APPENDICES

Executive

- Appendix A: Amendment to Senate Rules
- Appendix B: Principles Governing a Presidential Search
- Appendix C: Report to Senate at its meeting of March 24, 2005

Academic Policy, Planning & Research Committee:

- Appendix A: Establishment of a School of Global Health in the Faculty of Health
- Appendix B: Establishment of the Faculty of Urban and Environmental Change
- Appendix C: Vice-President Research & Innovation Annual Report

Current Version	Proposed Revision
The Committee is composed of the	The Committee is composed of the
following members:	following members:
Voting Members	Voting Members
Seven faculty members elected by	Seven faculty members elected by
Senate	Senate
One Librarian or Archivist elected by	One Librarian or Archivist elected by
Senate	Senate
Two student Senators, normally one	Two student Senators, normally one
undergraduate and one graduate	undergraduate and one graduate
One contract faculty member elected by	One contract faculty member elected by
Senate	Senate
Chair of Senate	Chair of Senate
Vice-Provost Academic and Provost (or	Provost and Vice-President Academic
delegate)	(or delegate)
Vice-Provost Students	University Registrar (or delegate)
Dean of Libraries (or delegate)	Dean and Associate Vice-President
University Registrar (or delegate)	Graduate (or delegate)
President	Associate Vice-President Teaching &
	Learning (or delegate)
Non-Voting Members	President
Secretary of Senate	
Associate Vice-President Teaching &	Non-Voting Members
Learning	Secretary of Senate
	Vice-Provost Students
	Dean of Libraries (or delegate)

Nomination Guidelines and Criteria

Current Version	Proposed Revision
Normally, members should not succeed	Normally, faculty members should not
themselves on a committee, although for	succeed themselves on a committee,
reasons of continuity, special skills, or	although for reasons of continuity, special
other exceptional reasons it may be	skills, or other exceptional reasons it may
advisable in a particular circumstance to	be advisable in a particular circumstance
waive this practice. Application of this	to waive this practice. Application of this
practice should vary according to the	practice should vary according to the
committee. Non-succession is mandatory	committee. Non-succession is mandatory
in the case of Tenure and Promotions,	in the case of Tenure and Promotions,
advisable in the case of Academic Policy,	advisable in the case of Academic Policy,
Planning and Research Committee (and	Planning and Research Committee (and
perhaps the Executive Committee) and	perhaps the Executive Committee) and
followed generally where possible.	followed generally where possible.

Presidential Search (Principles)

Legislative History:

Approved by Senate: 2005/03/25; Approved by the Board of Governors: 2005/05

Approval Authority: Board of Governors and Senate

Signature: Marshall Cohen

Principles Governing a Presidential Search

- 1. The search process itself should ensure a very broad pool of highly qualified potential candidates.
- 2. The process should be as short as possible consistent with placing appropriate notices of the vacancy, and with a rigorous consideration of the candidates.
- 3. The process should include broad and extensive consultations with the York community about the University's strategic needs in the following five to ten year period and about the attributes which the new president should possess to meet those needs. Senate's advice to the search committee shall be based on focused discussion by Senators in committee of the whole and in key Senate committees. Senate Executive shall be responsible for preparing an advisory statement on the criteria which will be submitted to Senate for approval prior to transmittal to the search committee.
- 4. Taking into account the inputs from the community the search committee shall set the criteria for the search and desirable qualities of the candidates. The criteria shall be communicated by the committee to the Board of Governors and Senate, and thereafter distributed widely in the university community. All Senators, Governors and members of the community at large will be invited to suggest the names of candidates.
- 5. The documents and deliberations of the search committee should remain confidential but the search committee shall ensure consistent and meaningful communications to the community about the process as it unfolds.
- 6. The search committee should consider the use of search consultants.
- 7. The search committee should consist of 14 full voting members:
 - 7 members nominated by the Board of Governors, one of whom shall chair, one of whom shall be an alumnus / alumna of the University, and one of whom shall be a non-academic staff member
 - 7 members nominated by Senate following election by Senate, including 5 faculty members, 1 undergraduate student and 1 graduate student
- 8. The search committee shall strive for unanimity. Agreement by a special majority of 10 members of the search committee is necessary in order for a candidate to be recommended to the Board of Governors. In addition to this requirement, 5 of the 7 Board nominees and 5 of the 7 Senate nominees must approve the recommendation.

9. The Board will consider the candidate put forward. If the Board does not appoint the candidate recommended, it shall ask the search committee to present a second acceptable candidate. If there is no recommendation of a second acceptable candidate the search shall be deemed to be failed and the process shall be repeated.

EXECUTIVE COMMITTEE

Report to Senate at its meeting of March 24, 2005 FOR ACTION

The Executive Committee recommends, and will so move, that the vote on action item 1 be conducted by paper ballot.

1. Revisions to the Presidential Search Principles

Senate Executive recommends

that Senate approve, *without amendment*, revised *Principles Governing a Presidential Search* as outlined below.¹

- 1. The search process itself should ensure a very broad pool of highly qualified potential candidates.
- 2. The process should be as short as possible consistent with placing appropriate notices of the vacancy, and with a rigorous consideration of the candidates.
- 3. The process should include broad and extensive consultations with the York community about the University's strategic needs in the following five to ten year period and about the attributes which the new president should possess to meet those needs. Senate's advice to the search committee shall be based on focused discussion by Senators in committee of the whole and in key Senate committees. Senate Executive shall be responsible for preparing an advisory statement on the criteria which will be submitted to Senate for approval prior to transmittal to the search committee.
- 4. Taking into account the inputs from the community the search committee shall set the criteria for the search and desirable qualities of the candidates. The criteria shall be communicated by the committee to the Board of Governors and Senate, and thereafter distributed widely in the university community. All Senators, Governors and members of the community at large will be invited to suggest the names of candidates.
- 5. The documents and deliberations of the search committee should remain confidential but the search committee shall ensure consistent and meaningful communications to the community about the process as it unfolds.
- 6. The search committee should consider the use of search consultants.
- 7. The search committee should consist of 14 full voting members:
 - 7 members nominated by the Board of Governors, one of whom shall chair, one of whom shall be an alumnus / alumna of the University, and one of whom shall be a non-academic staff member
 - 7 members nominated by Senate following election by Senate, including 5 faculty members, 1 undergraduate student and 1 graduate student

¹ The legislative history of the current principles is as follows: Approved by Senate: 1993/10/28; Approved by the Board of Governors: 1993/12/06; Date Effective: 1993/12/06. These changes of 1993 superceded procedures approved by Senate: 1983/06/23 and subsequently amended and approved by the Board of Governors: 1983/07/07.

- 8. The search committee shall strive for unanimity. Agreement by a special majority of 10 members of the search committee is necessary in order for a candidate to be recommended to the Board of Governors. In addition to this requirement, 5 of the 7 Board nominees and 5 of the 7 Senate nominees must approve the recommendation.
- 9. The Board will consider the candidate put forward. If the Board does not appoint the candidate recommended, it shall ask the search committee to present a second acceptable candidate. If there is no recommendation of a second acceptable candidate the search shall be deemed to be failed and the process shall be repeated.

RATIONALE

Goals, Principles and Context

Since the spring of 2004 the Executive Committee of Senate has discussed the desirability of revising the formal protocol establishing the search process for the next president of the University. Senate Executive is of the view that it would be in the best interests of the University to revise the "Principles Governing a Presidential Search."

The Executive Committee has worked with the Board to develop changes that are acceptable to both Senate and the Board of Governors, and to approve a set of principles that will permit the University to identify the best possible candidate while ensuring that stipulations in the *York Act* are fully and formally respected.

With the challenges facing the post-secondary education sector; the complexity of administering Universities in general, and a large and multifaceted university such as York in particular; the small pool of qualified and willing candidates, and the large number of presidential searches underway or to be underway in Canada; attracting the best pool of candidates is both very important and quite difficult.

While the Board has the responsibility of appointing York's president, the York Act requires that it do so "in consultation with Senate". It has been a long-established practice that the consultation has consisted of seeking agreement upon the process for conducting the search, the inclusion of Senators or their appointees on the search committee, wide consultation with the York community and specific consultation with Senators on the criteria and qualities of the next president, and presentations by the individuals on the short list to the Senate followed by a form of ballot on acceptability. Those candidates who have been determined to be acceptable by Senate have then presented to the Board *in camera*. The Board makes the selection and appointment.

Genesis of the Proposal

Some time ago Professor Emeritus Peter Hogg was asked to review York's process for choosing a president. The Chair of the Board and the (then) Chair of Senate met and agreed to take the matter of revising the process to each of their executive committees for consideration. Professor Hogg was invited to the Senate Executive to discuss his findings and views. After hearing him, and reviewing the protocols for presidential search in other Canadian universities which are our natural comparators and competitors, (chart attached), we are persuaded that in order to attract the very best presidential candidates to York, the process used for the last search should be amended. Professor Hogg has since shared his findings with Senate (January 27, 2005).

While transparency is a high value, we believe that it must be accompanied by a degree of confidentiality not reflected in the current process. The Executive Committee We do not see

transparency and confidentiality as mutually exclusive, and suggest that both can be incorporated into an effective process if the process itself is transparent. It is suggested that there be wide consultation at the outset, but that the process becomes more confidential as the focus turns to individual candidates. There is a need to have wide involvement and consultation in determining the next president's mandate and qualities but the actual interviewing and consideration of candidates should be focused in the confidence of a well created committee.

This view was shared by (and brought to the attention of both Board and Senate Chairs as long ago as 1992) then President Harry Arthurs. He noted in a memorandum on the subject "Procedures which are public and protracted are not intrinsically bad: they facilitate maximum participation by campus constituencies; they enable the search committee to think carefully about its decision; and they permit candidates from other campuses to develop a sense of what York is and how they might relate to it. But if the result is that York is effectively cut off from a large pool of the most obvious candidates, then the procedures may be doing more harm than good".

The Senate Executive Committee is persuaded of the desirability of changing the process to be more confidential at the stage at which candidates are being considered. Specifically, we do not believe that it is desirable to make public the names of any candidates, nor to require short listed candidates to make presentations to either governing body. Evidence is that this requirement of our process discourages many desirable individuals from allowing their names to stand. We hope and believe that if the members of Senate and Board of Governors can be satisfied that their respective duties and responsibilities remain intact in any amended process, (being consulted in the case of the Senate, and having the authority to appoint in the case of the Board), this form of change is possible and would be in the university's best interests.

Consultation Process

Senate Executive informed Senate of its consideration of this matter beginning in the spring of 2004. The principles and possible changes were discussed in detail by Senate in January (in committee of the whole) and February of this year. Before this the Executive Committee engaged in preliminary discussions with the chairs of Faculty Councils and Senate Committees in December 2004. The issue was also raised with the Deans and Vice Presidents. Those consulted have made some astute observations on both process and substance. In these consultations, some attention was also given to the manner in which Senate might chose its nominees to the search committee.

Senate Executive also sought and received the views of Senate committees and Faculty councils Comments from Councils and committees have been posted, as Appendix D, on the Senate meeting Website.

Revisions to the Recommendation

In a discussion paper issued by Senate Executive for consultations this winter, it was proposed that the search committee be composed of 12 members: a chair named by the Board, 5 other members selected by the Board, 5 members selected by the Senate, including one student; and 1 non-academic staff member. It was suggested that the approval of a special majority of 8 members of the search committee would be required in order to agree on a recommendation.

The proposal now submitted to Senate and the Board for approval has been revised during the course of consultations. In particular, it is now recommended that the search committee's total membership be expanded to 14, and that it include 2 students (1 undergraduate and 1 graduate student). Senate and the Board would each nominate 7 members to the 14-person committee (see Appendix A for details on the current and proposed membership). In response to suggestions about the "special majority" needed to finalize a recommendation to the Board by the search committee, the proposal has been adjusted to stipulate that a special majority of 10 of the 14 members is

necessary. Moreover, it would be necessary for 5 of the 7 nominees of *each* of the Board and Senate to agree on a recommendation.

Choosing Senate's Nominees

The search committee should be comprised of persons who have extensive knowledge and affection for our university and should include both those who have a deep experience of York and those whose involvement with the university will be largely during the term of the next and future presidents. In keeping with Senate's recognized nomination and election principles, Senate's nominees should serve as respected and trusted individuals rather than as "representatives" of constituencies and should have no conflicting obligations that might compromise their ability to serve.2

In the last search, Senate Executive served as the nominating committee, choosing 3 individuals in each of three categories based on criteria used for Senate committee nominations, and a Senate election was held.3 In this proposal, Senate Executive retains its role as a nominating committee for the faculty and student nominees. Senate's nominees should reflect the diversity of the collegium, and it is proposed that the five faculty member nominees be chosen by ballot as follows:

From Arts, Atkinson and Glendon	2 nominees
From Science & Engineering	1 nominee
From Osgoode and Schulich	1 nominee
From Education, Environmental Studies and Fine Arts	1 nominee

Senate will also be responsible for choosing the two student members by means of a ballot of all Senators. The student caucus will recommend candidates to the Executive Committee for inclusion on the ballot.

In other respects the nomination process should adhere to the recognized guidelines adopted by Senate Executive and Senate, guidelines that highlight skills, equity, diversity and the like (see Appendix B)

Implications of the Proposed Process

In this recommendation, both of the governing bodies relinquish the right to see and hear a short list of candidates and Senate relinquishes its opportunity to vote on acceptability. Both governing bodies would be required to put their full confidence in the search committee, on which Senate would have a strengthened presence. With consultation and communication included among the Principles, the transparency of the process and the maximum input into the criteria should be maintained, while the confidentiality of the candidates would also be assured. In our opinion this combination of principles and process is most likely to yield the best possible candidates for the next president, and result in an appointment of someone who is well placed to lead York in its next stage of development.

Documentation: Appendix A (Current and Proposed Principles)

Appendix B (Nominations Guidelines)

Appendix C (Procedures at Comparator Universities) NOT COPIED

Appendix D (Comments by Councils and Senate Committees) NOT COPIED

Approved by Senate Executive March 11, 2005 / Approved by the Board Executive March 18, 2005

^{2.} Members must have time available and commitment, and must not be in a position where their membership would put them in a conflict of duties.

^{3.} In the case of the last search, the slate had 3 categories or constituencies: Humanities / Social Sciences, professional / quasi-professional, Senate leadership (current and past), student and staff.

2. Nomination and Selection Guidelines for Designating Senate's Nominees for the Next Presidential Search Committee

Senate Executive recommends that Senate approve the following guidelines for designating Senate's nominees for the next Presidential Search Committee:

- the five faculty members and two students nominated for the search committee by Senate will be selected by a ballot of Senators and all Senators will be eligible to vote for candidates;
- candidacy will not be restricted to Senators;
- Senate Executive will serve as the nominating committee for the purpose of preparing a slate of recommended faculty member candidates, and in doing so will be guided by recognized nomination and election principles (see appendix B);
- Senate's 5 faculty member nominees for membership on the search committee will be selected as follows:

From Arts, Atkinson and Glendon	2 nominees
From Science & Engineering	1 nominee
From Osgoode and Schulich	1 nominee
From Education, Environmental Studies and Fine Arts	1 nominee

- Senate Executive will serve as the nominating committee for the purpose of preparing a recommended slate of candidates and in constructing a slate of recommended candidates will be guided by recognized nomination and election principles (see appendix B);
- the Student Senator Caucus will propose, and Senate Executive will confirm, the slate of student candidates recommended for selection by Senate;

Rationale

Please see the rationale for action item 1, above.

Approved by Senate Executive March 8, 2005

Appendix 1 PRESIDENTIAL SEARCH PRINCIPLES: Current and Proposed

Current

1. The search process itself should ensure a very broad pool of potential candidates

2. The process should be shortened as much as possible consistent with engaging in appropriate consultations, with placing appropriate notices of the vacancy, and with a rigorous consideration of the candidates

3. The process should include consultations with the York community about the University's needs in the following five to ten year period and about the attributes which the new president should possess to meet those needs

4. The documents and deliberations of the search committee must remain confidential except where the committee specifically agrees to communicate particular information

5. The search committee should consider the use of search consultants

6. The search committee should consist of: a chair named by the Board (who shall have a casting vote only), 5 members selected by the Board, 1 of whom must be an alumnus/alumna, and 5 members selected by the Senate, including at least one faculty member, staff member and student

7. The search committee should be mandated to prepare a short-list of one to three candidates for President of York University

8. The candidate(s) should meet the Senate in camera, ie with only members of Senate present.

9. Very shortly following Senate's meeting with the last candidate, members of Senate will be given an opportunity to cast a ballot which will provide space for written comments on each candidate and for an indication as to whether the candidate is: highly acceptable, acceptable, or unacceptable; the results of the ballot will be confidential to the members of the search committee

10. The candidate(s) deemed acceptable by the Senate shall meet with members of the Board in camera following which a ballot similar to the one used by Senate will be held; the results of this ballot will be confidential to the search committee

Proposed

1. The search process itself should ensure a very broad pool of highly qualified potential candidates.

2. The process should be as short as possible consistent with placing appropriate notices of the vacancy, and with a rigorous consideration of the candidates.

3. The process should include broad and extensive consultations with the York community about the University's strategic needs in the following five to ten year period and about the attributes which the new president should possess to meet those needs. Senate's advice to the search committee shall be based on focused discussion by Senators in committee of the whole and in key Senate committees. Senate Executive shall be responsible for preparing an advisory statement on the criteria which will be submitted to Senate for approval prior to transmittal to the search committee.

4. Taking into account the inputs from the community and set the criteria for the search and desirable qualities of the candidates. The criteria shall be communicated by the committee to the Board of Governors and Senate, and thereafter distributed widely in the university community. All Senators, Governors and members of the community at large will be invited to suggest the names of candidates.

5. The documents and deliberations of the search committee should remain confidential but the search committee shall ensure consistent and meaningful communications to the community about the process as it unfolds.

6. The search committee should consider the use of search consultants.

7. The search committee should consist of 14 full voting members:

- 7 members nominated by the Board of Governors, one of whom shall chair, one of whom shall be an alumnus / alumna of the University, and one of whom shall be a nonacademic staff member

7 members nominated by Senate following election by Senate, including 5 faculty members,
1 undergraduate student and 1 graduate student
8. The search committee shall strive for

unanimity. Agreement by a special majority of 10 members of the search committee is necessary in order for a candidate to be recommended to the Board of Governors. In addition to this requirement, 5 of the 7 Board nominees and 5 of the 7 Senate nominees must approve the recommendation.

9. The Board will consider the candidate put forward. If the Board does not appoint the candidate recommended, it shall ask the search committee to present a second acceptable candidate. If there is no recommendation of a second acceptable candidate the search shall be deemed to be failed and the process shall be repeated.

Appendix 2 Senate Nominations Rules and Procedures

The following are the general procedures and guidelines used by the Senate Executive Committee in the nomination process.

Procedures:

1. In developing the slate of nominees for vacant positions, the following actions are taken:

all faculty members are surveyed for their interest; Faculty Councils, Deans and Principal are asked for suggestions; members of the Senate Executive Committee suggest names; the names of those eligible for sabbatical in the coming two years and those coming off sabbatical are reviewed; the names of those who have served on Senate Committees in the past are reviewed.

2. Elections are held for all seats on committees except as follows:

where seats are designated for small Faculties (such as FES, Schulich, Education, Osgoode, Fine Arts);

where a reasonable effort has failed to find enough candidates for Faculty-designated seats for the mid-sized Faculties (such as Glendon, Atkinson, and Pure and Applied Science) to construct a ballot;

where extraordinary efforts have failed to find enough candidates in the larger Faculties (such as Arts, Graduate Studies) to construct a ballot.

3. Notwithstanding the above, elections <u>must</u> be held for the following:

seats on the Senate Tenure and Promotions Committee; seats on the Tenure Appeals Committee; seats on the FGS Review Committee; seats on committees which are non-designated; the position of Academic Colleague; the position of Vice-Chair of Senate.

Guidelines and Criteria:

1. The selection of faculty members for nomination to Senate Committees and legislated sub-committees will be conducted in such a way as to draw on the various talents of members of all Faculties of the University.

2. No elected faculty member of a Senate Committee or legislated sub-committee shall serve more than two consecutive terms.

3. Notwithstanding the suggestions made or the interest shown by individuals, nominees selected for a ballot/acclamation are considered in the context of the following criteria:

the responsibilities of the position and any specific requirements which can be reasonably anticipated in the coming three year period;

the skills, including leadership skills, which the candidates would bring to the position; the experience which the candidates would bring to the position;

the current and historical balance among Faculties, in the case of non-designated committees;

the current and historical gender balance;

the range of skills and experience of other continuing members of the committee;

the level of interest of the candidate in the subject matter;

the availability of the individual to attend meetings and contribute to the work of the committee;

the ability of the individual to participate in the work of the committee through the electronic medium where this is an important and on-going modality of the Committee (eg, SCAC).

4. Normally, members should not succeed themselves on a committee, although for reasons of continuity, special skills, or other exceptional reasons it may be advisable in a particular circumstance to waive this practice. Application of this practice should vary according to the committee. It is mandatory in the case of Tenure and Promotions, advisable in the case of APPC (and perhaps the Executive Committee) and followed generally where possible.

5. In applying the criteria above, a special effort should be made to include younger and less experienced faculty in the work of committees as a means of developing them for further service in the future.

6. Leadership ability and relevant experience must be present in those being put forward for senior positions and committees.

7. The overall objective of the nomination and election procedure is to produce committees that will exercise well and responsibly the trust that Senate has placed in them.

8. Notwithstanding all of the practices summarized above, the Executive Committee must exercise its best judgment and do so with the best interests of York University at heart.

9. In the final analysis, Senate has the final say: a nomination from the floor of Senate will be accepted for a ballot where the individual nominated has agreed to stand and where he/she is available to meet at the times when the committee concerned conducts its business.

Proposal to Establish a School of Global Health in the Faculty of Health DRAFT of November 21, 2019

Introduction

The Faculty of Health seeks approval to establish a School of Global Health as a new academic unit. It would be the first dedicated School of Global Health (SGH) in Canada, and among a small handful in the world.

Global health emerged and codified as a permeable yet distinct practice and academic discipline over the last thirty years. It is concerned with the global forces, factors and actors which shape health including health determinants and challenges, as well as multi and transnational opportunities and interventions. It is best - but not exclusively understood and addressed at the level of the global commons. It is generally distinctive from international health which is directed at aiding challenges within an individual nation to improve health and health care. From an academic perspective, global health is a transdisciplinary field situated at the nexus of multiple disciplines such as medicine, public health, health sciences, law, and social sciences (including international policy and relations, economics and political science). It uses mixed methods in research and requires problem-based skill, knowledge and fluency across these domains to achieve relevance and excellence in research, policy and practice. Despite this, the great majority of global health programs and research projects are nested within schools of medicine or public health. York's distinctive advantage is to create an independent, multi-disciplinary School which enables students and faculty to explore a greater array of perspectives and solutions to global health challenges.

Vision for Global Health

The mission of our global health initiatives within the Faculty of Health is to enhance human health, health equity, healthcare and wellbeing by engaging in research and developing and sharing innovative ideas and solutions to address significant global health challenges; supporting the development of informed, skilled and compassionate global health leaders, policy makers and practitioners; and facilitating transformational partnerships with people and organizations who share our values and goals for global health. We welcome and proactively facilitate collaboration across York University as well as other local, national and international partners. This mission will be pursued in a manner intended to encourage, support, and enable success in the Faculty of Health as well as other research centers, Faculties and programs.

The Faculty of Health's goal in creating a new School is to create and support a stable administrative infrastructure which facilitates the growth and interdisciplinary nature of

Canada's contribution to global health. Senate's establishment of the Dahdaleh Institute for Global Health Research provides an institutional platform to support and encourage cross faculty global health research around specific themes and strengths. However, ORUs can neither hire faculty nor offer the academic programs which generate the income required to hire faculty and offset the costs of research infrastructure. By approving a BSc and a BA program in global health for launch in September 2014, Senate created the first undergraduate programs in global health in Canada. These programs are enabling us to establish a new School which will serve as a sustainable administrative platform to grow the size and impact of our global health academic programs, and by extension, our research impact, community/global engagement and service.

We seek approval to:

- 1. Establish a School of Global Health as a new academic unit within the Faculty of Health, effective July 1, 2020.
- 2. Transfer the BA and BSc degree programs in Global Health from the Faculty of Health Dean's office to the new School of Global Health, effective July 1, 2020.

Rationale and Resources for a New School of Global Health

Summary of our progress to date.

Over the past six years, the Faculty of Health has undertaken several actions to advance global health. It has:

- designed and implemented Canada's first undergraduate program in Global Health in 2014. The first cohort of students graduated in the spring of 2018.
- built a growing cadre of placement options for global health students in organizations such as the WHO regional offices, international aid and humanitarian organizations, health agencies, and academic institutions in countries such as Belize, Costa Rica, England, Ethiopia, Germany, Granada, Haiti, Jordan, India, Scotland, Sri Lanka, Trinidad and Tobago, and the United States.
- established a pool of money to provide financial assistance to students who wish to experience an international placement;
- recruited two of Canada's leading global health researchers and practitioners: Professors James Orbinski and Stephen Hoffman to complement our existing faculty expertise and interest.

