "innovator"
- New College is appropriate fit for hosting the program; provides good administrative support
- Successful governance model

The reviewers identified the following areas of concern:

- Challenging to gain access to cross-listed courses and the support of other departments for partnerships
- Problems with building accessibility
- Staff and space issues

The reviewers made the following recommendations:

- Plan for additional space and support staff to address program growth
- Conduct an accessibility audit and develop a plan to make the building accessible to persons with disabilities.

Current Review: Documentation and Consultation

Documentation Provided to Reviewers

Terms of Reference; Self-Study; Faculty CVs.

Consultation Process

The reviewers met with the Dean, Faculty of Arts and Science, Vice-Dean, Academic Planning and Strategic Initiatives; Principal and Vice Principal, New College; Director, Equity Studies; Administrative Staff (Business Officer, Program Administrator, Program Support Officer), New College; Equity Studies faculty members; Equity Studies students; Faculty from collaborating units (African Studies, Department of Leadership, Higher & Adult Education, OISE/UT, Caribbean Studies, Women and Gender Studies); and Vice-Dean, Graduate Education.

Current Review: Findings and Recommendations

1. Undergraduate Program

Equity Studies, B.A., Hons. (Major, Minor)

The reviewers observed the following strengths:

- Overall quality
 - Highly sought after undergraduate program; potential to advance the field of social justice studies in research, curriculum and teaching innovation
- Objectives
 - Goal of the program is consistent with the vision of both the College and the Faculty of Arts & Sciences
 - The diversity in the suite of programs is consistent with the Faculty and unit's academic plans
- Admissions requirements
 - o Appropriate to the learning outcomes
- Curriculum and program delivery
 - Innovative, community-based interdisciplinary curriculum, including cultural approach to disability studies
 - o Addresses the needs and interests of diverse students
 - The Equity Studies Students Union solicits students' input on the curriculum
 - Multiple avenues for students to engage in research, including: courses, capstones, undergraduate journal, research assistantships
 - o International opportunities for students (e.g., Belize, Namibia)
 - o Program is regarded as an excellent foundation for graduate studies

Equity Studies Programs, Summary of 2017 UTQAP Review

- Assessment of learning
 - Varied, effective and appropriate, including publicly visible products (e.g., academic research papers, reflective essay-writing, conference/poster presentations)
- Enrolment
 - Strong enrolment growth (200 to 400 students); one of the largest college programs at U of T
 - The course-based option and the cohort delivery model have meant "great success" in student recruitment
- Students
 - Students view program as "life-changing" and "empowering"; value the personal and intellectual benefits of the program
 - Students value the writing program and course pedagogy, faculty expertise and dedication
- Support
 - Students praised student-faculty interactions, including faculty support for non-standard admission through the Transitional Year Program

The reviewers identified the following **areas of concern**:

- Curriculum and program delivery
 - Insufficient research opportunities and 4th year courses for students
- Enrolment
 - Responding to enrolment growth (in part due to the new minor)
- Program administration
 - Staff feel overwhelmed supporting four programs including Equity Studies

The reviewers made the following **recommendations**:

- Enrolment
 - With the support of New College, increase enrolments in the introductory course, which is required for both the major and minor programs
 - Consider offering more upper year level courses in the summer term to address enrolment pressures, or joint courses with OISE
- Students
 - In the context of limited supervisory resources, the reviewers suggested that the program seek ways to increase opportunities for students to pursue, or participate in, independent research projects
- Student funding
 - Increase the number of awards and scholarships available to students in the program
- Program administration
 - Increase administrative staff resources
- Program development

Equity Studies Programs, Summary of 2017 UTQAP Review

- Consider a new initiative with OISE, "Youth, Activism and Community"
- Find ways for students from multiple disciplines (including sciences) to accommodate the minor in their degree requirements

2. Faculty/Research

The reviewers observed the following strengths:

- Research
 - "Exemplary record" of high calibre research; impressive collective research focus and publications
- Faculty
 - o Teaching-stream hire in 2015-16 added capacity

The reviewers identified the following areas of concern:

- Faculty
 - Limited number of full-time faculty, possible retirements pose challenges for sustaining program's successful growth

The reviewers made the following recommendations:

- Faculty
 - Additional faculty resources, through UCDF and especially in the tenurestream, would address demand for research opportunities and 4th year courses, support continued growth
 - A position in Social Advocacy would allow for the realization of the program's vision around activist scholarship and teaching

3. Administration

The reviewers observed the following **strengths**:

- Relationships
 - Strong relationships with many units at U of T (e.g., agreements with 32 programs/departments to cross list several courses)
 - o High praise for strong community engagement
 - Several connections of faculty with other universities and organizations create opportunities for teaching, research and professional development activities, and create opportunities for students to liaise with these institutions
- Organizational and financial structure
 - Well supported financially by New College
 - Increased full-time faculty capacity has allowed for core faculty meetings that address curriculum content, delivery and long term planning
- Planning/vision

Equity Studies Programs, Summary of 2017 UTQAP Review

- Steps are being taken to implement Equity Studies' vision "to become an international hub of theory driven activism and a Centre of activist scholarship and teaching"
- Alumni had high praise for the program; an alumni listserv was developed as part of the self-study and will be useful for future efforts to build and sustain alumni relations

The reviewers identified the following areas of concern:

- Planning/vision
 - Challenge to secure long-term funding to sustain and fund the CELA, Belize relationship, a "model for student international experience"

The reviewers made the following recommendations:

- Relationships
 - Continue to foster new collaborative partnerships with community groups, including those that will support course delivery and community engaged learning opportunities
- Planning/vision
 - o Continue to expand advancement and alumni activities
 - Increase long-term funding for the program's activities, including its international opportunities for students (CELA, Belize), through advancement
 - Reviewers affirmed the idea of an interdisciplinary graduate program in Equity Studies serving diverse communities across Canada, if sufficient resources are available



David Cameron, FRSC Dean

October 12, 2017

Professor Sioban Nelson Vice-Provost Academic Programs University of Toronto

Re: Review of Equity Studies Program

Dear Sioban,

Along with the faculty, staff and students of the Equity Studies program, I am pleased with the external reviewers' assessment of Equity Studies and its undergraduate program: Equity Studies B.A., Hons. (Major, Minor). The reviewers complimented Equity Studies for its "innovative teaching and creativity in the content and delivery of the ES program in and outside of the classroom" and its "innovative programming" in its program and undergraduate courses.

The quality of this program notwithstanding, as per your letter dated September 21, 2017, the review report raises a number of issues and challenges. I am writing to address the areas of the review report that you identify as key. The response to these items is separated into immediate- (current-3 months)/medium- (3-12 months)/longer- (12+months) term action items for Equity Studies, where appropriate. Equity Studies has discussed the reviewers' comments through consultation with various groups and has begun to implement changes where appropriate and that are consistent with Equity Studies' mission.

1. Students

In the context of limited supervisory resources, the reviewers suggested that the program seek ways to increase opportunities for students to pursue, or participate in, independent research projects

Immediate-term:

A number of initiatives enable Equity Studies students to participate in independent research projects:

• A fourth-year capstone research seminar was introduced in the fall 2016 to provide senior students with the opportunity to pursue independent research projects that integrate the abilities, skills and knowledge they have acquired in the Equity Studies program. The course will now be offered on a continuing basis. In addition, the

program notes that the core 400-level seminars provide students with the skills to synthesize their acquired knowledge in a major research paper on a specific social justice issue.

- Students in Equity Studies are participating in research projects with community organizations through NEW497Y: Independent Community Engaged Research Seminar, a course introduced in 2017-18 in the Community Engaged Learning Program New College. Equity Studies students can count the course for their required 4th year credit for the major program.
- New College provides a stipend to provide the Undergraduate Course Development Fund (UCDF) instructors, Professor Tara Goldstein and Professor George Dei, with funds to hire equity studies students to work on their research projects.
- Equity Studies will continue to publish *Knots*, the first undergraduate journal in disability studies worldwide, as a forum for the scholarly work of equity studies students and alumni. Articles published in *Knots* are often based on papers students develop in their 4th year disability studies courses.
- Professor Anne McGuire, who teaches disability studies courses in Equity Studies, is co-founder of the 'Unsettling Normalcy' working group launched at Congress, May 2017. A goal of the working group is to provide opportunities for students to connect with and learn from graduate and faculty doing work in disability studies. This may well lead to publishing opportunities and other collaborative projects for Equity Studies students.

Medium-term:

Following on the success of the fall 2017 undergraduate research symposium in critical anti-racism, the program plans to organize other research symposia based on topics related to areas of emphasis in the program: Disability Studies, Global Food Equity and Social Advocacy. Their focus in the next two years will be providing opportunities for students to present research papers they have developed in the senior research course (NEW469Y), the Independent Community Engaged Research Seminar (NEW497Y), 4th year seminars, and research projects that students have conducted through their work study or as research assistants for faculty projects.

The new program initiative, Youth, Activism and Community, will provide students with new research opportunities through the courses NEW340F: Youth, Activism and Social Change and NEW441S: Art, Cultural Production and Resistance. Additional student

research opportunities will be created through faculty research projects connected to the YAC initiative.

Longer-term:

Equity Studies is participating in the New College Undergraduate Research Initiative established in 2017 to find creative ways to promote undergraduate research opportunities for students in New College programs.

2. Faculty

The reviewers supported the many strategies already in place to address enrolment challenges. They also recommended hiring faculty, especially in the tenure-stream, to address demand for research opportunities and 4th year course.

In responding to the reviewers' points, it is helpful to provide some context about the nature of the program and its place within Arts and Science. Equity Studies is one of several multidisciplinary College programs in the Faculty of Arts and Science. In cases where faculty support for a multidisciplinary program has fallen away, or where student interest in a program has grown, the Dean's office may initiate conversations with units that have supported the program in the past, or may facilitate the development of new relationships. Moreover, any consideration of new faculty appointments typically takes place through a formal process: units submit requests in the spring of each year, and these requests are considered by the Faculty Appointments Committee (FAC), which includes faculty representatives from across the three FAS sectors (the Humanities, Social Sciences, and Sciences) as well as the Colleges. After considering the full range of requests, the FAC makes recommendations to the Dean. Any request for additional faculty positions has an impact across the division, and as such, faculty appointments are considered not in isolation, but with respect to needs that exist across the Faculty.

Immediate-term:

Equity Studies is a multidisciplinary program at New College, and as such, is supported by faculty from multiple units. The FAS Dean's office will work with Equity Studies to develop stronger teaching relationships with cognate units. In addition, given growth in student enrolments in this area, the Faculty will allocate a CLTA position to New College to support the Equity Studies undergraduate programs. The Faculty will continue to monitor enrolments during the CLTA contract period.

To address growing enrolments and to move forward in their overall plan to become a hub of activist scholarship and teaching, the program introduced the Youth, Activism and

Community initiative in partnership with the Department of Leadership, Higher, and Adult Education, OISE/UT. To implement this initiative Equity Studies has hired a 75% CLTA position jointly funded by New College (50%) and the Department of Leadership, Higher, and Adult Education, OISE/UT (25%) for one year, beginning July 2017.

The program has developed joint courses with other interdisciplinary programs (Sexual Diversity Studies, Caribbean Studies, African Studies, Latin American Studies and Diaspora and Transnational Studies) as a way of providing a wide range of curriculum offerings.

Medium-term:

The program has successfully applied for positions through the Undergraduate Curriculum Development Fund (UCDF) for faculty members to teach an undergraduate course at the 3rd year level. The program plans to apply for another UCDF position in one of the three areas of emphasis: Disability Studies, Global Food Equity or Social Advocacy. Possible partners are Social Work, Faculty of Information or Architecture. Courses taught by UCDF faculty are not core to the program, but rather provide a greater range of options to students.

Longer-term:

Equity Studies will explore joint courses of relevance to the three areas of emphasis with disciplinary programs such as Sociology, Geography and History.

The Youth, Activism and Community (YAC) Initiative is a partnership between Equity Studies and the Department of Leadership, Higher, and Adult Education, OISE/UT. As this initiative develops, Equity Studies is interested in pursuing a faculty appointment in the area of Social Advocacy. As an EDU-B, the unit does not have the capacity to make majority faculty appointments and will therefore seek a joint appointment for the position. As noted above, any requests for faculty positions are considered each spring at the Faculty Appointments Committee. In the longer-term, Equity Studies will seek additional faculty positions to support core areas in the program.

3. Resources to Support the Program

The reviewers recommended hiring additional administrative staff in response to increased enrolment, and suggested increasing funding for the program's activities, including its international activities, through advancement.

Immediate-term:

A number of steps are being undertaken to support the program:

- Program support has increased due to funding provided by New College and resources that the program has accessed through various university funding opportunities. New College has increased the program's annual discretionary funds by more than a factor of 3 to provide additional resources for curricular and co-curricular program activities.
- New College has hired a Program Support Officer who supports program events, assists with the administration of international activities and produces various promotional program materials.
- Equity Studies has access to the New College Initiative Fund that supports major curricular and co-curricular projects such as conferences, the publication of student journals and student proposed initiatives.
- Equity Studies will continue to take advantage of FAS funding opportunities such as LEAF and ATLAS to support major curricular and co-curricular initiatives. The current ATLAS/STEP Forward student initiative on opportunities for social justice work in the non-profit sector has been renewed for 2017-18 and 2018-19.
- Equity Studies will continue to monitor program enrolments to determine pressure on administrative resources and seek additional support if needed.

Longer-term:

New College is refreshing its list of advancement priorities this fall. Equity Studies will enter into discussions with Advancement about how to identify and define other opportunities of interest to donors.

4. Program Development

The reviewers supported Equity Studies' long-term plan to engage OISE in a Youth, Activism and Community initiative, as well as an interdisciplinary graduate offering.

Immediate-term:

The Youth, Activism and Community (YAC) Initiative was launched at New College, on March 31, 2017. The event included a panel of four students from the joint partners (Equity

Studies and the Department of Leadership, Higher, and Adult Education (OISE/UT) who presented research papers on topics of youth activism. On May 31, 2017 the program held the second YAC event, a symposium on Youth, War and Migration, funded by the Social Science and Humanities Research Council and scheduled during the Congress 2017 to allow for international participation. In the upcoming year the program has introduced three courses as part of the YAC initiative: NEW340F: Youth, Activism and Social Change (Equity Studies); NEW441S: Art, Cultural Production and Resistance (Equity Studies); and NEW443S: Youth, Community and Revolution in Transnational Contexts (joint OISE/UT, Equity Studies). NEW443S, taught at OISE/UT, is an interdisciplinary graduate offering with spaces reserved for senior students in Equity Studies. The program is identifying researchers within and beyond the University of Toronto as well as graduate (OISE/UT) and undergraduate students (Equity Studies) who have research interests in the area of youth activism for inclusion on their developing website and future projects and events.

Medium to Longer-term:

Over the next two years the program plans to build and enhance the YAC website, bring YAC members together to share their research and teaching in the area, and explore opportunities for shared projects with students and researchers associated with YAC. Equity Studies is an undergraduate program and the program will focus on building its undergraduate profile rather than developing a graduate program at this time.

To conclude, we appreciate that the external reviewers identified the Equity Studies program's strengths and noted a few areas for development. Equity Studies has already begun to move forward with plans to address the recommendations as presented by the reviewers.

Sincerely,

David Comment

David Cameron, Dean and Professor of Political Science

cc. June Larkin, Vice-Principal, New College, Director, Equity Studies Poppy Lockwood, Vice-Dean, Academic Planning and Strategic Initiatives

UTQAP Review Summary

Programs(s) Reviewed:	Sexual Diversity Studies, B.A., Hons. (Specialist, Major and Minor) (review of programs and the Mark S. Bonham Centre for Sexual Diversity Studies)
Unit Offering Program(s):	Mark S. Bonham Centre for Sexual Diversity Studies (housed in University College)
Commissioning Officer:	Dean David Cameron, Faculty of Arts and Science
Reviewers (Name, Affiliation):	 Dr. Carolyn Dinshaw, Julius Silver, Roslyn S. Silver, and Enid Silver Winslow Professor of Social and Cultural Analysis and English, New York University Dr. Marc Stein, Jamie and Phyllis Pasker Professor of History, San Francisco State University Dr. Susan Stryker, Associate Professor of Gender and Women's Studies, University of Arizona
Date of Review Visit:	April 7, 2017

Previous Review

Date: January 31, 2008

Summary of Findings and Recommendations

Sexual Diversity Studies, B.A. Specialist, Major, Minor

1. Undergraduate Programs

The reviewers observed the following strengths:

- Excellent program; well-designed and showcases an "exciting interdisciplinary area of inquiry"
- Enthusiastic students

The reviewers identified the following areas of concern:

- Students sought more core courses
- Too little programmatic coherence
- Little room for expansion with current staffing levels
- Heavy reliance on the offerings of other departments and programs

The reviewers made the following recommendations:

- Offer new courses
- List cross-listed courses in a more organized manner

2. Graduate Programs: n/a

Faculty/Research

The reviewers observed the following strengths:

- High success in undergraduate teaching
- High level of collaboration and engagement with related research clusters and community groups
- Strong relationships with cognate units

The reviewers identified the following areas of concern:

• Need for core faculty complement and stable institutional support

The reviewers made the following recommendations:

- Create a teaching-stream appointment
- Pursue new joint appointments with other academic units
- Organize faculty retreats to enhance pedagogical objectives

Administration

The reviewers observed the following strengths:

- Appropriate organizational structure and governance
- Excellent newly refurbished space

The reviewers identified the following areas of concern: n/a

The reviewers made the following recommendations:

• Review administrative mechanisms

Last OCGS review(s) date(s): n/a

Current Review: Documentation and Consultation

Documentation Provided to Reviewers

Terms of Reference; Self-Study; Faculty CVs.

Consultation Process

The reviewers met with the Vice-Dean, Academic Planning and Strategic Initiatives, and Vice-Dean, Graduate, Faculty of Arts and Science; the Director and Undergraduate Director of Sexual Diversity Studies; junior and senior faculty associated with SDS, sessional teaching staff, administrative staff; Chairs of the Department of English and Department of Political Science, Principal of University College, and undergraduate students.