- recruited an additional five net new full-time professorial stream faculty members from multiple disciplines and areas of global health expertise;
- supported the University to establish the Dahdaleh Institute for Global Health Research, a university-wide ORU;
- attracted and hosted the Global Strategy Lab and the CIHR Institute for Population and Public Health;
- supported a proposal to host a World Health Organization Collaborating Centre for the Global Governance of Antimicrobial Resistance;
- established a Task Force to design innovative graduate programs in Global Health;
- actively explored international and global health partnerships (beyond student placements) in countries such as Ghana (as a portal to Africa), Trinidad and Tobago (as a portal to the Caribbean), Norway and Germany (as portals to the EU), the UK, and India; and
- increased our understanding of and potential connections around global health issues by more than doubling our intake of international students over the last three years.

i. Degree Programming in Global Health

The undergraduate BA and BSc programs in global health are interdisciplinary degrees whose core and elective courses are jointly delivered by faculty from Health, environmental studies, math, biology, computer science, chemistry, physics, and social sciences and others.

Currently hosted in the Office of the Dean of Health, the program is governed by a Global Health Executive Committee comprised of the Coordinator of the program, Chairs of the Schools of Health Policy and Management, Kinesiology and Health Science, and Nursing along with the support of the Dean and a Special Advisor to the Dean. The program has been highly successful, attracting new students to the Faculty and achieving steady growth in enrolments (see section ii). *Maclean's* magazine referred to Global Health as "one of York University's stand out programs."

While the current governance and administrative processes enabled the program to quickly establish itself, the creation of a School of Global Health will enhance program quality, student experience, profile, and innovation. For example, it would ensure that the global health program has the same level of academic oversight as other academic programs in the Faculty of Health. A new School ensures the program's interests and perspectives are represented on key Faculty Council Committees and Senate. It ensures core courses are taught by faculty with focused expertise in global health. Dedicated professorial faculty associated with a School ensures the majority of instructors are engaged in global health research which creates research opportunities for students. A new School dedicated to global health will improve our ability to attract world class global health scholars who would otherwise have concerns about the focus

of their teaching, the ability to attract graduate students, tenure and promotion requirements, etc. The School would maintain a multi-disciplinary focus by hosting a core group of scholars and instructors with an array of expertise (see Table 1), as well as continuing to utilize the broad expertise of persons with cross appointments, and by utilizing courses taught by faculty in other Schools and Departments within and beyond the Faculty of Health.

ii. Degree Programs to be Transferred to the School

Coincident with the establishment of the School, the following degree programs/options would be transferred from the Office of the Dean to be housed in the School of Global Health.

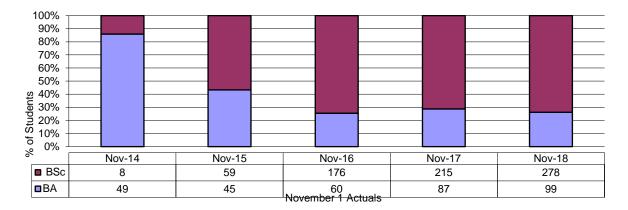
- the BA and BSc Honours and Specialized Honours programs in Global Health
- the Honours Minor option in Global Health

These are the first undergraduate degree programs in Canada to combine a core body of knowledge in global health with specialized options in: global health promotion and disease prevention; global health policy, management and systems; global e-health; and global health and the environment. A non-specialized Honours Degree option allows for major-minor combinations within or outside the Faculty of Health.

The BA and BSc programs in Global Health would provide the mainstay of financial resources necessary for a School of Global Health. Current enrolments are shown in Figure 1. It is unlikely that a School of Global Health would have the means to be sustainable unless it hosted the BA and BSc programs in global health.

Figure 1





iii. Accommodation of Students

Students currently enrolled in either the Major or Minor programs in Global Health will see no change in their degree program. In the longer term the dedicated oversight and more autonomous resources associated with a School should enhance program quality, student experience, and curricular innovation. For example, a core group of faculty members and staff will enhance continuity for students. Dedicated professorial faculty provide more opportunities for students to become involved in global health research. Global health faculty can assist in using their contacts to create experiential learning opportunities and exchanges, as well as graduate school references and employment referrals.

iv. Potential Graduate Programs

A Faculty of Health Task Force has been developing a proposal to create a highly innovative PhD in Global Health. A Notice of Intent for the doctoral program was approved in April 2019 by the Vice-Provost Academic and the development of the proposal will proceed over the next year.

The vision for the new PhD in global health is to foster scholarship that contributes insights and critical problem-solving skills focused on how the world can collectively address the most pressing global health challenges of our time, through collaborative leadership. The program will support academic research and mid-career professionals. The objective is to enable graduates to work in the interface between science and governance in order to realize research impact on policy and practice. Depending upon the final program design (e.g., if entry to the PhD is direct from an undergraduate qualification), it may also be desirable to develop a master's program as well.

Consultations and approval for a new graduate program in global health will be sought through a separate process and after a decision has been made about the formation of a School of Global Health.

v. Global Health Scholarship

Affiliation with Dahdaleh Institute for Global Health Research. The academic mission of a new School would add to and complement York's research agenda and infrastructure to enhance global health research in several ways. First, as noted in the previous section, the School provides an administrative home to increase the number of faculty members with specific interest and expertise in global health research. Second, the resources generated through the School's academic programs in global health would help cover the salary and benefit costs of faculty and staff. It would also provide additional office and research space dedicated to global health. To enhance connectivity and synergy, we have created a suite of offices in the same building as the Dahdaleh Institute for Global Health Research, the CIHR Institute for Population and

Public Health, and the Global Strategy Lab and a WHO Collaborating Centre. Third, the School would provide a logical, focused administrative host for graduate programs in global health. These graduate programs would include both professional and research/academic pathways for graduates. Finally, the School would help raise the profile of global health at York and enrich institutional research partnerships and networks.

The momentum of the Global Health Program attracted a \$20 million donation from alumnus Victor Phillip Dahdaleh to establish the Dahdaleh Institute for Global Health Research (DIGHR) as a University-wide Organized Research Unit. The Faculty of Health is proud to be one of the sponsoring Faculties of the Institute. The DIGHR's three research themes include Global Health & Humanitarianism, Planetary Health and Global Health Foresighting. The Institute Director is Dr. James Orbinski, a leading scholar in global health and a proposed member of the new School who has extensive leadership, advocacy, and research experience in global health. Dr. Steven Hoffman, another proposed member of the new School is the Director of the Global Strategy Lab in DIGHR, and the Scientific Director of the Canadian Institutes of Health Research's Institute of Population & Public Health. With the support of the Faculty of Health and DIGHR, Professor Steven Hoffman recently led a proposal to establish a World Health Organization (WHO) Collaborating Centre on Global Governance of Antimicrobial Resistance that will enable and deepen collaborative research with the WHO with global reach. Professorial faculty members in the new School would benefit from and/or contribute to these various global health research initiatives.

vi. Faculty Complement for the School of Global Health

Course development and teaching assignments are based on the following principles: (1) program quality, sustainability and student experience are best served by ensuring there is a stable group of dedicated faculty specialists in global health; (2) the curriculum should not duplicate courses offered through other units; (3) global health requires multi-disciplinary perspectives; and (4) students benefit from broader education through electives and general education requirements. With this in mind, core courses in the program (and offered by faculty appointed to the new School) include: foundations of global health, global health policy, global health research methods and measurement, the determinants of health, chronic diseases and care, communicable diseases and care, epidemiology for global health, health promotion in a global context, health care planning for communities, program evaluation, global health governance and leadership, global health ethics, health and human rights, a field practicum, and a capstone project. Courses such as anatomy and physiology would continue to be taught by faculty from other units within the Faculty of Health. Various electives would be fulfilled by taking courses in other Faculty of Health programs (nursing, kinesiology,

psychology, health studies) and Faculties (e.g., math, economics, environmental studies, chemistry, biology, physics, computer science, LA&PS gen eds.).

Table 1 summarizes the list of faculty members who would be affiliated with the School and their disciplinary backgrounds, expertise and research interests. It is broken down by full members, and those with cross appointments (i.e. faculty whose primary appointment is in another unit). As per their offers of appointment and discussions during the hiring process, five core faculty were initially appointed to existing units with the Faculty of Health but would move into a new School of Global Health, should it be approved. The two remaining core Faculty members (Orbinski and Hoffman) have indicated a desire to change their appointment into the new School, should it be approved. Other faculty have indicated their interest in a cross appointment with the new School, should it be approved.

Faculty members	Area of Expertise and Scholarship
Amrita Daftary, Assistant Professor	Community Health and Health Policy. Amrita
	uses qualitative methods to study tuberculosis
	and HIV policy and practice, quality of care, and
	the structural determinants of tuberculosis
	stigma. She contributes to the human centered
	design and evaluation of interventions in South
	Africa and India, and will lead a
	transdisciplinary centre on tuberculosis at the
	Dahdaleh Institute for Global Health Research.
Oghenowede Eyawo, Assistant	Global Health Epidemiology and Public
Professor	Health. With training in epidemiology,
	population and public health, his research
	interest is focused on precision-based global
	health and the application of epidemiological
	methods to examine patterns of morbidity,
	mortality and their potential effects among
	vulnerable populations of children, women and
	men. Dr. Eyawo is an expert advisor to the
	Global Burden of Disease Study (GBD), the
	largest accumulation of health data in history.
Steven Hoffman, Professor	Global Health, Law, and Political Science.
Director, Global Strategy Lab	Scientific Director of the Canadian Institutes of
	Health Research's Institute of Population &
	Public Health. He is an international lawyer who

	specializes in global health law, global governance and institutional design. His
	research integrates analytical, empirical and big
	data approaches to craft global regulatory
	strategies that better address transnational
	health threats and social inequalities. He is the
	Director of the WHO Collaborating Centre on
	the Global Governance of AMR.
James Orbinski, Professor	Medicine. Fosters scientific research and
Inaugural Director, Dahdaleh	technological innovation, and social science
Institute for Global Health Research	research to engage critical problem solving
	around 1) Planetary Health, 2) the clinical
	public health effectiveness of Humanitarian
	response, and capacity in 3) Global Health
	Foresighting. This research includes modelling
	the health impacts of climate change; use of
	artificial intelligence in optimizing safe water in
	humanitarian crises; exploring the history and
	politics of global health and humanitarianism
	with a view to participating in shaping future
	research, policy and practice; exploring the use
	of distributed ledger technology for improved
	humanitarian supply chain management in
	humanitarian crises; policy and practice on
	Antimicrobial Resistance, and 21st Century
	ethical and governance challenges in Global
	Health.
Tarra Penney, Assistant Professor	Health Systems Program/Policy Evaluation.
	Her research focuses on generating population
	level evidence for addressing the global
	syndemic of obesity, undernutrition and climate
	change. She uses systems thinking and
	multiple methods to evaluate national policy
	and explore the role of the commercial sector in
	fostering healthy, sustainable and equitable
	food systems. She will be a member of
	the Dahdaleh Institute of Global Health
Mathiau Dairian Assistant	Research.
Mathieu Poirier, Assistant	Social Epidemiology. His work ranges from
Professor	evaluating international laws using a framework

	of global legal epidemiology, to developing innovative transnational health equity metrics and generating policy-relevant research on social determinants of health. He has led collaborative research projects throughout Latin America and the Caribbean and will be a member of the WHO Collaboration Centre on the Global Governance of Antimicrobial resistance.
Adrien Viens, Associate Professor	Global Health Policy . His research focuses on global health ethics and law, with a particular interest in demonstrating how philosophical analysis and regulatory theory should shape how we approach different issues within global health policy, practice and research (especially infectious diseases, disasters, health promotion, harm reduction). He will be a member of the Dahdaleh Institute of Global Health Research, the WHO Collaborating Centre for the Global Governance of Antimicrobial Resistance and the Global Strategy Lab.
Faculty who have expressed intere	est in a Cross-Appointment to Global Health
Claudia Chaufan, Associate	Health Policy and Medicine. An
Professor	interdisciplinary background that spans medicine, sociology, philosophy and political economy. Her research incorporates an analysis of struggles against colonialism, imperialism, and capitalist globalization, and their implications for global health policy and equity. Current projects include an assessment of the corporatization of global health governance, a cross-national analysis of the ideology of moral hazard, and an assessment of active learning in global health instruction.
Paul McDonald, Dean and	Public Health, Health Promotion, and
Professor of Health Policy and Management	Psychology . Trans-disciplinary expertise is in the development and evaluation of population level interventions (e.g., policy, programs, communication campaigns) for the prevention

	of chronic illness such as cancer,
	cardiovascular diseases, respiratory diseases,
	diabetes, and mental illness. He has also been
	involved in knowledge exchange and the
	capacity building for public health. He has
	advised multiple national governments (e.g.,
	New Zealand, Australia, the UK, the US, Israel)
	and agencies in areas such as tobacco control,
	public health, and health services. He is on the
	DIGHR Board of Directors.
Beryl Pilkington, Associate	Nursing. Her professional background is in
Professor School of Nursing.	maternal-child nursing and women's health. Her
Inaugural Coordinator, Global Health	most recent research focused on community
Program	health in the refugee camps in Dadaab, Kenya,
	and informed the development of a new BSc
	Community Health Education program at Moi
	University. She is currently working with
	colleagues at the University of Health and Allied
	Sciences (UHAS) in Ho, Ghana, to establish a
	partnership focused on increasing access to
	graduate education in Nursing.
Shahirose Premji, Professor	Nursing. Program of research investigates
Director of the School of Nursing	psychosocial, cultural and environmental
	factors as both risk factors and targets of
	intervention to prevent preterm birth in women
	in low and middle-income countries (Pakistan,
	Kenya, Tanzania). Her research also explores
	the transition of care of late preterm infants
	from hospital to community, and
	implementation research in integrating
	screening and management of depression
	within primary health care (China).
Harvey Skinner, Professor and	Psychology. Broad experience in behavior
Founding Dean of the Faculty of	change at individual, organizational and
Health	systems levels with a special interest in global
	health. He is Chair of the Board of the Canada
	International Scientific Exchange Program
	(www.cisepo.ca) leading peacebuilding through
	health initiatives in the Middle East. Dr. Skinner
	was principal investigator of the <i>Connected</i>
1	

	Health and Wellness Project - a cloud-based software system that enables collaborative health and wellness management.
Mary Wiktorowicz, Professor	Health Policy. Research focuses on global
School of Health Policy &	health governance including the design of
Management	comparative frameworks to evaluate models of global health governance that shape the development of international agreements, standards and accountability mechanisms to address collective action problems. She is a member of the DIGHR board and will be a member of the WHO Collaboration Centre on the Global Governance of Antimicrobial resistance.

vii. Administrative Support.

The administrative staff currently engaged in the Global Health Program (Program Assistant 1.0; Operations Manager 0.5) will continue to support the new School. The decanal statement of support confirms the necessary dedication of resources for the non-academic staff. In addition, like all other academic units, the Dean's Office in the Faculty of Health will provide shared staff to support services such as student advising and success, student recruitment, experiential learning, research, teaching and curricular innovation, HR, finance and budgeting, development and advancement, facilities management, and communications.

viii. Projected Financial Resources and Budget.

Current projections indicate enrolment in the global health programs will grow to approximately 390 FFTEs (501 heads) in the fall of 2019. With additional marketing, the higher profile associated with a new School, greater international reach, the benefit of a growing alumni base, potential new graduate programs, and the potential to create joint majors and minors with other programs and Faculties, there is clear potential for the enrolments to continue growing for years to come.

If we assume 8% of students are international, and 27% of domestic students are in their first year, then the program would generate approximately \$5,953,000 in annual revenue from tuition and provincial grants. After paying shared service costs at the institutional and Faculty level, inter-faculty and intra-faculty teaching costs, and other miscellaneous obligations, it would leave approximately \$1,900,000 in revenue. This is

enough financial base to support the salary and benefit costs of the seven core faculty in Table 1, 1.5 FTEs of staff support, as well as stipends and releases for administrative leaders, support for graduate teaching assistants, basic operating costs not covered by the Dean's office, and a small residual to hire sessional instructors to cover faculty leaves and sabbaticals. Pending retirements of three senior faculty member over the next three years will provide future budgetary flexibility.

ix. Space and Computing

The School would be in a contiguous suite of 14 offices/rooms (approximately 2,000 square feet) on the 5th Floor of the Dahdaleh Building. This is enough to host all current faculty members (except Orbinski and Hoffman who have pre-existing fit for purpose office and research space on the second floor the Dahdaleh Building), three of the joint faculty members (the others have existing offices in their home departments), two staff, as well as potential grad students, research staff and guests. Given the close affiliation with the DIGHR, the location has the advantage of being in close proximity to the Institute on the 2nd floor of the Victor Philip Dahdaleh Building.

Computing needs will be addressed through the Faculty of Health's contract with UIT which provides computing support services on a fee for service basis outlined in an Internal Service Agreement. The arrangement allows for the provision of high-quality service coupled with flexibility to allow the Faculty to grow and alter its service demand, and allowing for financial flexibility. Service delivery is managed jointly by an assigned UIT Client Solutions Manager and the Faculty's Executive Officer. The agreement covers a wide array of services that range from personal computing needs of faculty and staff, teaching computing labs, common Faculty facilities, course websites, elearning initiatives, and highly specialized development and consulting services. Special projects which require IT support above the standard services included in the agreement are arranged between the Faculty and UIT as required.

Relationship to UAP, SRP and SMA

The new School of Global Health and its current and proposed academic programs align with the York University Academic Plan (UAP) (2015-2020) in that they are progressive, offer innovative approaches to undergraduate and graduate education whose goal is to solve problems and develop new understandings and solutions to enhance social justice, equity and the public good. The new School will contribute to our aim to increase internationalization. In developing leading-edge innovative solutions, these programs will attract the highest calibre of applicants. Such innovation will support academic quality, student success and engagement to multilateral organizations such as the WHO, as well as nongovernmental organizations (NGOs), governments and the private sector. The goals of the UAP refer specifically to Global Health as an innovative new area in which York is uniquely positioned to demonstrate leadership in innovation by: "Strengthening York's institutional gravitas by fulfilling its commitment to improve and demonstrate the quality of our academic programs and research including the development of exciting new areas where York can demonstrate leadership such as global health..." (page 9). The UAP further emphasizes strengthening comprehensiveness and interdisciplinarity by developing innovative degree programs including those in health. The UAP also encourages the creation of more Faculty-spanning curricula that draw on more than one academic unit. The transdisciplinary nature of the programs that the School of Global Health will host are designed with a Faculty-spanning approach as a fundamental tenet.

From the perspective of the Strategic Mandate Agreement (2017-2020), the proposal supports York's vision "to strengthen our reputation for pedagogical innovation and excellence" through innovative pedagogic approaches, research and scholarship as currently proposed (page 5). The BSc and BA Programs in Global Health and the proposed new PhD Program would enhance the reputation of York as a global centre for interdisciplinary and transdisciplinary scholarship to meet the needs of the global knowledge economy. Experiential education is embedded within these degree programs including a 4th year field practicum in the Specialized Honours BA/BSc program that creates the potential for meaningful experiences followed by a capstone course that consolidates student learning. Students have the option of undertaking a global health relevant position in either a domestic or international setting. The Faculty has a small travel fund to support students who wish to exercise the international option. Finally, the Faculty is currently in discussions with international university partners to create exchange opportunities for undergraduate students.

Administration and Governance of the New School

As noted above, the undergraduate program has been led by a Coordinator advised by an Executive Committee and reports to the Dean of the Health Faculty. The Global Health Executive Committee, comprised of the Program Coordinator and the chairs and directors of the three Faculty of Health units and the Special Advisor to the Dean and Director, Global Health and Community Partnerships has offered the program oversight and guidance. The current structure will remain in place until the School has been established and a new Director has been appointed. The current coordinator will provide support to the new Director for the first few months of the School's operation.

Consistent with the existing Schools and Department in the Faculty of Health, the new School of Global Health will have a Director. Because of its size, the Director will also

serve initially as the undergraduate program director. She or he will report to the Dean of the Faculty of Health. The administrative structure will be revisited once a graduate program is approved and/or the undergraduate enrolment continues to grow. As is the practice for other Schools and Departments within the Faculty of Health, the School of Global Health will establish a School Council with terms of reference. Our unit level Councils host regular meetings of departmental members and develop policies and procedures to organize unit level responsibilities. For example, consistent with other academic Units in Health, the Council will facilitate the exchange of information, the development of a collegial environment as well as develop and recommend basic guidelines around workload, tenure and promotion criteria, etc. The Faculty of Health Council will amend its terms of reference to ensure appropriate standing committees (e.g., the Executive and Planning Committee, the Undergraduate Curriculum Committee, the Graduate Committee, the Petitions Committee, the Committee on Research and Awards, and the Committee on Examinations and Academic Standards), have appropriate representation from the School of Global Health, equivalent to those of other academic units. The School Director will also serve as a member of the Dean's Leadership Committee. To ensure students are engaged in the School, the new unit will assume responsibility for supporting a global health undergraduate student association.

Consultations Undertaken

Within the Faculty of Health. From September 2017 to March 2019 a task force examined potential scenarios for the future governance of undergraduate and graduate global health programs. The options included: 1) maintaining the status quo; 2) moving global health into an existing academic unit in the Faculty of Health; or 3) creating a new School of Global Health in the Faculty of Health. The Task Force wrote and distributed a discussion paper which was circulated to all faculty members, staff and students in the Faculty of Health to set the stage for consultation. The Global Health Executive Committee was asked to lead a consultation with members of the Faculty and make a recommendation to Faculty Council. This was done primarily through a short e-survey which enabled respondents to provide open ended comments and choose between the options outlined in the discussion paper, as well as open dialogue with the Faculty Leadership Committee (which includes all Associate Deans, the EO, and School Directors and Chairs). Sixty-five per cent of survey respondents favoured the creation of a new School of Global Health. Based on the consultation results, and on the weight of the arguments, particularly those of faculty members with specific content expertise in Global Health, the Global Health Executive recommended to the Faculty of Health Council that it proceed with the creation of a proposal for a new school. Creation of a new school would foster the most favourable conditions for sustaining the global health

curriculum and pedagogy, grow the program by adding graduate training and research intensity in this area, grow research capacity; create a unique identity and ensure dedicated leadership on campus, nationally and (pertinent to this field) globally.

In making its recommendation to create a new School of Global Health, the Global Health Executive Committee emphasized the history of collegiality which made the establishment of the Global Health BA/BSc program possible. All units in the Faculty of Health contributed to its formation, implementation and governance to date. The program's success is largely due to the exemplary intra-Faculty collaboration and collegiality, along with its essential interdisciplinarity and multidisciplinarity. As noted previously, these intra- and cross-Faculty collaborations will continue to flourish and be mutually supportive.

After reviewing the Executive Committee's report and recommendation, the Faculty of Health Council voted 95% in favour of <u>developing a proposal</u> to create a new School of Global Health. It was passed with the understanding that such a proposal would still need to be approved according to Senate and University guidelines for the creation of new academic units, including a final vote from the Faculty of Health Council. This document is the result of the Faculty's desire to create a formal proposal for a new School of Global Health.

In mid July, invitations to review and comment on the draft proposal were sent to the Deans/Interim Deans of the Faculties primarily involved in related academic programs and research including Thomas Loebel (Grad Studies), Alice Horvoka (Environmental Studies), Mary Condon (Osgoode), Jane Goodyer (Lassonde), JJ McMurtry (LA&PS), and Esaias Janse Van Rensburg (Science). Invitations were also sent to Registrar Lucy Bellissimo; Huaiping Zhu, Director of the Centre for Disease Modelling; Sean Rehaag, Director of the Centre for Refugee Studies; and Jianhong Wu, Director of ADERSIM. Feedback (all positive and supportive) was received from Dean Horvoka and Director Rehaag, and incorporated into this document. Letters of support that have been received are attached.

The October 10th version of the document was sent to the Provost for her review and feedback. Concurrent with the Provost's review, the draft proposal will be discussed at the October 18th meeting of the Faculty of Health Council Executive and Planning Committee. With the consent of the Provost and Executive and Planning Committee, the proposal and a notice of motion will be forwarded at least 14 days in advance of the November 6th meeting of the Faculty of Health Council. A motion to approve the proposal to create a School of Global Health will be presented for consideration by Faculty Council at its regular scheduled meeting on November 6, 2019. Faculty Council Approval for the new School and transfer of the related global health programs will be

also require approval of APPRC, Senate, the Academic Resources Committee of the Board of Governors, then finally the Board of Governors.

Letters of Support

Paul McDonald, Dean of the Faculty of Health (attached) Professor Beryl Pilkington, Chair of the Global Health Executive Committee (attached) James Orbinski, Director of the Dahdaleh Institute for Global Health Research (attached) Stephen Hoffman, Director of the Global Strategy Lab (attached) Alice Horvoka, Dean of Environmental Studies, (attached) Sean Rehaag, Director of Refugee Studies (attached) Lisa Philipps, Provost and Vice-President Academic (attached)



FACULTY OF HEALTH

Office of the Dean

4700 Keele St. Toronto Ontario Canada M3J 1P3 Tel 416 736 5124 Fax 416 736 5760 healthdn@yorku.ca www.health.yorku.ca October 10, 2019

Lisa Phillips, Provost and VP Academic

Members of AAPRC

Members of Senate

Members of the Board of Governors

It gives me great pleasure to enthusiastically support the creation of a new School of Global Health within the Faculty of Health, and the proposal to transfer our degree majors and minor in global health to the new School.

Global health as a rapidly expanding area of policy, practice, and research. It is necessary because of growing revelations about how health and disease are not subject to geographic or national boundaries. Just as SARS, influenza spread rapidly around the planet, so too are chronic conditions such as cardiovascular disease, respiratory disease, cancer, mental illness, and the health impact of climate change. Attempts to improve health, control and treat disease necessarily require mutli-lateral cooperation and interventions. The new School represents an important opportunity to continue building our presence, impact and academic excellence in global health. It is the logical next step in an evolution which began with the creation of Canada's first undergraduate degrees in global health and the establishment of the Dahdaleh Institute for Global Health Research.