Current Review: Findings and Recommendations

1. Undergraduate Program

The reviewers observed the following strengths:

- Overall quality
 - o excellent, robust, and internationally-recognized program
- Objectives
 - Academic rationale, learning outcomes, degree objectives are "entirely appropriate" and consistent with the unit's academic objectives
- Curriculum and program delivery
 - o "Ample evidence of creativity and innovation" in the program

- Up-to-date curriculum with innovative courses in disability and sexuality, global sexualities, queer of color critique, transgender issues; new course on indigenous sexualities in 2017-18
- Strong research opportunities in upper-division classes, especially capstone, annual research colloquium
- Effective service-learning course and opportunities for student learning beyond the classroom
- o Program responsive to student input regarding courses
- Significant opportunities for student-faculty interaction, in and outside the classroom
- Coherent and intentional sequence of core courses relative to peer programs
- Large number of electives offered through cognate units relative to peer programs
- Unusual balance between humanities and social sciences allows for meaningful interdisciplinarity in the program's research and teaching, consistent with the program's goal of interdisciplinarity
- Assessment of learning
 - Methods to assess student achievement of degree objectives and learning outcomes are appropriate and effective, and consistent with those of other units
- Quality indicators
 - Course evaluations show program's courses rank higher than Faculty of Arts and Science mean scores in overall quality, intellectual stimulation, deeper understanding of subject matter, conducive learning environment, and appropriateness of assignments, projects, and tests
- Students
 - "engaged, enthusiastic, knowledgeable, and thoughtful"; "of high academic ability"
 - Stimulating intellectual environment allows students to come in contact with national and international scholars, artists, activists, and leaders on matters related to gender and sexual diversity
 - Students are confident that they are being adequately prepared for their chosen careers
- Physical resources
 - Sexual representation collection provides valuable research resource and training opportunities in museum, archival, information and library studies
 - Location in large, diverse, cosmopolitan city provides advantages relative to peer programs

The reviewers identified the following areas of concern:

• Curriculum and program delivery

- Need for greater attention to race and sexuality, histories of sexuality, sexualities beyond Canada and the United States, and non-LGBT sexualities
- Quality indicators
 - NSSE scores on student-faculty interaction are higher than U of T average or U15 comparators, but lower than other NSSE scores for this program, connected to low number of permanent faculty relative to number of students
- Students
 - Students perceived the program's faculty and curriculum to be predominantly white and Anglocentric
- Faculty resources
 - Students felt instructors should be better able to address sensitive and contentious social issues in the classroom

The reviewers made the following recommendations:

- Curriculum and program delivery
 - Increase attention to transnational and multiracial dimensions of sexualities in curriculum development
 - Consider revising the curriculum to include an optional or required firstyear course; redesign the two existing second-year introductory courses to provide better topical and methodological foundations for success in upper years; a more coherent menu of required and optional courses in third-year
 - Create more research opportunities for students by including undergraduate research assistants in grant proposals
 - Create more opportunities for student-faculty interaction by providing more individualized attention in capstones, and more academic and social functions
- Faculty resources
 - Increase faculty collaboration and consultation to improve course sequencing and coordination of content across courses
 - Provide training for instructors to develop more effective pedagogical practices when engaging with sensitive and contentious social issues
 - Increase permanent faculty resources to support transnational and multiracial dimensions of sexualities and other emerging areas of the curriculum, to address concerns over student-faculty interaction, and to support further growth

2. Faculty/Research

The reviewers observed the following strengths:

• Overall quality

- "Superb" faculty who have had an important impact on the growth and development of the field
- Broad and deep expertise, drawing on faculty from academic units in multiple divisions and the University of Toronto Libraries
- Faculty members have won prestigious grants and fellowships, national and international awards, and major commendations for teaching
- Research
 - o "International leaders in their research fields"
 - Publications and projects have appeared in high-quality, influential scholarly and popular venues
 - Bonham Centre's 2014 World Pride Human rights Conference and other conferences contribute to high research profile
- Faculty
 - o "Exceptional teachers"
 - "Powerful voices in public media, influential consultants in policy and activism"

The reviewers identified the following areas of concern:

- Faculty
 - Anthropology, geography, history, philosophy, performance studies, and film and media studies, areas crucial to the development of the field, are not currently well represented
 - Environmental studies and religious studies, areas of increasing importance in the field, are not well represented

The reviewers made the following **recommendations**:

- Faculty
 - Hire two new permanent faculty, prioritizing critical race studies and trans studies
 - Increase attention to racial/ethnic diversity in faculty recruitment
 - Provide incentives for departments to allow four faculty from cognate units to transfer part of their lines permanently into the Centre
 - Weaknesses in coverage relative to the program's stated goals could be addressed by faculty resources in the natural sciences, science studies, public health, public history or museum studies, specialists in non-English languages and literatures, and faculty who specialize in non-Western or pre-modern cultures

3. Administration

The reviewers observed the following strengths:

Relationships

- High morale; faculty, students and staff are deeply committed to and proud of the program
- Collaboration with University College and cognate units has allowed the program to accomplish a lot with limited faculty resources
- Close relationship with U of T Art Museum provides opportunities in curation, cultural programming and visual studies
- Informal links through Fellows program with leading scholars at other institutions fosters professional development and high quality teaching
- Relationships with the Canadian Lesbian and Gay Archives, Pride Toronto, Glad Day Bookstore, Inside Out Film Festival, Egale Canada, and Planned Parenthood support on-going opportunities for service-learning placements for students
- Participation in community events and participation of guest speakers creates a multidirectional flow of knowledge between local communities, students and researchers
- Organizational and financial structure
 - Governance structures and practices function admirably well, with strong student and Advisory Board involvement
 - Effective use of the Undergraduate Course Development Fund (UCDF)
- Planning/vision
 - o Extraordinary financial support from donors
- Reputation/profile
 - "Stellar" reputation, nationally and internationally; current reviewers affirm previous reviewers' ranking of the program "among the finest of undergraduate sexuality studies programs in existence"

The reviewers identified the following **areas of concern**:

- Relationships
 - o Complex relationship with the Women and Gender Studies Institute
 - Lack of formal partnerships with external entities is a missed opportunity
- Organizational and financial structure
 - o Administrative staff have heavy responsibilities
 - Undergraduate Course Development Fund (UCDF) not designed to support core courses
- Planning/vision
 - o Planned departure of long-time director

The reviewers made the following **recommendations**:

- Relationships
 - Prioritize strengthened relationships with the Women and Gender Studies Institute (WGSI)

- Develop partnerships with programs in anthropology, film, geography, history, literature, philosophy, and religion
- o Improve collaboration with sexuality studies faculty at UTM and UTSC
- Broaden community partnerships beyond LGBT organizations
- Create formal partnerships with other universities, government entities, and professional organizations to strengthen the program, the discipline, and the quality of community engagement in the GTA
- Organizational and financial structure
 - Activate the Curriculum Subcommittee of the Steering Committee to review curriculum regularly, with particular attention to interdisciplinarity, emergent trends, and student interests
 - o Increase administrative staff resources to support continued growth
- Planning/vision
 - Reviewers urged that consideration be given as to whether the unit should remain an EDU:B or bring forward a proposal to become an EDU:A; the reviewers made no recommendation as to which is preferable
 - Diversify fundraising strategies by seeking greater support from the Faculty of Arts and Science and through external grants and partnerships
 - Address concerns regarding faculty resources before considering the development of a graduate program or expanding the experiential learning course

Administrative response—appended



David Cameron, FRSC Dean

October 12, 2017

Professor Sioban Nelson Vice-Provost Academic Programs University of Toronto

Re: Review of Sexual Diversity Studies

Dear Sioban,

Along with the faculty, staff and students of Sexual Diversity Studies, I am pleased with the external reviewers' assessment of Sexual Diversity Studies and its programs: B.A., Hons. (Specialist, Major, Minor). The reviewers complimented Sexual Diversity Studies for "developing and sustaining an excellent, robust, and internationally-recognized program" that features "innovative courses, strong research opportunities, and effective service-learning placements, while also fostering a stimulating intellectual environment" in its undergraduate programs and courses.

The quality of this program notwithstanding, as per your letter dated September 21, 2017, the review report raises a number of issues and challenges. I am writing to address the areas of the review report that you identify as key. The response to these items is separated into immediate- (current-3 months)/medium- (3-12 months)/longer- (12+months) term action items for Sexual Diversity Studies, where appropriate. Sexual Diversity Studies has discussed the reviewers' comments through consultation with various groups and has begun to implement changes where appropriate and that are consistent with Sexual Diversity Studies' mission.

1. Curriculum and Program delivery

The reviewers recommended a number of curriculum revisions, including changes to introductory and elective course requirements, and increased attention to racial/ethnic diversity, including non LGBT sexualities, as well as transnational and multiracial dimensions of sexualities.

Steps in this direction were already being undertaken before the review, through the addition of new courses on queer of colour critique and global sexualities. The recommendations to do more in this direction fit entirely with the priorities of, and discussions within, SDS.

Immediate-term:

SDS will undertake a curriculum review through the Curriculum Subcommittee of the Steering Committee to address these and other issues raised by the reviewers. SDS agrees with the recommendations of the need to rethink the core courses. The Curriculum Subcommittee Review will pay particular attention to the diversification of core courses of the SDS program, to reconsider the sequencing of required and optional courses, and to further augment our attention to racial/ethnic and transnational issues.

The Curriculum Subcommittee will consider the possibility of a first year course. SDS developed as a college program, and did not have first year courses. There is currently one course associated with UC One, UNI104Y1: Sex in the City, which provides a first year opportunity to study issues related to sexual diversity. The Subcommittee will consider whether a first year introductory course may now be appropriate. The implementation of such a course would, however, be within intermediate term steps.

Medium-term:

FAS will work with SDS to build on relationships with other academic units to diversify offerings in core areas. SDS will seek governance approval of any curricular changes to program requirements. In the event that the Curriculum Subcommittee recommends the introduction of a new first year course, its implementation would be in the intermediate term.

The reviewers supported professional training to address instructors' concerns with teaching sensitive and contentious social issues.

Immediate-term:

SDS will arrange a series of workshops for instructors, designed to address teaching dynamics in sensitive and contentious social issues in the 2017-2018 academic year. Based on participant feedback, SDS will seek to provide similar learning opportunities on an on-going basis.

2. Faculty

The reviewers recommended increasing faculty complement through new hires and increased contributions from cognate units to address the need for greater faculty-student interaction, maintain the currency of its curriculum and research, and provide the administrative support the program requires. They also emphasized the importance of increasing attention to racial/ethnic diversity in faculty hires. In responding to the reviewers' points, it is helpful to provide context about the nature of the program and its place within Arts and Science. Sexual Diversity Studies is one of a large number of multidisciplinary programs offered in the Faculty. Multidisciplinary programs typically emerge when a group of faculty from different disciplines come together with a shared area of interest. Over time, however, as faculty interests and departmental priorities change, and as student interest waxes or wanes, the robustness of these programs may be affected. In cases where faculty support for a program has fallen away, or where student interest in a program has grown, the Dean's office initiates conversations with units that have supported the program in the past, or may facilitate the development of new relationships. Support for a multidisciplinary program is often not achieved most effectively through the allocation of new faculty lines isolated in a smaller unit, but rather through the engagement of existing well-resourced departments, or the enhancement of resources in support of the programs in cognate departments. Moreover, any consideration of new faculty appointments typically takes place through a formal process: units submit requests in the spring of each year, and these requests are considered by the Faculty Appointments Committee, which includes faculty representatives from across the three Arts & Science sectors (the Humanities, Social Sciences, and Sciences) as well as the Colleges. After considering the full range of requests, the FAC makes recommendations to the Dean. Any request for additional faculty has an impact across the division, and as such, faculty appointments are considered not in isolation, but with respect to needs that exist across the Faculty.

Sexual Diversity Studies was initially a University College program, but became a "freestanding" EDU-B in 2008, while still maintaining a close relationship with the College. As an EDU-B, it does not have the capacity to make majority faculty appointments. We note that the program continues to generate student interest, although enrolments have fallen by 17% since a high of 193 (including minors) in 2013; this pattern is consistent with a more general decline in enrolments in the social sciences. The program, although relatively small in the Arts & Science context (with 7 specialists and 84 majors last year) is an important one for the Faculty, and does hold, in addition to the Director, two joint appointments. The most recent appointment took place in 2017 with a joint appointment to Political Science (51%) and SDS (49%).

Immediate to Medium-term:

SDS has indicated an interest in additional faculty in the areas of critical race studies and in trans studies; these requests will be considered in due course at the Faculty Appointments Committee. SDS is a multidisciplinary program, and as such, is supported by faculty from multiple departments in Arts & Science. The Dean's office will work with SDS to develop stronger teaching relationships with cognate units. Until such relationships develop and deepen the Faculty is proposing to enhance short-term funding to the Centre to support its teaching activities in high demand areas, in consultation with the current and in-coming Director, a search for whom is just underway.

The reviewers highlighted a need for consideration of diversity in future hires. The Faculty, as part of the larger University, shares a commitment to equity and value for diversity (<u>http://www.governingcouncil.utoronto.ca/Assets/Governing+Council+Digital+Assets/Policies/PDF/ppdec14</u> 2006.pdf).

3. Resources to Support the Programs

The reviewers recommended diversification of funding strategies and an increase in permanent staff.

Medium-term:

We note that SDS has been extremely successful in attracting sources of funding through a variety of advancement initiatives. In addition SDS is, and continues to be, supported by a mix of predictable 'base' funds that are annually available and one-time-only (OTO) allocations that are calibrated annually based on student demand for the Centre's programs and courses. Recognizing that the program required long-term institutional support, however, FAS reviewed the program's resources in 2015. As a result of that review the Faculty significantly increased the 'base' funding of the Centre. Annually adjusted OTO allocations continue, as is the practice across the Faculty. Enrolments have remained relatively steady since that time. It is also important to recognize that, given the close and historical relationship of the Centre with University College, the College continues to make a significant contribution to SDS in terms of administrative, financial and infrastructure support. We will continue to monitor the needs of the program over time and work with SDS to maintain a stable funding model.

4. Relationships and governance

Reviewers suggested reactivating the Curriculum Subcommittee.

Immediate-term:

SDS will reactivate the Curriculum Subcommittee immediately, to undertake this curricular review. SDS is appointing a new undergraduate Director, whose mandate will include leading this review.

Reviewers suggested developing relationships with cognate units on three campuses, as well as WGSI and other universities and organizations.

Immediate-term:

SDS with work with FAS to develop closer relationships with cognate units including history, anthropology, and geography. SDS will join the Sexuality Studies Association and encourage greater participation in its annual events.

SDS has had a long and close working relationship with many of WGSI's faculty. However, SDS and WGSI have different intellectual foundations and instructional reaches, and SDS has an array of community connections that are quite distinct from those of the WGSI. SDS will continue to explore possibilities of additional cross listed courses, secured access for students registered in one or the other programs, and future collaborations.

In the short term, SDS will remain focused on developing curricular opportunities and collaborations with units on the St. George campus. The unit remains open to developing relationships with faculty located on the UTM and UTSC campuses, and hopeful that they will be able to develop synergies with their research agendas.

Reviewers encouraged discussions regarding the unit's EDU classification.

Immediate-term:

The SDS Director will raise this issue with the Steering Committee, and initiate this discussion, based on the External Review.

Medium to longer-term:

Changes to a program's EDU status are initiated by Arts and Science when circumstances warrant, and take into account a variety of issues relating to a program. FAS has no immediate plans to make such a change with SDS, but remains open to the discussion in the longer term. The next SDS Director, yet to be appointed, will undertake a more systematic consultation and review of the advantages and disadvantages of reclassification of the unit's EDU status.

To conclude, we appreciate that the external reviewers identified Sexual Diversity Studies' strengths and noted a few areas for development. Sexual Diversity Studies has already begun to move forward with plans to address the recommendations as presented by the reviewers.

Sincerely,

David Comen

David Cameron, Dean and Professor of Political Science

cc. Brenda Cossman, Director, Mark S. Bonham Centre for Sexual Diversity Studies Poppy Lockwood, Vice-Dean, Academic Planning and Strategic Initiatives

UTQAP Review Summary

Programs(s) Reviewed:	Undergraduate Programs: Statistics, B.Sc., Hons. (Specialist, Major, Minor) Applied Statistics, B.Sc., Hons. (Specialist) Actuarial Science, B.Sc., Hons. (Specialist, Major) Graduate programs: Statistical Sciences (M.Sc., Ph.D.)
Division/Unit Reviewed OR Division/Unit Offering Program(s):	Faculty of Arts and Science
Commissioning Officer:	Dean David Cameron, Faculty of Arts and Science
Reviewers (Name, Affiliation):	 Professor Mary Thompson, Statistics and Actuarial Science, University of Waterloo Professor Richard Davis, Chair, Department of Statistics, Columbia University Professor Simon Sheather, Department of Statistics, Texas A&M University
Date of Review Visit:	January 26 -27, 2017

Previous Review

Date: March 29-30, 2007

Summary of Findings and Recommendations:

Undergraduate Programs

B.Sc.: Actuarial Science (specialist, major); Statistics (specialist, major, minor); Statistics and Computer Science (specialist); Statistics and Economics (specialist); Statistics and Mathematics (specialist)

The reviewers observed the following strengths:

- One of the leading international units in statistics
- Actuarial science program: very good reputation for training their students well
- Statistics specialist programs: well-deserved reputations, as the students are sought after by leading graduate programs in North America

The reviewers identified the following areas of concern:

• Courses emphasize the theoretical; a few courses include experience with data

The reviewers made the following recommendations:

• Support efforts to ensure courses include a mix of applied and theoretical material; consider giving teaching relief to those who will be developing these courses

Graduate Programs

M.Sc. and Ph.D: Statistics

The reviewers observed the following strengths:

- High quality
- Attracts excellent students engaged in their research, active in the department, and satisfied with their financial support
- MMF program: students very successful in obtaining employment
- Probability, theoretical statistics, and actuarial science: in excellent shape

The reviewers identified the following areas of concern:

• Applied Statistics: needs attention; appears understaffed and outdated relative to student demand and interests

The reviewers made the following recommendations:

• Applied Statistics: consider reviewers' suggestions to enhance the program

Faculty/Research

The reviewers observed the following strengths:

- Superb new appointments have increased strengths in actuarial science and mathematical finance
- Outstanding image internationally; several high profile faculty members
- Groups at UTM and UTSC have been successful in taking leadership for the teaching of statistics courses

The reviewers identified the following areas of concern:

• Teaching load is much higher than in other departments in an effort to support the various undergraduate, graduate programs, and service courses

The reviewers made the following recommendations:

- Engage with the administration more regularly on teaching load issues
- Expand research strengths in applied statistics through building a strong centre for this activity
- Appoint faculty in new research areas with diverse linkages in order to increase collaborative engagement

Administration

The reviewers observed the following strengths:

- Hard working, cooperative, staff; positive attitude
- Strong bridges built with public health sciences, mathematics, computer science, UTM and UTSC colleagues
- Reviewers commend invaluable role of the Consulting Service for U of T

The reviewers identified the following areas of concern:

- Serious shortage of support staff
- Lack of physical space constrains department cohesiveness

The reviewers made the following recommendations:

- Increase staff support
- Increase communication within department and between department and Dean's office.
- Shortage of office space significantly impacts the research program

Last OCGS review date: 2009

Current Review: Documentation and Consultation

Documentation Provided to Reviewers

Terms of Reference; Self-Study; Faculty CVs.

Consultation Process

The reviewers met with the Dean, Faculty of Arts & Science and the Vice-Dean, Academic Planning and Strategic Initiatives, the Chair of the Department, members of the Department's Executive, and cognate Chairs in Computer Science and from UTSC. Throughout their visit, the reviewers also met with administrative staff, many other faculty, some with primary appointments elsewhere (UTSC, UTM, CS, DLSPH, Faculty of Medicine), undergraduate and graduate students, and reviewers were given a tour of the Department's space.

Current Review: Findings and Recommendations

1. Undergraduate Program

Statistics, B.Sc., Hons. (Specialist, Major, Minor); Applied Statistics, B.Sc., Hons. (Specialist); Actuarial Science, B.Sc., Hons. (Specialist, Major)

The reviewers observed the following strengths:

- Objectives
 - o Appropriate
- Admissions requirements
 - Actuarial Science and Statistics specialist programs: minimum grade requirements may result in a higher quality of admitted students
- Curriculum and program delivery
 - o Applied Statistics: popular specialist program with capstone course
 - Incorporates integrative, inquiry-based activity
 - Currently modernizing the curriculum and engaged in a curriculum renewal process
 - Innovative introductory first year course in Statistical Reasoning and Data Science
 - Commendable use of inverted classroom techniques and capstone courses in Statistics and Actuarial Science
 - Curriculum features cross disciplinary perspectives taught in courses with joint faculty (Computer Science)
 - Appropriate research opportunities enhance students' educational and research experience

- "Blessed with a number of forward looking opportunities in Data Science"; new specialist program "should compare very favourably" with similar initiatives in other Canadian universities
- Assessment of learning
 - o Teaching-stream faculty actively develop and evaluate methods
- Quality indicators
 - Statistics specialist programs: the students appear to be of high quality, based on their average grades
 - "No cause for concern" in time to completion and employment rates given the degree requirements and offerings
 - Students "were enthusiastic, engaged and articulate"; NSSE scores suggest "no cause for concern"
- Support
 - Reviewers reported that there are a range of student learning opportunities possible beyond the classroom
 - Peer-to-peer mentorship program is available
 - Opportunities are being created for undergraduate and graduate students to work with scientific groups on campus

The reviewers identified the following **areas of concern**:

• Admission requirements:

Statistics major and minor programs: no minimum grade requirements in mathematics or computer science

- Curriculum and program delivery
 - Undergraduate student interest in research opportunities exceeds available opportunities; even more challenging for international students
- Enrolment
 - o Recent rate of growth is "not sustainable or healthy"
- Faculty resources
 - High number of students relative to tenure-stream faculty; limited student-faculty interaction

The reviewers made the following **recommendations**:

- Admissions requirements
 - Statistics programs: consider program specific minimum grade requirements in mathematics and computer science
- Curriculum and program delivery
 - Even as the undergraduate curriculum is modernized, care should be taken that subjects in the core of statistics be available to undergraduate students especially specialists.
- Enrolment

- Consider limiting the size of the undergraduate program to ensure a quality educational experience
- Faculty resources
 - Consider the addition of more faculty or teaching resources to support student-faculty interaction
 - Consider providing more extensive training to student teaching assistants
- Program development
 - Continue efforts to have in place in 2018 the undergraduate specialist program in Data Science, to be offered jointly with Computer Science

2. Graduate Program

Statistical Sciences (M.Sc., Ph.D.)

The reviewers observed the following strengths:

- Overall quality
 - o "Competitive" program
- Objectives
 - PhD program and M.Sc. in Financial Insurance: consistent with the Department's long term plans
 - Appropriate structure of the graduate programs and their learning outcomes
- Admissions requirements
 - o Appropriate
- Curriculum and program delivery
 - o Excellent professors
 - "Strides" in modernizing course offerings that reflect the evolving trend in the discipline
 - Excellent addition of the PhD and 8-month MSc 6-week topic research course
 - Appropriate research opportunities enhance students' educational and research experience
- Quality indicators
 - o "Recent surge in applicants"
 - MSc in Financial Insurance: excellent number of applicants
 - Completion rates and time to completion "look very good and consistent with the design of the programs"
 - o CGPSS:
 - In terms of 'Supportive dissertation advisor', U of T scored higher than U15, demonstrating quality of advising
 - Nearly 80% 'Probably' or 'Definitely' would select U of T if they were to start their graduate/professional career again; this is 5% higher than the corresponding U15 group

- Reviewers remarked that students in the 8-month MSc and PhD programs "were generally pleased with their educational experience"
- Program development
 - o The new concentration in Data Science is an "excellent development"
- Physical Resources
 - Students enjoyed the study and gathering space which they designed

The reviewers identified the following areas of concern:

- Curriculum and program delivery
 - Some concern about the ability of the 8-month MSc program to support two different constituencies: students seeking a professional only MSc degree and those who wish to progress towards a PhD program
 - "Sparsity of course offerings"; actuarial/math finance PhD students would like more math finance course offerings
- Quality indicators
 - o CGPSS:
 - Scored below U of T average in: 'Relationship of program content to my research professional goals'; 'Opportunities to engage in interdisciplinary work'; 'Amount of coursework'; in the suite of questions on Research Experience
 - 80% of the PhD stream students rated the 'Quality of academic experience' at U of T as 'Good' or 'Better'; 93% for the U15 group
- Enrolment
 - Faculty concerns that limited ability to admit international students pose challenge to maintaining program's excellence
- Student funding
 - Faculty felt that larger graduate student stipends would attract better quality graduate students
- Faculty resources
 - Limited resources to support senior level graduate courses

The reviewers made the following recommendations:

- Enrolment
 - o Increase PhD enrolment
 - Review and if possible increase the allocation of international PhD student spots
- Student funding
- Program development
 - PhD program could expand into another track (computational statistics), which might be distinct from the others

 Clarify rationale for and consider possible changes to the eight-month doctoral stream MSc program; consider offering a PhD program only, in which students earn a MSc on the way to a PhD

3. Faculty/Research

The reviewers observed the following strengths:

- Research
 - High quality
 - Top research awards in Canada and from the world's leading professional societies
 - Total research funding in 2015 approximately \$1.6 million; 42% increase over 2014
 - Among Canadian universities, ranks first in publications and second in citations; world-wide, ranks 17th and 12th, respectively
- Faculty
 - Good faculty morale; satisfied with the leadership and with the direction in which the Department is moving
 - Faculty recruitment is aided by "generous start-up funding, enough to hire a post-doc, and by initially reduced teaching
 - Newly recruited faculty felt that they are getting good advice from the Chair and others

The reviewers identified the following **areas of concern**:

- Faculty
 - Imbalance in faculty advising workload

The reviewers made the following recommendations:

- Faculty
 - PhD programs: ensure the supervisory load is balanced across faculty members
 - Machine learning group: hire experienced faculty with senior leadership experience
 - MSc in Financial Insurance: consider additional expertise in mathematical finance/actuarial science

4. Administration

The reviewers observed the following **strengths**:

- Relationships
 - o Dedicated staff
 - o Relationships with other units, especially with Computer Science
 - o Relations with suburban campuses "seem to be working well"

- Strong efforts have been made to find opportunities for undergraduate and graduate students to work with scientific groups on campus
- Several "fruitful partnerships" (e.g., The Canadian Institute of Actuaries)
- Planning/vision
 - o Current Department head is a very effective leader
- Reputation/profile
 - In 2013, the International Year of Statistics, held a very successful public lecture series of with talks by distinguished international visitors
 - Hosted the Statistical Society of Canada annual meeting in 2015
 - The department currently runs the (virtual) Canadian Statistical Sciences Institute

The reviewers identified the following areas of concern:

- Organizational and financial structure
 - Staff overworked due to enrolment growth and need to support conferences, workshops, public lectures
 - Revenue sharing issues for new programs (e.g., the MSc in Financial Insurance professional program)

The reviewers made the following **recommendations**:

- Organizational and financial structure
 - Consider additional staff, including possible support to IT infrastructure
 - Develop plan to provide more space for faculty and students and improve the "sense of cohesiveness" with space to support discussion and collaborative work



David Cameron, FRSC Dean

October 12, 2017

Professor Sioban Nelson Vice-Provost Academic Programs University of Toronto

Re: Review of Department of Statistical Sciences

Dear Sioban,

Along with the faculty, staff and students of the Department of Statistical Sciences, I am pleased with the external reviewers' assessment of the Department of Statistical Sciences and its undergraduate programs: Statistics, B.Sc., Hons. (Specialist, Major, Minor); Applied Statistics, B.Sc., Hons (Specialist); Actuarial Science, B.Sc., Hons. (Specialist, Major); and graduate degrees: Masters of Financial Insurance (MFI); Statistics, M.Sc. and Statistics, Ph.D. The reviewers complimented the Department of Statistical Sciences on "leading the way in terms of modernization of content" in undergraduate and graduate courses and programs, and noted that "the current Department head is viewed as a very effective leader, by both the faculty and the staff of the Department."

The quality of this program notwithstanding, as per your letter dated September 21, 2017, the review report raises a number of issues and challenges. I am writing to address the areas of the review report that you identify as key. The response to these items is separated into immediate- (current-3 months)/medium- (3-12 months)/longer- (12+months) term action items for the Department of Statistical Sciences, where appropriate. The Department of Statistical Sciences has discussed the reviewers' comments through consultation with various groups and has begun to implement changes where appropriate and that are consistent with the Department of Statistical Sciences' mission.

1. Curriculum and Program delivery

A) Undergraduate programs

The reviewers were concerned about the recent rate of enrolment growth and recommended that the Department work with the Faculty of Arts and Science to develop a plan that limits undergraduate program enrolment, establishes minimum grade requirements in pre-requisite courses, and ensures appropriate levels of staffing and teaching assistant training, to support a high quality educational experience and adequate student preparation. The Faculty recognizes that Statistical Sciences has experienced extraordinary growth over the past five years. At its most recent meeting in March, 2017, the Committee on Admissions considered and ultimately did not adopt a proposal from Statistical Sciences to introduce admission criteria that would limit enrolment in the POSt; limiting enrolments in this high-demand program would have the knock-on effect of shifting enrolment pressure to Mathematics (which currently does not have enrolment controls), and other related programs. The Faculty is currently examining options for controlling enrolments in a more holistic and considered way; the program by program approach simply shifts the enrolment challenge from one department to another, which is frustrating for faculty, students, and administrators.

Immediate to Medium-term:

Responding to challenges faced by the program, the Faculty has significantly increased the faculty complement in this department. In the 3 years from 2015/16 to 2017/18 and following the recommendations of the Faculty Appointments Committee (FAC), the Dean allocated to Statistical Sciences 7 new faculty lines consisting of 3 teaching stream and 4 research stream faculty. In addition, the FAC recommended and the Dean allocated back to the department all vacant positions from resignations or other departures.

To deal with the enrolment pressures in the immediate term, moreover, the Faculty has allocated a CLTA, effective January 2018, to allow for additional sections of key courses.

To ensure that the student experience is not compromised by growth in this area, the Faculty has approved two new staff positions for the Department to support undergraduate programs. In addition, the Faculty has expanded the space footprint of the Department's Learning Centre to support undergraduate students. The Faculty has also approved substantial growth in ELL (English Language Learning) & WIT (Writing Instruction for TAs) funds for the training of TAs. Finally, the Faculty has approved funding for significant growth in a peer-to-peer mentorship program to improve the UG student experience.

Medium to Longer-term

Consideration of future new faculty positions typically takes place through the formal faculty appointments process: units submit requests in the spring of each year, and these requests are considered by the Faculty Appointments Committee (FAC), which includes faculty representatives from across the three FAS sectors (the Humanities, Social Sciences, and Sciences) as well as the Colleges. After considering the full range of requests, the FAC makes recommendations to the Dean. Any request for additional faculty positions has an impact across the division, and as such, faculty appointments are considered not in isolation, but with respect to needs that exist across the Faculty, including changing

enrolment pressures. Requests from the Department for additional faculty appointments will be considered at the next FAC meeting in the spring of 2018.

The reviewers endorsed the development of the new undergraduate specialist program in Data Science.

Immediate-term:

The proposed Data Science program is a new specialist that will be offered jointly by Computer Science and Statistical Sciences. The external review for this new program took place September 22, 2017. The program proposal is moving through governance.

While the reviewers commended the Department's modernization of the curriculum, they highlighted the importance of ensuring the continued availability of subjects in the core of the discipline.

Immediate to Longer-term:

The Department has an international reputation for research and education at the core/foundation of the discipline and many of its faculty would strongly agree with the reviewers' comment. These faculty will ensure the core of the discipline will not be abandoned as the Department rightly modernizes its curriculum. As the Department modernizes its curriculum it seeks to integrate the subjects in the core of the discipline as they are critical to the appropriate use of statistical methods/computation

B) Graduate programs

The reviewers encouraged the department to reimagine its doctoral stream master's program, given the mix of doctoral and professional aspirations of its students.

Medium-term:

Curriculum renewal will take place within the current MSc. The current MSc will truly become a doctoral stream Masters program only. Prospective students with professional aspirations may be directed to the Data Science concentration within the MScAC. The current cohort of 20 (approximately) MSc students will be reduced over time to those truly interested in doctoral studies (5 or less). Planning for this is being discussed by the FAS Vice Dean, Graduate, and the Department.

The reviewers supported efforts to increase PhD enrolment, including international students enrolment, which would help the Department maintain its excellence; they also suggested attempting to even out supervisory responsibilities.

Medium to Longer-term:

With the recent and ongoing increases in faculty complement, PhD student growth will follow. Shifting resources (UTF funds) from the MSc program to the PhD program should also facilitate growth. The hiring of new faculty in the areas of Actuarial Science & Mathematical Finance (a sought-after PhD field in the Department) will help to even out supervisory responsibilities as will faculty complement growth in general.

2. Resources to Support Programs

The reviewers suggested the Department consider adding staff to support IT infrastructure.

Immediate-term:

Recognizing the need for additional staff, the Faculty has recently approved 4 new staff positions. These include two staff to support the undergraduate program, mentioned above, one staff member to support the MFI program, and one EA. The Department's IT staff are working with the Faculty's Instructional and Information Technology (IIT) office to explore the IT needs of Statistical Sciences and how to address them. In addition, there are discussions for a possible allocation of two more administrative staff, one for communication and one more to support the undergraduate program.

The reviewers recommended the development of a space plan to further enhance department cohesion and address growth.

Immediate to Medium-term:

New space has been allocated to the Department commencing the summer of 2016. More space was allocated and renovated over the summer of 2017 and the Department now occupies the entire 4th floor of the Stewart Building, complete with new and additional offices for faculty and staff. This space also included new and expanded graduate student space and a new classroom. The Faculty has significantly expanded the space footprint for the Department's learning center.

Medium to Longer-term:

The Faculty recognizes that the Department has experienced significant growth and will continue to work closely with the Department to address ongoing space needs.

To conclude, we appreciate that the external reviewers identified the Department of Statistical Sciences' strengths and noted a few areas for development. The Department of Statistical Sciences has already begun to move forward with plans to address the recommendations as presented by the reviewers.

Sincerely,

David Commen

David Cameron, Dean and Professor of Political Science

cc. Jamie Stafford, Chair, Department of Statistical Sciences Poppy Lockwood, Vice-Dean, Academic Planning and Strategic Initiatives

UTQAP Review Summary

Programs(s) Reviewed:	Immunology, B.Sc. (offered through the Faculty of Arts and Science) Immunology, M.Sc., Ph.D.
Division/Unit Reviewed:	Department of Immunology
Commissioning Officer:	Dean, Faculty of Medicine
Reviewers (Name, Affiliation):	 Professor Jeremy Boss, Department of Microbiology and Immunology, Emory University Dr. Michael Gold, Professor, Department of Microbiology and Immunology, University of British Columbia Professor Kamala Patel, Department of Physiology & Biochemistry and Department of Biochemistry & Molecular Biology, University of Calgary
Date of Review Visit:	February 1-2, 2017

Previous UTQAP Review

Date: November 29-30, 2011

Summary of Findings and Recommendations:

Graduate Programs: Immunology, M.Sc. and Ph.D.

The reviewers observed the following strengths:

- "Top tier" research and teaching programs
- Comprehensive range of undergraduate courses
- Outstanding educational experience
- Graduates, postdoctoral trainees, and faculty are in great demand

The reviewers made the following recommendations:

- Examine graduate student enrolment
- Review faculty contributions to medical undergraduate curriculum
- Support the four research platforms within the broader Departmental mandate
- Identify new revenue streams

Current Review: Documentation and Consultation

Documentation Provided to Reviewers

Terms of Reference; Self-Study Report and Appendices; Faculty CVs; Schedule; Dean's Report 2016; Faculty of Medicine's Strategic Priorities; Previous External Review Report (2011) and the Dean's and Chair's Responses.

Consultation Process

The reviewers met with the following:

- 1. Dean, Faculty of Medicine and Vice Provost, Relations with Health Care Institutions
- 2. Vice Dean, Graduate and Academic Affairs, Faculty of Medicine
- 3. Vice Dean, Academic Planning & Strategic Initiatives, Faculty of Arts & Science
- 4. Department Chair
- 5. Executive Committee
- Hospital Research Institutes Vice Dean, Research and Innovation, Vice President, Research, Sunnybrook Health Sciences Centre; Director, Toronto General Research Institute, University Health Network; Vice President, Research, University Health Network
- 7. Cognate Department Chairs Molecular Genetics; Laboratory Medicine and Pathobiology; Medicine
- 8. Professors Full, Associate, Assistant
- 9. Undergraduate Education Vice Dean, Academic Planning & Strategic Initiatives, Faculty of Arts & Science; Undergraduate Education Committee
- 10. Undergraduate Students and Immunology Students' Association
- 11. Graduate Education Vice Dean, Graduate and Academic Affairs; Associate Director, Graduate Professional Development; Associate Chair, Graduate Studies and Graduate Coordinator; Graduate Education Committee
- 12. Graduate Students
- 13. Collaborative Specialization Directors
- 14. Postdoctoral Fellows
- 15. Advancement & Alumni Executive Director of Advancement; Director, Alumni Affairs and Annual Giving; Director, Graduate Professional Development (Department)
- 16. In addition, the external reviewers were given a tour of the Department of Immunology in the Medical Sciences Building.

Current Review: Findings and Recommendations

1. Undergraduate Program: BSc

The reviewers observed the following strengths:

- Overall quality
 - Extensive and highly intensive; through its flexibility meets the demands of a diverse set of students with its specialists, major, and minor programs
- Objectives
 - o In line with goals of training students in a research intensive university

- Admissions requirements
 - Appropriate for the rigor of the program
- Curriculum and program delivery
 - Timely and relevant for the discipline
 - Students are well trained upon graduation; the specialists, in particular are highly sought after by many national/international graduate programs
- Assessment of learning
 - The reviewers noted a number of measurements of learning that contribute to students coming out of the program "well trained"
- Quality indicators
 - Consistently ranks higher than similar programs across the country
 - Completion rates are fine
- Enrolment
 - o Strong and increasing with the development of the minor's program
- Students
 - o Excellent quality
 - Students report very positive experiences

The reviewers identified the following areas of concern:

- Curriculum and program delivery
 - Students reported the need for additional coursework (e.g., computational biology/bioinformatics, statistics, and optional advanced courses that highlight emerging topics)
 - o Need to expand research opportunities
 - Students see need for additional coursework for specialists and majors
- Students
 - Students report that they do not feel a part of the department until their 3rd year
- Physical resources
 - Some classrooms lacked up-to-date technology

The reviewers made the following recommendations:

- Curriculum and program delivery
 - Coordinate and collaborate on course content and available offerings across departments to improve integration of the curriculum and availability of courses; curriculum/content maps would be helpful
 - o Communicate course availability to the specialists and majors
 - Continue to teach students how to evaluate data and scientific information and to communicate more broadly the role of science in society

- Offer a tutorial session for IMM250 to enable specialists to build a cohort; provide an overview of the department research programs
- Create blended classrooms and support active learning
- Expand research opportunities; specify skill sets/experiences and eligibility to work in a research lab
- Prioritize training programs and/or mechanisms to enhance/build computational biology/informatics
- Student funding
 - Provide additional funding for summer research experiences
- Outreach/promotion
 - Regularly post lab positions/research opportunities on the website
- Physical resources
 - Increase and upgrade classroom spaces (especially for large classes)
 - Build more capacity to expand research experiences

2. Graduate Program: MSc, PhD

The reviewers observed the following **strengths**:

- Objectives
 - All programs are "terrific" and reflect the mission of the university
- Admissions requirements
 - Strict and appropriate for each of the programs
 - **MSc:** fulfills its mission; supports the entry of highly qualified students into the PhD program
 - Applied MSc: fine
- Curriculum and program delivery
 - Offers an extensive and effective mix of academic courses, interactive sessions/journal clubs, seminar series, and professional development courses
 - "Outstanding" and represents the current state of the field, as well as current training modalities
 - **MSc**: provides an original research experience for students who may choose other career options (e.g., medical school)
 - **Applied MSc**: meets many students' needs (e.g., a shortened research experience for students seeking entry into graduate programs, jobs in industry or clinical laboratories, or those students seeking research experience and additional education for entrance into medical school)
 - Students are positioned for advanced study if they so choose
 - Set of collaborative programs enhance the community and learning experience and enrich the opportunities for those that participate
 - Applied MSc program: has a "wonderful internship program and has very nice, integrated career development"
- Assessment of learning
 - Standard and appropriate

- Reclassification/qualifying exam are helpful for tracking student progress and are a "great checkpoint" for successful PhD students
- Excellent PhD and MSc requirements to assess achievement of degree expectations (e.g., PhD students complete two first author papers)
- Quality indicators
 - PhD graduates are strong overall; former students are now positioned in research leadership roles across Canada and internationally
 - Applicants are drawn from the department's undergraduate streams (primarily the specialist stream), as well as nationally
 - High admission standards
 - o Low attrition
- Enrolment
 - Strong especially with the new applied MSc program; reviewers noted that IMM250 "fundamental immunology" quickly attracted ~1,000 students
 - Reviewers felt there will be no problem in attracting students to the undergraduate or graduate programs
- Students
 - The student magazine is of impressive quality, "an amazing production"; indicates student ownership of the program
 - o High quality student contribution to the self-study
 - "Extraordinary" placement rates as reported in the last magazine: 50% of the PhD grads are faculty at the 15-year mark; and 40% of MSc grads are in medical professions
- Student funding
 - The highest stipends in Canada

The reviewers identified the following **areas of concern**:

- Quality indicators
 - The department is unable to accept outstanding international students due to funding and the fee differential imposed by the university
 - Time to degree concerns; students concerned by a lack of oversight by thesis committees and the viability of their projects
- Support
 - Uneven support for graduate student travel to academic meetings; reviewers note this activity is an essential part of their training
- Student funding
 - Students face financial needs living in Toronto