The School will enhance our profile, academic programming, our faculty complement, and research intensity in this domain. It's design is consistent with York's values, and academic plan. Indeed, York is uniquely positioned to elevate our multi-disciplinary approach outside the confines of a medical school of school of public health. We envision continued collaboration with and for multiple faculty members and students across campus. The new School, the strategic growth of undergraduate enrolments and the introduction of graduate programs in global health are all key features of the Faculty of Health's strategic and operational plans. The proposal to create a new School is the result of extensive involvement of our faculty. It began with the report of a task force examining potential governance options for the global health programs, consultations with the Global Health Executive Committee, and the Faculty Leadership Committee and with the overwhelming support of the Faculty of Health Council to create a proposal for a new school. The proposal has been shared with and shaped by the feedback of key leaders



across campus.

Undergraduate enrolments in global health have been stable and provide the financial foundation to support the School, including a core group of faculty, staff, and various operating costs. Indeed, the quality of student applying to the program has been excellent. With the increased profile and stability expected to come from the School, we expect undergraduate enrolments will rise in the future, and provide the foundation to host a distinctive graduate program in global health. This would, in turn, generate the resources required to support the continued growth of the School in terms of faculty, staff and other program support.

The seven initial core faculty members have all given me an indication that they would welcome the opportunity to move their affiliations to the proposed new School of Global Health. Staff to support the programs and the new School would remain at their current levels until the School can grow its enrolments. The undergraduate curriculum will not be substantially altered until such time as we have the results of our first program review in 2021. Participation of the School on key Faculty Council Standing Committees will help integrate global health with other programs. The addition of core faculty and staff should enhance student support and experience. Finally, I am pleased to confirm that the Dean's office will ensure that the new School continues to have access to Faculty supports at a level commensurate with our other academic units, including IT services, space, student advising and support. Office space and grad student accommodations for our five new faculty hires have already been secured on the fifth floor of the Dahdaleh Building.

Please let me know if you have any additional questions or concerns.

Sincerely,

me

Paul McDonald, PhD, FRSPH, FCAHS Professor and Dean



UNIVERSITE

FACULTY OF HEALTH

Global Health Program

4700 Keele St. Toronto ON Canada M3J 1P3

Tel 416 736-5028

Dean Paul McDonald Faculty of Health

October 15, 2019

Dear Dean McDonald:

CALTH Re: School of Global Health

I am writing as Coordinator of the Global Health (GH) Program and Chair of the GH Executive Committee to express enthusiastic support for the proposal to create a new School of Global Health within the Faculty of Health (FoH). The GH Executive Committee includes the Chairs/Director of the four academic units in the FoH plus Mary Wiktorowicz (previously, Special Advisor to the Dean—Global Health, Community Partnerships and Strategic Projects); the Program Coordinator; and the Operations Manager for the GH Program and School of Health Policy & Management (SHPM).

In February 2019, the GH Executive Committee received a discussion paper (*Global Health Program Governance and Positioning*) produced by a Task Force struck to explore the following three options for the future governance of the GH program: 1) status quo; 2) move it to an existing unit in the FoH; or 3) create a new School of Global Health. (The Task Force comprised three members of the GH Executive Committee [Marina Morrow, Beryl Pilkington, and Mary Wiktorowicz] plus Professor Tamara Daly [SHPM]; the Executive Officer, and Director, Financial & Academic Resources, Office of the Dean; and the Dean.) Subsequently, the GH Executive Committee undertook a Faculty-wide consultation with faculty members and the Global Health Students Association (GHSA), using a brief survey to solicit feedback on the three options addressed in the Discussion Paper.

A total of 65 responses to the survey were received from across the Faculty, including 15 responses from members of the GHSA. The majority (65%) of respondents supported the creation of a new School of Global Health. Although the majority (14) of respondents from the SHPM chose the option to align Global Health with the SHPM, five chose the option to create a new School of Global Health. These five respondents included James Orbinski and Steven Hoffman, who were hired to fill leadership positions in global health and who provided compelling arguments supporting the creation of a new School. After carefully considering all feedback, including the level of support and rationales for supporting each option along with expressed concerns, the Global Health Executive Committee concluded that the creation of a new School was the preferred future for Global Health and accordingly, made this recommendation to the Faculty of Health.

Based on my experience as Coordinator of the GH Program since its inception and as Chair of the GH Executive Committee, I believe that the interdisciplinary model in which the Program drew teaching resources from across the FoH was necessary to incubate this innovative and unique program—and, it undoubtedly succeeded in this regard. Specifically, the model enabled the FoH to cobble together relevant expertise amongst existing faculty to fully implement the program. (The first cohort graduated in June 2018). However, this model is not sustainable for the long term. For instance, most of the courses have been delivered by contract-limited and part-time faculty. Only two core courses have been consistently delivered by a tenure-stream faculty member. While the CLA and part-time faculty we relied upon to deliver core courses were mostly exceptional teachers, they were not global health exerts or researchers. In addition, these faculty only knew their own course(s), and not those taught by others, which presented challenges for overall program coherence and levelling of curricular concepts across years. Moreover, resourcing the courses required continuous negotiation with the Chairs/Director of the home units of full-time faculty members. Similarly, when Chairs submitted complement requests, as Coordinator of the GH program, I had to negotiate for partial coverage of GH teaching requirements within these appointments (to SHPM and Kinesiology & Health Science). However, for understandable reasons, the hiring units prioritized their own needs over those of the GH program in creating these new positions. Finally, while the GH Executive Committee provided oversight, the GH program lacked formal structures for collegial governance, including representation on Faculty-level committees (e.g., Curriculum Committee, CEAS). In summary, notwithstanding its undeniable success as a start-up strategy, the present interdisciplinary model also poses serious challenges to the growth and future flourishing of the GH program.

Based on the results of the consultation, along with my own experiences and observations in my position as Coordinator of the Global Health Program since its inception, I am convinced that the creation of a new School would foster the most favourable conditions for sustaining the global health curriculum and pedagogy. Already, with the hire of five new professorial, tenure stream appointments in global health in July 2019, quality improvements in the curriculum and teaching are happening. I know this because students are telling me about their positive experiences in the classroom. Furthermore, by adding graduate education and research strength in the area of global health, the new School will greatly augment global health's unique identity at York, nationally, and globally.

Yours Sincerely,

Bayl Pittington

F. Beryl Pilkington, RN; PhD Associate Professor, Nursing Coordinator, Global Health BA/BSc Program Faculty of Health





Dahdaleh Institute

Suite 2150 Victor Phillip Dahdaleh Building

88 The Pond Rd York University Toronto Ontario Canada M3J 2S6 Tel 416 736 2100 ext. 20175

arhinatri@warten an

The Senate York University

July 8, 2019

Dear Senate:

As Inaugural Director of the Dahdaleh Institute for Global Health Research (DIGHR), I have reviewed and contributed to the Faculty of Health proposal to the Senate for the creation of a School of Global Health.

Since its opening in September 2017 as a University-wide ORU, the DIGHR is actively building transdisciplinary critical problem solving research capacity in Planetary Health, Global Health and Humanitarianism, and Global Health Foresighting. It has attracted 1.8 million dollars in research funding (in addition to gifted funds); hosted several major national and international public events; held a major international conference on Data Science and Global Health, and hosted numerous university-wide, national and international research workshops (See: http://dighr.yorku.ca/).

The Faculty of Health has been vital to this early success.

Building on existing undergraduate programs, five new faculty hires, and other Faculty of Health initiatives in Global Health, a School of Global Health at York would have profound potential to make major transdisciplinary contributions to improving research, policy and practice in Global Health. It would also augment an already outstanding undergraduate program in Global Health that now needs a coherent faculty compliment and administrative infrastructure to match the unique requirements of the discipline of global health. A new School would attract among the very best new faculty and students who are committed to the discipline of global health, and make major globally relevant contributions in graduate teaching and research for new graduate students and midcareer professionals.

York's unique strength is its commitment to transdisciplinarity, equity and social justice. Creating a new School of Global Health would further catalyze the transdisciplinary potential in global health that so obviously exists at York, and provide an academic and administrative centre-point for a visionary approach to the discipline of Global Health that is unique in the world.

York can make outstanding contributions to shaping and growing a truly equitable global health for this very challenging 21st Century. York is poised to take on this challenge, and I am delighted to be part of this committed and forward looking team.

The DIGHR whole-heartedly supports the Faculty of Health proposal and submission to the Senate for the creation of a School of Global Health.

Sincerely,

James Ormely

James Orbinski OC, MSC, MD, MA, MCFP Director, Dahdaleh Institute for Global Health Research, York University Professor (Adjunct),Clinical Public Health, Dalla Lana School of Public Health, University of Toronto Professor, Faculty of Health, School of Health Policy & Management, York University



FACULTY OF HEALTH AND OSGOODE HALL LAW SCHOOL

Dahdaleh Institute for Global Health Research

Global Strategy Lab

4700 KEELE ST TORONTO ON CANADA M3J 1P3 T 416 7362100 X33364 W globalstrategylab.org To whom it may concern:

Re: Letter of support for a new School of Global Health at York University

I am pleased to write this letter in strong support of the proposal for creating a new School of Global Health at York University. Based on my work at national and global levels, it is clear to me that creating such a school would be a bold move that will create the institutional arrangements and mechanisms needed for our university to achieve big impacts in this important and growing area.

Global health has emerged over the past decades as a distinct field of scholarly inquiry, training and practice. This field is unique in its global scope, its applied focus on improving health equity, and intense interdisciplinarity. While its roots are usually traced to "tropical medicine" and its successor "international health", today global health has come to encompass the many globally shared risks and responsibilities that require collective action to achieve good health for all. Global health attempts to understand and act on those health risks, determinants, responsibilities, and solutions that transcend national boundaries.

Distinct fields like global health need scholarly homes for them to properly flourish. When looking across the Canadian landscape, it is evident that a School of Global Health at York University would be unique in numerous ways, including its situation within a Faculty of Health, its embrace of all disciplines, its location in one of the world's most international cities, and its student body that comes from all over the world. Quite excitingly, there is simply no comparator in the Canadian or North American context; and only one possible comparator internationally (i.e., University of Copenhagen's School of Global Health). Creating a new School of Global Health would situate York University to lead the world in intellectually nurturing this important interdisciplinary field for our globally interconnected future and further build on our university's commitment to social justice and track-record for social impact.

I am personally thrilled by the prospect of being part of a new School of Global Health and I hope to have the opportunity to help build it over the years to come. Please let me know if you have any questions or if I can be further helpful.

Sincerely,

Steven J. Hoffman BHSc JD MA PhD LLD Scientific Director, CIHR Institute of Population & Public Health,

Canadian Institutes of Health Research, Government of Canada Director, Global Strategy Lab / Directeur, Labo de stratégie mondiale Professor of Global Health, Law, and Political Science,

Faculty of Health and Osgoode Hall Law School, York University Visiting Fellow, Oxford Martin School, University of Oxford (2018-2019) Adjunct Professor of Global Health & Population, Harvard University steven.hoffman@globalstrategylab.org | +1-416-736-2100 x 33364





FACULTY OF ENVIRONMENTAL STUDIES

4700 KEELE ST TORONTO ON CANADA M3J 1P3

T 416 736 5252 F 416 736 5679

www.yorku.ca/fes

August 27, 2019

Dear Dean McDonald,

I am writing to offer my full and enthusiastic support for the proposed School of Global Health.

Thank you for sending me the proposal to review. I read with much interest of York's pioneering role in mounting global health academic programs, and in establishing the Dahdaleh Institute for Global Health Research. Creating an independent, multi-disciplinary School of Global Health, as detailed in the proposal, will offer more visibility in this area, facilitate a stable administrative structure, and enhance interdisciplinarity and internationalism at York University.

Global health is an important area of academic scholarship and practice founded on transdisciplinary knowledge, skills and collaboration in pursuit of enhanced and equitable health and wellbeing. It is increasingly vital and urgent that we understand and attend to health-related consequences related to the climate crisis and destruction of nature. In particular, we face as yet under-appreciated health impacts of pollution, rising temperatures, natural disasters, limited access to clean water and fertile soil, and inadequate housing conditions around the world. Human's ability to thrive is necessarily tied to environmental, and indeed planetary, health.

It is in this context that I look forward to exploring further synergies between the Faculty of Health – in particular the School of Global Health – and the Faculty of Environmental Studies. I see possibilities for collaborating on academic courses and programs featuring environmental health and offering experiential education/training opportunities in various international locales where faculty members and students work (including the Las Nubes Ecocampus in Costa Rica).

Sincerely,

Mai J =

Alice J. Hovorka Dean & Professor



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Paul W. McDonald

From: Sent: To: Subject: Sean Rehaag Thursday, August 08, 2019 1:58 PM Paul W. McDonald RE: Invitation to comment on a new School of Global Health

Hello Paul,

Thanks for the opportunity for CRS to provide feedback on this proposal.

I have consulted with CRS faculty who work in the area.

Here are our views:

This is a timely and interesting proposal that will increase the visibility of York's depth of expertise in the area of global health. It builds on York's known strengths in the determinants of health and health policy. In departing from the heavily medicalized approaches that mark most global health programs, this proposed School offers a unique and important contribution to global health scholarship and pedagogy.

In light of the importance of building on York's strengths, we would have been interested in see more emphasis on global mental health and/or migration in the proposal.

The Faculty of Health has a clinical psychology program and several faculty are actively involved in the study of mental health in the context of migration across each of the other units in the Faculty.

From the perspective of the Centre of Refugee Studies, we hope that the new school will include migration, and especially forced migration, as a focus area, and one that intersects with many of the existing themes identified in the proposal.

We anticipate opportunities for teaching or cross-listing courses with the program for our current faculty, and the possibility of fruitful research collaboration between the current CRS faculty and those who are ultimately appointed to the school. CRS is already collaborating with faculty and students affiliated with the Dahdaleh Institute for Global Health Research and we welcome the opportunity for extending these relationships to a new school in global health.

Our final observation is that recruitment of international students is an important element of a strong global health program. Currently, York has few alternatives for engaging international students who cannot afford high international student fees. Identifying possible sources of scholarships for these students will be an important part of ensuring the relevance and value of the new school.

s

SEAN REHAAG

Director, Centre for Refugee Studies Associate Professor, Osgoode Hall Law School York University, Toronto, Canada <u>www.yorku.ca/crs</u> www.osgoode.yorku.ca/rehaag-sean

Office of the Provost and Vice-President Academic



Memorandum

To:	Faculty Council, Faculty of Health
From:	Lisa Philipps, Provost and Vice-President Academic
Date:	November 1, 2019
Subject:	Proposal for Establishment of a School of Global Health

I am pleased to write in support of the proposal from the Faculty of Health to establish a new School of Global Health, effective July 1, 2020, with existing programs to be transferred to the School at that time. The proposal is the result of an extensive consultative process within the Faculty and beyond, which included consideration of a range of structural options for Global Health going forward. The new School will be the first of its kind in Canada, presenting an exciting opportunity to profile one of the University's emerging areas of distinctive strength.

Undergraduate programs in the field of Global Health (BA and BSc Honours and Specialized Honours and an Honours Minor) have been offered in the Faculty of Health at York since 2014, under the administrative auspices of the Dean's Office. This initial structure enabled the Faculty to launch its Global Health programs efficiently. These programs have proven to be very successful to the point where the start-up administrative structure now presents challenges in relation to the profile of the programs, the locus of new faculty appointments with global health as a primary focus of their research and teaching, and representation of Global Health in Faculty governance.

The establishment of the School of Global Health recognizes the development of global health as a distinct field of study and research with clear intersections with a range of disciplines in the social sciences, law, sciences, etc., as well as the importance of approaching the search for solutions to the world's significant health-related issues from a multi-disciplinary and global perspective. The School will provide a clear focus for teaching and research in this field in the Faculty and will align with and complement the Dahdaleh Institute for Global Health Research, enabling Global

Health at York to pursue its full potential by providing opportunities for enhanced visibility and profile, the development of local and international partnerships and collaborations, the recruitment of outstanding students, and the expansion of experiential education (EE) opportunities, as well as a platform for new programming initiatives such as a PhD program now in development.

The establishment of the School will also advance York's institutional priorities, including the expansion of health-related programming, the development of innovative programming which contributes to addressing real world issues, the intensification of impactful research, the promotion of internationalization, and the incorporation of internships and other forms of EE into the curriculum.

The proposal and the supporting letter from Dean McDonald confirm that the proposed School is both financially and structurally viable and sustainable. Five new faculty members with primary research and teaching interests in global health have recently been appointed in the Faculty and, together with two distinguished senior colleagues, they will provide a cadre of outstanding faculty to initiate the new School - and other faculty members have indicated an interest in cross-appointments. There are no plans for changes to the existing undergraduate programs at this time, pending results of a program review scheduled for 2021; relevant courses from other units and Faculties will continue to be available to students in the programs. Enrolments in the programs have grown since their introduction; and projections for enrolment increases domestic and international, undergraduate and eventually graduate - seem realistic and entirely achievable and are anticipated to be sufficient to support the complement, administrative, infrastructure, and other costs of the School as proposed. Administrative and central Faculty supports will continue as currently provided. It will be important to put plans in place to ensure that the financial and academic needs of students - particularly international students - will be addressed in support of access.

In short, the proposal puts forth a compelling academic rationale, business case, and resourcing plan in support of the establishment of a School of Global Health in the Faculty of Health; and I am therefore happy to signal my strong support for it.

Cc: Vice-Provost Academic A. Pitt Dean P. McDonald

Updated November 12, 2019

PROPOSAL FOR THE CREATION OF A

FACULTY OF URBAN & ENVIRONMENTAL CHANGE

A COLLABORATIVE INITIATIVE OF THE DEPARTMENT OF GEOGRAPHY AND THE FACULTY OF ENVIRONMENTAL STUDIES

*Provisional Faculty name to be confirmed by Senate prior to launch on September 1, 2019

YORK UNIVERSITY | 4700 Keele Street, Toronto, Ontario M3J 1P3 CANADA

Executive Summary

Environmental change and urbanization represent two of the most pressing challenges facing people and the planet, and transitions to a sustainable and just future require urgent attention. These connected worldly concerns represent the framing agenda for a new Faculty at York University.

The Faculty of Urban and Environmental Change at York University will be an international leader of critical and innovative urban, environmental, and geographic knowledges and skills in pursuit of sustainability and justice. The creation of this new Faculty will draw together scholars from Geography and Environmental Studies, as well as across the university, building on existing synergies and excellence, as well as encouraging collaboration and innovation in teaching, research, and engagement activities.

The Faculty of Urban and Environmental Change will inspire students as citizens and leaders whose knowledge, skills, and values position them in careers and engagement activities that serve the public good and the nature upon which society depends. The Faculty will champion interdisciplinarity through curricular programs and scholarship; emphasize field-based and experiential learning to enhance understanding of biophysical processes and social issues; embrace global perspectives so that this understanding is derived from a broad range of places; and pursue community-engaged endeavours for the production of engaged scholarship and the training of active citizens, innovators and leaders.

The five distinct yet interconnected undergraduate programs ground the new Faculty's core identity and scholarly strengths in a purposive and efficient curricular design, and offer students structure, choice, and flexibility of programming on distinctive themes and cross-cutting approaches. Specifically, programs will include BA Urbanization; BA Global Geography; BES Environmental Arts & Justice; BES Sustainable Environmental Management; and BSc Environmental Science (with Faculty of Science, Lassonde School of Engineering, and Glendon). The new Faculty will continue to offer Masters and PhD degree programs in Geography and Environmental Studies that are well-established, well-reputed, and offer students high quality learning outcomes.

The Faculty of Urban and Environmental Change will unite a critical mass of scholars and scientists whose research excellence is world-renowned and productive across all standards. The new Faculty will amplify existing strengths, and indeed exceptionality, in research, scholarly and creative work by further building multi-stakeholder networks for knowledge mobilization, partnerships and collaborations, and direct uptake of research by communities, industry, and government actors.

Ultimately, the Faculty of Urban and Environmental change will:

- Inspire and prepare students for careers and engaged citizenship through experiential education, critical thinking, hands-on-research, and leadership skills;
- Engage interdisciplinary perspectives and techniques that span the biophysical sciences, social sciences, and the arts;
- Advance scholarly understanding and scientific research of natural, built, and social spaces;
- Mobilize knowledge through action-oriented collaborations with change-makers, communities, and institutions;
- Inform and facilitate dialogues and strategies to globally and locally addressing mounting degradation, inequities, and injustices.

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Introduction

Climate action in March 2019 saw youth from around the world take to the streets and raise their concerns about the sobering environmental degradation, injustices and uncertainties facing humanity today. They urged decision-makers to recognize climate change as the biggest threat in human history, and to take responsibility for solving this unprecedented crisis. Further, human destruction of nature is rapidly eroding the capacity to provide food, water and security to the global population. Environmental changes owing to human activities are mounting with rising average temperatures, extreme weather events, melting ice sheets, freshwater shortages, air pollution, habitat depletion, and species extinction. These changes disproportionately impact vulnerable communities whose ability to adapt is limited; this vulnerability is rooted in social, political and economic systems that create stark inequities between the haves and have nots. Natural resource inequities and degradation trigger migration, conflict and fear among people and threaten opportunities for the next generation. The climate emergency and rapid biodiversity loss warrant urgent attention to sustainable and just environmental transitions.

If the 21st century will be one in which humanity seeks to address and adapt to environmental crises, it will do so as an urban species in built environments. Around 2008, the planet's urbanites were, for the first time, more than half of its human population; by 2050 that proportion will be two-thirds. Cities are drivers behind many of our planet's environmental crises, as well as being a rich source for imagining and practicing new forms of sustainable and just living. In turn, urbanization presents challenges of its own. While cities are national economic engines in many countries, they are also faced with daunting problems of urban poverty, inequality and homelessness; cities are also changing our relationships to rural spaces and settlements. The dynamic culture of cities reflects both the richness and the tension created by the 'thrown togetherness' of humanity in all of its diversity. Governance challenges continue to confound urban regions everywhere, but cities are also crucibles of political struggle, activism and possibility. In Toronto, we live in one the world's most diverse and vibrant urban regions in which all of these challenges and opportunities are being lived and confronted.

Environmental change and urbanization represent two of the most pressing challenges facing people and the planet, and transitions to a sustainable and just future require urgent attention. These connected worldly concerns represent the framing agenda for a new Faculty at York University. The creation of the Faculty of Urban and Environmental Change offers York University the opportunity to consolidate, enhance and more clearly project its excellence in, and contributions to environmental, urban, and sustainability and justice realms. It will draw together scholars from Geography and Environmental Studies, as well as across the university, building on existing synergies and encouraging collaboration and innovation in teaching, research, and engagement activities. The Faculty of Urban and Environmental Change will champion interdisciplinarity through curricular programs and scholarship; emphasize field-based and experiential learning to enhance understanding of biophysical processes and social issues; embrace global perspectives so that this understanding is derived from a broad range of places; and pursue community-engaged endeavours to generate meaningful scholarship and to train active citizens, innovators and leaders. Within this new Faculty, Geography as a discipline offers a holistic approach to understanding people, places, and environments. Spanning the physical sciences, social sciences, and humanities, Geography highlights spatial variations of human and natural phenomena and explores how social, economic, political, demographic, and environmental processes shape human lives and landscapes. Geography at York, founded in 1962, reflects a breadth of scholarship ranging from biogeochemical ecosystem change in the Northwest Territories, to experiences of displaced migrants in urban environments in Cuba, Canada, and India, to fisheries labour relations shaped by industrialization and marine ecologies in Southeast Asia. York Geography is an accomplished, well-respected department in the discipline with one of the highest global academic reputations within the Faculty of Liberal Arts and Professional Studies according to 2019 QS rankings. York Geography faculty members are widely published and actively participate in university-wide research initiatives through Organized Research Units (ORUs) such as the CITY Institute. Geographers attracted \$6.2 million in Tri-Council funding during the last Cyclical Program Review period, with virtually all faculty members currently holding a SSHRC or NSERC grant as principal or co-investigator. Geography undergraduate students benefit from pedagogical innovations in classroom, lab- and field-based learning, as well as outstanding teaching that leverages active learning. The graduate program in Geography has a long tradition of innovative and high-quality research by both doctoral and master's students.

Environmental Studies similarly offers comprehensive exploration of the relationships between humans and the environment – be it natural, built or social. At York University these explorations span a wide range of realms including polar bear ecologies in Southern Hudson Bay; sustainability informatics calculating 'ecological footprints'; climate change and sustainability transitions; and food-based performances in social gatherings. Founded in 1968, Environmental Studies has led the way in environmental research, innovative pedagogy, and action-oriented engagements in the environmental sector. It has also been a leader in urban research, from theorizing urban politics in Europe and North America, to studying the cultural landscapes of Indonesian cities, to engaging with policies and practices in the planning of suburbs. York environmental studies faculty include several Research Chairs and a Trudeau Fellow, attracting \$8.76million in Tri-Council and other research grants, contracts and gifts over the past five years. The research culture of Environmental Studies is sustained by a talented and impactful community of graduate students. Environmental Studies student learning experiences rank among the highest quality at York according to the 2018 National Survey of Student Engagement (NSSE).

Geography and Environmental Studies faculty thus share demonstrated excellence in research and teaching. Furthermore, both are inherently interdisciplinary, drawing on the full range of academic perspectives and methods; both are committed to experiential education and the mobilization of knowledge through key stakeholder engagement to address complex and dynamic challenges. Currently, Geography has 18 full time faculty members, 8 staff members (3 are technicians), ~250 undergraduate students, and 70 graduate students. Environmental Studies has 40 faculty members, 23 staff members, 460 undergraduate students, and 302 graduate students. These units have 8004 and 4500 alumni respectively. The Faculty of Urban and Environmental Change will bring together these colleagues and stakeholders into a united entity.