The reviewers made the following recommendations:

• Quality indicators

- With respect to improving time to completion:
 - the reviewers provided suggestions for the thesis committee progress forms to assist and engage students in moving their degree forward
 - the department should obtain/purchase, implement a better tracking system for student progress, milestone management, and to enforce committee meeting requirements
 - the student's individual development plans (IDP) be developed in concert with advice from their advisor and thesis committee members to assist aligning student and faculty goals
- Change parameters on the funding and fee differential to improve international diversity and to secure "outstanding" international graduate students
- Support
 - Allocate a set of department funds to aid all students in year 3 and above to travel to meetings

3. Faculty/Research

The reviewers observed the following strengths:

- Overall quality
 - o "World-class research and academic unit"
- Research
 - An outstanding reputation internationally
 - A sense of community and collaboration exists on the research level that is critical to the success of the program
 - Ranked #1 in Canada in publications and citations; very high (#7) in the rankings in North America
 - 100% of the eligible members of the department have had CIHR funding for the past 6 years, at the top of the Faculty of Medicine and U of T
 - An outstanding research environment for the training of undergraduate and graduate students
- Faculty
 - o Successful complement plan
 - Teaching-stream faculty are doing a "great job in enhancing and expanding the undergraduate program and interface well with the tenure-stream faculty"; are important and major contributors to the success of the undergraduate program
 - Tenure-stream faculty are the course directors for 7 of 8 of the undergraduate courses and lecture/teach 60% of the contact hours

The reviewers identified the following areas of concern:

- Faculty
 - There are a small number of tenure-stream faculty and reviewers felt that this could lead to burnout

The reviewers made the following **recommendations**:

- Faculty
 - To enhance undergraduate teaching provide faculty development opportunities in new technologies
 - Facilitate interactions between the department and Molecular Genetics through joint hires
 - To meet the increased demand for undergraduate research experiences and to accommodate the needs of students in this area, reviewers recommend:
 - increase faculty complement over the next 5-10 years; several areas of immunology are not represented or at critical mass in the investigators' labs
 - begin proactive recruitment to replace faculty who leave or retire from the department; this is essential to maintain its eminence in the field

4. Administration

The reviewers observed the following strengths:

- Relationships
 - Faculty, students, and staff are highly engaged in the department and programs
 - Tenure-stream faculty are the hub of the immunology program and cohesiveness within the city
 - Great value in crossover appointments that offer opportunities for joint hires, research collaborations, and education; included here are the cognate departments of Medicine, Laboratory Medicine and Pathobiology, and Molecular Genetics
 - The department has established a summer research program relationship/program with institutes in India, South Africa, Scotland and England, Kenya, and Australia; these bring research and educational experiences to the department and students
 - The department is a national leader in the Canadian Society for Immunology as several of its faculty have had major leadership roles; the department Chair is the current President
 - Faculty have also served in leadership roles at the American Association of Immunologists and on a variety of editorial boards

- The reviewers commended both the graduate and undergraduate student society leadership teams for their contributions to creating a supportive community for their peers
- Organizational and financial structure
 - Reviewers were encouraged that federal funding (SIF) for infrastructure upgrades will be directed to the 7th floor Medical Science Building; the new designs for space allocation "look great and effective"
 - Excellent support staff for the programs
- Planning/vision
 - Great vision and leadership in Dr. Zúñiga-Pflücker; received glowing commendations from his colleagues, students, and staff; reviewers felt he will promote continued excellence in research and education, expand the scope of immunology research within the department, and maintain the relationships across the city with other members of the community
 - The current administrative team supports the academic research and education missions

The reviewers identified the following areas of concern:

- Relationships
 - Need to better communicate expertise between the departments (e.g., the strong computational biology expertise that resides within Molecular Genetics could serve as a great resource for the Department of Immunology)
 - Due to the decentralized locations of postdocs across the city (and on other campuses), there is an ongoing need to create postdoctoral cohesion in the department
- Organizational and financial structure
 - Remaining challenges with asbestos and recurring water damage on the 7th floor
 - Management challenges over the next few years include raising funds to hire faculty and support infrastructure, and flexible funds to support / bridge labs

The reviewers made the following recommendations:

- Relationships
 - Continue the summer research program relationship/program with various international institutes
 - Create specific opportunities for postdocs that can address concerns about cohesion:
 - hosting speakers
 - speaking at departmental retreats (currently in progress)

- posting research achievements, new positions obtained on the department website
- fostering the use of Individual Development Plans to discuss with their mentor(s)
- informing postdocs about departmental events, seminars, etc.
- providing access to the professional development courses offered by the department
- Organizational and financial structure
 - Continue work on the asbestos and recurring water damage on the 7th floor
 - o Identify mechanisms for sustaining core facilities
 - Integrate the 7th floor Medical Science Building with Molecular Genetics
 - Update the infrastructure in the Medical Science Building to enable Biosafety levels (BSL2) work and support the new germ-free unit
 - o Maintain and expand the IT infrastructure and support
 - Work with the Advancement Office to derive additional funding streams



L. Trevor Young, MD PhD FRCPC Dean Vice-Provost, Relations with Health Care Institutions

October 6, 2017

Professor Sioban Nelson Vice-Provost, Academic Programs University of Toronto Simcoe Hall, Room 225 27 Kings College Circle Toronto, ON M5S 1A1

Dear Vice-Provost Nelson,

I am responding to your request for a decanal administrative response to the External Review of the Department of Immunology's undergraduate (BSc) and graduate programs (MSc, PhD).

On behalf of the Faculty of Medicine, University of Toronto, I would first like to thank the three External Reviewers, Professors Jeremy Boss (Emory University), Michael Gold (University British Columbia) and Kamala Patel (University of Calgary) for their outstanding review of the Department of Immunology on February 1-2, 2017. The reviewers referred to the Department of Immunology as "a world class research and academic unit". I would also like to thank on behalf of the Faculty Professor JC Zúñiga-Pflücker, Chair of the Department, the administrative staff of the Department and all those who contributed to the preparation of the comprehensive self-study. I also thank the many faculty members and students who met with the external reviewers; your input was invaluable for this review. The Faculty of Medicine greatly appreciates the time and effort of the reviewers in providing a written report that is comprehensive and thoughtful.

I will comment on each of the specific areas that you have identified:

A. Undergraduate Program:

The reviewers encouraged increased coordination and collaboration to address duplication in course offerings, to ensure courses complement one another, to develop new offerings (e.g., computational biology/bioinformatics), and to improve integration of the curriculum; they suggested curriculum and content mapping might be helpful in efforts to enhance the program.

Implementation Plan:

In the Immediate Term:

1. The notion that some course offerings may contain duplication in material being covered is unavoidable when moving from introductory courses to advanced courses. Nevertheless, the program will continue to ensure that any duplication of course materials is minimized, as part of their yearly undergraduate course coordinators meeting. In addition, to ensure that duplication does not occur, the Department commits to undergoing a curriculum mapping exercise in collaboration with the Faculty of Arts and Sciences in the coming year.

- 2. The Department of Immunology recognizes that there is an increased demand from the student body for new offerings, and cross-disciplinary courses. The Associate Chair, Undergraduate Studies, will start a consultation process with Immunology faculty, through Immunology Curriculum meetings, to identify potential gaps in the programs and course offerings as well as opportunity for development. Potential areas that have already been discussed include cancer immunotherapy, Bioinformatics (with Molecular Genetics) and Immunoengineering (with the Institute of Biomaterials and Biomedical Engineering). Any new courses are submitted through the formal governance process of the Faculty of Arts & Science.
- 3. The co-recruitment of faculty with other Departments and Institutes (e.g. Molecular Genetics, IBBME) will facilitate the development of novel and cross-disciplinary courses.

While the reviewers praised the outstanding research environment for the training of undergraduate and graduate students, they drew attention to the need for more research experiences and opportunities for undergraduate students and made several recommendations around funding, structure and promotion of opportunities, and complement to support this.

Implementation Plan:

In the Immediate Term:

- 1. The program agrees and recognizes the need and demand from the student body for more research opportunities. This will require new funding streams to support faculty's ability for training students. This could be achieved through a training grant, possibly funded by NSERC or other sources.
- The Department of Immunology currently offers a Summer Research Program for 2nd- and 3rd-year Immunology students (<u>http://www.immunology.utoronto.ca/immunology-summer-research-program</u>) as well as a Research Project in Immunology (<u>http://www.immunology.utoronto.ca/node/274</u>).
- 3. Trinity College, in partnership with the Department of Immunology, now offers Research Opportunities abroad funded through the Queen Elizabeth II Scholarship program: <u>http://www.trinity.utoronto.ca/prospective/scholarships-financial-aid/qetwoschoarships.html#</u>

The reviewers recommended that the department enhance undergraduate teaching by supporting faculty development opportunities in new technologies.

Implementation Plan:

In the Immediate Term:

- 1. The Department has recently developed an online Immunology course offered through the School of Continuing Studies: <u>https://learn.utoronto.ca/interactive-course-search#/profile/3128</u>. We are currently developing another complimentary course. (As a Continuing Studies course, this is separate from the Arts & Science Immunology Program.)
- 2. The program has recently implemented the TopHat teaching platform, which provides interactive learning experiences, for IMM250H, IMM340H and IMM350H. The goal of this initiative is to improve attendance and participation in tutorials and ultimately improve the learning experience for students.
- 3. The program has started the production of short videos featuring research labs within the Department of Immunology that will be used for active learning, and "bring the research into classrooms." This has been made possible through the Advancing Teaching and Learning in Arts & Science (ATLAS) Fund, and the participation of our undergraduate students (IMMSA, Immunology Undergraduate Student Association). Three videos have been produced thus far, and more are planned.

The reviewers offered several suggestions to support cohort building and career exploration amongst undergraduate students, who reported feeling like they are not part of the department until their 3rd year.

Implementation Plan:

In the Immediate Term:

- 1. IMMSA organizes numerous educational, scientific and social events throughout the year that are geared towards networking and meeting other students and faculty. The program will continue to support its initiatives and advertise these events to undergraduate students. The program will also encourage faculty to take part in more of these events.
- 2. The Department organizes a welcome event (lunch and discussions) for Immunology Specialist students (year 2 to year 4) hosted at the beginning of each academic year.
- 3. Thanks to the support of an anonymous donor, the Department of Immunology has incepted the Undergraduate Immunology prize, which is given annually to the best student enrolled in its 3rd year courses, IMM340 or IMM341 and IMM350 or IMM351. The prize is complemented by an invitation to the annual winter retreat.
- 4. The program has suggested exploring an initiative in which undergraduate students "shadow" graduate students within the Department.
- 5. The short videos described above are also designed to bridge the gap between the Faculty and undergraduate students, and stimulate future interactions.

B. Graduate Program:

1. Time to Completion

The reviewers noted concerns about time to completion and made recommendations to address this.

The Department has been addressing this issue since the last review and more recently, the TTC for PhD students has deceased from a mean of 6.5 years to 6.0 years for the 2016 PhD graduates. The reviewers made some excellent suggestions in this regard, and initiatives coming from Graduate Life Sciences Office under Vice Dean Kaplan have been implemented specifically to reduce TTC.

Implementation Plan:

In the Immediate Term:

With support from the SGS Innovation Fund, and under the leadership of the Vice Dean Graduate Allan Kaplan, the Office of Graduate Life Sciences Education (GLSE) is implementing a new policy requiring the institution of Individual Development Plans (IDPs) for all graduate students. Towards that end, faculty development workshops beginning in September 2017 given by Professor Nana Lee (Biochemistry & Immunology) will be focused on training faculty on the importance of IDPs and providing a standardized template for implementation of IDPs across the FoM.

In addition, as of April 2017, GLSE now provides stipendiary support for students when they need to take a leave of absence (LOA) for physical or mental health reasons. This important initiative was spearheaded by Professor Jen Gommerman (Immunology). One of the factors responsible for longer TTCs is that students could not financially afford to take a LOA when they needed to because of the loss of their stipend when on a LOA; as a result, students when unwell were often in an unproductive state for prolonged periods of time. This new stipendiary program has been very well received by both students and faculty.

2. Uneven Support for Graduate Student Travel

The reviewers noted uneven support for students to attend conferences.

As recommended by the reviewers, the Department has committed to providing travel awards to all students in years 3 and above (i.e., post-reclass/qualifying exam) to attend and present at conferences through collaborating with the Advancement Office to establish new funding streams.

Implementation Plan:

In the Immediate Term:

With the support of the Advancement Office, the Department of Immunology has already obtained significant support (\$25K from Biolegend) to help in support travel awards for graduate students. Additionally, the Department is currently providing travel awards to the co-presidents of the Immunology Graduate Student Association (IGSA), this serves to acknowledge the contribution of student leaders and to showcase our graduate students at national and international conferences.

3. Core Facilities : Space and Infrastructure

The reviewers noted the importance of addressing the infrastructure needs of the Department.

Implementation Plan:

In the Immediate Term:

As part of the reappointment of the Professor Zúñiga-Pflücker, the Faculty of Medicine is committed to upgrading and renovating the Immunology laboratory space in the 7th floor of the MSB, which will insure BSL2 compliance. As part of this effort, the issues regarding flooding from the 8th-floor physical plant facilities will be addressed. Renovations to current laboratories on 7th floor of MSB are planned to begin in fall 2017, and will address many of the issues related to infrastructure, including assuring the laboratories are BSL 2+ compliant.

In addition, the reviewers noted the following issues that required attention, as noted in the UTQAP summary document:

1. Quality indicators

Time to Completion:

Addressed above. As another indication of the efforts to decrease TTC, when looking at the number of PhD FOE the Department had over the last 2 years, which is 5 in 2016, and 20 (thus far) in 2017, it provides an excellent indication that our efforts to ensure timely completion of the thesis work are beginning to show positive results.

Recruitment of and funding for international students.

The reviewers noted the funding difficulties in recruiting international students and recommended these be addressed.

The Faculty of Medicine now provides to the Department approximately \$6000/year for each international student above an established baseline that is enrolled in the graduate department. In addition, the Faculty has established a merit-based scholarship of \$5000, which is used to help bridge the gap in the tuition differential for second year international graduate students.

The Faculty will evaluate the impact of these funding initiatives to support international students and respond accordingly.

In addition, for the first time, the Faculty will, as part of our annual graduate recruitment fair, hold a special workshop on November 2, 2017 for those international students already enrolled in the FoM undergraduate life science programs. Representatives of the various FoM graduate departments will meet with the students to answer their questions and address their concerns about graduate training.

Reviewers recommended a tracking system to track student progress.

This will be addressed in the 2017-18 academic year through two initiatives:

The School of Graduate Studies has developed and now has offered for Divisions to utilize a new web based tool (Progress Tracker) to assist graduate students, supervisors, and units with tracking progress of research stream students. The FoM is planning on implementing this for our graduate students. In addition, GLSE will be conducting workshops beginning in September 2017 to train our faculty on IDPs - Independent Development Plans - for our students. The goal to have all of graduate departments institute IDPs for our graduate students over the coming academic year. Additionally, the Department of Immunology will be implementing an additional tracking system that is currently used by the Department of Medical Biophysics, which has proven to be extremely useful in collecting timely information about the on-track progress of their students.

Support for travel – addressed above.

2. Faculty

Reviewers recommended increasing the number of the number of tenure-stream faculty over the next 5-10 years.

Implementation Plan:

The Faculty has committed to providing funds for a new tenure-track position in the Department. This recruitment will occur during 2018-19, upon the return of the Chair from his academic leave. Additionally, the Department of Immunology is currently assisting in the recruitment of new faculty member in the field of Immunoengineering, which is being spearheaded by the Institute of Biomaterials and Biomedical Engineering, under the auspices of a Medicine by Design (CFREF) funded position. This together with potential co-recruitment with the Department of Molecular Genetics for a new faculty member, working in the field of computational immuno-biology, will further increase the number of tenure-stream faculty associated with Immunology.

3. Relationships

The reviewers recommended opportunities for postdocs that address concerns about cohesion.

The postdocs are currently quite engaged with the Department and have opportunities to participate in departmental events, seminars and courses. The Department of Immunology has started to involve postdocs in workshops that are provided by Professor Nana Lee, which are aimed at ensuring access to professional development skills and networking opportunities. The postdocs are now also encouraged to invite guest speakers to the Easton Seminar Series, and will serve as hosts. Further efforts will be put in place, including providing additional support for

postdocs to develop new journal clubs and other career development workshops to address the issues raised by the reviewers.

Sincerely,

L. Trevor Young, MD, PhD, FRCPC Dean, Faculty of Medicine Vice Provost, Relations with Health Care Institutions

BACHELOR OF SCIENCE Joint Decanal Response | Faculty of Arts & Science and Faculty of Medicine

The Faculty of Arts & Science thanks the reviewers for their comments on the undergraduate immunology program. We will continue to work with the Faculty of Medicine to ensure the quality of the program.

L. Trevor Young, MD, PhD, FRCPC Dean, Faculty of Medicine Vice Provost, Relations with Health Care Institutions

David Comen

David Cameron, PhD, FRSC Dean and Professor of Political Science Faculty of Arts & Science

UTQAP Review Summary

Programs(s) Reviewed:	Astronomical Sciences, B.Sc., Hons.: Specialist Astronomy, B.Sc., Hons.: Major Biological Chemistry, B.Sc., Hons.: Specialist Biomedical Physics, B.Sc., Hons.: Specialist Chemistry, B.Sc., Hons.: Specialist, Major, Minor Earth Science, B.Sc., Hons.: Specialist, Major, Minor Environmental Geosciences, B.Sc. Hons.: Specialist (offered with UTM Department of Geography) Geology, B.Sc., Hons.: Specialist Physics, B.Sc., Hons.: Major, Minor
Division/Unit Reviewed OR	Department of Chemical & Physical Sciences,
Division/Unit Offering Program(s):	University of Toronto Mississauga (UTM)
Commissioning Officer:	Amrita Daniere, Vice-Principal Academic & Dean, UTM
Reviewers (Name, Affiliation):	 Professor Emeritus Nils Petersen, Department of Chemistry and Centre for Molecular Structure and Dynamics, University of Alberta Professor Harm Rotermund, George Munro Professor of Physics & Department Chair, Department of Physics and Atmospheric Science, Dalhousie University
Date of Review Visit:	February 27-28, 2017

Previous Review

Date: 2008-09

Summary of Findings and Recommendations:

Undergraduate Programs

Astronomical Sciences, BSc: Spec; Astronomy, BSc: Maj; Biological Chemistry, BSc: Spec; Biological Physics, BSc: Spec; Chemistry, BSc: Spec, Maj; Earth Science, BSc: Spec, Maj; Geology, BSc: Spec; Physics, BSc: Maj

The reviewers observed the following strengths:

- Students "highly engaged" and enthusiastic
- The Biological Chemistry and Biophysics clusters are "dynamic and synergistic"

The reviewers identified the following areas of concern:

- Evaluate the programs' relation to the St. George campus
- Biological Chemistry and Biophysics have not yet reached a desirable critical mass
- The Earth and Space cluster has not yet developed a "clear vision or synergy"
- Astronomy has "lost critical mass" and recruitment and perhaps retention "would pose significant challenges"
- Increased enrolments and faculty member hires have outgrown the space
- Space and laboratory safety issues (e.g., waste pick-up system, air quality issues)
- Weak department web resources

The reviewers made the following recommendations:

- Earth and Space cluster: consider geobiology, geomicrobiology or biogeosciences as future areas
- Astronomy: consider two options 1) to devote the astronomy resources to the earth sciences, or 2) to place emphasis on the planetary sciences
- Increase space allocation for the department
- Establish a single undergraduate club

Faculty/Research

The reviewers observed the following strengths:

- Very competitive start-up packages for new faculty
- National and international research awards and national teaching excellence awards

- Location allows for researchers to intermingle; a collegial and collaborative environment; mentoring for research working well
- Excellent library support

The reviewers identified the following areas of concern:

• Mentors located at the St. George campus hinders informal interactions

The reviewers made the following recommendations:

• Whenever possible, mentors should be chosen from the UTM campus

Administration

The reviewers observed the following strengths:

• Academic plan is commendable; "excellent strategy"

The reviewers identified the following areas of concern:

• Although enrolment has increased substantially in the department, the operating budget has not

The reviewers made the following recommendations:

- The next department chair should have a research program based at UTM and focus on the "promotion of the Department's interests within UTM, across the 3 campuses, nationally and internationally"
- Hold a one-day department retreat on an annual basis
- Set department oversight groups
- A Chair's Advisory Committee could facilitate internal departmental relations
- A formula based on enrolment be applied for department funding

Current Review: Documentation and Consultation

Documentation Provided to Reviewers

Terms of Reference; Department of Chemical & Physical Sciences Self-Study, 2017; Previous Review Report and Administrative Responses; UTM Degree Level Expectations, 2016; U of T Facts & Figures, 2015; UTM Divisional Academic Plan, 2012; UTM Vision Statement, 2017; UTM Academic Calendar, 2016-2017; UTM Viewbook, 2017-2018; U of T Domestic Viewbook, 2017-2018; Tri-Campus Framework.

Consultation Process

The reviewers met with the Vice-Dean, Teaching & Learning; the Chair of the Department of Chemical & Physical Sciences, UTM; the Graduate Chairs of Astronomy & Astrophysics, Chemistry, and Physics; tenure-stream faculty members representing the

disciplines of Astronomy, Chemistry, Earth Sciences, and Physics; teaching-stream faculty members; sessional and contractually limited term appointment instructors; undergraduate and graduate students; postdoctoral fellows; departmental administrative staff; teaching lab technicians.

Current Review: Findings and Recommendations

1. Undergraduate Program

Astronomical Sciences (Specialist); Astronomy (Major), Biological Chemistry (Specialist), Biomedical Physics (Specialist), Chemistry (Specialist, Major, Minor), Earth Science (Specialist, Major, Minor), Environmental Geosciences (Specialist [offered with UTM Department of Geography]), Geology (Specialist), Physics (Major, Minor).

The reviewers observed the following strengths:

- Overall quality
 - Reviewers credited the "remarkable success" in meeting the challenges of delivering educational and research programs in four disciplines
 - One of the strongest departments at UTM in terms of research activity, graduate student education, and undergraduate student education
- Objectives
 - All programs are consistent with the University Mission and the department academic plans and vision
- Admissions requirements
 - o Appropriate and common practices in place
- Curriculum and program delivery
 - Improvements made in course offerings that increase flexibility for students
 - The department is introducing a first-year calculus-based physics course, a requirement for entry into the Physics programs
 - Research Opportunity Programs (ROPs) offer "innovative, well subscribed courses" in the department
 - Specialist students receive additional skills via a credit research course in a laboratory
 - Recent introduction of AirLAB (advanced interdisciplinary research laboratory) that enhances project management, teamwork, problem solving and leadership skills
 - Chemistry: overall, this is the strongest set of programs in the department, supported by the largest group of professors, graduate students, and staff; well-run; the programs include a "suite of courses that support all the sub-disciplines of chemistry very well"
 - Earth Sciences: all courses are available at UTM; programs "on solid footing"

- Physics: course descriptions reflect breadth and depth across physics subfields
- Assessment of learning
 - Faculty members are "passionate about the student experience" and incorporate appropriate assessment processes using varied tools among the disciplines
- Quality indicators
 - Application numbers are steadily increasing; increases appear comparable to other programs at UTM
 - o Increased admission numbers and registration numbers
 - Retention rates from year to year are "very strong, healthy" averaging 87% between 2007 and 2015
 - Steady increases in number of students who graduate within the fouryear program timeline; half of the students complete their programs within five years
 - Reviewers commended the AirLAB as a "great example of the teaching stream faculty adding value to the department through focus on important pedagogical tools to enhance the student experience"
 - The department conforms with and compares well with programs at other Canadian universities
 - Students from the program were able to compete for graduate school at universities in Canada and abroad
 - Around 85% employment rate within the first two years of graduation
- Students
 - Satisfied with their courses and programs
- Program administration
 - Program support staff are enthusiastic
- Physical resources
 - Recent renovations: "state of the art teaching laboratories" for chemistry and physics courses

The reviewers identified the following areas of concern:

- Overall quality
 - Despite the strategies used to deliver quality programs across the disciplines, "the status quo is not sustainable"
- Objectives
 - Earth Sciences: reviewers were confused by identical course objectives in the three Earth Science programs: Specialist, Major, and Minor; expected a differentiation in the level of expectations
 - Physics: many program objectives are "poorly framed for a student"
- Admissions requirements

- Different programs require different average grades in prerequisite courses
- Different programs have different admission criteria relating to both overall average as well as course specific averages, which may be confusing for students
- Astronomy: admissions criteria are not clearly communicated in the materials, including calendar copy, provided for the review
- Curriculum and program delivery
 - Department must manage large first year courses, many of which support disciplines other than their own, in conjunction with smaller core courses related to their disciplinary interests and expertise (though "pragmatically, all divisions need to cater to both")
 - The specialist programs need to be underpinned by a cohesive set of courses that can prepare students both for advanced studies and professional designation
 - The major and minor programs need to be cognizant of future workplace requirements
 - Few opportunities for students to acquire appropriate training in analytical and computational skills
 - Astronomy: Specialist in Astronomical Sciences & Major in Astronomy relies heavily on subject specific courses offered by the Faculty of Arts and Science on the St. George campus; not as rigorous as similar programs in other universities
 - Earth Sciences: reviewers were unclear whether all Specialist courses in geology were available at UTM
 - Physics: graduate students raised concerns that some of the jointly listed courses did not have enough physics related content to prepare undergraduate students for future upper level undergraduate physics courses; reviewers "surprised, and concerned" that the department does not offer a Specialist Program in Physics
- Quality indicators
 - Due to lack of available data it is unclear why students do not complete CPS programs
 - Some graduates of the program reported that their undergraduate training did not fully prepare them for graduate school; concern that some of the Joint Chemistry Physics courses and their content were not appropriate for both chemistry and physics majors
 - Specialist in Environmental Geosciences (Earth Sciences) leads to professional designation but does not attract any students
- Support
 - Significant technical and administrative support required (in addition to TAs, e.g., for labs), especially in Earth Sciences

- High student enrolment results in evening lab courses, creating an additional challenge for the support staff who need to be there for safety reasons
- Faculty resources
 - Need for a "critical mass" and appropriate balance of tenure- and teaching-stream faculty to ensure strong research and pedagogical environments
 - For Earth Sciences, the programs as designed are not sustainable with only three faculty members and their graduate students
 - Appointing senior undergraduate students as Teaching Assistants does not always provide an optimal learning experience
 - Teaching Assistants who were graduate students reported the need for better training and noted the uneven quality of Teaching Assistants

The reviewers made the following **recommendations**:

- Overall quality
 - Design programs to allow students to take all their courses toward the specialist, major and minor programs on UTM campus
 - Ensure quality programming is a "priority consideration" in order to measure up to national and international standards; program design needs to address the diversity of objectives of the students
- Objectives
 - For Earth Sciences, suggest that the members of the division provide more useful objectives for each of the Specialist, Major, and Minor programs
 - For Physics, suggest that all program objectives be more succinct so that the students can better appreciate program expectations
- Admissions requirements
 - Curriculum Committee: where possible review the admissions criteria to ensure similar standards for entry into equivalent programs
- Curriculum and program delivery
 - Curriculum Committee: with the respective course coordinators, reexamine the course content of joint courses to ensure that they meet the needs of all the students in their programs
 - Consider introducing computational course requirements as early as possible in the programs
 - Suggest that the first-year physics calculus based course serve as a prerequisite for other programs, such as the Chemistry Specialist program
 - The specialist programs should be underpinned by a cohesive set of courses that can prepare students both for advanced studies and professional designation

- The major and minor programs should be cognizant of future workplace requirements
- Department to be given the "freedom and flexibility to design programs that serve student needs rather than financial formulas" (reviewers noted this with respect to large first year courses)
- For Astronomy, reviewers suggested that the department address the issue of critical mass, ideally by merging the program with cognates or phasing it out, alternatively by expanding the number of faculty and ensuring all courses are offered at UTM
- The Chemistry Curriculum Committee should determine which programs qualify students to achieve the P.Chem designation
- For Earth Sciences, reviewers support plans to consolidate the specialist programs
- Physics: create a specialist program in physics; re-examine the content of the jointly listed courses to ensure sufficient exposure and rigor for the physics students
- Physical resources
 - Prioritize the currently scheduled renovation of dedicated undergraduate earth science laboratories and facilities to ensure it remains on track for a Fall 2018 completion
- Faculty Resources
 - o Draw on graduate students affiliated with UTM to optimize learning
 - Ensure enough graduate students are recruited to support the undergraduate programs
 - The department institute a formal TA evaluation and feedback process
 - Consider instituting an in-house training program on science-based TA issues

2. Faculty/Research

The reviewers observed the following strengths:

- Research
 - o "Successful and internationally recognized research activities"
 - Quality and quantity of research activities
 - Well-established researchers and early career researchers in the department
 - At or better than the average of the rest of the campus both in grants awarded, awards received, articles published, and citations earned
- Faculty
 - o Enthusiastic
 - o Excellent hires over the last several years

The reviewers identified the following areas of concern:

- Faculty
 - o Ten-year hiring gap may represent a challenge in the next period

The reviewers made the following recommendations:

- Research
 - o Regularly examine the focus of the research themes
 - Earth Sciences should continue hiring plans to add a teaching-stream faculty member followed by a tenure-stream faculty member

3. Administration

The reviewers observed the following strengths:

- Relationships
 - Good interactions with other departments at UTM
 - Strong relationships with colleagues in the corresponding departments at the St. George campus
 - o Impressive interactions with local organizations
 - The department has taken advantage of the focus on biologically related research and teaching across the disciplines to develop core strength and opportunity for interactions within and beyond the department
- Organizational and financial structure
 - Recently hired an Academic Counsellor

The reviewers identified the following areas of concern:

- Organizational and financial structure
 - Tendency towards centralized decision-making processes at the institutional level; "micromanagement" from central administration of issues that are delegated to faculties or departments elsewhere; for example, business services rather than the department evaluates the paid time allocated to a TA
 - o Lack of properly designed educational and research space
 - Lack of common space for student, staff, and faculty use
 - Increases in workload due to committee work

The reviewers made the following **recommendations**:

- Organizational and financial structure
 - Articulate some overarching principles that in turn would provide context for the specific evaluations of the programs and help frame the recommendations and decision-making
 - Create a stronger focus for the department by pursuing one of several options to merge astronomy into the other divisions of the department;

grow all remaining divisions of the department to remain competitive in each

- Planning/vision
 - o Develop a long term hiring plan
 - Continue to improve on transparency in decision making and on clarity of purpose to ensure current sustained levels of enthusiasm, commitment, and coherence



OFFICE OF THE DEAN

October 2, 2017

Professor Sioban Nelson Vice-Provost, Academic Programs Simcoe Hall University of Toronto

Dear Sioban,

I am writing to provide an administrative response to the External Review of UTM's Department of Chemical and Physical Sciences, which was held in February of 2017. This Department includes programs in Astronomy, Chemistry, Earth Science, and Physics. I am pleased with the largely favourable review, which highlights the delivery of quality programs across multiple disciplines, providing strong undergraduate and graduate education and faculty research activity. Reviewers commended the innovative research opportunities available to students, including both a range of Research Opportunity Programs (ROPs) and interdisciplinary AirLAB offerings. The state of the art teaching laboratory facilities for chemistry and physics were also acknowledged as positive developments in the Department. I expect that, with continued support, the Department will continue to provide outstanding programs across a range of fields. An implementation plan with timelines can be found at the end of this letter.

Curriculum and Program Delivery

The reviewers commended the department's strategies to meet the challenges of delivering educational and research programs in four disciplines. They encouraged more focus on designing learning outcomes (e.g., Physics) and course objectives (e.g., Earth Sciences) to ensure that students can (1) better appreciate program expectations; (2) understand which programs are associated with specific pathways (e.g., graduate school, professional certification, etc.); and (3) receive sufficient preparation (e.g., in joint courses) to succeed in their chosen pathway.

The Department has already begun the process of creating Curriculum Maps of its programs, which directly addresses the more explicit creation of learning outcomes and course objectives, as well as providing the Department with targeted knowledge of the preparation students are receiving in their courses, and where any gaps may exist. For example, computational skills are a concern for many of the degree programs in this Department, and the Curriculum Maps will help to highlight gaps in existing requirements and courses, as well as places where solutions will best fit; more details are provided in the Implementation Plan, including proposed joint courses.

Points (1) and (2) are also addressed by the newly unveiled Program Plans for degree programs in this Department (and others) created by the UTM Career Office with support from the Dean's Office and the departments, which provides accurate and parallel advice on academic, cocurricular, work experience and skills training for each stage of undergraduate study, including links to UTM campus-based support for each of these (see <u>http://www.utm.utoronto.ca/program-plans/</u> for examples). These will be expanded to cover all the major degree streams in the Department. Both the Curriculum Maps and the Program Plans will require regular updates and revisions as the Department continues to improve its degree offerings.

Earth Science, in particular, will be making major changes to their degree programs as they reorient their existing degree programs with new faculty hires (see below) and to achieve APGO (Association of Professional Geologists of Ontario) compliance; their Curriculum Maps and Program Plans will be essential tools in this process.

Reviewers suggested that the department design programs to allow students to take all their courses at UTM.

Students in Chemistry, Physics, and Earth Science degree programs all generally complete their degrees with courses offered at UTM. Geology and Astronomy are the only programs with insufficient course offerings at UTM to allow completion without including courses offered on the St. George campus. Earth Science will be undertaking major curriculum revisions in conjunction with two new hires, whose searches are currently underway (anticipated start date July 1, 2018), including reassessment of the Geology program. Astronomy is addressed below.

The reviewers recommended that the Curriculum Committee review admissions criteria to ensure similar standards for entry into equivalent programs.

The Department reviewed admission criteria across all their programs at a recent departmental retreat (May 11, 2017). The discussion made it clear that it would not be appropriate to make all programs equivalent, given the diversity of disciplines within the Department. For programs where equivalency would be appropriate, admission requirements are in the process of being streamlined and made equivalent. For other programs, especially programs expected to undergo major changes in curriculum or enrolment (e.g., Earth Science, Astronomy), admissions criteria will be reviewed regularly and changes made as appropriate, on a longer time scale. The ongoing development of Curriculum Maps and Program Plans will help the Department to monitor and assess these issues.

Reviewers were concerned around the sustainability of Astronomy as currently structured and recommended that the department pursue one of several options to merge this division into the other divisions of the department to ensure critical mass, availability of courses on the UTM campus, and competitiveness.

The Department agrees that this is a major concern and this was a major discussion topic at the recent retreat. The Department is currently reviewing options, and is considering two main options proposed by reviewers as well as other potential alternatives that may be beneficial for students and faculty, such as linking to an Astrophysics program and/or a Planetary Science program. Because of the impact these changes could have on multiple aspects of the Department, we do not want to rush this decision.

The department uses both undergraduate and graduate students as teaching assistants. The reviewers strongly recommend that TAs have sufficient educational background, training, and feedback to ensure an optimal learning environment and experience for undergraduate students.

To deal with the variety of training provided across the various disciplines and graduate programs from which Chemical and Physical Sciences draws its TAs, and to provide more uniform instruction specifically tailored to CPS needs, an in-house TA training program is currently being developed, to begin in 2018-19. CPS will draw on TATP and other expertise to develop the training program.

Faculty

The reviewers recommended the development of a long term hiring plan to support the programs with the appropriate mix of tenure- and teaching-stream faculty and disciplinary expertise.

The Department values the reviewers' suggestion and has already begun to reflect on the appropriate mixture of responsibilities and appointment categories to support their programs, courses, and research. As noted, Earth Science is already in the process of hiring two new positions, one teaching-stream and one tenure-stream, to address the significant needs of this program. The Department will continue to discuss the complementary needs of each program.

Organizational and Financial Structure

The reviewers recommended continued prioritization of the planned renovations to the Earth Science teaching laboratories to address a range of space concerns.

The Earth Science teaching labs continue to be a priority for the Department and the division (UTM). Plans are well underway for the space; most unfortunately, there has been a delay due to delays in other building projects at UTM, and while there are shared teaching labs where Earth Science is considered to be the primary user, the new labs dedicated to Earth Science will allow much improved teaching and more lab sessions as the program grows. The labs should be operational no later than 18 months after the original completion date of Fall 2018, in Jan 2020, with hopes for an earlier completion in Fall 2019. A new Earth Science lab coordinator was hired in August 2017 and will be instrumental in the lab design process.

Implementation Plan - Department of Chemical and Physical Sciences, UTM

The Department and the Office of the Dean, in consultation, will undertake the following approaches to enact positive changes:

Immediate Term (6 months)

Curriculum and Program Delivery

- Curriculum mapping of all programs, including attention to learning outcomes and course objectives, and student preparation at each stage for degree requirements; project underway, will take 1-2 years to complete, then requires continual review and updating; *Department with assistance from UTM Dean's Office (Associate Dean Undergraduate)*
- Program plans for degree programs; first phase completed, annual updates of existing plans and new developments for new degrees; *Department working with UTM Career Centre*

- Computational skills/training to be addressed by initiatives in the current curriculum cycle, with medium/long term implementation; *Department*; examples include:
 - Computational training components to be introduced in existing 1st and 2nd year Physics courses
 - Introduction of an additional joint Chemistry and Physics (JCP) course at the 200level to introduce scientific computing, specifically to train students on numerical software tools to solve practical Chemistry and Physics problems relevant in both academic and industrial settings
 - Computational modelling course currently being proposed at the 300-level for Physics students
- For programs where equivalent admissions criteria are appropriate, admission requirement changes are being proposed in this year's curriculum cycle; *Department*

Faculty

- Hiring of two new faculty in Earth Science (one teaching-stream and one tenure-stream); Department with funding from the Dean's Office

Medium Term (1-2 years)

Curriculum and Program Delivery

- Continue new work on and revisions to Program Plans
- Continue new work on and revisions to Curriculum Maps
- Physics to pursue a new specialist stream in Physics or Computational Physics (medium to long term); *Department with assistance of Dean's Office (Program and Curriculum Officer)*
- Earth Science continues major curriculum review and overhaul, with new faculty hires beginning in July 2018, including consolidating the Earth Science programs with the existing Geology programs (medium to long term); *Department with assistance of Dean's Office (Program and Curriculum Officer);* Goals include:
 - Addressing the enrolment issue with existing Geology specialist program
 - Streamlining existing program requirements to clarify program and course objectives and expectations, align with student interest and career goals
- Astronomy will assess effects of program changes put in place shortly before the review; continued discussion of future options for Astronomy degree stream; *Department with assistance of Dean's Office (Vice-Dean Teaching and Learning, as needed)*
- Certification/Accreditation
 - Earth Sciences curriculum changes planned to allow their degree programs to become APGO (Association of Professional Geologists of Ontario) compliant, including Professional Geoscientist (P.Geo) designation (medium to long term); *Department with assistance of Dean's Office (Program and Curriculum Officer)*
 - The Chemistry Specialist and Biological Chemistry Specialist programs have been accredited with the Canadian Society for Chemistry (CSC) for the past 10 years; accreditation is up for renewal in 2018 and CPS plans on seeking a 5-year renewal; *Department with assistance of Dean's Office (Program and Curriculum Officer)*
- Computational skills/training to be addressed by initiatives in the next curriculum cycles, with medium/long term implementation; in addition Chemistry to review new Physics

programs at all levels (see Immediate) to determine if this is an appropriate fit for their programs and students; if yes, they will bring this into their programs; *Department*

- In-house TA training program currently being developed, to begin in 2018-19; *Department, with assistance of TATP and other groups*

Faculty

- Annual assessment of faculty complement needs, including future directions of Astronomy program; *Department with funding from the Dean's Office*

Organizational and Financial Structure

- Earth Science teaching labs should be operational within 18 months of the original completion date of Fall 2018 (ideally by Fall 2019, at the latest by January 2020); *UTM Facilities and Dean's Office*

Long Term (3-5 years)

Curriculum and Program Delivery

- See medium term goals above
- For programs where equivalent admissions criteria were not deemed to be appropriate in earlier stages, monitoring and regular review will occur (especially with program and enrolment level changes), with admission changes made as appropriate (medium-long term); *Department*
- Monitor, review and discuss options for Astronomy degree stream for final decision about direction to be taken; *Department with assistance of Dean's Office (Vice-Dean Teaching and Learning)*

Faculty

- Annual assessment of faculty complement needs, including future directions of Astronomy program; *Department with funding from the Dean's Office*

Please let me know if you have any questions about this response.