Notably, as highlighted by Cyclical Program Reviews in both units, the creation of the Faculty of Urban and Environmental Change offers opportunities to reverse declining undergraduate enrolment trends in these realms. A recent comparative analysis of environmental programs at York (compiled by Higher Education Strategy Associates in March 2019) identifies the divergence of environmental studies and science programs as undermining student access to and experiences of these offerings. It also reveals multiple yet disconnected pathways to studying urban issues, dynamics and environments that are confusing to students and do not provide a clear 'urban' identity for York University. Finally, it suggests untapped potential in areas such as environmental science, sustainability informatics, and environment, economy and entrepreneurship that could be brought forward more substantively.

Bringing clarity, refinement, and visibility to existing environmental, urban and geography degree programs, as well as re-imagining and innovating curriculum, will be a focal point for the Faculty of Urban and Environmental Change. As part of this effort, the new Faculty will embody a collaborative 'hub and spoke' approach intended to draw explicit and productive linkages to other York University faculties, units, and programs where cognate issues are highlighted and of concern. The new Faculty will explore existing 'spokes' or pathways and enhance dialogues with, for example, the Faculty of Science, Lassonde School of Engineering, and Glendon Campus (to invigorate collaborative BSc Environmental Science programming), the Faculty of Liberal Arts and Professional Studies (to align with programs in, for example, Disaster and Emergency Management, Urban Studies, Business and Society, and Indigenous Studies), as well as the Sustainability Office and Innovation York (to enhance curriculum via experiential education, work-integrative, and innovative sustainability transitions).

Through its collaborative spirit, scholarly excellence, and leadership, the Faculty of Urban and Environmental Change will build upon York University's globally-recognized efforts to build a more sustainable and just world. According to the Times Higher Education Ranking 2019, York University ranks #26 internationally and #5 in Canada for its contributions towards the UN Sustainable Development Goals through efforts to address environmental degradation, climate change, inequality, and poverty. York University ranks most highly in Reduced Inequalities (Goal #10), Sustainable Cities & Communities (Goal #11), Responsible Consumption & Production (Goal #12), Climate Action (Goal #13), and Partnerships to Achieve Goals (Goal #17). Geography and Environmental Studies have been vital to these efforts through, for example, their excellence in urban teaching and research, establishment of Las Nubes EcoCampus as a 'living lab' for global sustainability and community engagement, and multisided collaborations addressing injustices in labour markets, migration patterns, and natural resource depletion. The Faculty of Urban and Environmental Change will draw upon these strengths to further champion sustainability and justice at York University, as well as on the local and global stage.

Vision and Scope

The Faculty of Urban and Environmental Change at York University aspires to the following vision:

To be an international leader of critical and innovative urban, environmental, and geographic knowledges and skills in pursuit of sustainability and justice.

To mobilize this vision, the Faculty of Urban and Environmental Change will:

- Inspire and prepare students for careers and engaged citizenship through experiential education, critical thinking, hands-on-research, and leadership skills;
- Engage interdisciplinary perspectives and techniques that span the biophysical sciences, social sciences, and the arts;
- Advance scholarly understanding and scientific research of natural, built, and social spaces;
- Mobilize knowledge through action-oriented collaborations with change-makers, communities, and institutions;
- Inform and facilitate dialogues and strategies to globally and locally address mounting degradation, inequities, and injustices.

The Faculty of Urban and Environmental Change will embrace the following values:

Scholarly and research excellence

Interdisciplinary learning and experiential education

Engaged citizenship and leadership

Local-global outreach and activism

Sustainable communities and environments

Social, economic, and environmental justice

Reconciliation and respect for Indigenous knowledge systems

Respect for rights, differences, and dignity of others

Respect for place, community, and diversity

The Faculty of Urban and Environmental Change at York University will be the first of its kind in Canada to explicitly address the distinct yet interconnected challenges of environmental change and urbanization, and innovate transitions to a sustainable and just future. This focus reflects distinctive strengths at York and differentiates York within higher education in Ontario, Canada, and beyond.







In research and teaching on **environmental change**, the new Faculty will consolidate a critical mass of physical geographers, ecologists, social scientists, and humanists who focus on the biophysical processes of environmental systems and human relationships with the natural world. Deploying field-based approaches, policy analysis, critical social theory, planning skills, geomatics, and sustainability informatics, the new Faculty will offer a major cluster of expertise to understand how earth systems are evolving and how humanity is impacting on, and impacted by, such changes. It will highlight innovative thinking and practice around sustainability transitions as a means of mitigating environmental changes that threaten the planet and people alike.

In research and teaching on **urbanization**, the new Faculty will consolidate arguably Canada's most prominent cluster of urban scholars, whose work spans innovative theoretical thinking, empiricallydriven research, and policy-oriented practice. It will feature topical areas of urban history, urban ecology, rural-urban linkages, global suburbanisms, urban political economy, migration and resilience. It will serve as York's accredited provider of professional training in planning and as primary sponsor of the university-wide CITY Institute. Deploying critical social theory, planning skills, design charrettes, and impact assessments will offer a major cluster of expertise to understand changes in human settlement patterns, the growth of major urban centres, and impacts on the planet and people.

Sustainability and justice will reflect core expertise in the new Faculty. Understanding imbalances of ecological, economic, and social realms is key to explaining the dire challenges associated with environmental change and urbanization. Unequal distribution of power, opportunities, mobilities, resources, and wealth shapes people's daily lives and livelihoods. Issues of injustice disproportionately expose marginalized peoples to natural disasters, depleted resources, and environmental degradation. Critical thinking skills and inquiry-based learning offer ways to investigate in-depth how structures, institutions, and communities produce relations of power to the benefit of some and the detriment of many. Innovative sustainability transitions require new ways of thinking and doing for the benefit of the planet and people. Four cross-cutting orientations will characterize the teaching and research of the new Faculty.



First, **interdisciplinarity** in the new Faculty will bring together biophysical sciences, social sciences, humanities, and the arts to address the pressing challenges of environmental change and urbanization, as well as solutions for sustainable and just transitions. For example, environmental change includes ecological systems as much as political ecologies and demographic shifts owing to climate change while urbanization includes planning and design as much as urban social theory and urban ecologies. Innovative solutions will require integration of these varied knowledges and via diverse approaches including documentary film making, critical analysis, and citizen conservation science.



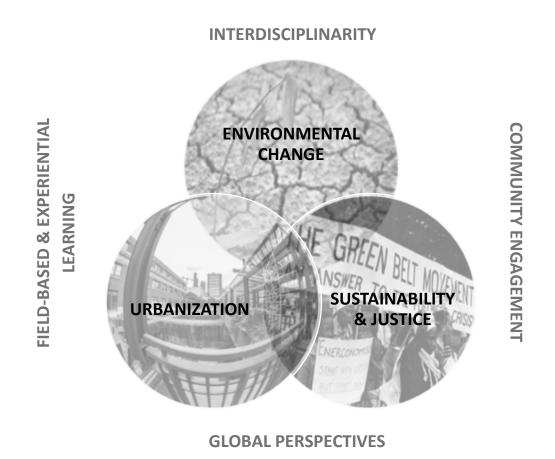
Second, addressing challenges of environmental change and urbanization via sustainable and just solutions require theoretical explanation of such dynamics, as well as empirical research to explore how they manifest in particular contexts. As world-class researchers, faculty members pair conceptually rich insights with empirically-grounded investigations; they engage students in **field-based and experiential learning** through projects and in course offerings such that students are assured to acquire meaningful hands-on experiences and skills via laboratory-based science, geomatics, interviewing, and arts-based practice.



Third, **community engagement** is vital to ensuring key stakeholder participation in generating knowledge on environmental change and urbanization challenges, and in offering tangible solutions that are sustainable and just. Further, knowledges and skills are actively mobilized through community, industry, and policy-based endeavours. Faculty research brings students directly into 'real world' realms and issues; students appreciate the complexity of environmental issues while skills and multi-sectoral relationships position them for meaningful careers where they can make a difference in the environmental realm.



Fourth, the new Faculty will offer distinctively **global perspectives** given that their research endeavours take place around the world, including the Caribbean, Africa, Latin America, Asia, and the circumpolar North. This internationalism is woven into foundational course offerings and students benefit from various perspectives and approaches to environmental change and urbanization. The new Faculty offers students and faculty members a unique opportunity at the Las Nubes EcoCampus in Costa Rica which serves as a 'living laboratory' and experiential education site of neo-tropical conservation and sustainability. In sum, the Faculty of Urban and Environmental Change core themes and cross-cutting approaches thus include:



Notably, in pursuit of sustainability and justice, the new Faculty will espouse tenets of **reconciliation** and Indigeneity as detailed in York University's Indigenous Framework. During 2019/20, Geography and Environmental Studies faculty, staff and students will seek guidance from Indigenous Council, colleagues in the LA&PS Indigenous Studies program, and other stakeholders regarding how best to build upon its existing approaches and strengths, and to explore new substantive and tangible directions for advancing York's Indigeneity and reconciliation agenda. The new Faculty offers opportunities, for example, to expand Indigenous curricular offerings; enrich experiential education through land-based learning; ensure Indigenous knowledges, perspectives and experiences are highlighted within and through research endeavours; and fully support and increase the number of Indigenous faculty, staff and students in our midst. Establishment of the new Faculty also offers an opportunity to explore an Indigenous naming by the Huron-Wendat, and the responsibility that this invitation involves.

University Academic Plan Alignment

The Faculty of Urban and Environmental Change will align with the University Academic Plan and further advance York University priorities of academic quality, student success, and engagement and outreach.

In terms of academic quality, the new Faculty will enhance, refine, and innovate undergraduate and graduate program offerings based on distinctive themes and cross-cutting approaches detailed above. Curriculum will champion high quality student learning outcomes, experiential education, flexible pathways, and effective advisory support. The Faculty will explore collaborative programs with other faculties (e.g., Science, Lassonde, LA&PS) and units (e.g., Sustainability Office, Innovation York, CITY Institute) to enhance 'Environment @York' and 'Urban @York' programming, identity, and reputation. Further, Geography and Environmental Studies faculty members are already well-reputed given their scholarly excellence. The new Faculty will increase their visibility and profile, encourage and support their efforts to secure further funds for their endeavours, and actively connect faculty with students to provide hands-on learning, research skills, and placement opportunities.

In terms of student success, the Faculty of Urban and Environmental Change will build upon 'signature pedagogies' of learning-by-doing by enhancing student placements, internships, and research opportunities with multi-stakeholders (civil society, industry, government, academia) to ensure knowledge application, skills training and clear employability. A continued focus on experiential education will attract and retain high quality students through hands-on application of theory with practice within the classroom, the lab, and the field. In particular, the new Faculty will offer students a meaningful, globally-focused, community-engaged, and experiential education curriculum at Las Nubes Ecocampus in Costa Rica. The new Faculty will build upon existing pedagogical excellence experienced by students as reflected in NSSE and course evaluations, and thus positively impacting undergraduate retention and graduate progress to completion rates.

In terms of engagement and outreach, the Faculty of Urban and Environmental Change will amplify existing strengths, and indeed exceptionality, in building multi-stakeholder networks for knowledge mobilization, partnerships and collaborations, and direct uptake of research by communities, industry, and government actors. The new Faculty will serve as a hub and leader of York University's commitment to sustainability (through active partnership with the Sustainability Office) by advancing high quality sustainability education and research, and championing environmental enhancements across campus grounds, buildings and operations. The Faculty will also serve as a hub and leader of York's internationalization mandate (through its Las Nubes Ecocampus and embracing international student intake and educating through global perspectives), as well as equity, diversity, and inclusivity (through its commitment to reconciliation, respect for diverse worldviews, and commitment to social justice).

Curriculum

The Faculty of Urban and Environmental Change curriculum serves as a 'call to action' to understand and seek sustainable and just solutions to the environmental change and urbanization challenges of our time. The new Faculty will innovate curriculum, re-vision learning outcomes, enhance program options, and offer various modes of delivery for students to facilitate meaningful career pathways and advanced study opportunities. Environmental and urban areas of study lend themselves well to experiential education, fieldwork, laboratory analysis, and community activities. Here students learn-by-doing and connect theory with practice to prepare fully for wide-ranging careers in the environmental and urban sectors and beyond be they in public, private or civil society realms.

The Faculty of Urban and Environmental Change will strive to attract, train and inspire students in dedicated programs, as well as to serve as the locus for general education and elective education in environmental change, urbanization, and sustainable and just transitions across the University. Such broad literacy is needed given the urgent and complex challenges facing us. The new Faculty will provide foundational courses for understanding our changing climate, the destruction of nature, and urbanization trends along with their effects on people, their livelihoods, lifestyles and mobilities. Students across York University will also benefit from continuing and fundamental exposure to issues related to environmental sustainability, social justice, and reconciliation of people and nature.

To do so, the Faculty of Urban and Environmental Change is committed to interdisciplinary and collaborative curriculum dialogues, planning, and implementation across academic and administrative units at York University. The new Faculty sees opportunities for cross-teaching of and multiple pathways for students at undergraduate and graduate levels to deliver a positive, high-quality student experience. We have identified areas of internal fragmentation or overlap requiring realignment to permit greater collaboration and, with reduced redundancy, offer deeper and wider offerings in those areas. We have extensively consulted with faculties, units and programs across York to this end. Further, we seek opportunities to enhance teaching and learning through the effective use of technologies and to continue bringing research directly into the classroom. With these innovations and refinements, students will be attracted by the curricula in sufficient numbers to ensure the new Faculty flourishes.

Ultimately, the Faculty of Urban and Environmental Change will inspire students as citizens and leaders whose knowledge, skills, and values position them in careers and engagement activities that serve the public good and the nature upon which society depends. Recruitment messaging could ask:

"Are you someone who thinks that environmental change, urbanization, and sustainable and just transitions are important issues today? Do you think these challenges need to be tackled both locally and globally? Do you believe that we need to understand these challenges using integrative and diverse ways of thinking from the arts, sciences and social sciences? Do you want to acquire the insights and skills to tackle these issues as a thinker, planner, analyst, policy maker, activist or organizer? Have you considered careers as a green entrepreneur, park manager, urban planner, environmental scientist or impact assessor, human rights advocate, or national policy analyst? If so, the Faculty of Urban and Environmental Change is for you!"

Undergraduate Degree Programs

Undergraduate degree programs in the Faculty of Urban and Environmental Change will foster students' critical thinking and skills development, active learning, engaged citizenship, and career preparedness for roles within an increasingly diverse and wide-ranging environmental sector.

Five distinct yet interrelated undergraduate programs will anchor the new Faculty, namely:



Together these undergraduate programs offer multiple entry points through which to explore the challenges of environmental change and urbanization, as well as to innovate transitions to a sustainable and just future. Students can 'mix and match' programmatic options in ways that capture the breadth of their interests and their desire to acquire career-ready knowledges and skills. Core course offerings will explicitly guide students through foundational concepts, perspectives, and methodologies. To this end, keystone courses for each distinctive undergraduate program will align such that one 'signature introductory course' focused on, for example, urban ecologies may serve as a cross-cutting core for students regardless of the undergraduate program in which they are majoring or minoring. Similarly, fourth year capstone experiences may draw together students into 'teams' from across the various undergraduate programs to collectively, and from multiple entry points, explore real-world problems and innovate just and sustainable solutions. As part of their undergraduate journey, students will have options to pursue major/minor combinations that support their particular interests, as illustrated below:



E.g. Student combines BA Major in Urbanization with BES Minor in Environmental Arts and Justice given their desire for an urban-focused degree and interest in critical and creative practices for social change.



E.g. Student combines BSc Major in Environmental Science with BES Minor in Sustainable Environmental Management given their desire for a science degree complemented by policy, planning, management skills.



E.g. Student combines BES in Sustainable Environmental Management with BA Minor in Global Geography given their interest in global environmental change and urbanization through a spatial lens. Ultimately, the five distinct yet interconnected undergraduate programs ground the new Faculty's core identity and scholarly strengths in a purposive and efficient curricular design, and offer students structure, choice, and flexibility of programming. The undergraduate curriculum specifically embodies the new Faculty's four cross-cutting approaches as follows:

Interdisciplinarity is embedded such that students engage with knowledges and skills from biophysical sciences, social sciences, humanities and the arts within individual courses, within each undergraduate program, and across programs as a whole. For example, a course on environmental literature draws in understanding of natural or physical processes; a program focused on environmental science draws in exploration of policies and regulations that drive degradation; and the undergraduate curriculum as a whole allows students to mix and match programs to fully embrace multiple disciplines and their integration. The curriculum will also feature interdisciplinary keystone and capstone offerings that bring students together.

Field-based and experiential learning, as a signature pedagogy of the new Faculty, is woven throughout the undergraduate curriculum. Students regardless of program major or minor will benefit from numerous sustained and in-depth experiential opportunities. These may include classroom-based experiential learning activities ranging from reflective journaling to case studies to guest lectures; conducting field or lab work including, for example, GIS overlay analysis or soil sampling or archival searches or textile dying or participant observation in urban communities; or field courses where students 'learn through the soles of their feet' in locales such as the Greater Toronto Area, Frankfurt Germany, and in Costa Rica.

Community engagement will facilitate students' direct application of issues they are studying in the curriculum and with ongoing efforts to analyze and solve problems in the 'real world'. Students will benefit from work-integrated learning through placements or internships to ensure first-hand career experiences in public, private or civil sectors. Undergraduate research opportunities will also be featured for students to explore theoretical and applied questions related to challenges of environmental change and urbanization, and innovating sustainable and just solutions. Here students can connect directly with key stakeholders on pressing issues.

Global perspectives are woven throughout the new Faculty's undergraduate programs so as to champion internationalism, equity, and inclusivity, as well as breadth of worldviews and perspectives. Students will benefit from faculty members whose research programs are grounded in contexts around the world, including Australia, Cuba, Germany, Ghana, Guyana, Ireland, India, Thailand, and the Philippines. Those wishing to travel abroad, for example to the Las Nubes EcoCampus summer semester, will receive financial assistance and logistical support.

Each undergraduate program is detailed below in terms of a synopsis, learning outcomes and curricular overview of thematic strengths and sample courses. Program distinctiveness, demand trends, and enrolment targets are also highlighted. Each program has been developed in consultation and/or collaboration with cognate faculties, units and programs at York University. These engagements will continue as needed to ensure complementary and robust programming in these areas moving forward.



BA in URBANIZATION

Honours (120 cr) | BA (90 cr) | Minor (30 cr) | 3+2 option leading to MES Planning

We live in an urban world. Intensive urbanization challenges our conventional understanding of the city and its relationships with suburban, exurban and rural environments. The urban now figures as both cause and consequence of many contemporary planetary issues. It is an instigator of the climate emergency, global migration, increasing inequality and poverty while also a crucible for innovation and creativity. Students will acquire the knowledge, critical thinking and technical skills to understand the deep social, economic and environmental transformations necessary to address urbanization challenges. Sustainable cities and resilient communities need to be held accountable to the highest democratic standards of social and environmental justice. Students are encouraged to reimagine the responsibilities of global urban citizenship and to help design new forms of urban governance that is inclusive and participatory, especially for those historically excluded from democratic decision-making and planning processes. Research that informs this program is supported by the CITY Institute at York University, a leading research center that combines critical urban investigation with applied research and intervention. Students with an academic record of A/A+ may enter the MES (Planning) program after their third year of study through a 3+2 program option, accredited by the Canadian Institute of Planners (CIP), the Ontario Professional Planners Institute (OPPI) and the Planning Accreditation Board.

Learning Outcomes

Upon completion of this degree, graduates will be able to:

- Assess critically the historical and geographical processes across multiple scales of urbanization and their implications for just and sustainable cities, nature and planning;
- Assess critically the relationships between socio-cultural, economic, political, technological, physical, governance, and ecological dimensions of urbanization and planning;
- Analyze critically the problems of social and spatial marginalization and innovate just solutions;
- Work collaboratively with communities, non-governmental organisations sector, government agencies, and the private sector to address urban challenges;
- Become local, national and global agents of urban and regional change.

Curricular Overview

The URBANIZATION program is anchored by the following thematic strengths and sample courses:



Urban programs are in high-demand among students according to external analysis and programs at other universities. York has yet to fully benefit from this demand given fragmentation and confusion in urban programming spanning numerous units. BA Urbanization offers a fully interdisciplinary program capturing a breadth of student interests with distinctive strengths in urban planning, urban ecologies, global suburbanization, urban geomatics, critical urban theory, and urban justice. This program reflects a flagship contribution to a broader vision for 'the urban' at York, which aims to consolidate urban programming to increase coherence, encourage student mobility, and enhance excellence in urban research, curriculum, pedagogy, reputation, reach and impact. Ongoing consultations will continue through a York-wide Urban Working Group that will include, but is not limited to, LA&PS' Urban Studies program, CITY Institute, and the new Faculty. Graduate programs in Critical Urban Studies, as well as professional development courses will also be explored.



BA in GLOBAL GEOGRAPHY

Honours (120 cr) | BA (90 cr) | Minor (30 cr)

Geographers study the formation of places and landscapes, and the dynamics that connect the world together in all of its unevenness and complexity. The Global Geography program equips students with an in-depth understanding of the rapidly changing world we live in. It explores historical legacies and contemporary systems that drive global change: human migration flows; economic production and consumption; geopolitical power relations; flows of knowledge, culture and data; networks of global cities; and environmental change and action. These dynamics are linked to an understanding of how they affect human societies and physical environments in specific places. The program highlights, in particular, feminist and postcolonial geographies of difference examining gender and construction of nature as well as inequalities among social groups that arise from differential access to power and resources. Students benefit from experiential learning through hands-on classroom activities, field and lab-based exercises, and community engagement. They gain geographical skills of spatial analysis and critical thinking to equip them for careers in Canada and abroad in government, journalism/media, development agencies, private sector corporations, and non-profit sectors.

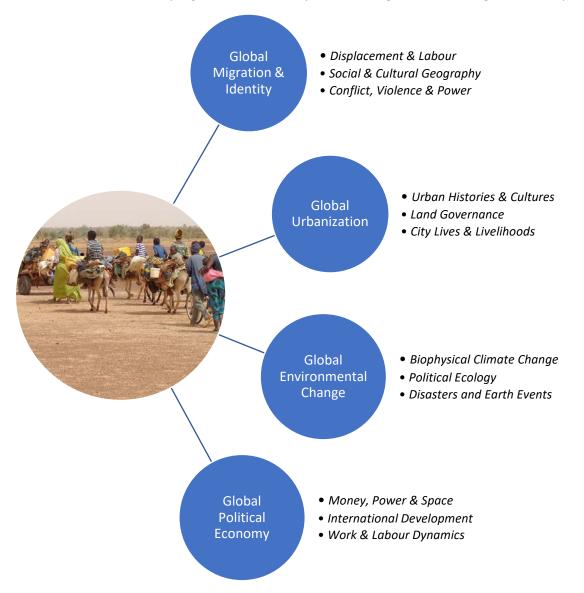
Learning Outcomes

Upon completion of this degree, graduates will be able to:

- Analyze how global processes shape human mobility, urban settlements, environmental problems, and economic structures in various places around the world;
- Analyze global-local dynamics using geographical concepts of space, place, region, and landscape;
- Analyse how economies are structured based on production, trade, labour regimes, and waste flows;
- Reflect critically on how global processes create differences and inequalities among people and places;
- Apply geographical skills and techniques (spatial analysis, geomatics, critical social research) to real world problems;
- Communicate geographical concepts and data effectively using oral, written, technical, visual forms;
- Demonstrate social/spatial consciousness and active citizenship to effect social change.

Curricular Overview

The GLOBAL GEOGRAPHY program is anchored by the following thematic strengths and sample courses:



Geography enrolments have declined in Ontario, in part because of the discipline's limited presence in primary and secondary school curricula. Nevertheless, Geography offers distinctive knowledge and skills that students appreciate once they are exposed to it – indeed Geography remains a major 'discovery' discipline because of its interdisciplinarity, its combination of sciences, social sciences and humanities, and its field-based and experiential learning components. The Global Geography offering embraces the place-based orientation of the discipline, and provides a global perspective that students are increasingly drawn to according to demand data. York's strong reputation as a university that advances the UN Sustainable Development Goals means that we are well positioned to capture students interested in contributing to these global efforts.



BES in ENVIRONMENTAL ARTS and JUSTICE

Minor (30 cr)

How do critical thinking and creative artistic practice understand and reimagine the global environmental crisis and produce effective and just responses to it? In this specialized interdisciplinary program, issues of fairness and justice are centred as students undergo rigorous education in artistic creation (e.g. visual art, performance, curation), writing, cultural criticism, and cultural policy analysis. Students learn how political, cultural, economic and social systems and structures (e.g. colonialism, racism, sexism, ableism, and homophobia) shape the environmental crisis, and are equipped with the skills and knowledge to analyze, challenge and respond to this. Courses in literature, social science, environmental science, media production, performance and art address issues such as climate change, loss of biodiversity, resource extraction, food justice, environmental racism, Indigenous sovereignty and decolonization, space/place and land ethics, human/animal/plant relations, and gender identities and relationships. Through experiential learning and skills training in and out of the classroom, students learn to critique, create, collaborate, and communicate to make a difference at community and policy levels.

Learning Outcomes

Upon completion of this degree, graduates will be able to:

- Demonstrate ecological, cultural, historical, conceptual, and media literacy in understanding causes of and responses to social/environmental challenges;
- Analyze how environmental injustices intersect with social injustices and colonial violence to impact human and ecological well-being;
- Appraise the cultural dimensions of environmental issues and how these issues play out in popular social media (e.g. television, internet, movies, literature, art);
- Apply practices of popular environmental education, media literacy, and critical social and cultural analysis to real-world issues;
- Apply cultural theory reflexively to their own lives as it relates to environmental issues;
- Mobilize active citizenship and leadership skills to effect positive local and global change;
- Work collaboratively in and with communities and various public, private, media, and arts organizations to address social and environmental challenges.

Curricular Overview

The ENVIRONMENTAL ARTS AND JUSTICE program is anchored by the following thematic strengths and sample courses:



Environmental arts reflect a novel and robust cluster of faculty members and students in the new Faculty interested in cultural production, creative expression, and endeavours embracing art for just social change. This is a unique program strength on the current academic landscape. With already 35+ students in this stream of the BES program, and given the expertise of our new Faculty, this program has the potential to develop into a major offering. Current demand analysis suggests that while high school students are passionate about environmental justice, it is a moniker that decreases the likelihood of students selecting it as a major. York trends show that students are drawn to this area once exposed so a minor program is a viable and indeed exciting option for students to 'mix and match' with other major offerings. Ongoing consultations with Arts Media Performance and Design and the LA&PS Department of Humanities will facilitate alignment and collaboration around cognate programming.



BES in SUSTAINABLE ENVIRONMENTAL MANAGEMENT

Honours (120 cr) | BES (90 cr) | Minor (30 cr)

Sustainable Environmental Management focuses on how the environment and its resources are managed and how transitions towards more sustainable systems are accelerated. It recognizes that addressing the climate crisis and destruction of nature require problem-solving, innovation and holistic strategies. The program combines an understanding of policy, law and regulation, economic and social dynamics with applied aspects of environmental science and technology and facilitates practical management skills. It highlights innovative approaches and sustainable transitions that can address environmental and social injustices. Students benefit from experiential learning through hands-on classroom activities, field and lab-based exercises, and community engagement. They learn first-hand about topics such as energy, water, food, and waste and in particular how transitioning towards sustainable systems, planning and monitoring is urgently needed. Students gain skills in sustainability measures and concepts, project management and critical thinking to equip them for careers in government, private sector, and non-profit sectors in Canada and abroad. Ultimately, students will gain knowledge and skills to help them make positive contributions towards a sustainable future.

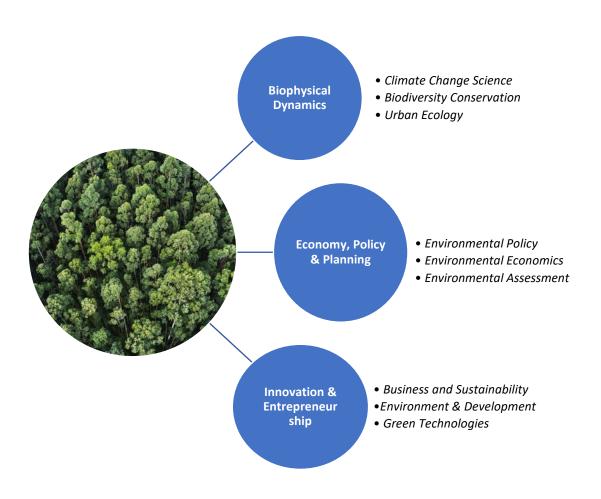
Learning Outcomes

Upon completion of this degree, graduates will be able to:

- Analyze environmental issues through lenses of biophysical processes, society and economy, policy, law and planning, and sustainability transitions and innovation;
- Apply sustainability concepts and interdisciplinary approaches to understand and implement effective environmental management and transition strategies;
- Apply conventional and alternative management models and policy instruments for compatibility with ethical, justice, and reconciliation frames;
- Interrelate scientific and other forms of knowledge such as Indigenous and community worldviews to better understand environmental issues and possibilities for sustainable transitions;
- Work collaboratively with governmental institutions, multidisciplinary professional organisations, communities, and other stakeholders to address environmental and societal challenges;
- Communicate concepts and data effectively using oral, written, technical, and visual forms;
- Demonstrate critical thinking skills and active citizenship to effective positive environmental change.

Curricular Overview

The SUSTAINABLE ENVIRONMENTAL MANAGEMENT program is anchored by the following thematic strengths and sample courses:



Environmental management remains a high-demand program among students interested in pursuing careers in the environmental sector according to recruitment and institutional planning research trends. Already one of the highest subscribed streams of the BES program, and given the expertise of our new Faculty, this program is well situated as a major offering. Enrolment is anticipated to increase to particularly given program emphasis on experiential education via work placements, opportunities to participate in the Las Nubes program in Costa Rica, and enhanced focus on innovation and entrepreneurship aimed at sustainable and just futures. Ongoing consultations are taking place especially with the LA&PS Business & Society program 'environment' stream; School of Public Policy & Administration's focus on public administration, program evaluation and policy analysis; Disaster & Emergency Management given their natural resource focus; and potentially with Lassonde School of Engineering given their strengths in green technology development and infrastructure innovation.



BSc in ENVIRONMENTAL SCIENCE

Honours (120 cr) | Specialized (120 cr) | BSc (90 cr) | Minor (30 cr)

With Faculty of Science, Lassonde School of Engineering, Glendon Campus

Environmental Science is a broad technical field that integrates biology, chemistry, physics, and physical geography. Environmental scientists seek to understand processes in the natural environment and the impacts of human activities on natural systems. They generate, analyze, and interpret data collected directly from the environment and through complex simulation models. In the Environmental Science program, students will learn how systemic interactions, feedbacks, and changes affect the terrestrial, aquatic, biotic, and atmospheric domains of our planet. Students will also be trained to monitor and analyze flows of mass, energy, heat, nutrients, contaminants, and moisture in the environment. Specific areas of curriculum focus include: climate change impacts and adaptation; biodiversity and conservation of species and habitats; and, earth surface processes and water quality.

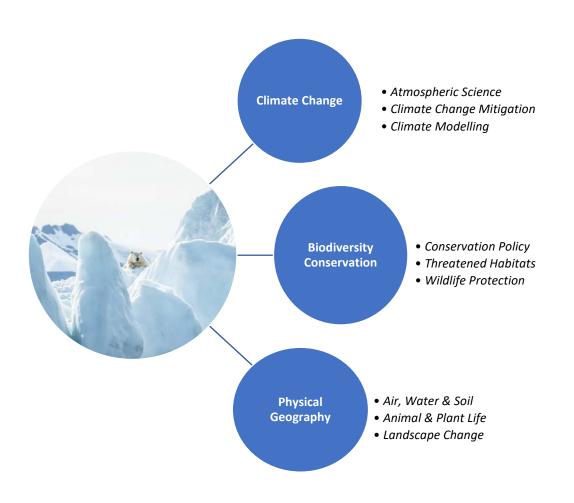
Learning Outcomes

Upon completion of this degree, graduates will be able to:

- Recognize, synthesize and evaluate the causes, impacts, and solutions to environmental challenges facing our planet;
- Develop scientific, strategic and expert knowledge with sampling, measuring, investigating, analyzing, and interpreting intertwined climatological, ecological, and biophysical systems;
- Understand the complex physical processes involved in the global distribution and utilization of energy and materials and their implications;
- Develop an interdisciplinary understanding of existing and emerging strategies to prevent and manage impacts of human activities on the natural world, and adapt to those changes;
- Interrelate scientific and other forms of knowledge such as Indigenous and community worldviews to better understand the environment;
- Work collaboratively to address scientific and practical solutions to environmental challenges.

Curricular Overview

The ENVIRONMENTAL SCIENCE program is anchored by the following thematic strengths and sample courses:



Environmental science remains a high-demand program. Current demand analysis suggests that high school students passionate about environmental issues are more likely to select a science-based environmental program. York University has not benefited from this demand relative to others given existing fragmentation and confusion in environmental science programs spanning numerous faculties. A consolidated, multiple pathway program is envisioned and being developed around issues of climate change, biodiversity conservation, and physical geography to attract and retain students. Enrolment is anticipated as approximately 50 students. This is a collaborative effort among colleagues in Faculty of Science, Lassonde School of Engineering, Glendon College, and the Faculty of Urban and Environmental Change. Further, environmental science courses will be woven throughout all undergraduate programs in the new Faculty not only to achieve true interdisciplinarity but also to ensure exposure to scientific foundations for all those interested in addressing environmental and urban challenges.

Undergraduate Dual Credential Programs

The Faculty of Urban and Environmental Change will feature Dual Credential Programs that offer students unique pathways through college and university programming in a 3+1 or 3+2 structure. These offerings are premised on the existing BES and will be re-aligned with the proposed degrees detailed above. Programs include:

- Environmental Management & Technology with Seneca College whereby students receive their Honours Bachelor in Environmental Studies degree and an Advanced Diploma in Environmental Technology. Focusing on environmental technologies, resources, and applied science, this program allows completion of the Bachelor in Environmental Studies degree at York University and the advanced diploma in Environmental Technologies at Seneca College in just 5 years. Future career outcomes include environmental sampling, surveying, and transportation design.
- Urban Sustainability with Seneca College whereby students receive their Honours Bachelor in Environmental Studies degree and an Advanced Diploma in Civil Engineering Technology. From studying water resource to transportation planning, this program allows students to complete the Bachelor in Environmental Studies degree from York University and the Civil Engineering Technology Advanced Diploma in just 5 years. Training students in the planning, design, and construction of major services and infrastructure, future career outcomes for graduates of this program include urban planning, water management, and Geographic Information Systems.
- International Development with Humber College combines the Bachelor in Environmental Studies degree at York University with the post-diploma certificate in International Development Management Studies at Humber. To be completed in just 4 years, students study topics such as development, sustainability, and policy in global context preparing students for a career in an NGO or environmental law.
- Ecosystems Management with Fleming College explores topics such as conservation, ecological restoration, and the environmental impact on health, this program allows students to complete the Bachelor in Environmental Studies degree at York University and the Ecosystems Management Technology Advanced Diploma at Fleming College in just 5 years. Future career outcomes of this program include rural planning, habitat assessment, and Geographic Information Systems.

Undergraduate Certificates

Undergraduate certificates offer students opportunities to enroll in a group of related classes that enhance particular thematic, technical, or disciplinary expertise in addition to their major program of study. Having certificates in a particular field 'adds value' and prepares students for more targeted employment and careers by honing in on marketable knowledge and skills.

The Faculty of Urban and Environmental Change will review its certificate offerings as part of the curriculum planning and development efforts during 2019/20. Student feedback from those within certificate programs, and broader demand analysis, will be used to determine whether certificates should be retained and what new certificates should be proposed. Key criteria in this certificate evaluation will include student demand, positive learning experiences/outcomes, enrolment numbers, collaborative and interdisciplinary opportunities among York faculties and units, and enhanced student employability in environmental careers especially related to environmental change, urban issues, and social justice.

The following certificates currently exist in Geography and Environmental Studies programming:

- GIS and Remote Sensing
- Sustainable Energy
- Migration and Refugee Studies
- Urban Studies
- Urban Ecologies
- Cultural & Artistic Practices for Environmental & Social Justice

Additional certificates may be considered in consultation and/or collaboration with cognate faculties, units and programs at York as follows:

- Sustainable Food Systems
- Environment and Human Health (with Faculty of Health)
- Indigenous Ecologies, Landscapes and Knowledges (with Indigenous Studies)
- Animal Studies and Advocacy



Graduate Degree Programs

Graduate degree programs in Geography and Environmental Studies are well-established, well-reputed, and offer students high quality learning outcomes. The existing graduate administrative structures will remain initially in place; potential refinements will be explored based on program size, curriculum logic, course offerings, structure (e.g. Plan of Study, thesis-based, course-based options), and thematic visibility (e.g. distinctive MES in Planning). Faculty members will continue their participation in other graduate programs across the university. The Faculty of Urban and Environmental Change will offer:

- **PhD in Geography** offers two fields: Critical Human Geography and in Biophysical Processes. It requires 3 mandatory courses, 2 elective courses, the program's colloquium for two years, comprehensive examinations and a dissertation. Students are guaranteed full Teaching Assistantship and Doctoral Fellowship; they are encouraged to apply for Tri-Council or other external funding.
- MA/MSc in Geography requires students to take 3 mandatory courses and 1 elective course, attend the program's colloquium in their first year, and to complete a thesis; or to take an additional 2 elective courses, attend the colloquium, and complete a major research paper. The funding of all Masters students in Geography includes a full Teaching Assistantship and Masters Fellowship. Geography graduate students may also pursue graduate diplomas, such as in Migration and Refugee Studies (through the Centre for Refugee Studies).
- PhD in Environmental Studies encourages student to create their own program plan to examine environmental concerns and approaches related to the natural, the social, the political, the cultural, and the urban. Adopting an interdisciplinary approach to environmental research, the program connects conventional disciplines in the social sciences, humanities, arts, and biophysical sciences in ways that encourage viewing issues through a broader, more contextual perspective, with an emphasis on social justice. Students take a mandatory PhD Research Seminar and write a specific program plan, comprehensive examinations, proposal presentation and examination, and a dissertation (fieldwork, writing and examination). Students may also take more courses in their first year. Doctoral students are guaranteed full Teaching Assistantship and Doctoral Fellowship, and are strongly encouraged to apply for Tri-Council or other external funding.

- Masters in Environmental Studies (MES) offers a general degree and two specialized programs:
 - o MES
 - MES/JD program offered jointly with Osgoode Law School
 - o MES in Planning accredited by the Ontario Professional Planners Institute

The Plan of Study is the foundation of all MES programs. Except for the MES/JD program (4-yr full time), the MES program (2-yr full time) requires a minimum of 36 credits (with one mandatory course ENVS 5100 and a requirement to complete a course in research design and one in research methods) and a major research project (in the form of major paper, project, portfolio or thesis).

Future graduate program planning in the Faculty of Urban and Environmental Change will explore the following new graduate degrees, in consultation and/or collaboration with cognate faculties, units and programs at York:

- MSc in Environmental Science (with Faculty of Science and Lassonde School of Engineering)
- MA and PhD in Critical Urban Studies

The new Faculty will also continue discussions on the following:

- The possibility of a Critical Urban Studies diploma, in partnership with the City Institute.
- The possibility of a direct admission, accredited professional MES Planning program. The program would retain an interdisciplinary pedagogical approach and 4 specializations (environmental planning, urban and regional planning, community and social planning, and an open specialization to accommodate emergent forms of planning).
- The possibility of reorganizing the existing MES program into conventional (36 credits of coursework + non-thesis research requirement (paper/project/portfolio) and research (thesis) options (12 credits of coursework – possibly aligned with requirements of MA/MSc Geography (thesis option).
- The possibility of formalizing MES specializations (minimum of 12 credits in addition to core) so as to cluster existing and future strengths, and provide more defined boundaries for MES advising, Plan of Study and course offerings.
- The possibility of offering a specialized one-year course-based (36 credit) graduate diploma in environmental studies.
- The possibility of joint graduate degree programs between Geography and Environmental Studies.

Graduate Diplomas

Graduate diplomas offer students opportunities to enroll in a group of related courses that enhance particular thematic, technical, or disciplinary expertise in addition to their graduate program. Having diplomas in a particular field 'adds value' and prepares students for more targeted employment and careers by honing in on marketable knowledge and skills.

The Faculty of Urban and Environmental Change will review its diploma offerings as part of the curriculum planning and development efforts during 2019/20. Importantly, student feedback from those within diploma programs, and broader demand analysis, will be used to determine whether diplomas should be retained and what new diplomas should be proposed. Key criteria in this diploma evaluation will include student demand, positive learning experiences/outcomes, enrolment numbers, collaborative and interdisciplinary opportunities among York faculties and units, and enhanced student employability in environmental careers especially related to environmental change, urban issues, and social justice.

The following diplomas currently exist in Geography and Environmental Studies programming:

- Environmental Sustainability Education (with Faculty of Education)
- Business and Environment (with Schulich School of Business)
- Migration and Refugee Studies.

Career Outcomes for the Class of 2025

Demand for urban and environmental focused careers has outpaced that of the rest of the workforce. To respond to the global climate crisis, destruction of nature, and mounting urbanization, as well as the United Nations' 2030 Agenda for Sustainable Development, governments are placing environmental regulations and public policies on industry that require organizations to rethink their practices and incorporate environmental and sustainable experts into their teams. Communities around the world are taking action through civil society organizations to ensure livable cities and respect for nature.



500,000 opportunities in Canada by 2025

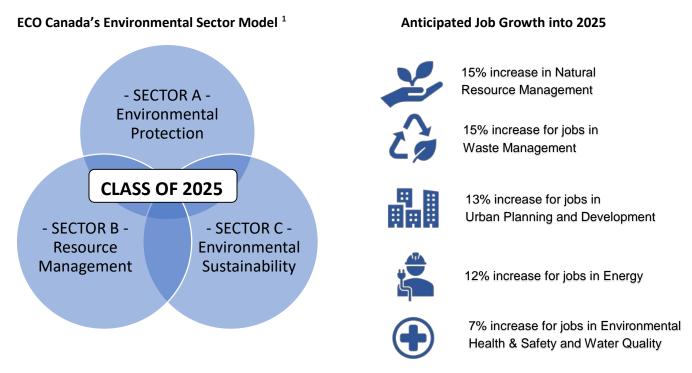


17% increase in environmental job postings



78% of environmental jobs require a university degree

The new Faculty of Urban and Environmental Change at York University will be well positioned to respond to this demand for environmental, urban and sustainable professionals in Canada and around the world. Equipped with the knowledge, skills and training from our signature undergraduate and graduate programs, our graduates will obtain successful careers in the environmental sector, urban and regional planning, sustainable development, public policy, social justice organizations, and beyond.



¹ Eco Canada Job Posting Trends 2018 <u>https://www.eco.ca/research/report/environmental-job-market-trends-2018/</u>

Future Careers for the Class of 2025



Chief Sustainability Officers, Regulators and Analysts



Energy Entrepreneurs Auditors and Consultants



Environmental Lawyers, Community Advocates and Diversity Educators



Environmental and Geoscientists, Technicians and Specialists



Urban Planners, Social Service Administrators and Infrastructure Directors

Enrolment & Recruitment

Graduate enrolment in the Faculty of Urban and Environmental Change will be held constant for the foreseeable future and is dependent upon further discussions relating to graduate programming.

Undergraduate enrolment in the new Faculty will involve a 'slow growth' scenario based on Fall 2019/20 actual intakes and starting in 2020/21 and increase annual intakes by 10 eligible and 6 visa (total across the new Faculty) students over 2019/20 enrolment contracts. A 'fast growth' scenario would increase annual intakes by 20 eligible and 10 visa students (total across the new Faculty) over 2019/20 enrolment contracts. Enrolment trends based on these scenarios are detailed in Figure 1.

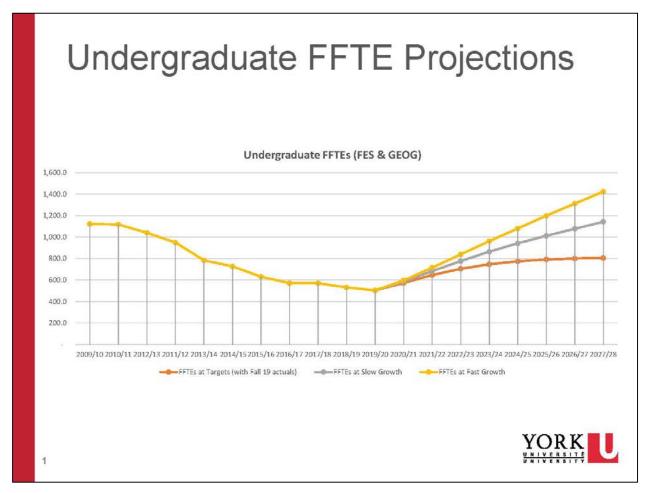


Figure 1: Undergraduate FFTE Projections

Figure 2: Intake Projections

FES		Actual	Projections								
FES		2018/19	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25	2025/26	2026/27	2027/28
Enrolment Contract (with actual Fall 2019 intakes)	A. Eligible	75	70	130	130	130	130	130	130	130	130
Enronnent contract (with actual Pail 2019 Intakes)	B. Int. Rate - Visa	13	10	11	11	11	11	11	11	11	11
Slow Growth	A. Eligible	75	70	135	140	145	150	155	160	165	170
Slow Growth	B. Int. Rate - Visa	13	10	14	17	20	23	26	29	32	35
Fact Carriet	A. Eligible	75	70	140	150	160	170	180	190	200	210
Fast Growth	B. Int. Rate - Visa	13	10	16	21	26	31	36	41	46	51
GEOG		Actual		Projections							
GEOG		2018/19	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25	2025/26	2026/27	2027/28
Enrolment Contract (with actual Fall 2019 intakes)	A. Eligible	35	12	44	47	47	47	47	47	47	47
Enronnent contract (with actual Pail 2019 Intakes)	B. Int. Rate - Visa	5	1	7	8	8	8	8	8	8	8
Slow Growth	A. Eligible	35	12	49	57	62	67	72	77	82	87
	B. Int. Rate - Visa	5	1	10	14	17	20	23	26	29	32
Fast Growth	A. Eligible	35	12	54	67	77	87	97	107	117	127
	B. Int. Rate - Visa	5	1	12	18	23	28	33	38	43	48

The FFTE projections are produced using the undergraduate enrolment model that takes into account students flow-through from one term to the next based on historical retention rates.

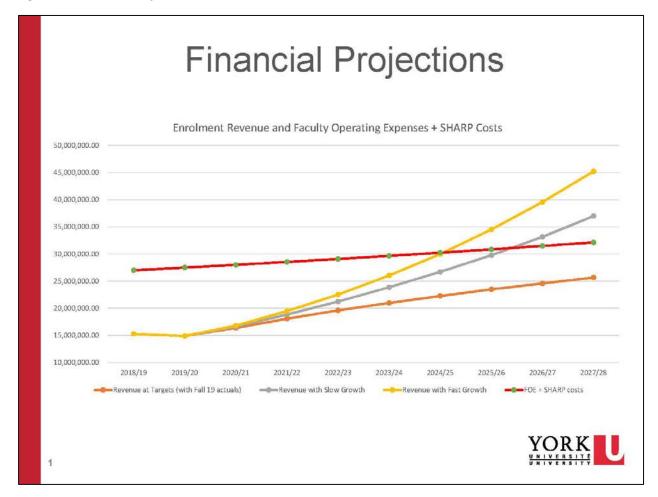
Of the 1423 FFTEs in the fast growth scenario, 952 are coming from FES and 471 from Geography. The scenario assumes the intake HEADS in 2027 at 436. However, there will also be new students from 2024 (346), 2025 (376), and 2026 (406) in the system. This means projected overall HEADS would generate 1423 FFTEs.

FES: UNMET FFTES		2018/19	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25	2025/26	2026/27	2027/28
Enrolment contract with actual 2019	A. Eligible	332.9	308.3	350.5	399.6	438.1	465.1	481.0	489.4	494.2	495.7
	B. Ineligible - Visa	52.4	66.4	85.6	99.5	108.3	115.1	121.0	124.7	126.3	127.3
	Env Studies Total	385.3	374.7	436.0	499.0	546.4	580.3	602.0	614.2	620.5	623.0
SLOW GROWTH	A. Eligible	332.9	308.3	354.7	410.7	459.4	499.2	528.9	552.7	571.9	589.9
	B. Ineligible - Visa	52.4	66.4	87.8	105.9	123.5	141.2	158.3	176.4	194.7	212.9
	Env Studies Total	385.3	374.7	442.4	516.6	582.9	640.4	687.2	729.1	766.6	802.7
FAST GROWTH	A. Eligible	332.9	308.3	358.9	423.1	482.2	534.6	578.4	616.3	650.7	683.6
	B. Ineligible - Visa	52.4	66.4	89.2	110.5	133.5	157.3	183.9	211.8	240.1	268.3
	Env Studies Total	385.3	374.7	448.1	533.6	615.6	691.8	762.3	828.1	890.8	952.0
GEOG: UNMET FFTES		2018/19	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25	2025/26	2026/27	2027/28
Enrolment contract with actual 2019	A Flight	2018/19	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25	2025/26	2026/27	2027/28
Enronnent contract with actual 2015	A. Eligible	13.2	110.4	125.1	151.5	135.0	21.0	22.5	24.8	25.3	25.4
	B. Ineligible - Visa GEOG Total	13.2	130.3	14.5	17.1	19.5	167.3	173.3	178.6	181.1	183.2
SLOW GROWTH	A. Eligible	133.0	118.4	127.2	142.9	161.8	181.6	199.4	217.1	234.3	251.1
	B. Ineligible - Visa	13.2	12.0	16.7	24.1	32.3	42.6	55.5	66.4	77.3	89.3
	GEOG Total	146.1	130.3	143.9	166.9	194.0	224.2	254.9	283.5	311.6	340.4
FAST GROWTH	A. Eligible	133.0	118.4	131.3	154.2	182.5	212.6	244.0	277.2	309.3	340.8
	B. Ineligible - Visa	13.2	12.0	18.1	28.4	41.4	57.7	74.6	93.4	112.1	130.4
	GEOG Total	146.1	130.3	149.4	182.6	223.9	270.4	318.6	370.5	421.4	471.2

Figure 3: Undergraduate FFTE Projections

Financial projections based on the slow growth enrolment scenario are detailed in Figure 4:

Figure 4: Financial Projections



Financial projections assume the following complement of the new Faculty:

- Full Time Faculty: 61 heads total for 2018/19 (41 FES & 20 GEO) or 57.4 FTEs (38.5 FES & 18.9 GEO); FTE/head counts will remain constant
- Part Time Faculty: 2018/19 level as the base with 2% annual increase
- Support Staff: Staff complement will remain at 2018/19 level
 - CPM: 4 CPMs (all FES) YUSA: 27 YUSA positions (19 FES and 8 GEO)

The recruitment plan of the Faculty of Urban and Environmental Change is based on the following goals:

- Increase applications of high quality applicants to the undergraduate and graduate offerings through renewed curricula with more visibility for in-demand knowledge components (for example science), more direct and explicit incorporation of transferrable skills, and more obvious career relevance;
- 2. Develop engagement and community awareness activities to promote the new Faculty to prospective applicants and key influencers;
- 3. Review and redesign recruitment publications and materials to attract prospective applicants (including viewbooks, website, social media and others);
- 4. Establish key messages for the new Faculty and each area to be consistently delivered by recruitment team;
- 5. Maintain and enhance effective services and programming that yield successful outcomes.