Sincerely,

ante Wonine

Amrita Daniere Vice-Principal, Academic & Dean

Heather Mit- Miller

Heather M.-L. Miller Vice-Dean, Teaching & Learning

UTQAP Review Summary

Programs(s) Reviewed:	Classical Civilization, B.A., Hons.: Major, Minor Diaspora and Transnational Studies, B.A., Hons.,: Major, Minor History, B.A., Hons: Specialist, Major, Minor History and Political Science, B.A., Hons.: Specialist (offered with Dept. of Political Science) History of Religions, B.A., Hons.: Specialist, Major, Minor Latin American and Caribbean Studies: Minor South Asian Civilizations: Minor Women and Gender Studies, B.A.: Major, Minor
Division/Unit Reviewed OR Division/Unit Offering Program(s):	Department of Historical Studies University of Toronto Mississauga
Commissioning Officer:	Amrita Daniere, Vice-Principal Academic and Dean, University of Toronto Mississauga
Reviewers (Name, Affiliation):	 Professor Lesley Dean-Jones, Department of Classics, University of Texas at Austin Professor Pamela Swett, Department of History, McMaster University
Date of Review Visit:	February 9-10, 2017

Previous Review

Date: December 2009

Summary of Findings and Recommendations:

Undergraduate Programs

Classical Civilization, BA: Maj; History, BA: Spec, Maj; Diaspora and Transnational Studies, BA: Maj; History of Religions, BA: Spec, Maj; Women and Gender Studies, BA: Maj

The reviewers observed the following strengths:

• Integration of several disciplines into a single unit has met with an enthusiastic response from faculty members

The reviewers identified the following areas of concern:

- Students expressed concern regarding the limited presence of faculty members and mentoring of undergraduate students
- Support staff should not be engaged in student advising

The reviewers made the following recommendations:

- Create two new positions for student advising
- Increase engagement of tenure stream faculty in key courses

Faculty/Research

The reviewers observed the following strengths:

• Faculty members are dedicated and have genuine respect for their UTM students

The reviewers identified the following areas of concern:

• Not all tenure stream faculty have been formally assigned mentors

The reviewers made the following recommendations:

- Enhance the intersections between scholarly activity of faculty members and opportunities for cross disciplinary work
- Develop a mentoring policy, including both junior faculty members and graduate students
- Develop a colloquium for faculty to present their research
- Increase number of tenure-stream faculty given enrolment growth

Administration

The reviewers observed the following strengths:

• Department of Historical Studies is on the "cusp of significant transformation"

The reviewers identified the following areas of concern:

- The advantages of interdisciplinarity are not being fully exploited
- Overburdened support staff

The reviewers made the following recommendations:

- Reconsider governance structure to increase participation in governance and decision making
- Increase graduate student presence
- Create incentives for faculty to live in Mississauga
- Consider teaching graduate courses at UTM

Current Review: Documentation and Consultation

Documentation Provided to Reviewers

Terms of Reference; Department of Historical Studies Self-Study, 2017; Previous Review Report and Administrative Responses; UTM Degree Level Expectations, 2016; U of T Facts & Figures, 2015; UTM Divisional Academic Plan, 2012; UTM Vision Statement, 2017; UTM Academic Calendar, 2016-2017; UTM Viewbook, 2017-2018; U of T Domestic Viewbook, 2017-2018; Tri-Campus Framework

Consultation Process

The reviewers met with the Vice-Principal Academic & Dean; the Vice-Dean, Teaching & Learning; the Chair of the Department of Historical Studies, UTM; the Associate Chair of the Department of Historical Studies, UTM; tenure and teaching-stream faculty members; sessional instructors; undergraduate students; departmental administrative staff.

Current Review: Findings and Recommendations

1. Undergraduate Programs

Classical Civilization (Major, Minor); Diaspora and Transnational Studies (Major, Minor); History (Specialist, Major, Minor); History and Political Science (Specialist [offered with Dept. of Political Science]); History of Religions (Specialist, Major, Minor); Latin American and Caribbean Studies (Minor); South Asian Civilizations (Minor); Women and Gender Studies (Major, Minor)

The reviewers observed the following strengths:

- Objectives
 - o Classical Civilization:
 - range of topics covered both textual and material sources fits well with UTM's vision
 - focus on active learning in the 300-level courses fits well with U of T's desire to promote communication skills
 - a large proportion of the courses offered are historical in nature and this fits well with the inter-disciplinary aims of Department of Historical Studies
 - o History:
 - aligns well with the academic plans of the department and meets most of the goals of U of T's mission
 - o Women and Gender Studies
 - interdisciplinary, intersectional and transnational nature aligns well with U of T's Vision Statement
- Admissions requirements
 - Classical Civilization, History, South Asian Civilizations, Women and Gender Studies: appropriate
- Curriculum and program delivery
 - o Classical Civilization:
 - broadened course offerings are in keeping with current trends in classical studies
 - plan for tenure-stream faculty to co-teach CLA101H5
 - improvements made to the 200-level courses in Greek History, and Roman Culture and Society (fewer lecture hours and more tutorial hours)
 - o History:
 - diversity of themes in terms of geographic breadth and thematic coverage
 - attempts to match students with community partners in offcampus learning

- structures to encourage students to substitute courses from elsewhere, particularly Classics and History of Religions, to add interdisciplinary flavor
- the introduction of new Digital History courses
- attempts have been made to examine the gains in students' skillset and to address shortcomings
- History of Religion:
 - students comment positively on Level I methods and theory course
 - field trips make use of the city
 - mix of traditional scholarly approaches and newer areas of investigation
- o Latin American and Caribbean Studies:
 - thoughtful design of the minor and its program learning outcomes
- South Asian Civilizations:
 - the minor benefits from courses in History, Religion, Women and Gender Studies programs as well in from programs offered by other departments
 - the connection to the Centre for South Asian Civilizations makes for a very rich educational experience beyond the classroom
- o Women and Gender Studies:
 - thoughtful, progressive approach through the various levels
 - writing focused course at the 100-level is in tune with the activist focus of the major
 - opportunities for students to extend their learning beyond the classroom reflects program's activist focus
 - valuable opportunities to produce a creative work
 - the "Feminist Lunch" series has been extremely successful, sometimes drawing audiences of over 150
- Assessment of learning
 - Where information was provided, assessment of learning is as would be expected for the discipline and appropriate for the course
- Quality indicators
 - In all categories of the NSSE survey the average for the Department of Historical Studies was slightly higher than the average for UTM
 - 78% of 364 students rated the teaching in the Department of Historical Studies as "good" or "excellent"
 - Classical Civilization: number of majors graduating from the program more than doubled over the last few years suggests faculty successfully retain students once they have started taking Classical Civilization courses
 - South Asian Civilizations: steady increase in the number of graduates that have completed the minor in the last three years

- Enrolment
 - o History and Political Science: steady stream of students in the program
 - History of Religion: healthy
 - Women and Gender Studies: increase in enrolments (42%) and graduates (63%) between 2012 and 2016 has made possible new tenure-stream hires
- Faculty resources
 - NSSE survey: 77.62% of students strongly or somewhat agreed with the statement that they had sufficient interaction with the faculty in the Department of Historical Studies
 - Many of the students talked about the approachability, passion and knowledge of the faculty
 - Department of Historical Studies has seen major growth in its faculty complement
 - South Asian Civilizations: 7 tenure-stream faculty and several others in the area cluster support the minor well and enable the offering of a broad selection of courses
- Support
 - o Classical Civilizations: department size gives program "extra clout"

The reviewers identified the following **areas of concern**:

- Overall quality
 - Diaspora Studies: reviewers were concerned that the Department of Historical Studies is not " the best place for this program"
- Objectives
 - Diaspora Studies: social science program may not fit well in mostly humanities department or at UTM
 - History and Political Science: seemed to be orphans within the Department of Historical Studies
 - Women and Gender Studies: the program might fit better in a social science milieu such as Sociology, Anthropology, Political Science, or one with a heavily theoretical literary perspective
- Admissions requirements
 - History: there are CGPA requirements for the Specialist degree that do not exist elsewhere in the Department of Historical Studies; this may restrict enrolment in ways unintended by the program
- Curriculum and program delivery
 - Department of Historical Studies overall:
 - students have comparatively few contact hours with faculty in the classroom
 - NSSE survey: low number of students participating in high-impact practices

- Classical Civilization:
 - reduction in the variety of courses offered may discourage interest in the program as a whole
 - the self study reported that participation in excavations may only be a possibility for students in the St. George campus programs
- Diaspora Studies:
 - reducing the number of social science courses required to fulfill the major may undermine the program's core
 - reviewers note that none of the five students they met knew what "diaspora" meant
- o History:
 - students reported that the Level I History course had a "scattershot approach to content"
 - very small numbers involved in the internship course
 - reviewers did not find evidence of "thematic streams" mentioned in self-study during site visit discussions, or in program materials on the website
 - about 30% of level II courses have only 2 hours of contact per week and use lectures exclusively; only 1 of 47 courses at level III have a third contact hour
- o History of Religion:
 - majors and specialists must choose primary and secondary fields of study which do not include allowing students to study "the interaction of religion with other factors of society"
 - appears to be an imbalance between the number of level II and III courses offered
- Latin American and Caribbean Studies:
 - "severe" limitations on language in Spanish at UTM training hinders students to grasp this complex area of study
- Assessment of learning
 - Very little information provided on assessment of learning
- Quality indicators
 - Diaspora Studies: reviewers did not see evidence of student interest in the major despite self-study claims
- Enrolment
 - o Faculty report that courses with waiting lists had been cut
 - Classical Civilization: like Liberal Arts programs worldwide, courses at UTM have seen a decrease in enrolment in the last few years (from 602 to 434, 28%)
 - Diaspora Studies: increase in course enrolment has not resulted in an increase in major enrolment
 - o History: declining enrolment, similar to programs across North America

- History and Political Science: disinterest as reflected in small enrolment seems related to poor promotion
- Support
 - o Absence of mentoring and departmental identity for majors
 - Students reported a greater sense of "belonging" to their other departments and a better idea of the careers they could expect with those majors on graduation
 - Classical Civilization: challenge, also faced by similar programs elsewhere, to convince students in this program that it is a viable major
 - History: very little program outreach or promotion to students despite declining enrolments
 - History and Political Science: little effort made to promote the program, foster the program's growth or create a sense of community among its student cohort; no separate information about the program on the website (link goes to the History page)
- Faculty resources
 - o Low student-faculty interaction (NSSE and student reports)
 - Tenure-stream faculty do not appear to feel a responsibility to provide their students with mentoring or interaction beyond lectures
 - Students did not seem enthusiastic to participate in the review; perhaps reflecting lack of faculty engagement
 - The reviewers were advised that of all the tenure-stream faculty only two from Women and Gender Studies are regularly in the Department of Historical Studies more than one day a week
 - Faculty convenience in course scheduling is not in the students' best interests (e.g., all their classes on the one day)
 - Most of the programs within the Department of Historical Studies are facing falling enrollments in their classes even as they are adding faculty

The reviewers made the following **recommendations**:

- Objectives
 - Diaspora Studies: reviewers advise against investment of time or resources in this major
 - Women and Gender Studies: consider housing the program in a department that shares more of its interests and activist tendencies; if it remains in the Department of Historical Studies consider hiring more tenure-stream faculty, with a "historical bent"
- Curriculum and program delivery
 - o **Overall**:
 - increase the number of contact hours in the 300- and 400-level courses; break up lectures into periods of an hour; add tutorials where possible in the 100- and 200-level courses
 - Classical Civilization:

- addition of courses on Egypt could help attract a more diverse student body to the program
- maintain the current level of courses offered
- o History:
 - encourage more investment and promotion in the internship program
 - connect the curriculum across the department's disciplines
 - explore team-teaching
 - explore integrating digital history skills in existing courses, to complement the stand-alone Department of Historical Studies courses
 - add tutorials to level II courses that have less than 3 contact hours per week
- History of Religion:
 - consider a new stream in "religion and society" that would appeal to those interested in the interaction of religion with other factors of society, rather than in any individual faith
 - consider a practicum type course
 - add more level II courses with a 3rd contact hour
 - do more to connect across disciplines in the Department of Historical Studies through some of the traditional scholarly approaches and newer areas of investigation (e.g., raise student awareness of disciplinary overlap through guest lectures by historians or WGS faculty in History of Religion courses and team teaching)
- South Asian Civilizations:
 - almost strong enough to become a major with the addition of more historically-focused faculty
 - encourage a language requirement for the minor
 - offer more South Asian languages in the Language Studies department
- Enrolment
 - If courses need to be cut due to lack of teaching staff, consider cutting small courses rather than those with waiting lists
 - Classical Civilization: find ways to grow enrolment (e.g., by engaging with students at various venues, encouraging current majors to give short presentations on the attractions of this program major to students in the introductory courses, etc.)
 - History and Political Science: work with the Political Science Department to seek ways to grow this program
- Students
 - Classical Civilization: consider an offshoot of the Undergraduate Historical Student Society that could focus specifically on ancient world activities

- Latin American and Caribbean Studies: UTM should invest further in language training
- Student funding
 - Classical Civilization: provide summer support for undergraduate participation in excavations
- Support
 - Tenure-stream faculty should be involved in student advising with one of these faculty for each of the programs within the Department of Historical Studies
 - Women and Gender Studies: advise students of the benefits of a second major or two minors in complementary areas
- Faculty resources
 - Tenure-stream faculty need to have a greater presence at UTM and take a greater role in recruiting students, and interacting with and mentoring undergraduates outside of the classroom

2. Faculty/Research

The reviewers observed the following strengths:

- Research
 - Very proactive in promoting research through Research Committees and the planned introduction of Working Groups; reviewers note that results so far have been extremely impressive:
 - research revenues have soared since 2011-12
 - strong rates of participation in Tri-Agency competitions; higher than the humanities average since 2006-7, and equal to or close to the overall U of T average in recent years
 - "very respectable," 50% success rate in the SSHRC Grants since 2012
 - good spread of field research across the disciplines and impressive productivity of both tenure-stream and teaching-stream faculty
- Faculty
 - Many of the tenure-stream junior faculty appeared very grateful for their positions and the freedom provided by the institution to chart their own research agendas and teaching duties
 - Teaching-stream faculty were extremely enthusiastic about their appointments and were the most engaged with the Department of Historical Studies as an entity; productive in their research and successful in winning grants and feel their research is taken seriously
 - History: recent hires have been geared toward making the Department of Historical Studies more globally-minded
 - Women and Gender Studies: recent tenure-stream appointment hires are productive scholars and very active in community and political projects

The reviewers identified the following areas of concern:

- Research
 - It is unclear whether the term 'edited monograph' refers to a published monograph or to something in the process of being edited or a coauthored work, which is less impressive
- Faculty
 - The reviewers noted that teaching-stream faculty teach more than the tenure-stream faculty, and perform much of the extra-curricular and outreach activity that is so important in building a strong department

The reviewers made the following **recommendations**:

- Faculty
 - Leave the Eastern European and Soviet History position unfilled and strengthen an area such as South Asian Studies, Latin American Studies, Middle Eastern Studies or Classics by hiring in Language Studies
 - If faculty are added to the South Asian Minor, other than in Language Studies, they should be more historical in focus
 - tenure-stream faculty need to have a greater presence on the Mississauga campus and take a greater role in interacting and mentoring undergraduates outside of the classroom

3. Administration

The reviewers observed the following strengths:

- Relationships
 - o Faculty morale is generally high
 - Faculty appreciated the informal collaboration sharing of ideas and interests across the units within the Department of Historical Studies
 - Women and Gender Studies faculty show interest in department community
 - o Staff genuinely invested in the Department of Historical Studies
- Organizational and financial structure
 - The department has been well resourced, including a new space to which it will relocate shortly and the Dean has provided "multiple pots" of discretionary funding to foster research productivity and graduate presence
 - Effective staff team are appreciated by faculty
- Department/unit/programs relative to the best in Canada/North America and internationally (reputation/profile)

 At most universities in North America, departments for the disciplines represented in this review here have not seen the growth that the Department of Historical Studies has experienced; places UTM in a very advantageous position with respect to new faculty recruitment

The reviewers identified the following areas of concern:

- Relationships
 - Staff morale is very low; staff often feel the need to participate in activities that tenure-stream faculty would normally engage in
 - Weak relationships with other academic units at UTM despite the role that these Departments play in assisting the Department of Historical Studies to mount interdisciplinary minors
 - o Limited faculty interest in the review
- Organizational and financial structure
 - Governance structure for the Department of Historical Studies is a work in progress and some improvements have been made on clear and transparent service duties and decision making raised in the last review; however, continual review and improvements are needed to ensure changes are meeting the needs of the Department
 - Tenure-stream faculty do not come in for Department of Historical Studies meetings unless they are on campus to teach, which means that only about 50% of faculty attend
 - While reviewers are not fully convinced this is the case, faculty report heavier service and teaching demands than St. George colleagues in the Faculty of Arts and Science
- Planning/vision
 - Origin of the Department of Historical Studies as an administrative measure rather than as an intellectual disciplinary decision is still in evidence; the multiple programs in a single unit does provide opportunity, but may not currently be a strength as the individual programs remain unsure on how, together, to forge an organic whole or create unique programming or partnerships that would add value

The reviewers made the following recommendations:

- Relationships
 - Review the staffing structure regularly to ensure it continues to fit the needs of the Department of Historical Studies
 - Extend informal collaborations and collegiality to team teaching and department-wide co-curricular events
 - Consider replacing the poorly attended graduate student speaker series with a Department Speakers Series at which faculty, guests and graduate

students present research – once per month; use the Dean's research funds to pay for the shuttle trip/parking, honoraria, refreshments

- Organizational and financial structure
 - Consider directors for each of the majors (History, Religion, Classics, and perhaps a fourth for the three interdisciplinary minors); if this level of administration is brought in, the associate chair position would no longer be necessary
 - Directors should be elected by the entire Department of Historical Studies, serve a fixed term, should meet regularly with the Chair as a Department of Historical Studies Executive Committee; pretenure faculty should not serve as unit directors
 - Encourage the Department of Historical Studies to seek data on faculty claims of heavier service and teaching loads than St. George campus colleagues, and, if it exists, present the Dean with data to support these claims
 - Service duties, including those involving undergraduate student support and outreach, should be shared by tenure- and teaching-stream faculty
 - Regularly circulate governance documents (Constitution), including university or the Department of Historical Studies policies for forming search committees
 - Reviewers support the Dean's intentions to further facilitate travel between campuses
 - A faculty retreat is a "good starting point" to foster departmental cohesion, but a greater presence on campus and attendance at regular faculty meetings would be more effective
 - Faculty do not need offices on the St. George campus; meeting graduate students at UTM will help build cohesion
- Planning/vision
 - Consider synchronizing the semesters of all U of T campuses
 - The Vice-Dean Teaching and Learning should work with the department to make unique programming or partnerships a reality, including capitalizing on the diversity of the student population and surrounding cultural abundance in the Mississauga and Toronto community areas
 - o Develop practicum courses and other community research partnerships

Administrative response appended



October 3, 2017

Professor Sioban Nelson Vice-Provost, Academic Programs Simcoe Hall University of Toronto

Dear Sioban,

I am writing to provide an administrative response to the External Review of UTM's Department of Historical Studies, which was held in February of 2017. The following undergraduate programs in this Department were reviewed: Classical Civilization (Major, Minor); Diaspora and Transnational Studies (Major, Minor); History (Specialist, Major, Minor); History and Political Science (Specialist [offered with Dept. of Political Science]); History of Religions (Specialist, Major, Minor); Latin American and Caribbean Studies (Minor); South Asian Civilizations (Minor); Women and Gender Studies (Major, Minor).