Undergraduate recruitment will pivot on the following key events:

- Ontario Universities Fair (September) Faculty, staff, alumni and students will be joining the YU-Team at the Metro Convention Centre to highlight the new Faculty in the York booth
- High School Teacher's Guide Mail Out Campaign (September) Over 750 Ontario high schools briefed on programming, invited to events, and encourage personalized visits
- Change Your World (October annual eco-conference with 350 high school students)
- 3% Project: Final Summit (May follow up to Change Your World)
- Fall Campus Day (November)
- YES! For a Day Applicant Visits (November to March on-campus)
- High School Lecture Series (On- and Off-Campus throughout the year featuring faculty research)
- High School Workshop Series (On and Off-Campus throughout the year focused on careers)
- High School Fairs and Parent Nights (with Central Recruitment throughout the year)
- Field Trip to York Days with High Schools
- Fall Guidance Counsellor Day
- o College Visits Series (e.g. Seneca, Humber, Fleming)
- Experience York (March Open House)
- Social media campaign (throughout the year)

Graduate recruitment will pivot on the following key events

- Online Information Sessions for prospective graduate students to visit the campus, learn more about faculty member research and course offerings, and meet with Admissions staff
- Faculty of Graduate Studies' Open House
- Special Calls for Faculty Member Research Project via social media or academic channels
- Central recruitment and Faculty of Graduate Studies targeted visits

Enrolment and Budget Monitoring Plan

It is expected that enrolment growth will be demonstrable within three years of the launch of the Faculty. Budget and enrollment will be monitored closely through existing systems and practices:

- Annual budget and forecasting exercises twice per year in November and March, including review of Faculty progress towards achieving enrolment contracts.
- Increased enrolment planning efforts must be demonstrated for projections following an enrolment shortfall.
- Regular review of intake projections and corresponding enrolment through the Enrolment Planning Group (EPG) and the Enrolment Management Group (EMG; includes Faculties). This is in addition to enrolment management and planning at the Faculty level.

Research

The Faculty of Urban and Environmental Change will unite a critical mass of scholars and scientists whose research excellence is already world-renowned and productive across all standards. Separately and collaboratively, Geography and Environmental Studies have facilitated York University's intensive research reputation through interdisciplinary scholarship, diversity of perspectives, and commitment to environmental protection and social justice. They have contributed through robust publications and creative outputs, attracting Tri-Council and other research funding, and leading collaborative research teams that span the university and the globe. Bringing colleagues together into a new Faculty will accelerate efforts and impacts to this end through support of robust research clusters, enhance research support, and identifying strategic renewals.

The thematic cluster of environmental change, for example, will unite biophysical scientists (e.g. Bello, Colla, Drezner, Fraser, Korosi, Molot, Podur, Thiemann, Young), as well as those focused on social, political, economic, ecological, and spatial dynamics of and responses to environmental change (e.g. Birch, Bunch, Etcheverry, Gosine, Hoicka, Fawcett, MacRae, Perkins, Sandberg, Sandilands, Stiegman, Remmel, Timmerman, Vandergeest, Warkentin, Winfield, Zalik). The thematic cluster of urbanization will draw together those focused on theoretical and/or planning oriented aspects of investigating cities and suburbs in Canada and beyond (e.g. Bain, Basu, Foster, Gilbert, Keil, Kipfer, Kusno, Lehrer, Mulvihill, Preston, Sotomayor, Taylor, Wood). The thematic cluster of sustainability and justice includes scholars offering social critique and/or tangible solutions for a better future. On the one hand, scholars focused on sustainability transitions, particularly the systems-based, technical, institutional, economic, and political innovations and processes needed to balance planet, people, and profits (e.g. Birch, Etcheverry, Hoicka, Perkins, Timmerman, Winfield); on the other hand scholars exploring how relations of power operate through broad structures and dynamics to shape people's circumstances, experiences, opportunities, and constraints in various places and contexts (e.g. De Costa, Das, Flicker, Ford-Smith, Gilbert, Haritaworn, Hyndman, McGregor, Mensah, Montoya-Greenheck, Myers, Jenkins, Kapoor, Kelly, Kipfer, Tufts, Zalik). Importantly, while faculty members are aligned here with specific thematic clusters, they often cut across other themes given their varied topical foci, theoretical and applied orientation, and interdisciplinary approaches.

The Faculty of Urban and Environmental Change will unite highly collaborative scholars and scientists who work in multi-stakeholder, multidisciplinary teams, and who have facilitated research excellence through ORUs at York University, including CITY Institute, York Centre for Asian Research, Centre for Refugee Studies, Centre for Research on Latin America and the Caribbean, Centre for Feminist Research, Global Labour Research Centre, and the Robarts Centre for Canadian Studies. The new Faculty will be a hub of numerous past and present Canada Research Chairs and York University Research Chairs (Tier 1 and 2) and industry funded chairs in a range of issues including Indigenous Environmental Justice (McGregor), Sustainability and Culture (Sandilands, Trudeau Scholar), Global Sub/Urban Studies (Keil), Environmental Law and Justice in the Green Economy (Scott), Sustainable Energy Economics (Hoicka), Environmental Conservation (Montoya-Greenheck). Building on this rich tradition of research excellence, the Faculty of Urban and Environmental Change will seek renewal opportunities to support future Canada Research Chairs.

The Faculty of Urban and Environmental Change's existing scholarly excellence and new research partnerships across and beyond the University will help operationalize York University Strategic Research Plan 2018-2023. The new Faculty of Urban and Environmental Change strongly contributes to four of the six intersecting themes:

- Building Healthy Lives, Communities and Environments: Research covers a vast range of interests from globalization and the spread of infectious diseases, participatory engagement with youth on reproductive health, environmental pollution and health risks (particularly on indigenous and racialized communities), food security, occupational health, provisions of green spaces for physical and mental wellbeing, aging populations, protection of ecosystems and endangered species, climate mitigation and adaption, to urban sustainability and resilience, and including collaborations with the Faculty of Health.
- Forging a Just and Equitable World: Justice and equity have been predominant pillars of geography and environmental studies and research. The multi-scalar impacts of collaborative research between scholars and communities range from an active role played in the York University-TD Community Engagement Centre in the Jane-Finch community, to the study of urban services shortages and deficits for immigrant/multicultural populations, to consideration of regional overburdens of infrastructural projects or extractive industries, to national debates about land and resources conflicts caused by colonialism and development, to the contested politics of international development.
- Analyzing Cultures and Mobilizing Creativity: Innovative scholarship regarding issues of justice and equity is expressed through art, performance and community engagement. The existing interdisciplinary focus and opening to different worldviews to address cultural, urban, geographical and ecological issues expand the possibilities of engagement and scholarship – and a prime example of this is the existing environmental and legal scholarship on Indigenous knowledge systems. Mobilizing creativity is no longer reserved to artists and performers, it features prominently in environmental education, urban planning, sustainability transitions.
- Integrating Entrepreneurial Innovation and the Public Good: Current research in the fields of ecological economics, economic and labour market transformations, and sustainability transitions in energy, food, water, and resource management provide opportunities to enhance scholarship in entrepreneurial innovation and the public good.

The Faculty of Urban and Environmental Change, in collaboration with other Faculties at York University, is poised to contribute to York University's areas of research opportunities: *Healthy Individuals, Healthy Communities* as health extends to natural and built environments; *Indigenous Futurities* particularly in a context of reconciliation, truth and justice; and *Public Engagement* for a *Just and Sustainable World* as this new Faculty is designed precisely to address some of the most important socio-environmental challenges. Notably, the Faculty of Urban and Environmental Change, in collaboration with the Sustainability Office, will champion and lead research and action regarding sustainability, climate action, and environmental justice at York University and beyond.

Governance

Academic Structure

The Faculty of Urban and Environmental Change academic structure is detailed in Figure 3. It is nondepartmentalized to reflect efforts to embody interdisciplinary. It is streamlined administratively to encourage collegial governance and decision-making processes for academic faculty matters. A new Faculty-based transition team, in consultation with the broader Faculty, will work with this proposed academic structure to ensure it effectively incorporates collegiality and constituent interests moving forward. The academic structure will be formally reviewed three years after launch of the new Faculty to assess its effectiveness and its relevance according to academic strategic planning and resourcing.

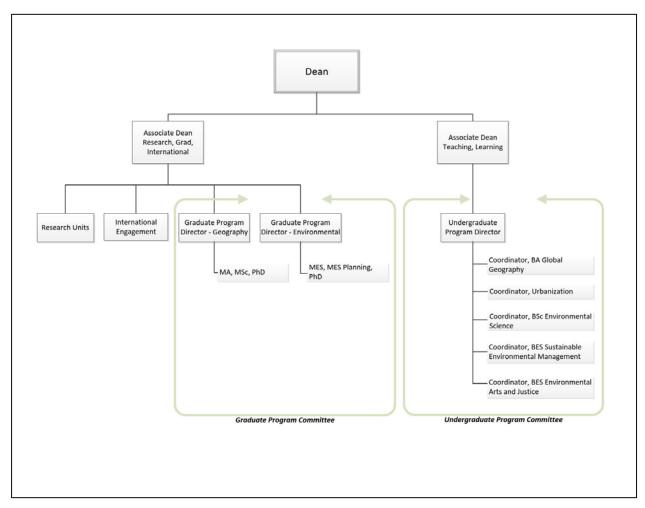


Figure 3: Faculty of Urban and Environmental Change Academic Structure

Interim Faculty Council

Given the different structure of governance of the Department of Geography and the Faculty of Environmental Studies, and the need to take curriculum and governance decisions, an Interim Faculty Council (Figure 4) will be established for the period January 1st 2020 to June 30th 2020. An Interim Faculty Council will be the direct line to Senate committees as these proposals and plans are reviewed and approved. This Interim Council will streamline processes that now involve the Faculty Councils of the Faculty of Environmental Studies and the Faculty of Liberal Arts and Professional Studies as well as the Department of Geography. This Interim Council will allow members of the new Faculty to take full responsibility for developing proposals and implementation plans until it becomes operational on September 1st 2020.

It is important to underline that the membership and structure of the interim committees have been designed to be representative of both Geography and Environmental Studies programs within the two existing Faculties. The membership of the interim Faculty Council and each committee will have proportional representation to ensure that both programs are well represented. The membership, purpose, structure and rules of the interim Faculty Council are detailed below.

The interim Faculty Council and committees will be established concurrently with this proposal to establish the Faculty of Urban and Environmental Change. It would require approvals from the Department of Geography, Liberal Arts and Professional Studies Faculty Council (and Executive Committee prior to Council), Faculty of Environmental Studies Faculty Council (and Executive Committee prior to Council), Senate Executive Committee and Senate.

Figure 4: Interim Faculty Council

FACULTY OF URBAN AND ENVIRONMENTAL CHANGE INTERIM FACULTY COUNCIL

(Effective January 1, 2020 – August 31, 2020)

Executive, Equity and Planning Committee Pedagogy, Standards and Awards Committee

Permanent Faculty Council

Upon approval and full launch of the Faculty of Urban and Environmental Change on September 1st 2020, a permanent Faculty Council will be established to ensure the governance of the new unit. The purpose, structure, membership and rules of this permanent Council structure align with those articulated for the Interim Faculty Council with opportunities to adjust as needed prior to full Faculty launch. The proposed permanent Faculty Council Committee Structure is detailed in Figure 5.

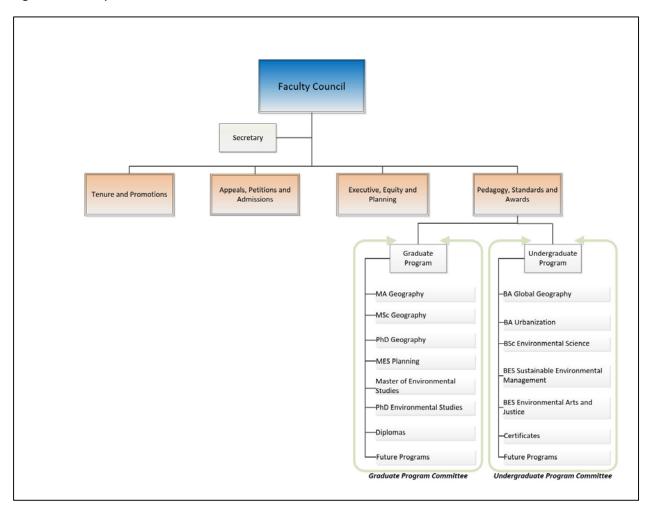


Figure 5: Faculty Council Committee Structure

Implementation

Goals Guiding Implementation

- 1. Create a hub of scholarly expertise on urban and environmental change at York University by enhancing visibility and recognition internally and externally;
- 2. Improve the clarity and visibility of interdisciplinary programs at York University;
- 3. Reduce internal competition for students in similar or cognate fields by reducing curricular overlap and enhancing collaboration;
- 4. Compete more effectively with other institutions by collaborating across academic units/faculties;
- 5. Increase undergraduate enrolment;
- 6. Improve undergraduate experiences via clarity and choice in degree types and streams, explicit emphasis on experiential learning and skills development, and guidance on career preparation;
- 7. Provide graduate students with an enhanced community of scholars and breadth of courses and approaches;
- 8. Streamline engagement activities with civil society, industry, and government partners;
- 9. Bring together disciplinarily-related individuals to foster collaboration in research and teaching;
- 10. Improve access to field equipment, computing, and lab resources without duplication;
- 11. Consolidate and enhance communication and promotional strategies for recruitment, funding, alumni involvement, advancement, and outreach; and,
- 12. Increase financial sustainability for both units by increasing undergraduate enrolments, enhancing graduate training, creating opportunity for external donation, and achieving curricular harmonization.

Administrative Principles Guiding Implementation

- 1. Creation of the new Faculty will align with basic SHARP principles in terms of revenue and expenses with collaborative programs guided by York University's Cross-Faculty Degree Programs Principles;
- 2. Creation of the new Faculty will be cost neutral aside from central support provided for transition costs associated with its creation;
- 3. Detailed structure of the new Faculty will be discussed and approved through agreed upon governance processes;
- 4. Curricular program changes will be discussed and approved through agreed upon governance processes;
- 5. Provisions for faculty workload and research release programs will be discussed and approved by YUFA members in both units, and submitted to the Dean for approval, in accordance with Article 18.08.1 of the YUFA Collective Agreement;
- 6. Tenure and promotion criteria for existing faculty will be based on criteria at time of hire unless faculty choose new process operative within new unit;
- 7. Staff positions will be protected for a minimum of 18 months from September 1, 2020;
- 8. Registrar arrangements, retroactive grand-parenting, and academic standards will be addressed through appropriate channels so as not to disrupt students' programs of study; and,
- 9. The new Faculty will seek co-location on campus over time.

Initial Proposal Genesis and Relationship to University Planning

This proposal is the culmination of collegial planning efforts over more than three years. An open meeting was held in May 2016 to discuss potential merger between the Department of Geography and the Faculty of Environmental Studies and to create an ad hoc committee of 4 faculty members (2 in Geography and 2 in Faculty of Environmental Studies) to come up with a proposal on how to proceed to establish a new Faculty. A proposal was submitted in November 2016. Motions were brought to respective governing bodies for adoption that legitimize our continued discussions.

At their meeting of December 1st 2016, the Faculty of Environmental Studies Committee of Instruction adopted the following motion:

"May it be resolved that faculty, staff and students represented in the Committee of Instruction at the Faculty of Environmental Studies approve, in principle, an intensification of discussions on a possible merger of FES with the Department of Geography and potentially other cognate units in the University."

"May it be resolved that the Committee of Instruction of the Faculty of Environmental Studies requests that the University provide assistance to facilitate a merger of FES with the Department of Geography at York University (and possibly other units in the University). FES specifically requests that the University provides information on processes, support staff and course releases for faculty to work on a merger in the most expedient way feasible."

At their meeting of December 7th 2016, the Department of Geography adopted the following motion:

"May it be resolved that faculty represented at the Department Meeting of the Department of Geography within the Faculty of Liberal Arts & Professional Studies approve, in principle, an intensification of discussions on a possible merger of FES with the Department of Geography and potentially other cognate units in the University."

"May it be resolved that the Department of Geography within the Faculty of Liberal Arts & Professional Studies request that the University provide assistance to facilitate a merger of FES with the Department of Geography at York University (and possibly other units in the University). The Department of Geography specifically requests that the University provides information on processes, support staff and course releases for faculty to work on a merger in the most expedient way feasible."

On May 25th 2017, the Faculty of Environmental Studies Committee of Instruction adopted this motion in principle for Senate:

"May it be resolved that faculty, staff and students represented in the Committee of Instruction at the Faculty of Environmental Studies approve a "Motion in Principle" that the Faculty of Environmental Studies join with the Department of Geography, and potentially other cognate units in the University, under a new Faculty." On May 16th 2017, the Department of Geography adopted this motion in principle for Senate:

"May it be resolved that faculty represented at the Department Meeting of the Department of Geography within the Faculty of Liberal Arts & Professional Studies approve a "Motion in Principle" that the Department of Geography join with FES, and potentially other cognate units in the University, under a new Faculty."

On May 17th 2017, Interim Provost Lisa Philipps recorded her "support for a motion for approval in principle of this merger" between the Faculty of Environmental Studies and Geography Department in a Memo to L. Jacobs (Chair, Senate APPRC) and L. Farley (Chair, Senate ACSP), Interim Vice-President Academic & Provost.

On June 15th 2017, Senate approved in principle a motion presented by APPRC for the creation of a new Faculty "comprising the Faculty of Environmental Studies, the Liberal Arts and Professional Studies Department of Geography, and potentially other departmental units or programs."

On August 29th 2017, underscoring the need for a bottom-up collegial process, members of the Faculty of Environmental Studies and Department of Geography and individuals from cognate programs met to discuss degrees, programs, organizational structure, governance structure, naming and branding. The result was a report "Planning for a new Faculty: Progress Report for APPRC and ASCP".

On January 12th 2018, an initial Geography-Environmental Studies Retreat was held to establish some consensus around programs to go forward for development (representatives of Urban Studies, Disaster and Emergency Management Studies, and Business and Society programs were also present).

During Winter 2018, a series of meetings of the Undergraduate Curriculum Working Group and Graduate Curriculum Working Group fleshed out proposals of existing, proposed, and new degrees. The planning process was suspended at the request of the co-coordinators in April 2018 given the perceived lack of broad institutional support required to continue (and the CUPE strike that lasted from March 5 to July 25, 2018). A Memo in May 2018 memo from the APPRC chair acknowledged that AAPRC has been "remove[d] from the process" and identifying the need for "authentic, visible, dedicated championship at the senior level to augment and support collegial effort".

In October 2018, the process was restarted with the arrival of a new dean in the Faculty of Environmental Studies and the appointment of an interim dean in LA&PS. A Facilitating Group was formed to champion the process for reaching a decision on a new Faculty in the 2018/19 academic year. The Facilitating Group emphasized the need for continuing bottom-up consultations among Geography and Environmental Studies colleagues and other units/programs, discussion with YUFA and YUSA on collective agreements, the deference of other restructuring proposals, and the need to report to APPRC and ASCP.

On February 27th 2019, a second Geography-Environmental Studies retreat was held to discuss the name, vision, and broad curriculum themes and programs of the new Faculty. An initial draft proposal emerged from this collaborative process.

Timeline to Date and Beyond

The following represent milestones in the consultation and proposal development; each point was supported by numerous informal meetings, discussions, feedback loops, working group discussions, and planning meetings of the various actors involved in this process.

May 2016	Open meeting to discuss potential merger and creation of a 4-member committee (Elizabeth Lunstrum, Tarmo Remmel, Roger Keil and Gail Fraser) to come up with a proposal on how to proceed to establish a new Faculty – identified as Faculty Blue.
Nov 2016	Presentation by the group of 4 of possible scenarios for integration of teaching programs and consensus to accelerate the process (representatives of the Urban Studies program were in attendance).
Dec 2016	Faculty of Environmental Studies Merger motion adopted at the Committee of Instruction of December 1.
	Department of Geography Merger motion adopted at the Department Meeting on December 7.
Mar 2017	Report & Motion Merger Discussions among Geography, the Faculty of Environmental Studies and Others submitted by group of 4 presenting Motions in Principle for Senate.
May 2017	Faculty of Environmental Studies Motion in Principle for Senate adopted at Faculty Council on May 25.
	Geography Motion in Principle for Senate adopted at Department Meeting on May 16.
	Interim Vice-President Academic & Provost, Lisa Philipps, in a memo to L. Jacobs (Chair, Senate APPRC) and L. Farley (Chair, Senate ACSP) dated May 17, 2017 and entitled "Proposal for Merger of Faculty of Environmental Studies and Geography Department" recorded her "support for a motion for approval in principle of this merger."
Jun 2017	On June 15, Senate approved, in principle, the creation of a new Faculty "comprising the Faculty of Environmental Studies, the Liberal Arts and Professional Studies Department of Geography, and potentially other departmental units or programs." Motion presented by APPRC.
Aug 2017	Retreat for members of the Faculty of Environmental Studies and Geography held in HNES 140 on August 29 to get to know each other, to have initial collective discussion about degrees, programs, organizational structure, governance structure and naming and branding.
Sep 2017	Discussion of tentative structure for new Faculty approved at Faculty of Environmental Studies Faculty Council of September 28, notably joint Undergraduate Curriculum Working Group (based on clusters) and Graduate Curriculum Working Group.

	Gail Fraser and Patricia Wood chosen as co-coordinators of the planning process for the new Faculty.
Jan 2018	Geography-Environmental Studies Retreat held on January 12 to establish some consensus around the suite of programs to go forward for development (with some representatives of Urban Studies, Disasters and Emergency Management Studies, and Business and Society programs);
	Coordinators Gail Fraser and Patricia Wood submitted "Planning for a new Faculty: Progress Report for APPRC and ASCP."
Winter 2018	Twelve meetings of the Undergraduate Curriculum Working Group and Graduate Curriculum Working Group were held during the term to flesh out proposals of revised and new degrees.
Apr 2018	Co-coordinators Gail Fraser and Patricia Wood resigned on April 24; they recommended that the planning process be suspended given lack of broad institutional support required to continue. (CUPE strike from March 5 to July 25, 2018).
May 2018	Co-coordinators Gail Fraser and Patricia Wood participated to APPRC meeting at which the Chair and Secretary of ASCP were also participants.
	APPRC memo (Tom Loebel, Chair) acknowledging AAPRC "remove from the process" and the need for "authentic, visible, dedicated championship at the senior level to augment and support collegial effort".
Oct 2018	Alice Hovorka starts 5-yr dean appointment in the Faculty of Environmental Studies and JJ McMurtry named interim Dean of Liberal Arts and Professional Studies on October 1.
	Memo from Lisa Philipps, Provost & Vice-President Academic to APPRC, cc Alice Hovorka (Dean of FES), JJ McMurtry (Interim Dean, LAP&PS), Joseph Mensah (Chair, Geography), Kim Michasiw (Chair ASCP), Alice Pitt (Vice-Provost Academic) dated October 18 and entitled "Process for Considering New or Revisioned Faculty" outlining process for reaching a decision on a new or revisioned Faculty in 2018-2019. The memo suggests the creation of a Facilitating Group, the need for collegial consultations in Geography/ Environmental Studies and other units/programs, discussion with YUFA on collective agreement rights, the deference of other restructuring proposals, and the need for the Facilitating Group to report to APPRC and ASCP.
Nov 2018	Discussion of re-engagement based on Provost's memo presented in Faculty of Environmental Studies at Committee of Instruction on November 1 and later in Geography.
	First meeting of Facilitating Group on November 9.
Jan 2019	Meetings of the Facilitating Group co-chaired by Lesley Jacobs (Chair APPRC) and Kim Michasiw (Chair, ASCP)

New Co-coordinators Tarmo Remmel (Department of Geography) and Liette Gilbert (Faculty of Environmental Studies) named to work on planning process of new Faculty.

- Feb 2019 Merger Retreat 2.0 "Out of the Blue" (February 27) with members (faculty, staff, student representatives) to agree on a vision for the new faculty, broad curriculum themes and name for the new Faculty.
- Mar 2019 Ongoing meetings among the Facilitating Group, co-coordinators, workload working group, and curriculum working group to inform the drafting of a proposal for the new Faculty of Environment. Assessment report received from Higher Education Strategy Associates.
- Apr 2019 Circulation of Draft of Proposal for the establish of the Faculty of Environment on April 10th to Geography, Environmental Studies, the Facilitating Group, and all other relevant stakeholders with feedback sought by April 24.
- May-Aug 2019 ASCP Senate Sub-Committee organized and held consultations to discuss synergies and potential collaborations as follows:
 - School of Administrative Studies (DEM) on May 30
 - School of Public Policy and Administration on June 12
 - o Department of Social Science (BUSO, IDS, URST) on June 12
 - o Indigenous Studies Program on June 18
 - CITY Institute on July 10
 - o Lassonde School of Engineering & Faculty of Science on July 18
 - o Department of Earth and Atmospheric Sciences on Aug 13
 - o Art, Media, Performance & Design and Department of Humanities on Aug 13

Geog/ES Working Groups on Curriculum developed two-page synopses of signature undergraduate programs and discussed graduate program structure for the new Faculty. Extensive consultation took place via email and in-person meetings during July and August.

Continuing participation of Geog/ES colleagues, new Faculty co-coordinators, and Dean in the Environmental Science working group co-chaired by Kim Michasiw and Alice Pitt.

Curriculum program marketing potential expertise offered by Lily Piccone and Alison Ozog, including development of 'career pathways' overviews for students.

Geog/ES Working Group on Governance discussed academic structure and faculty council details with assistance from Robert Everett. Consultation took place via email and an in-person meeting on July 16 to discuss new Faculty name, academic structure, and interim Faculty Council.

Polling for new Faculty name took place in early August with n=370 responses from faculty, staff, graduate students, undergraduate students, and alumni.

OIPA Environmental Studies Conjoint Survey distributed on August 10 with market analysis anticipated by early September.

Notice of Intents (NOIs) submitted to VP Academic for all proposed curriculum changes.

Circulated revised Proposal for the Creation of the new Faculty on August 22.

Open Forum scheduled to discuss revised proposal on August 29.

Sep 2019 ASCP Senate Sub-Committee continued with a second round of consultations as follows:

- September 9 Department of Earth and Atmospheric Sciences; School of Public Policy and Administration
- September 11 Department of Social Science
- September 16 Faculty of Science; Lassonde School of Engineering; Equity Studies; CITY Institute
- September 18 Art, Media, Performance & Design; Department of Humanities; Indigenous Studies; School of Administrative Studies (DEM)
- Fall 2019 Approval process for the creation of the new Faculty anticipated as follows:

Meeting/Agenda	Date
FES Council Agenda	19 September 2019
FES Council Meeting	26 September 2019
Geography Agenda	19 September 2019
Geography Meeting	27 September 2019
LAPS Council Agenda	3 October 2019
LAPS Council Meeting	10 October 2019
APPRC Special Meeting Agenda documents due	10 October 2019
APPRC Special Meeting	17 October 2019
Senate Executive Agenda documents due	10 October 2019
Senate Executive Meeting	15 October 2019
Senate Meeting Agenda (Notice of Motion) documents due	10 October 2019
Senate Meeting (Notice of Motion)	24 October 2019
Senate Executive Agenda docs due	13 November 2019
Senate Executive Meeting	19 November 2019
Senate Meeting Agenda documents due	21 November 2019
Senate Meeting	28 November 2019
Board Academic Resources Committee Agenda documents due	3 December 2019
Board Academic Resources Committee Meeting	12 December 2019
Board of Governors Agenda documents due	3 December 2019
Board of Governors Meeting	13 December 2019

Geog/ES Working Groups to continue the following activities:

- Finalize undergraduate program proposals & submit into approval cycle
- Continue discussion and refinement of graduate programs
- Review certificates, diplomas, and dual credential programs
- Plan recruitment and admissions into new Faculty programs
- Plan communications, branding, and promotion of new Faculty
- Conduct space and facilities inventory and explore co-location options

Transition Team to be established to spearhead and coordinate efforts around communications, space and facilities, student program transitions, identity branding, and other transitional elements as needed. Particular attention to be paid to Geography and Environmental Studies legacy practices and/or structures to ensure continuity of academic programs during the transition period.

- Jan 1, 2020 Launch of Interim Faculty Council
- Sep 1, 2020 Launch of the new Faculty of Urban and Environmental Change and its Faculty Council

Dissolution of Department of Geography and Faculty of Environmental Studies

Sep 2021 First cohort of Faculty of Urban and Environmental Change students



OFFICE OF THE PROVOST & VICE-PRESIDENT ACADEMIC

4700 Keele St. Toronto Ontario Canada M3J 1P3 Tel 416 736 5280 Fax 416 736 5876

vpacademic.yorku.ca

October 16, 2019

Dean Alice Hovorka Faculty of Environmental Studies Health, Nursing and Environmental Studies Building, 139J

Dear Dean Hovorka,

I am writing to convey my strong support for the proposal to establish a Faculty of Urban and Environmental Change at York University. The proposal responds to the opportunity to provide leadership and vision on our environment, encompassing natural and built, at a time when climate and planetary health present the world's most pressing issues.

Several reasons have been advanced for the proposed new Faculty. The Institutional Integrated Resource Plan called upon Faculties and units to seek ways to enhance the quality and sustainability of their programs and identified harmonization, rationalization and streamlining of program offerings as potential activities. More specifically, the recent Cyclical Program Reviews of both units and an environmental scan of cognate programs at Ontario universities commissioned from Higher Education Strategy Associates (HESA) identified a need for more coherence and focus in programs with an environmental core.

FES and Geography have both experienced enrolment declines in their undergraduate programs (and to a lesser extent at the graduate level) in recent years. Both internal and external research suggests that the array of program and course options offered across these two units and others presents a confusing array of programs to potential students and likely decreases our competitive advantage in terms of applications and enrolments with programs offered by other universities. A merger will enable a more coordinated approach to curriculum planning and, importantly, to the presentation of program options in a clear and integrated way that conveys to potential students the opportunities available to them. A new vision for the programs involved will reduce duplication, identify career and graduate education opportunities, and create opportunities for cross-disciplinary projects and practices.

The Faculty of Urban and Environmental Change will bring together scholars that exemplify research excellence, interdisciplinarity, and impact at York. The establishment of thematic clusters will further provide opportunity for collaboration around environmental change, urbanization, sustainability and justice, sustainable transitions, and other connected and pressing issues.



I have been fully involved in discussions around the development of the proposal for a Faculty of Urban and Environmental Change. This proposal is the result of more than two and a half years of work and consultations led by colleagues within the Department of Geography and the Faculty of Environmental Studies, by APPRC and ASCP, and by the Dean of FES. My office has been an active participant in various processes designed to support this initiative: we have been members of the Facilitating Group, established under the leadership of the APPRC and ASCP Chairs to work on this initiative, the Vice provost Academic has facilitated the revision of curriculum, and we have provided project management and other resource supports. My office has also actively participated in the sub-group of ASCP mandated to consult with the wider York community on collaborative curriculum.

I concur with the proposal's analysis that this initiative aligns with the University vision, values and strategic research and academic priorities. New curricular proposals include signature elements that exemplify and enhance university goals around student experience and academic excellence:

- The revisioned cross-Faculty Environmental Science program will help to strengthen natural sciences course and program offerings within the new Faculty.
- Prospective consolidation of the urban and planning-related programming at York, means prospective students are presented with a single, unified gateway into all urban studies offerings.
- There is an articulation of experiential education and transferrable skills components within every undergraduate program.
- There is a vision for a one-year, course-based professional master's degree, and streamlining of existing successful graduate programs.
- Graduate career maps based on labour market needs analysis and known alumni career paths will be developed.

All curricular changes will of course follow the required approvals processes. Collectively and once complete, they present tremendous opportunity for teaching, learning, research and student engagement within the new Faculty.

Resource planning is based on a non-departmentalized Faculty with a unified workload agreement, on existing expenses, and on the understanding that the undergraduate curriculum revisioning included in the proposal will be prioritized and move forward at the earliest opportunity. Intensive recruitment efforts, informed by market research and other data, will be key in supporting the new Faculty's achievements of ambitious enrolment targets within a short time. Given annual expenses, it will be essential for the new Faculty's enrolment to climb significantly within three years from the formal launch date of September 1, 2020. The resource plan assumes that as activities move to the new Faculty, the budget supporting those activities will also move, as will expenses. These include existing faculty and staff salaries, operational budgets, and existing space allocations.

It is acknowledged that there will be some additional supports required to ensure a successful transition to a Faculty of Urban and Environmental Change. My office is prepared to offer support and resources where existing resources and personnel are not able to meet transition period needs.

I wish to acknowledge the significant time and energy that colleagues have invested in this process and signal my enthusiastic support for their continued efforts around curricular reform and establishment of the new Faculty. I believe that the establishment of the Faculty of Urban and Environmental Change is an essential step for research, teaching, community engagement, and the global impact of York University. I am pleased to record my strong support for this proposal.

Yours truly,

Lisa Philipps Provost & Vice-President Academic



FACULTY OF LIBERAL ARTS & PROFESSIONAL STUDIES

Office of the Dean

S900 ROSS BLDG. 4700 KEELE ST. TORONTO ON CANADA M3J 1P3 T 416 736 5220 F 416 736 5750 www.yorku.ca/laps October 10, 2019

To: APPRC:

I am writing in support of the proposed new faculty of Urban and Environmental Change. It is impressive that the colleagues in both Geography and the Faculty of Environmental Studies have been able to work together to put together the proposal which addresses a number of urgent concerns. First, it is important that York University continues to provide intellectual and research leadership on the environment and the proposed new faculty does this. It is also crucial that the issue of undergraduate enrollments in both Geography and the Faculty of Environmental Studies be addressed with curricular clarity and intellectual direction, which it appears the proposed faculty will provide. Finally, there seems to broad support in the LA&PS community for the proposed new faculty as the closing of the Geography Department passed Faculty Council this afternoon without a single vote of opposition (although it is clear that there are members of Geography at least who were not in support).

I do have some concerns about articulating the urban at York as there are multiple faculty members and programs within LA&PS which focus on the urban in their research and curriculum. Specifically, the Urban Studies Program has a long history in LA&PS and its predecessor faculty, Arts. However, I am encouraged by recent developments which appear to demonstrate a willingness on the parts of the Faculty of Environmental Studies, the Department of Geography, and the Department of Social Science and the Urban Studies Program to work together to find clear curricular and enrollment pathways for students interested in the urban broadly constructed using the Provost's Framework for Interfaculty Teaching. I also note that there are upcoming meetings to discuss curricular opportunities between these parties. I am hopeful that these upcoming meetings will continue to bear fruit, and I believe a positive climate for such discussions has been created.

Finally, as mentioned above, I am concerned about the current state of undergraduate enrollments in the Faculty of Environmental Studies and the Department of Geography, and the financial viability of the proposed new Faculty. These problems cannot be avoided, and the price of doing nothing, or maintaining the status quo, is enormously high. These enrolment problems reflect the current state of affairs, and there is reason to be hopeful that the new Faculty would be better able to address these issues as a collective whole and with greater curricular clarity. It is clear that this is the spirit in which the new Faculty is being proposed, and is the reason I am in support of this initiative.

Sincerely.

J.J. McMurtry Interim Dean



SCHOOL OF THE ARTS, MEDIA, PERFORMANCE & DESIGN

Office of the Dean

4700 KEELE ST TORONTO ON CANADA M3J 1P3 T 416 736 5136 ampd@yorku.ca ampd.yorku.ca Dr. Alice J. Hovorka Dean & Professor Faculty of Environmental Studies York University

Dear Dean Hovorka:

I am pleased to write in support of the proposal to create a new Faculty of Urban and Environmental Change (FUEC). I fully support the objectives detailed in this proposal; namely to integrate and consolidate programs with shared foci on urban and environmental issues, broadly defined, into a single faculty. The proposal offers a compelling rationale for the new faculty and clear objectives for programs within it. These timely programs seem well-positioned build upon historic institutional strengths and to capitalize upon the distinct capabilities of the existing faculty complement in both FES and Geography.

As Dean of the School of the Arts, Media, Performance and Design (AMPD), I also note and appreciate the consultations and incorporation of feedback from AMPD within this proposal. The resulting revisions mitigate our concerns regarding the potential duplication of arts programs between the proposed FUEC and AMPD and the potential for confusion in what students in the new faculty will receive as aspiring artists. The proposal to launch the BES in Environmental Arts and Justice as a minor seems to be a moderate and prudent course as does the description of how creativity is mobilised in these specific contexts. I appreciate the repeated emphasis on interdisciplinarity expressed throughout this proposal and the "hub and spoke" approach seems likely to yield new opportunities. I remain enthusiastic about the potential for collaboration with growing programs in Digital Media (AMPD & Lassonde) among other synergies with AMPD, in Theatre and Visual Art and Art History, among others. I look forward to future conversations about how best to serve students invested in intersections between the urban and natural environments and art praxis.

I am therefore pleased to lend my support to the proposed new faculty. Congratulations to you and your colleagues on this significant achievement and I wish you continued success in your endeavour.

Sincerely,

S. By-Cy

Sarah Bay-Cheng, Ph.D. Dean, AMPD

September 30, 2019





FACULTY OF GRADUATE STUDIES

Office of the Dean

230 YORK LANES 4700 KEELE ST TORONTO ON CANADA M3J 1P3 T 416 736 5521 www.yorku.ca/grads 20 September 2019

Dr. Alice Hovorka Dean, Faculty of Environmental Studies HNES Bldg. 139J c/o <u>bwells@yorku.ca</u>

Dear Alice,

I write in support of the idea of a Faculty of Urban & Environmental Change as well as its creation. My support for the current proposal, however, is qualified. The purpose and aim of the Faculty, its new vision and description, are inspiring. The flow of energy invested in the planning has been great and it shows no sign of abating – which is crucial, because should Senate approve the proposal to create this new Faculty, renewed efforts at program restructuring need to occur, I think, in order for the Faculty to achieve sustainable viability. The truly new program ideas are compelling and make sense to me. The ensuing process of their development will require equally compelling analyses of student demand aligned to "market" need, the latter term capaciously signifying all the career possibilities and lifelong learning that depend upon the learning outcomes and attributes which graduates of the Faculty's programs will possess. The existing programs of both units have been experiencing continued decline in application numbers and acceptances since 2009 for a suite of similar and different reasons, and one of my concerns is that program structure (design and length) may be a contributing factor.

Within the context of LA&PS and FGS, the 24-credit total, program length, course sequencing and programmatic regulations (electives outside the program, directed readings, colloquium, etc.) of the master's degrees of Geography were similar to those in other programs anchored in LA&PS. In its proposed new home, the context is now the 36-credit MES, with its individualized study plan and unique amount of faculty member supervision and mentorship, including 18 credits allowable of directed reading supervised by individual professors. Wonderfully, some of the 36 credits can be taken as experiential education (internships, placements). Suddenly, both programs will have new contexts with new optics to contend with as they engage in student recruitment. I have no crystal ball, and my comment arises in the context of the necessity for attentive and speedy analysis, once the new Faculty is launched.

The academic possibilities of the new Faculty – new programs, research, ORU involvement, etc. – are thrilling. I was one of the people who was precipitously giddy over the possibility of even *more* units and programs moving to form the new Faculty to educate a generation of students to address the emergency of environmental change. But the new Faculty rises or falls on, simply put, exponentially increasing enrolment quickly, mostly at the undergraduate level – necessarily at the undergraduate level, if it is to continue to invest in the academic-resource-intensive MES as the "backbone" of the Environmental unit in the Faculty.



The BA in Urbanization looks promising as a subject that hopefully will be as compelling to students as will be the possible 3+2 undergrad/grad degree fast track for those with A/A+ CGPAs. The proposed learning outcomes of a 3+2 degree structure will need to be articulated in light of those provided for an Honours and Specialised Honours in the same discipline. What are the outcomes of the "3," which could be interpreted as tantamount to a 90-credit BA, such that with an A/A+ one is ready for the graduate-level "2"? Is one more ready than someone with a Specialised Honours or Honours or simply differently so for the graduate planning degree?

I appreciate the revised Faculty organization chart with, amongst other alterations, a GPD for Geography and Environmental [Studies]. Truly a super-person will fill the AD Research, Grad, International role, given that, based on both units currently, the new Faculty will be a powerhouse of research production, strongly involved in bi-directional internationalization, and with graduate programs of many moving parts. Similarly, I appreciate very much the proposed Interim Council and its tasks of continued planning as well as streamlining the governance structure of committees in the Faculty. The Pedagogy, Standards, and Awards committee will be a very busy one.

Regarding the Administrative Principles Guiding Implementation, FGS will be able to help, particularly in light of 7 and 8. I know relatively well the history and circumstances in response to which FES developed a type of mini-FGS of in-house graduate administrative services and an unique relationship with the Registrar's Office, all of which were understood at the time as necessary to support FES's graduate (and undergraduate) pedagogical model. The SHARP budget model is not the only driver, however, of the necessity of reducing administrative duplication. Since Faculties invest in certain centralized services as a function of the University's organization, facilitated by the budget model, they must demand the type, quality, and level of service that they require for their programs. For example, during the time of the interim Council for the new Faculty, FGS will be developing with the Registrar's Office, UIT, and OIPA a new student dashboard for all graduate programs to keep abreast of student progress, achievement of milestones, leaves of absence – in a phrase, all the events of the academic program life cycle – which will integrate with the new Student Information Service, when it arrives. The dashboard and new SIS will help Faculties with efficient administrative services shared effectively.

Given the dramatic increase in enrollment growth and prudent fiscal sustainability that this Faculty requires for future viability, then success, I worry that as a letter of support, this one is a bit of a wet blanket, which feels uncomfortable; no one likes it. But it's still a blanket, which can't but warm up and dry out eventually. I remain committed to the new Faculty's success.

Best Regards,

Thomas Loebel, PhD Dean & AVP Graduate, York University



FACULTY OF HEALTH

Office of the Dean

4700 Keele St. Toronto Ontario Canada M3J 1P3 Tel 416 736 5031 Fax 416 736 5760 healthdn@yorku.ca www.health.yorku.ca September 26, 2019

Alice Hovorka Dean and Professor Faculty of Environmental Studies York University

Dear Dean Hovorka:

Re: Establishment of a new Faculty of Urban and Environmental Change

Thank you for the invitation to comment on the proposal to create a new Faculty of Urban and Environmental Change. On behalf of my colleagues in the Faculty of Health, I am delighted to offer our enthusiastic and unequivocal support. This is a wonderful opportunity to build upon the impressive legacies of two academic units by creating new synergy and opportunities. We have no doubt that it will provide a solid foundation to address urbanization and environmental changes, two of the most profoundly important challenges of our time. The proposal nicely aligns with and advances the University mission and Academic Plan.

Congratulation on your ability to engage and consolidate the important views of multiple stakeholders. Reaching consensus in a manner which both respects the past but also creates a distinctive and value-added future is extremely difficult. All those involved should be highly commended. Your hard work and perseverance have created a coherent plan filled with possibilities.

Concerns about undergraduate enrolments left me increasingly concerned about the financial sustainability of Environmental Studies and Geography. Given all our many fiscal challenges, a student to faculty ratio more than 30% below the University average, and an UG to graduate student ratio of less than 2 to 1 is not sustainable. That said, I also could not imagine York University without a strong presence in environmental studies, urbanization, and geography, particularly at this important moment in human history. I am greatly relieved that your plan creates potential to grow your academic and research impact within a fiscally sustainable framework. While creating a bold new consolidated Faculty comes with some risk and uncertainty, it is my opinion that maintaining the status quo would represent a greater risk, and a lost opportunity for York to revitalize its impact in profoundly important fields.

If I had one disappointment is it that your current plan says very little about the opportunity to grow greater connections between the new Faculty and the Faculty of Health. Our mission is to improve human health, health equity, health care, and wellbeing. We recognize that physical, social, cultural and economic environments and geographic locations are profoundly important determinants of health, health equity and wellbeing. Therefore, we urgently need a new generation of people, partners, and ideas which utilize this broader understanding of the relationship between health and

the environment. Our disappointment that your proposal does not include more links to Health is <u>not</u> a criticism. We recognize all effective plans must start somewhere and that it may be unwise to do too much too soon. Rather, our disappointment is an indicator of your new Faculty's future potential. It says something important about your proposal when others are already lining up to work with you. We believe your proposal lays a foundation which leaves the door open to working more closely with us to jointly develop new educational and research products in the future. In the interim, please let me know if there are ways we can support you and your colleagues as you launch this exciting new venture.

Sincerely,

time

Paul McDonald, PhD, FRSPH, FCAHS Professor and Dean





204 Bergeron Centre for Engineering Excellence 11 Arboretum Lane | Toronto | Canada | M3J 1P3

то:	Alice J. Hovorka, Dean, Faculty of Environmental Studies
FROM:	Jane Goodyer, Dean, Lassonde School of Engineering
SUBJECT:	Proposal for the Creation of a Faculty of Urban & Environmental Change
DATE:	September 30th, 2019

It gives me great pleasure to offer my support for the creation of the Faculty of Urban and Environmental Change at York University. The creation of this new Faculty is a significant step in the expansion and alignment of programming and resources offered at the institution to tackle two pressing challenges facing people and the planet: environmental change and urbanization. York is well positioned to be an international leader in these areas.

In particular, the five underlying outcomes for the creation of the new Faculty are grounded in creating linkages, synergies and knowledge mobilization between Research, and Teaching and Learning across the boundaries that comprise the critical and innovative urban, environmental, and geographic knowledge and skills in pursuit of sustainability and justice. Within this space, values centered on citizenship, activism, rights, diversity and inclusivity and respect are foundational in creating a space for interdisciplinary, field based and experiential learning, community engagement, and global perspectives to thrive.

The proposed governance structure is grounded in collegial decision making with a clear pathway laid out for interim and permanent Council oversight. At the same time, the implementation plan is thoughtful and clearly articulates the overarching goals guiding implementation and the administrative principles being adopted to achieve implementation seem reasonable. Thoughtful consideration has been made with respect to aligning resources with academic priorities within the new Faculty, and across related and interdisciplinary areas in the University.

In conclusion, I am pleased to offer my support for the creation of this new Faculty and look forward to future partnerships and collaborations in support of our students, faculty and community at large.



September 30, 2019

FACULTY OF SCIENCE Re: Letter of Support - Proposal for Faculty of Urban & Environmental Change

Office of the Dean

4700 KEELE ST. TORONTO ON CANADA M3J 1P3 T 416 736 5051 F 416 736 5950

scidean@yorku.ca science.yorku.ca Re. Letter of Support - Proposal for Faculty of Orban & Environmental C

Dear Dean Hovorka,

I have read the proposal to establish a Faculty of Urban & Environmental Change. The proposal is centered on bringing together scholars in Environmental Studies and Geography, and will revitalise the teaching and study of the environment, geography and urban studies at York University.

The Faculty of Science has collaborated with faculty members in Environmental Studies and the Lassonde School of Engineering to improve the curriculum in Environmental Science, and it will be an interdisciplinary program jointly administered by the three Faculties. In the past we have not succeeded in recruiting enough students to this program (in spite of a healthy demand) relative to other institutions. Underlying this was the existing fragmentation and confusion in environmental science programs spanning numerous Faculties. The new program is a consolidated, multiple pathway program and is being developed around issues of climate change, biodiversity conservation, and physical geography.

Former Dean Jayawardhana supported the motion in principle for the merger of Environmental Studies and Geography. My support for the formation of the Faculty of Urban & Environmental Change is in the same spirit expressed in his letter of May 31, 2017 to APPRC. Our understanding is that the Faculty of Science will remain engaged in shared science based programs and courses as a collaborative partner in managing the curriculum and delivery of courses.

I look forward to working with the academic leadership and faculty members in the new Faculty of Urban & Environmental Change on projects of joint interest to us both. With this mind, I am writing to endorse the establishment of the new Faculty of Urban and Environmental Change.

Sincerely,

EJ Janse van Rensburg Interim Dean, Faculty of Science





Monday, September 30, 2019

Dr. Alice Hovorka, Dean & Professor, Faculty of Environmental Studies

OFFICE OF THE VICE-PROVOST STUDENTS

N303 Bennett Centre For Student Services 4700 Keele St. Toronto Ontario Canada M3J 1P3 Tel 416 736 5955 Fax 416 736 5640 Faculty of Urban and Environmental Change - Letter of Support

The proposal to create this new Faculty represents a great deal of careful planning and consideration. The development of five exciting undergraduate programs, offering BA, BES and BSc options, with a range of experiential learning opportunities woven into the curriculum, pathways bridging undergraduate to graduate programs, degree to diploma studies, and academic studies to career outcomes, provides exciting ways for prospective and current students to prepare for success. Those involved in developing this proposal are to be commended for their leadership and innovation. Opportunities to establish a new Faculty are rare, and bold ideas such as those presented in this proposal are necessary.

This proposal lays out directions that will capture the imagination of prospective students and create opportunities for them to prepare for careers that align with their values and serve the public good. The five distinct undergraduate programs will provide entry points that will excite students and the ability for them to "mix and match" program options will support their desire to acquire career-ready knowledge and skills.

Students seek opportunities to lead meaningful lives but are also pragmatic when making choices of programs of study, partially influenced by their families. More than fifty percent of the population of the GTA were not born in Canada, and most came here to provide opportunities for their children to access higher education that will lead to meaningful careers.

Within this context, I would like to provide the following comments.

Throughout the proposal there are repeated references to urbanization, and it may be an option to consider the term in the title (such as Urbanization and The Environment). This aligns with the naming conventions of programs in other Canadian universities, such as McGill and Trent's, School of the Environment, or Waterloo's Faculty of Environment.

Urbanization, Sustainable Environmental Management and Environmental Science programs are self-explanatory within their titles and will attract student interest. The names of these programs are recognizable and heard daily in the news. Familiarity will help students gravitate towards these programs.



Urban Geography presents exciting and important approaches to studying and understanding the rapidly changing world. The four thematic areas provide students with a clear understanding of what this program entails.