I am pleased that the reviewers recognized the Department's highly productive researchers, both in the tenure and teaching-stream. They also commented favourably on the strong increase in permanent faculty and staff numbers since the last review, in contrast to many comparator programs in North America, as well as commending the strong sense of community in Women and Gender Studies, in particular. The reviewers noted the increasing numbers of program graduates from Classical Civilizations and the minor in South Asian Civilizations, as well as solid enrolments in Women and Gender Studies and History of Religions, and innovative new courses in Digital Humanities in the History program. This diverse Department does face some challenges encompassing a variety of disciplines, but discussion of solutions to these issues has already begun. An implementation plan with timelines can be found at the end of this letter.

Faculty

The reviewers were very concerned that the lack of a strong tenure-stream faculty presence on the UTM campus negatively impacts classroom contact hours and student advising, as well as co-curricular activities, the distribution of service responsibilities across teaching- and tenurestream faculty and administrative staff and department morale. They made a number of recommendations to facilitate the presence of tenure-stream faculty, as well as recommendations around course scheduling, advising, outreach, department governance and service that hinge on tenure-stream faculty presence.

The Department and Dean's Office agree with the reviewers that the lack of faculty presence on campus is an issue that impacts students, staff and the intellectual community of the Department. It is difficult for reviewers to fully understand the complexities in the logistical constraints of the tri-campus system during their brief visits, including the difficulties for UTM faculty whose graduate appointments based on the St. George campus require a regular two-campus presence for classes, events and committee work. The disparity in time needed for travel to two campuses for teaching as well as the need to adjust to two entirely different academic Calendars (UTM undergraduate and St. George-focused graduate) are also issues. Notwithstanding, there are several issues impacting faculty presence that can and must be addressed, in both immediate and longer-term time scales. These include attention to a more dispersed scheduling of undergraduate courses throughout the week which is better for student schedules as well as providing a reason for faculty to be on campus on multiple days per week; increased incentives for graduate students to come to UTM, including enhanced meeting space; and increased intellectual incentives for faculty to spend non-teaching time at UTM (from more programming at UTM to offering graduate courses on campus to establishing post-doctoral scholars at UTM). There are some significant challenges to a greater faculty presence at UTM, especially for research, but the successful creation of community at UTM by some units in the Department as well as creative ideas by individuals across the Department demonstrates that it is possible and suggests some ways forward.

On a hopeful note, the Department has noticed a naturally occurring shift towards significant presence on the UTM campus by newer faculty. They consider this to be a sign of a changing culture in which newer faculty feel more invested in UTM and the Department, offering more extracurricular events, spending more time with students and conducting some of their research on campus. We are hopeful that this trend will continue as newer faculty realize some of the benefits of being at UTM.

Curriculum and Program Delivery

The reviewers supported further investment in language training offerings for Latin American and Caribbean Studies Minor as well as the South Asian Civilizations Minor.

The Dean's Office and the Department agree with the reviewers' observations about the difficulties facing some programs without sufficient student training in appropriate languages on campus. The Dean's Office commits to working with the Department of Language Studies at UTM to make the language training needs of other departments part of complement planning; for example, Language Studies has already indicated their interest in improving their Spanish program and so would welcome this demonstration of support from Historical Studies. To aid in the success of these investments, the Department will consider curriculum revisions to encourage interest by their students in language studies and will make special note of language needs in their on-going Curriculum Mapping projects, for all degree programs in the Department.

The reviewers also made a number of suggestions around program development, including the possibility of greater connections across disciplines within the unit, a new "Religion and Societies" stream and a major in South Asian Civilizations.

The Department will need to arrive at a way to manage the tensions between cross-disciplinary and disciplinary degree programs; at present, strong feeling seems to support a policy of diversification into disciplinary degrees with cohesion in administration, possibly research and possibly one or two special degree programs. The Dean's Office sees no difficulty with this general approach, but will encourage the Department to focus on a decision about the future of the current cross-disciplinary degree programs, such as Diaspora Studies, and determine whether any new programs (such as the suggested "Religion and Societies" stream) should replace or supplement them. The possibility of a future major in South Asian Civilization seems promising, given the strong enrolments in the minor program, but will depend on dedicated long-term interest by Department faculty in developing and proposing such a program, with the guidance of the Dean's Office, especially the Curriculum and Program Officer. The Dean's Office recommends that the Department form a Working Group or multiple Working Groups, perhaps drawn from existing disciplinary Curriculum Committees, to investigate the future of existing cross-disciplinary degree programs (e.g, Diaspora Studies), and to suggest the possible creation (or not) of new cross-disciplinary degree programs, including a possible Major in South Asian Civilizations. If the proposals are approved by the Department, the Working Group(s) will be responsible for long-term development of curriculum planning and documents needed to revise, end and/or create such programs.

These decisions will be aided by the Department's creation of Curriculum Maps for all of its programs. These will help assess the possibility of revising or ending existing cross-cutting degrees and creating others, as well as assess possible gaps in knowledge and skills in degree streams in relation to program planning and faculty hires. The new Departmental administrative structure, with more administrative participation by all of the disciplines, should also encourage greater attention to curriculum development.

Students

The reviewers reported some positive experiential learning and out of classroom learning opportunities but noted that a more concerted effort be made to capitalize on the "cultural abundance" in the UTM campus area. For example, the reviewers recommended bolstering current low student enrolment in the History internship course.

The Department agrees with the reviewers' recommendation to bolster their experiential learning opportunities by linking with the surrounding community. The reviewers also raised an important issue about students' perception of and engagement with the Department, specifically, a lack of awareness about the Department that stems both from its multi-disciplinary nature and the lack of presence of faculty. The Department also feels that the Historical Studies Society student group routinely seems to focus only on one of their disciplines (typically history). The Department has pledged to address this issue in a number of ways, including increased faculty involvement with student organizations and student advising, and more Department events involving the community. The new UTM Program Plans (http://www.utm.utoronto.ca/program-plans/) may provide an avenue for ensuring that students are aware of all opportunities open to them. Finally, the Dean's Office is in the process of expanding Experiential Education support and opportunities across campus, and these programs will be open to the Department in the medium to long term.

Long Range Planning

The reviewers were not convinced that the department as a whole was greater than the sum of its individual parts and made suggestions to improve the value of the unit as a whole by ceasing

support for programs (Diaspora Studies) that do not appear to fit with the unit or at UTM; moving healthy programs (Women and Gender Studies) to other departments where they may be a better fit; and working with the Dean's Office to create unique experiences and partnerships within and beyond UTM that leverage the department's unique array of programs and meet interdisciplinary goals

The issue of existing cross-disciplinary programs like Diaspora Studies is noted above under Curriculum and Program Delivery, and possible solutions discussed there.

The feedback to the Dean's Office from Department faculty was unanimously in favour of keeping the Department intact as a unit, both from Women and Gender Studies and outside it, both through the Chair and in Town Hall meetings. Indeed, Women and Gender Studies made the case that their presence in this multi-disciplinary Department had clearly been a success for them, given their strong showing in the review, and that they should stay in the Department to encourage and support community building for others. While this diverse, complex unit is more difficult for reviewers to assess than a more traditional disciplinary unit, or an explicitly cross-disciplinary one, the model of diversity of degree programs with unity of administrative structure seems remarkably successful at UTM, given that all three complex units of this kind under review in 2016-17 expressed similar desires to stay together. This does not mean such units are unproblematic, however, and the new administrative organization adopted by Historical Studies this year may be of assistance, as well as the plans suggested in this response.

In addition, the Dean's Office suggests that the Department of Historical Studies could benefit from a retreat, perhaps one led by a professional moderator to guide discussion into concrete decisions which can be subsequently enacted by Department administration with support from the Dean's Office, as needed. The Department may wish to make such retreats a regular event.

Implementation Plan - Department of Historical Studies, UTM

The Department and the Office of the Dean, in consultation, will undertake the following approaches to enact positive changes:

Immediate Term (6 months)

Faculty

- To increase faculty presence at UTM, the Department has already requested faculty to teach courses on at least two separate days per week at UTM, rather than teaching all courses on one day; some faculty have also voluntarily begun scheduling office hours on a different day of the week from teaching; *Department*
- Encourage existing trajectory of significant funding made available to faculty who choose to hold extra-curricular events at UTM, with steady increase in such events over past five years; *Department with funding from the Dean's Office, including directly to faculty and groups*
- Proposed increase to faculty and other research activity at UTM by hosting post-doctoral scholars on campus; funding has been granted for a post-doctoral fellow in Classics to be

housed in the Department at UTM as a pilot project; *Department with funding from the Dean's Office*

- Invite UTM disciplinary liason librarians to work with faculty and graduate students to ensure both are aware of the Library's services, including process and speed of requesting holdings delivered to UTM from elsewhere at U of T, as well as Library's interest in acquiring holdings needed for Historical Studies' disciplines; possible creation of informational materials directed towards faculty and graduate student research in Historical Studies and made available in print, by email, and on the Department's website; *Department and UTM Library (Hazel McCallion Academic Learning Centre)*
- Encourage faculty to cross-list advanced undergraduate seminars as graduate courses, as has been done in the past with excellent results, to increase graduate student presence on campus and increase their interactions with top undergraduates, as well as encourage faculty meetings with graduate students at UTM; *Department*
- At the request of the Department, the Dean will inquire into progress on subsidized transportation (shuttle bus) for UTM faculty required to attend committee and other meetings on other campuses, as previously discussed in recent UTFA agreements; at minimum, a supply of shuttle bus tickets for such meetings should be made available as appropriate; *Dean's Office*

Curriculum and Program Delivery

- Curriculum mapping of all programs, including attention to learning outcomes, course objectives, and student preparation at each stage for degree requirements; to be used for assessment and revisions to existing programs, especially with attention to language needs and possible collaborative or cross-disciplinary offerings within the Department; project will take 1-2 years to complete, then requires continual review and updating; *Department with assistance from UTM Dean's Office (Associate Dean Undergraduate)*
- Consider curriculum revisions to encourage interest by students in language studies (e.g., allowing language courses to fill option requirements towards Historical Studies degrees); make special note of language needs in their on-going Curriculum Mapping projects; Department with assistance of Dean's Office (Program and Curriculum Officer; Associate Dean Undergraduate for Curriculum Maps)
- Dean's Office will begin immediate work with the Department of Language Studies at UTM to make the needs of other departments for language training part of complement planning; *Dean's Office and Department of Language Studies, with input from Department of Historical Studies on specific needs*

Students

-

- Program Plans for degree programs; first phase completed, annual updates of existing plans and new developments for new degrees to make students aware of opportunities that exist; *Department and UTM Career Centre*
- Encourage Historical Studies Society (HSS) student group to focus on all disciplines, and encourage increased faculty involvement with HSS and other student organizations; *Department*
- Develop formal faculty advising structure for students, to complement the existing administrative staff student advising and engage students in their scholarly plans and choices; explore establishing a faculty advisor for each major and specialist program; *Department*

- Continue to develop and advertise Department events open to and involving the community, including alumni, perhaps employing the *Mississauga News*, the Alumni office, the Communications office and other venues; continue to invite alumni and other community members to give guest lectures; *Department*

Long Range Planning

- As above, plus planning for a Retreat, perhaps in the Spring term between classes and exams; *Department with assistance from Dean's Office as needed*. Suggested topics to be discussed, whether as a unit or in break-out groups, could include but not be limited to:
 - whether or not to focus on creating stronger cross-disciplinary undergraduate degree programs, or to focus on strengthening existing degree programs while adding crosslistings to relevant course in other Department units - as a philosophical discussion, rather than in reference to specific cases;
 - whether the existing disciplines as currently named and organized make the most sense for the Department, or whether other groupings of faculty and/or degree programs would enhance Department success for students and faculty;
 - issues relating to staff loads, needs, and faculty support of staff, not discussed directly in the review, but raised in the consultation process; and
 - o whether the new administrative structure is helpful, or more adjustments need to be made

Medium Term (1-2 years)

Faculty

- Department moves into new building in 2018, with purpose-designed office and research space for faculty and graduate students, and new meeting space designed to promote collaboration and intellectual community development; *Department and UTM Campus*
- Revision of Department's now-defunct Prandium lecture series into monthly Department speaker series intended to engage faculty and graduate students by both showcasing in-house research and bringing outside experts to UTM; will also be promoted to further engage undergraduate students in research (Medium and Long Term); *Department, with internal, Decanal, and other funds*
- New Director of the Centre for South Asian Civilizations (CSAC) associated with the Department has committed to holding many more events on the UTM campus in future; successful beginnings already made in conjunction with other departments (Medium and Long Term); *Department and CSAC, with internal, Decanal, and other funds*
- If current post-doctoral scholar position request is successful in increasing research activity and faculty presence on campus, Department will consider having at least one post-doctoral scholar on campus for each of their four major disciplines (Medium and Long Term); Department to seek out and apply for funding from granting agencies with assistance from Vice-Principal Research
- Department will continue to maintain strong ties with liason librarians and develop informational materials directed towards faculty and graduate student research (Medium and Long Term); *Department and UTM Library (Hazel McCallion Academic Learning Centre)*
- New 2017-18 organization of the department into four discipline-based Program Directors under the Chair, rather than a single Associate Chair and Chair model, should allow the Chair to focus more on faculty needs and problems, especially for the increased number of junior

faculty present at UTM, with the Program Directors handling many aspects of day-to-day undergraduate programing (Medium and Long Term); *Department*

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- As frequently noted by UTM faculty, more reliable and appropriate modes of shuttle transport would help increase faculty presence at UTM; *UTM Campus*

Curriculum and Program Delivery

- Continue new work on and revisions to Curriculum Maps
- Continued work on curriculum revisions to encourage language studies by Department students; *Department in consultation with Dean's Office (Program and Curriculum Officer)*. Possible options include:
 - o minor changes to requirements for existing degrees, allowing language credit;
 - development of new degree streams involving joint language degrees, as for the existing UTM International Affairs degrees or global scholars program in development by Language Studies (Medium to Long Term)
- Continued work by Dean's Office to make the needs of other departments for language training part of complement planning in the Department of Language Studies (Medium and Long Term); *Dean's Office and Language Studies, with input from Department of Historical Studies on specific needs*
- Department to form Working Group(s) to investigate future of existing cross-disciplinary degree programs (e.g., Diaspora Studies), suggest the possible creation or not of others (e.g., Major in South Asian Civilizations, Religion and Societies), bring ideas to Department, and be responsible for long-term development of curriculum documents needed to create such programs (Medium and Long Term); *Department in consultation with Dean's Office (Program and Curriculum Officer)*

Students

- Continue to work with Historical Studies Society student group to focus on all disciplines, perhaps by assigning multiple faculty advisors from different disciplines, or consulting with students to see if separate discipline-oriented student groups would be more effective; *Department and Undergraduates, including existing student organizations of various types*
- Increased faculty involvement with student organizations, including annual meet-and-greets; all-department event with opening of new building space in Fall 2018; *Department*
- Increased faculty involvement with student advising, through creation of a formal structure of faculty assignment as student disciplinary advisors for course content, disciplinary studies, and careers to complement existing administrative staff advising on degree requirements; *Department*
- Continue to develop Department events open to and involving the community; *Department*
- Engage with new Dean's Office opportunities expanding Experiential Education across campus, as desired (Medium to Long Term); *Department and Dean's Office (Experiential Education Office)*

Long Range Planning

- See above re Working Group to assess existing cross-disciplinary degree program of Diaspora Studies; must make final decision about future of this program and proceed to results determined during this period; *Department in consultation with Dean's Office*

- Retreat, if not previously held; consider annual department retreats, even short ones, to monitor progress; *Department*

Long Term (3-5 years)

Faculty

- See Medium Term goals above; Department and Dean's Office

Curriculum and Program Delivery

- See Medium Term goals related to possible major curriculum developments in language training and to possible new degree streams; *Department and Dean's Office (Program and Curriculum Officer)*
- Results chosen by Department from recommendations by Departmental Working Group(s) on major curriculum developments related to possible new degree streams; chosen programs advanced to curriculum development and governance (See Medium Term); *Department and Dean's Office (Program and Curriculum Officer)*

Students

- Continue faculty involvement with student organizations; Department
- Continue faculty involvement with student advising; Department
- Continue to develop Department events open to and involving the community; Department
- Engage with new Dean's Office opportunities expanding Experiential Education across campus, as desired (Medium to Long Term); *Department and Dean's Office (Experiential Education Office)*

Long Range Planning

- Finalize process to end Diaspora Studies degrees in favour of focus on other programs OR reassessment of enhanced Diaspora Studies program; *Department and Dean's Office*
- Possible annual retreats; Department

Please let me know if you have any questions about this response.

Sincerely,

Lie Howeie

Amrita Daniere Vice-Principal, Academic & Dean

eather M.L. Mille

Heather M.-L. Miller Vice-Dean, Teaching & Learning

UTQAP Review Summary

Program(s) Reviewed:	Commerce, B.A., Hons.: Major Commerce, B.Com.: Specialist Commerce, Accounting, B.Com.: Specialist Commerce, Finance, B.Com.: Specialist Commerce, Marketing, B.Com.: Specialist Management, B.A., Hons.: Major Management, Management Stream, B.B.A.: Specialist Management, Human Resource Management and Industrial Relations Stream, B.B.A.: Specialist
Division/Unit Reviewed OR Division/Unit Offering Program(s):	Department of Management University of Toronto Mississauga
Commissioning Officer:	Vice-Principal Academic and Dean, Amy Mullin Office of the Dean, University of Toronto Mississauga
Reviewers:	 Professor James Rebitzer, Economics, Management and Public Policy; Everett W Lord Distinguished Faculty Scholar (2012), Questrom School of Business; and Chair, Markets, Public Policy and Law Department, Boston University Professor John Ries, HSBC Professorship in Asia Business; Senior Associate Dean, Research, Sauder School of Business, University of British Columbia
Date of review visit:	November 14 - 15, 2016

Previous Review

Date: November 2007

Summary of Findings and Recommendations:

Undergraduate Programs

Management, BA: Specialist; Management, BA/BSc: Major; Commerce and Finance, BCom: Specialist; Commerce and Finance: Accounting, BCom: Specialist; Commerce and Finance: Finance, BCom: Specialist; Commerce and Finance: Human Resource Management, BCom: Specialist; Commerce and Finance: Marketing, BCom: Specialist; Commerce, BA: Major

The reviewers observed the following strengths:

• Rich and varied set of offerings; high quality programs; students are generally satisfied

The reviewers identified the following areas of concern:

• Over-reliance on non tenure-stream faculty to teach required courses

The reviewers made the following recommendations:

 Streamline specialty and major programs; re-examine the procedures for enrolling in courses on other campuses; ensure a minimum number of spots at Rotman for UTM students

Faculty/Research

The reviewers observed the following strengths:

• Very high quality, enthusiastic and committed; impressive tenure-stream research success and that "all appear to continue to be active and strong contributors in their respective fields"

The reviewers identified the following areas of concern:

• Faculty indicated they felt under-resourced and under-valued by UTM and Rotman School of Management despite high student demand for programs; "clear evidence of strain or tension between" the Department and Rotman

The reviewers made the following recommendations:

• Appoint more tenure-stream professors

Administration

The reviewers observed the following strengths:

• Valuable, collaborative and amicable relations with Department of Economics; exceptionally high spirit and morale

The reviewers identified the following areas of concern:

• Tense relations between the Department of Management and UTM administration over revenues derived from the department for the campus

The reviewers made the following **recommendations**:

• The department obtain much "greater affirmation of support from UTM in order to build its tenure-stream component of the faculty and establish a better foundation for being a more independent and well-respected unit"

Current Review: Documentation and Consultation

Documentation Provided to Reviewers

Terms of Reference; Department of Management Self-Study, 2016; Previous Review Report and Administrative Responses; UTM Degree Level Expectations, 2016; U of T Facts & Figures, 2014; UTM Divisional Academic Plan, 2012; UTM Academic Calendar, 2015-2016; UTM Viewbook, 2016-2017; UTM Viewbook, 2017-2018; U of T Domestic Viewbook, 2017-2018; Tri-Campus Framework.

Consultation Process

The reviewers met with the Vice-Principal Academic & Dean; the Vice-Dean, Undergraduate; the Chair of the Department of Management, UTM; the Director, Undergraduate Programs of the Department of Management, UTM; the Vice-President & Principal, UTM; tenure and teaching-stream faculty members; undergraduate students; departmental administrative staff.

Current Review: Findings and Recommendations

1. Undergraduate Program

Commerce HBA (Major); Commerce BCom (Specialist); Commerce: Accounting BCom (Specialist); Commerce: Finance BCom (Specialist); Commerce: Marketing BCom (Specialist) Management HBA (Major); Management: Management Stream BBA (Specialist); Management: Human Resource Management and Industrial Relations Stream BBA (Specialist)

The reviewers observed the following strengths:

- Overall quality
 - Quite good and very strong student interest in studying business
- Objectives
 - Reviewers were satisfied with the consistency of the program with the University's mission

- Admissions requirements
 - Appropriate
 - Both undergraduate degree programs are highly selective with less than half of applicants accepted for admission
- Curriculum and program delivery
 - The two principal Commerce programs are in good shape; the Finance Specialist program was reviewed in 2012 and the Accounting Specialist program was restructured in response to changes in the professional standards
 - Programs are appropriately and consistently delivered
 - Surveys: students felt that they had excellent faculty
 - Reviewers impressed by the energy and care that faculty brought to their teaching
 - Finance students like the "breadth and intellectual rigor" offered in the Economics Program
 - Reviewers felt that tightly integrating the Department of Management curriculum with economics "is a source of intellectual strength and differentiation"
- Program Administration
 - Non-teaching staff who supported these programs are "very committed, capable and energetic"

The reviewers identified the following areas of concern:

- Curriculum and program delivery
 - Internship program in which students gain practical experience and connections to secure employment is not sufficiently supporting program outcomes; only 22 students participated; may be offered too late in the program
 - Students dissatisfied with course requirements in Economics:
 - vast majority of students "didn't see the relevance of these courses"; Accounting students are "especially critical" as they are focused on mandated accounting requirements
 - survey of recent graduates indicated that 45% would have preferred less economics in their program; while 44% of those surveyed preferred to take more
 - reviewers note that students' feedback indicates that economic classes are not focusing on "presenting managerially relevant material"
 - Interviews with tenure-stream faculty suggest that few connections are made by teaching-stream faculty between business classes and the required economics classes; teaching-stream faculty may not be drawing on research to inform advanced/upper-level classes
- Quality indicators
 - Students expressed high levels of dissatisfaction (from in-person meetings with reviewers and surveys); 55% would *not* attend UTM if they had the choice again
 - "Spotty efforts" in collecting data on student placement success

- Because of a lack of connection between tenure and teaching-stream faculty, students tend to be unaware of faculty research and accomplished scholars in their department
- Support
 - Students felt that "although they pay differential tuition, they do not get commensurate levels of career support" and also expressed the need for co-op experience
 - o Undergraduate staff observed understaffing at the UTM Career Centre
 - Reviewers noted low levels of staffing for career placement and alumni outreach within the Department of Management
- Students
 - Tenure-stream faculty's engagement with graduate programs at Rotman on the St. George campus, as well as with graduate programs at the Institute for Management and Innovation at UTM, results in challenges in engagement in UTM undergraduate student events and on-campus activities

The reviewers made the following **recommendations**:

- Curriculum and program delivery
 - Consider instituting a trial co-op program for a small subset of students; initial access might be offered on a competitive basis to top performers
 - To address concerns regarding the Economics course requirements, content and delivery, consider the following options:
 - persuade Economics Department faculty to more fully address managerial applications and consider the interests of the business students who constitute a large portion of their enrollments
 - develop some managerially relevant economics classes in the Department of Management (e.g., in industrial organization, strategy, or organizational economics)
 - reduce the required economics courses for the accounting majors
- Quality indicators
 - Consider benchmarking placement efforts with other undergraduate business programs and management schools in the area
- Support
 - o Increase staffing levels to meet the needs of students
 - o "Increase availability of program support and career placement services"

2. Faculty/Research

The reviewers observed the following strengths:

- Overall quality
 - Reviewers impressed by the "thoughtfulness and dedication" of tenure- and teaching-stream faculty
 - o Strong research culture and attracts "world-class researchers"

- Research
 - UTM's proximity to and close involvement with Rotman is a "great boon for the research culture"
- Faculty
 - Strong track record in hiring talented researchers
 - o Very committed and effective senior faculty

The reviewers identified the following **areas of concern**:

- Overall quality
 - Tensions between tenure and teaching-stream faculty reflect the pull of Rotman as "the centre of gravity of the research culture"; tenure-stream faculty split their time and attention between downtown and UTM
- Research
 - On-campus events do not take full advantage of the department's research knowledge
- Faculty
 - Tenure-stream faculty have increased "significantly since the last review," however the levels are low relative to those of the best business schools in Canada

The reviewers made the following recommendations:

- Overall quality
 - "Take all possible steps" to involve tenure-stream faculty more at UTM, including:
 - enhance commuter transit between UTM and the St. George campus
 - continue to expand high profile efforts like the Organizational Economics
 Conferences that attract tenure-stream faculty to UTM's campus
 - persuade tenure-stream faculty to spend time on campus with the development of important shared research resources (e.g., a behavioral lab located on the campus)
 - institute public events that leverage the knowledge and skills of the tenure-stream faculty
- Faculty
 - Dean's office and the Department of Management should "come to a shared understanding of the basic facts around staffing," including what tenure- and teaching-stream staffing levels are required for accreditation purposes and to support strategic planning priorities in the Department and UTM; consider using an externally defined, objective benchmark, such as AACSB accreditation standards and supplement this by detailed investigations of the staffing patterns at other large undergraduate business programs in the US and Canada

3. Administration

The reviewers identified the following areas of concern:

- Organizational and financial structure
 - Reviewers noted a "large gulf" between the levels of funds the Department feels it should receive from differential tuition and what UTM allocates to it
 - Reviewers commented on tensions with the Dean's Office around the department's "limited control" over budget and hiring and "cumbersome bureaucracy"
- Planning/vision
 - Limited numbers of faculty in a position to take on next generation of departmental leadership roles

The reviewers made the following recommendations:

- Organizational and financial structure
 - Consider shifting resources on the margins to support academic programs and services in the Department of Management
 - Consider innovative budget models, including opportunities for "profit sharing"
 - Reduce "bureaucracy" wherever possible, including streamlining the recruiting process
 - The Dean's Office could find ways to consider the impact on programs in the department and in the Institute for Management and Innovation when allocating resources
- Planning / Vision
 - Explore hiring faculty who will be at a stage in their careers to take on leadership roles

Administrative response appended

OFFICE OF THE DEAN



October 5, 2017

Professor Sioban Nelson Vice-Provost, Academic Programs Simcoe Hall University of Toronto

Dear Sioban,

I am writing to provide an administrative response to the External Review of UTM's Department of Management, which was held in November of 2016. The following undergraduate programs in this Department were reviewed: Commerce HBA (Major); Commerce BCom (Specialist); Commerce: Accounting BCom (Specialist); Commerce: Finance BCom (Specialist); Commerce: Marketing BCom (Specialist); Management HBA (Major); Management: Management Stream BBA (Specialist); and Management: Human Resource Management & Industrial Relations Stream BBA (Specialist).

I am pleased that the reviewers recognized the Department's strong programs and excellent researchers, and the high level of dedication brought by faculty to teaching. They also commented on the rapid expansion of programs and permanent faculty numbers since the last review. Of course, such expansion brings challenges, and I am pleased to report that the Department and Dean's Office at UTM have already begun discussions about immediate and longer-term curriculum review in relation to issues related to student satisfaction, and plan a working group focused on untangling the complex faculty and staff data clouded by the strong and positive relationships between the Department of Management undergraduate and graduate programs, including cross-appointments with other units. An implementation plan with timelines can be found at the end of this letter.

Curriculum and Program Delivery

The reviewers made recommendations around improving the availability and structure of the programs' experiential learning component(s), in response to student demand and to support the program's learning outcomes.

After seeking advice from UTSC about undergraduate co-op programs, UTM has decided to create several models of Work-Integrated Learning (WIL) opportunities at UTM. This objective has been accelerated by the new mandate of the Ministry of Advanced Education and Skills Development (MAESD), just released in fall 2017, encouraging universities to expand WIL opportunities to all students and creating even more impetus for the Dean's Office to prioritize WIL. This new mandate has allowed the acceleration of program development related to Management's interest in Co-op and other sorts of WIL models. UTM is actively exploring and developing Work-Integrated Learning (WIL) opportunities to be rolled out at UTM in phases, with Management to be the second program developed, as soon as detailed questions related to the curriculum plans of the current pilot program are answered. The Dean's Office joins with the

Department of Management in recognizing the special importance of WIL for Management students, and looks forward to working with Management on this initiative as soon as possible.

Other experiential learning resources to be improved include revisions to the Li Koon Chun Financial Learning Centre (FLC) at UTM, to increase its capacity to serve as a finance lab as well as contribute more effectively to student experiential learning. The Department and the Dean's Office are working on a collaborative hire to design finance-oriented programming in the FLC for individual student development as well as collaborative student projects.

The reviewers recommended several possible approaches to address concerns regarding the economics course requirements, content and delivery.

In response to the Self-Study and External Review, the Department has already begun to plan both immediate and longer-term approaches to the incorporation of Economics courses into the different Management-administered degrees, and to larger issues of differential needs for different undergraduate groups within Management; for example, the Accounting and Finance students expressed opposite desires with regards to the requirements for Economics courses. Proposed curriculum changes under discussion include changes to specific courses, changes to requirements within degrees, and the introduction of a new specialist stream in Accounting within the BBA program, as well as a possible change to the general requirements for all Management and Economics degrees, bringing them more in line with other degrees at UTM.

These changes will be aided by the Department's creation of Curriculum Maps for all of its programs. These will help assess the possibility of revising existing Management courses to serve as alternatives to Economics courses for some degree streams, as well as assess possible gaps in knowledge and skills in degree streams in relation to program planning and faculty hires. These Curriculum Maps will also be of great assistance when designing curriculum associated with the new WIL program and a possible new stream in Accounting.

Undergraduate Program

The reviewers noted the low levels of career-support staffing for the program, which students felt were not commensurate with their high fees.

The Department agrees that greater career support is needed for their students, and they would like to see more career support staff embedded in the Department to provide tailored career support to Management students and their external partners. The Department has launched a pilot project with the newly formed Professional Development and Learning Centre (PDLC) to help address this concern. The relationship with the Institute for Management and Innovation (IMI) is an additional layer of complication in staffing related to career support for Management students, however, and detailed planning is required by the Department and UTM as a whole to assess needs. The Dean's Office has committed to partnering with the Department on a Working Group to conduct a detailed review of staffing resources between Management and IMI; see also sections on Faculty and Organizational and Financial Structure below. Resolution of this issue will begin immediately with formation of the Working Group, but likely changes will need to be rolled out in phases as other organizational and curricular changes are implemented.

Department events, such as the annual Momentum Conference directed towards second-year Management students and involving alumni, staff, faculty, and outside participants; the activities of the PDLC; and the proposed enhancements to the Financial Learning Centre all provide excellent examples of career-support opportunities. The new UTM Program Plans (http://www.utm.utoronto.ca/program-plans/) may provide an avenue for ensuring that students are aware of all opportunities open to them.

The reviewers highlighted the importance of finding ways to support the engagement of tenurestream faculty in program, department and campus-based activities to ensure that these activities reflect and highlight faculty research.

The Department has pledged to address this issue through the continuation and enhancement of conferences held on the UTM campus, such as the biannual Economics of Organization conference. They are also starting a series of junior faculty workshops on specialized topics; for example, the Workshop in Health Economics for junior faculty held in September 2017. Proposed staffing enhancements to the Financial Learning Centre will also be an attraction for faculty at UTM. Public events that highlight the knowledge and skills of the faculty, such as informal monthly lunch seminars by faculty members, are a pathway employed by other departments at UTM to create a sense of faculty community around research interests. The Department will encourage faculty to include their own and their colleagues' research and publications in class materials. Greater faculty involvement in student events like the Momentum Conference will also be encouraged, especially to help make students more aware of the research and expertise of Management faculty. Finally, enhanced quality buses for the shuttle route to UTM are a common request by faculty across UTM, and are a long-term item on the Campus agenda.

Faculty

The reviewers urged the Dean's office and the department to arrive at a common understanding of appropriate staffing levels relative to accreditation standards and peer institutions.

This issue will be directly addressed by the joint Working Group between the Department and the Dean's Office to enumerate and assess staff and faculty numbers and workloads, as complicated by relationships with IMI and other entities. Once established, the data can be used to conduct a cost-benefit analysis of different complement scenarios in relation to the standards of accreditation, such as AACSB (Association to Advance Collegiate Schools of Business) accreditation. The data will also be used to assess the relative access to career counseling and other training opportunities offered to UTM Management students in comparison to similar undergraduate programs in Canada. This work is also in line with the recognition by the Dean's Office of the need for their greater involvement in the accreditation process across multiple disciplines, including centralized record-keeping of duplicate documents for use in periodic accreditation review.

Organizational and Financial Structure

The reviewers recommended that the Dean's Office and department consider alternative ways of allocating resources to support the department's programs.

As announced at the September 2017 UTM Chairs' Meeting, the Dean is currently exploring models for enhanced financial and programmatic autonomy for all units at UTM. The models will be

presented to Chairs and units in 2017-2018 for feedback and discussion. If adopted, phased implementation across UTM is expected to take up to three years, depending on size, staffing and complexity of each unit.

The reviewers recommended finding ways to consider programs in both the Department and in the Institute for Management of Innovation when making resource allocations.

The Dean's Office and the Department agree that this is a serious problem that needs to be addressed as soon as possible, particularly with attention to split staffing and shared faculty appointments. As noted above, the Dean's Office has committed to partnering with the Department on a Working Group to conduct a detailed review of staffing resources between Management and IMI, including faculty. The investigations of this Working Group will be focused on determining what resources currently exist, what is needed for Management and IMI separately and jointly, and where there are deficiencies. The parallel development of the Curriculum Mapping project for Management will be very helpful in assessing the last point with regards to curriculum needs. Attention will also be paid to needs associated with accreditation, and with career-focused programing at the undergraduate level as distinct from but entwined with graduate program needs.

A particular organizational difficulty for the complementary and competing needs of the Department and IMI relates to the heavy needs for program administrators especially with many IMI program administrators coming from Management. The Department should consider helping junior faculty to learn about university administration and governance by establishing a central steering committee or executive committee with membership drawn from both junior and senior faculty members.

Implementation Plan - Department of Management, UTM

The Department and the Office of the Dean, in consultation, will undertake the following approaches to enact positive changes:

Immediate Term (6 months)

Curriculum and Program Delivery

- Curriculum mapping of all programs, including attention to learning outcomes, course objectives, and student preparation at each stage for degree requirements; to be used for assessment and revisions to existing programs and for developing new WIL programs, as well as for assessing resource needs and faculty hires; project underway, will take 1-2 years to complete, then requires continual review and updating; *Department with assistance from UTM Dean's Office (Associate Dean Undergraduate)*
- Begin planning for Work-Integrated Learning (WIL) opportunities at UTM for Management students, especially choice of WIL model and initial design of associated curriculum; Department with assistance of Dean's Office (Experiential Learning Office; Program and Curriculum Officer)
- Assessment of course requirements within Management streams, particularly requirements for Economics courses in Finance and Accounting programs (BCom degree), with

possibilities for alternatives for the latter; *Department with assistance of Dean's Office* (*Program and Curriculum Officer*)

- Finalize arrangement and hire new pilot position for Li Koon Chun Financial Learning Centre (FLC) to create more opportunities for student experiential learning in the area of finance related to skills- and career-focused learning; *Department with assistance of Dean's Office*

Undergraduate Program

- Formation of Working Group to enumerate and assess staff and faculty numbers and workloads, as complicated by relationships with IMI and other entities; *Department and Dean's Office*
- Program Plans for degree programs; first phase completed, annual updates of existing Plans and new developments for new degrees; *Department working with UTM Career Centre*
- Use Department faculty meetings to discuss plans to encourage engagement of tenure-stream faculty in program, department and campus-based activities to ensure that these activities reflect and highlight faculty research. Plan two to three activities for the coming year, such as continuing workshop series; scheduling informal monthly lunch seminars; incorporating faculty research into course materials; inviting faculty to present their research or experiences as part of undergraduate career events; *Department*

Faculty

- Establishment of Working Group, as above; Department and Dean's Office

Organizational and Financial Structure

- Dean currently exploring models for greater autonomy for units at UTM, to be presented to Chairs and units in 2017-2018 for feedback and consultation; *Dean's Office and UTM Chairs*
- Explore establishing a central steering committee or executive committee composed of both junior and senior faculty members; *Department with assistance from Dean's Office if needed*

Medium Term (1-2 years)

Curriculum and Program Delivery

- Continue new work on and revisions to Curriculum Maps
- Continue planning for Work-Integrated Learning (WIL) opportunities at UTM for Management students, including design of program and curriculum for governance process and contacts for placements; *Department with assistance of Dean's Office (Program and Curriculum Officer; Experiential Learning Office)*
- Possible major curriculum revisions and developments related to Economics requirements (medium to long term depending on governance requirements); *Department with assistance of Dean's Office (Program and Curriculum Officer)*. Examples include:
 - development of a new Accounting specialist stream within the BBA program
 - changes to the general requirements for all Management and Economics degrees

Undergraduate Program

Report by Working Group on staff and faculty numbers and workloads, as complicated by relationships with IMI and other entities; initial changes in association with curricular (e.g., WIL program) and organizational changes; *Department and Dean's Office*

- Data from Working Group report used to assess the relative access to career counseling and other training opportunities offered to UTM Management students in comparison to similar undergraduate programs in Canada; *Department and Dean's Office*
- Continue initiatives to encourage engagement of tenure-stream faculty in program, department and campus-based activities, as decided; continued reflection in faculty meetings on existing and new initiatives; *Department*

Faculty

- Results from Working Group on faculty numbers and workload applied to conduct a costbenefit analysis of seeking accreditation; *Department and Dean's Office*

Organizational and Financial Structure

- Phased implementation of models for greater autonomy, if adopted, across UTM (up to three years, depending on unit characteristics); *Dean's Office*
- Establish a central steering committee or executive committee with both junior and senior faculty members; *Department*

Long Term (3-5 years)

Curriculum and Program Delivery

- See medium term goals above, especially possible major curriculum developments
- Assessment and expansion of Work-Integrated Learning (WIL) opportunities at UTM for Management Students; *Department with assistance of Dean's Office (Program and Curriculum Officer; Experiential Learning Office) and Robert Gillespie Academic Skills Centre (Pedagogical Assessment assistance)*

Undergraduate Program

- Continued review and needed changes in staffing in response to Working Group recommendations, in association with curricular (e.g., WIL program) and organizational changes; *Department and Dean's Office*
- Continued involvement of faculty with UTM events (see Medium Term); Department

Faculty

- Annual assessment of faculty complement needs, with continued attention to accreditation standards; *Department and Dean's Office*

Please let me know if you have any questions about this response.

Sincerely,

aminte Daniere

Amrita Daniere Vice-Principal, Academic & Dean

Heather M.Z. Miller

Heather M.-L. Miller Vice-Dean, Teaching & Learning

APPENDIX I

Externally commissioned reviews of academic programs completed since the last report to AP&P

Additional reviews of programs are conducted by organizations external to the University most commonly for accreditation purposes. These reviews form part of collegial self-regulatory systems to ensure that mutually agreed-upon threshold standards of quality are maintained in new and existing programs. Such reviews may serve different purposes than those commissioned by the University. A summary listing of these reviews is presented below.

These reviews are reported semi-annually to AP&P as an appendix to the compendium of external reviews.

Unit	Program(s)	Accrediting Agency	Status
Faculty of Information	Master of Information, M.I.	American Library Association	Accreditation renewed until June 2024.
			An Annual Statistical Report is due December 1, 2017 and a Biennial Narrative Report is due February 15, 2018.