Like Urban Geography, Environmental Arts and Justice may be less familiar as an area of study or in its connection to a career, but will be attractive to a specific cohort of student.

Experiential Learning

We are excited to see the extensive experiential learning opportunities woven throughout the undergraduate programs, critical for transformational learning. From field courses, community-based projects, placements, internships to global options, the opportunities presented in this proposal will enrich and support student learning. Our experience informs us that when these experiential learning opportunities are integrated into the curriculum, students expect and plan for their participation. When explicitly part of the curriculum, participation in these experiences increase dramatically. For example, where a mobility opportunity (academic or field course) is part of the degree pathway, with the necessary alignment facilitated within the curriculum (such as transfer credit), students pursuing this option can easily navigate their participation.

BA/MES, Undergraduate Dual Credential Programs, Certificates

The opportunities, such as the 3+2 option presented in the BA in Urbanization to the MES, or the 3+2 or 3+1 dual credential program with the Colleges, and undergraduate certificates provide breadth and the important guided pathways for students. As noted in our comments regarded experiential learning, opportunities embedded within the curriculum or pre-arranged pathway and certificate options allow and support seamless transitions throughout a student's studies, expanding student options and participation.

Entrepreneurship

Entrepreneurship is captured in the proposal in the Research section. The Faculty may wish to consider a stronger focus on entrepreneurship within curricular opportunities and place it for consideration in the section addressing the cross-cutting approaches of: interdisciplinarity, field-based and experiential learning, community engagement, and global perspectives.

Recruitment

We support the many approaches to recruitment, both direct (OUF, High School Fairs) and indirect through participation and sponsorship of significant eco-conferences, lecture series and workshops. We would want to also work closely with the Faculty to consider the interests of these new programs for international students and find unique opportunities to highlight them.

This past weekend York was present at the Ontario Universities Fair where some 80,000 visitors attend to learn about the opportunities available at all Ontario universities. They visit each university booth to seek program-specific detailed information and compare what distinguishes one university's offering from another. The exciting opportunities presented in this proposal will offer the components which students and their parents enquired about: excellence in teaching, research opportunities, a student-centered approach, experiential learning and career pathways.

Thank you for the opportunity to provide comments.

tour

Lucy Fromowitz Vice-Provost, Students



OFFICE OF THE VICE-PRESIDENT, RESEARCH & INNOVATION

904 KANEFF TOWER 4700 KEELE ST TORONTO ON CANADA M3J 1P3 T 416 736-5479 F 416 736-5512 vpri@yorku.ca www.yorku.ca/research September 30, 2019

Dr. Alice J. Hovorka Dean & Professor Faculty of Environmental Studies York University

Dear Alice,

Re: Faculty of Urban & Environmental Change

It is with pleasure that I offer my enthusiastic support for the proposed Faculty of Urban & Environmental Change, an inspiring new Faculty bringing together scholars from Geography and Environmental Studies in a united entity that will build upon existing synergies and excellence in the pursuit of sustainability and justice.

Building on a rich tradition of research excellence, this new Faculty will offer distinctively global perspectives by consolidating a critical mass of prominent scholars that will address the interconnected but diverse challenges of environmental change and urbanization. By taking on a highly collaborative and interdisciplinary approach, this new Faculty will most certainly amplify our existing research, scholarly and creative strengths and help to further broaden and accelerate our research impact through its well-established research clusters and stakeholder networks for knowledge mobilization and partnerships.

Further, the depth and breadth of the research that will be conducted in the Faculty of Urban & Environmental Change is very well aligned with York's Strategic Research Plan (2018-2023) and strongly advances several of the thematic areas -- notably, research that advances critical inquiry and scientific discovery in the areas of:

- Environmental change, urbanization, sustainability and justice (Forging a Just and Equitable World);
- Health (Building Healthy Lives, Communities and Environments);
- The arts and performance (Analyzing Cultures and Mobilizing Creativity);
- Economics, labour market transformations (*Integrating Entrepreneurial Innovation and the Pubic Good*); and
- Biophysical sciences (*Exploring and Interrogating the Frontiers of Science and Technology*).

This proposed Faculty will undertake an engaged learning approach offering fieldbased experiential education and training as well as hands-on research, allowing for a rich learning environment for our students. This will be further augmented through expanded Indigenous curricular offerings, land-based learning and Indigenous knowledges, perspectives and experiences. Moreover, supporting, enhancing and facilitating Indigenous research and Indigenous ways of knowing further affirms our commitment to enabling research in an Indigenous context, as emphasized within our Strategic Research Plan.

I am very encouraged and excited by the potential of the proposed Faculty of Urban & Environmental Change – both the impact created by the research synergies as well as the high-quality learning opportunities emerging from the new curricular approaches.

I would advocate for the full support of this proposal.

Yours sincerely,

Rui Wang, MD, PhD, FAHA Interim Vice-President Research and Innovation





YORK UNIVERSITY LIBRARIES

Office of the Dean

516 Scott Library 4700 Keele Street Toronto ON Canada M3J 1P3 Tel 416 736 5601 Fax 416 736 5451 www.library.yorku.ca October 2, 2019

Dr. Alice J. Hovorka Dean Faculty of Environmental Studies York University

Dear Dr. Hovorka,

As Dean of Libraries, I am very pleased to provide a letter of support for the proposed Faculty of Urban and Environmental Change. The Libraries have a strong record of enabling access and discovery to rich data and resources for scholarship and teaching in these areas, and providing user focused spaces and services to support students and faculty in their academic pursuits. The Libraries are also longstanding campus partners in supporting the dissemination and discovery of campus research, which will provide global exposure to the work of the faculty.

We look forward to building upon our past close partnerships and working with the proposed new Faculty of Urban and Environmental Change to realize its aspirations of being "...an international leader of critical and innovative urban, environmental, and geographic knowledge and skills in pursuit of sustainability and justice".

We are well-positioned to support this collaborative initiative of the Department of Geography and the Faculty of Environmental Studies. The Libraries recently engaged in extensive restructuring that will enable us to continue to provide excellent collections and instructional support, while better leveraging the Libraries' deep expertise and infrastructure in anticipation of emerging needs in key areas such as open education, data management and data visualization. Our Digital Scholarship Centre, and in particular our specialists in GIS and digital scholarship methods are available as a resource for teaching critical digital literacies in support of the work of the faculty.

Sincerely,

Joy "ii

Joy Kirchner Dean of Libraries





GLENDON COLLEGE

COLLÈGE UNIVERSITAIRE

GLENDON

Principal

Bureau du

2275 BAYVIEW AVE.

CANADA M4N 3M6

T/T 416 487 6727

F/T 416 487 6786

principal@glendon.yorku.ca www.glendon.yorku.ca

TORONTO ON

Principal

Office of the

U NIVERSITÉ U NIVERSITY

Y O R K

October 4, 2019

Re. Faculty of Urban and Environmental Change

It is with pleasure and enthusiasm that we support the proposal for the creation of a Faculty of Urban and Environmental Change. The project aligns clearly with the priorities and the values of the University Plan and Strategic Research Plan. It allows for a progressive partnership between various internal and external stakeholders to engage in what is expected of a 21st century University in the domain of cities and environmental change.

We agree with the proponents that the new Faculty will enhance academic excellence, facilitate and encourage interdisciplinary, provide enhanced opportunities for experiential education, foster community engagement, and encourage global perspectives. The proposed programs and avenues of research provide for a coherent and well-integrated course of action that will maximize employability, innovation and globally-recognized graduate skills.

The pressing nature and scale of the problems facing our cities, local and global environments provide an imperative for world-class researchers to respond in a more systematic and ambitious manner than has historically been the case. The creation of the Faculty responds to this challenge by designing a cross-discipline curriculum at the university level that explores cities as integrated socio-technical systems and mobilizes an innovative and ambitious trans-disciplinary research agenda that addresses urban and environmental challenges globally. Finally, the new Faculty develops new routes to degrees and new forms of access.

We are fully engaged in the development of the new BSc in Environmental Science; Glendon campus situated on an 85-hectare park is well-positioned for active participation in this program. We also believe that the creation of this new Faculty will provide multiple other opportunities for academic and research collaboration between Glendon and this new entity.

We believe that the proponents of the project have put forward a strong and clear vision. Noting the work that still lies ahead, we look forward to that vision coming to fruition.

Sincerely,

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Ian Roberge Co-Interim Principal, Glendon Campus

Dominique Scheffel-Dunand Co-Interim Principal, Glendon Campus

Academic Standards Curriculum and Pedagogy Committee of Senate Special Sub-Committee on New Faculty Curriculum

Record of Consultation

Date	Tuesday, August 13, 2019
Attendees	Sarah Bay-Cheng, Dean, AMPD Andrea Davis, Chair, Humanities (LA&PS) Leslie Sanders, University Professor, Humanities
Sub-Committee Members	Kim Michasiw, Chair of ASCP, Chair Alice Hovorka, Dean FES Alice Pitt, Vice-Provost Academic Tarmo Remmel, Co-Coordinator (Geography) Robert Everett, Secretary

Overall Focus of the Consultation

Participants were provided with a three-page overview of a proposed Bachelor of Arts in Environmental Arts and Justice. It is currently conceived as a minor but which may evolve. AMPD and Humanities courses are listed among the those satisfying requirements for the extant Certificate in Cultural and Artistic Practices for Environmental and Social Justice, although enrolments are not strong. Colleagues from Humanities described the nature and thrust of a major curriculum review under way, one which may result in re-naming the Department itself and which is likely to have a public humanities dimension. Culture and Expression will be a driver.

The new Faculty's proponents described a critical mass of scholars who identify strongly with artistic praxis even if enrolments have not matched with this cohort. For them, the ordering of words in the name of the proposed minor reflects their commitment to cultural production, an aspect of scholarship that others are embedding in the curriculum.

There was a consensus that curriculum development must not result in competition or confusion for students. It is essential that no harm to reputation follow from curriculum reforms.

Specific Matters Addressed

Among the points that emerged were the following:

 it is imperative to provide students with a clear sense of the options available to them at York

- streams and programs be distinctive even when there is some curriculum in common
- as in other forms of collaboration discussed during this round of consultations, it was noted that MOUs can pave the way to appropriate resource sharing
- AMPD students have shown little interest in the current Certificate and it is also not clear how much the Faculty could contribute to collaborative programs
- collaborative options could include partnerships, shared core curriculum, crosslistings and the like
- the term media, used in the new Faculty curriculum overview, is a contested term and further discussion would be appropriate; the language of "hands on artistic creation" also needs greater clarity
- there is an emphasis on racism in the draft proposal; proponents should be aware that a focus on racism has been widely adopted by others at the University and needs to be developed with sensitivity to this

Outcomes and Further Steps

It was agreed that there should be sustained conversations about the curriculum given different mandates / shared interests and need to obviate risks associated with duplication and competition.

Colleagues from Humanities will provide additional information to the FES-Geography working group about the streams they are contemplating. Dean Bay-Cheng will forward the three-page overview to AMPD chairs in the first instance to provide feedback. It would be beneficial to invite an AMPD colleague to participate in discussions (a step that could lead to a smaller representative group to explore opportunities and issues).

By way of a follow up and in anticipation of a second round of consultations in September, the Sub-Committee itself will issue an open call to those interested in the broad topic areas covered by the minor.

Record of Consultation

Date	Wednesday, July 10, 2019
Attendees	Linda Peake, Director, The CITY Institute
Sub-Committee Members	Kim Michasiw, Chair of ASCP, Chair Liette Gilbert, Co-Coordinator (FES) Philip Kelly, Chair Geography Alice Pitt, Vice-Provost Academic Tarmo Remmel, Co-Coordinator (Geography) Robert Everett, Secretary

Summary

This meeting marked the first formal consultation involving The CITY Institute, but the Director is expecting to explore opportunities with the Dean of FES soon. In particular, the creation of a new Faculty has the potential to enhance urban research at York. In reciprocal fashion, it would also augment CITY's profile.

All of Toronto's downtown universities are organizing to capitalize on their urban expertise:

- the University of Toronto has recently established its university-wide School of Cities, and has a Presidential Advisor on Urban Engagement
- Ryerson University has added to its School of Urban and Regional Planning with a number of proliferating research centers: the Centre for Urban Energy, Centre for Urban Research and Land Development, Ryerson City Building Institute, and Ryerson Urban Water
- OCADu has a new focus on the urban in its Environmental Design program.

Yet there remain considerable opportunities for York, which already possesses a strong international reputation. The new Faculty that will emerge at York through the amalgamation of FES and the Department of Geography is York's opportunity to enhance its urban profile. Participants also discussed specific curriculum possibilities, such as a BA / BSc combination.

Professor Peake described the evolution of The CITY Institute and its aspirations to widen membership. She also stressed the value of research – along with experiential education -- that supports and complements undergraduate and graduate teaching and learning.

Further and Next Steps

The Sub-Committee will re-engage with those consulted in September, and the Director will be invited to participate at that time.

This record of consultation will be forwarded to the FES-Geography curriculum working group, shared with CITY, and posted on the Sub-Committee's Website.

Record of Consultation

Date	Monday, September 16, 2019
Attendees	Merle Jacobs, Equity Studies
Sub-Committee Members	Kim Michasiw, Chair of ASCP, Chair Liette Gilbert, Co-Coordinator (FES) Alice Hovorka, Dean FES Alice Pitt, Vice-Provost Academic Robert Everett, Secretary

Dean Hovorka provided an overview of the flagship program proposals in development with an emphasis on the incorporation of equity into the curriculum. Equity will be tied to the new Faculty's mission and values. FES currently offers a course on Human Rights and Public Space and has, along with other units and programs, an interest in bringing equity more fully into the curriculum

Professor Jacobs described the successful efforts of Equity Studies to re-focus the curriculum around a limited set of in-house critical human rights courses in response to CPR recommendations and a sense that too many courses previously recognized for credit were not sufficiently oriented to the program's learning outcomes. A concern in this regard is the possibility that any new program might lead to the re-emergence of cross-listing or student requests for substitutions. Equity Studies does encourage students to do double majors.

It was agreed that the new Faculty and Equity Studies would explore opportunities for collaboration in the future. Curriculum design will be sensitive to the concerns expressed by Professor Jacobs.

Record of Consultation

Date	Tuesday, June 18, 2019
Attendees	Ruth Koleszar-Green, Co-Chair, Indigenous Council Bonita Lawrence, Chair of the Department of Equity Studies Coordinator of the Indigenous Studies Program
Sub-Committee Members	Kim Michasiw, Chair of ASCP, Chair Liette Gilbert, Co-Coordinator (FES) Alice Hovorka, Dean, Environmental Studies Joseph Mensah, Chair, Geography Alice Pitt, Vice-Provost Academic Tarmo Remmel, Co-Coordinator (Geography) Robert Everett, Secretary

Nature of the Consultation

This consultation was preliminary in nature, and provided the Sub-Committee with an opportunity to learn about the landscape for Indigenization, Indigenous Studies program in LA&PS, and processes as the new Faculty's proponents develop curriculum. There had been no formal consultations to date, but those designing the new Faculty have explicitly stated their intentions to advance Indigenization in partnership with others.

Process

An animating question turned on how to proceed mindfully, systematically, collaboratively and respectfully. To this it was answered that Indigenous people should not be tokenized or segmented. A well-rounded curriculum should enmesh given the responsibility of citizen-scholars to comprehend political, cultural and economic aspects in a deep engagement. A thoughtful approach is essential, and the conversation will necessarily be a lengthy and inclusive one. The Indigenous Council is taking up a proposal to have a curriculum sub-committee which, if established, would be a valuable aid. The Council itself is also a key resource, and will be able to provide ongoing advice.

Curriculum

Participants addressed many themes:

- the benefits that could flow from cooperation between the new Faculty and Indigenous Studies (<u>but</u> the importance of ensuring that Indigenous Studies thrives)
- land-based education
- an academic year that accommodates students who wish to participate in ceremonies
- the possibility of field schools and the desirability of a living lab on the Keele campus as part of working with the Indigenous Studies program
- the value of curriculum that focuses on the lived experiences of Indigenous peoples in urban settings (e.g. AP/INDG 3650 3.00 Urban Native Communities)
- placement opportunities for students and the opportunity to share resources
- individualized students with knowledge keepers and other ways of learning beyond the traditional university pedagogy
- the flexible Cross-Disciplinary Certificate in Indigenous Studies and its potential attractiveness to the new Faculty's students along with the other programs (Indigenous Studies offers a three-year BA, a minor, major minor, double major and Specialized Honours) – explicit linkages should be considered between the new Faculty and Indigenous Studies
- promotion of AP/ INDG 1050.6.0 Introduction to Indigenous Studies throughout the University

Outcomes and Next Steps

It was agreed that the new Faculty must not have a negative impact on Indigenous Studies. Opportunities for collaboration should be pursued.

The FES-Geography curriculum working group is preparing two-page overviews of innovative curriculum that will be highlighted in the proposal to establish the new Faculty that goes to Senate and the Board of Governors. These will be forwarded to Professor Ruth Koleszar-Green and Professor Lawrence for comment.

Proponents expressed their desire to connect with the Indigenous Council for ongoing advice and suggestions regarding curriculum and pedagogy.

The Sub-Committee is planning a second phase of consultations in September and will include the Indigenous Council in its canvassing.

Record of Consultation

Date	Tuesday, August 13,2019
Attendees	Gary Klaassen, Professor, Lassonde Neil Tandon, Professor, Lassonde Peter Taylor, Professor, Lassonde
Sub-Committee Members	Kim Michasiw, Chair of ASCP <i>Chair</i> Alice Hovorka, Dean, Environmental Studies Alice Pitt, Vice-Provost Academic Tarmo Remmel, Co-Coordinator (Geography) Robert Everett, Secretary

Focus of the Consultation

The discussion focused on curriculum reform in Lassonde (where a process of creating new streams in Climate Science, Atmospheric Science and Planetary Science is underway) and program proposals developed by colleagues in Environmental Studies and Geography. Colleagues from Lassonde described the nature of the re-visioning exercise and the broad thrust of the innovations under consideration.

A 2-page overview of a proposed Bachelor of Science in Environmental Science in the new Faculty was shared with participants. Climate Change is one of the streams in the proposed BSc. Its name was chosen to capture its nature in words familiar to prospective students.

Throughout the consultation there was an emphasis on the need to ensure curriculum coherence while projecting York's collective strengths.

Specific Topics

Among the matters discussed were the following:

- opportunities for collaboration arising from the curriculum of the new Faculty's intended BSc (which accentuates near-Earth climate change) and the strengths of EATS in upper atmospheric research and teaching
- the possibility of explicit pathways between degrees and streams
- the desirability of including field work in the curriculum
- the need to construct degree requirements that are not unduly onerous and permit students to explore other interests

 issues associated with Calculus requirements (along with the possibility of rematriating instruction within programs and other ways to address high failure rates and resulting withdrawals)

Outcomes and Further Steps

The following were among the key outcomes:

- there will be further consultations, facilitated by Dean Hovorka; Lassonde colleagues will provide more detail about the proposed Atmospheric Stream to the FES-Geography curriculum working group
- it could be enriching for students, and promote their mobility, for the streams to have some curriculum in common
- over a longer term, it is critical to have a focused conversation about Geomatics at York (there are currently three separate programs)
- the Vice-Provost Academic will provide advice on the legislative pathway to approval of the changes under consideration by colleagues in EATS

Record of Consultation

Date	Tuesday, July 16, 2019
Attendees	Jane Goodyer Dean Lassonde Alex Mills, Associate Dean, Science
Sub-Committee Members	Kim Michasiw, Chair of ASCP, Chair Liette Gilbert, Co-Coordinator (FES) Alice Hovorka, Dean FES Philip Kelly, Chair Geography Alice Pitt, Vice-Provost Academic Tarmo Remmel, Co-Coordinator (Geography) Robert Everett, Secretary

Focus of the Consultation

A wide-ranging discussion focused on potential curriculum synergies; specific programs in development (especially Environmental Science); emerging holistic approaches and methodologies that are orienting scholarship; curriculum reviews at Lassonde and Science that may impact on the new Faculty; and the desirability of enhancing student mobility and exposure to different ways of thinking about challenges and solutions.

Current State of Consultations

Although there were some initial concerns about ideas floated in the draft proposal of April, colleagues in Lassonde and Science have shown good will toward the new Faculty. It is widely recognized that York has the depth and breadth of expertise to be a global leader in environmental scholarship. There is an appetite among colleagues to participate in curriculum innovations. Territoriality should not be an issue; but it is imperative to develop programs that are distinctive and attractive. Consultation must be ongoing and predicated on ensuring that programs are well aligned even if not offered in concert.

Curriculum Reviews and Reforms

Weak enrolments have resulted in reviews of the programs in Earth and Atmospheric Science (EATS) and Environmental Biology. Colleagues in EATS are working toward finalizing their recommendations by the early autumn. Reflections on Environmental Biology have begun with focused deliberations now underway.

Principles

The following were among the principles cited as the new Faculty takes shape and other programs are revised:

- York has strengths across a wide spectrum of environmental studies science, engineering, policy, law, communications and students should have opportunities to pursue a variety of interests
- at the same time, it would be beneficial to have a defining focus (for Queen's it is water, for Guelph food); at York might it be *populations*?
- many students have both a science and liberal arts bent, and universities that have developed programs have seen positive results; there are many ways of catering to this, including major/minors along with certificates and diplomas, especially if they impart credentials; a consensus has formed around straight forward Honours degree programs that create the space to take more courses outside of the major
- York should aim for international prowess, and see global urbanization as a major focal point
- student mobility should be a priority, and it is essential to learn from students by tapping into their experiences
- curriculum planners should be aware of new, holistic approaches informing research and pedagogy, including Systems Analysis/Assessment, Systems Thinking and (Sustainability) Transition Studies
- students have expressed interest in gaining the tools necessary to make positive changes while preparing for careers, and this must be kept in mind

Outcomes and Further Steps

In the weeks ahead the specific curriculum proposals will be refined to add in evidencebased need and demand analysis. The curriculum working group will circle back to those who have discussed partnerships (e.g. a joint program with Urban Studies has been mooted). There will be assistance from the Provost's Office and Teaching Commons in drafting formal proposal briefs. It will be essential to map out the legislative process for each proposal, for some will be wholly new and require approval right up to the Quality Council stage while others are major modifications.

It was agreed that there needs to be an ongoing dialogue to explore new opportunities for collaboration and avoid harm. The Sub-Committee is planning a second round of consultations in September and will invite Lassonde and Science to return to the table at that time. This record of consultation will be shared with the FES-Geography curriculum working group and forwarded to Dean Goodyer and Associate Dean Mills.

Record of Consultation

Date	Thursday, May 30, 2019
Unit and Programs	School of Administrative Studies Disaster and Emergency Management
Attendees	Adriano Solis, Director, School of Administrative Studies Marcela Porporato, UPD, SAS Nelson Waweru, incoming Director, SAS Cristobal Sanchez-Rodriguez, incoming UPD, SAS Aaida Mamuji, Area Coordinator, Disaster & Emergency Management Jack Rozdilsky, incoming GPD, Disaster & Emergency Management Eric Kennedy, Faculty Member, Disaster and Emergency Management
Sub-Committee Members	Kim Michasiw, Chair of ASCP, Chair Alice Horvoka, Dean, FES Alice Pitt, Vice-Provost Academic Tarmo Remmel, Co-Coordinator (Geography) Robert Everett, Secretary

Perspectives on Opportunities

It was stressed at the outset and thereafter that the possibilities identified in the draft establishment proposal circulated in April were essentially placeholders that neither prescribed or precluded innovations. Colleagues in FES and Geography are keen to further explore and begin to refine ideas in an ongoing dialogue and the curriculum design phase. Out of the conversation emerged a set of options for collaboration between the new Faculty between the School of Administrative and the undergraduate and graduate programs of Disaster and Emergency Management. Shared interests and potential cross-Faculty synergies point to an array of possibilities:

- Double major and major / minor combinations (with distinctive descriptors)
- Certificates
- Single courses that may serve multiple programs
- Concentrations or streams that draw upon courses offered in the new Faculty and DEM
- Cooperative capstone, experiential and field work courses
- Program ladders, such as 4+1 or 3+2 pathways to graduate studies
- Areas in which strengths can be combined (such as policy or management)

Members of the Sub-Committee acknowledged concerns expressed by the School and program, and gave assurances that the new Faculty's collaborative dimensions will be

wholly predicated on collegiality and respect. Entrepreneurship was referenced in the draft proposal, and participants worked toward an understanding of what that might entail. For example, SAS may contribute by a module that could be adapted to suit a number of programs at York that seek to provide students with skills.

Other Matters to be Addressed

The Sub-Committee agreed to the suggestion that it should be clearer about the goal of consultation sessions.

Regarding complement planning, there may be possibilities for cross appointments that enrich the curriculum and research cultures.

It was felt that there may be significant returns on a joint recruitment strategy and that student mobility should be promoted. Many students believe that many York programs do not lead to employment and accreditation. This misperception needs to be addressed and corrected, not least since FES, SAS and DEM have accredited courses of study.

Outcomes and Next Steps

It was understood that some initiatives may be pursued in the short-term while others would be taken up in a longer time frame. The proposal that comes to the Senate and the Board will highlight signature curriculum and other innovations given shape on a relatively fast track but may also identify modifications and innovations that are at a less advanced stage.

Colleagues from DEM will reflect on opportunities of the kind mooted at the meeting at a mid-June program meeting, and provide the Sub-Committee with a sense of the ideas that should be pursued.

DEM will nominate an individual to liaise with the Sub-Committee. The Sub-Committee will provide the FES-Geography working group with a record of the meeting.

Documentation on degree ladders will be shared with DEM and others involved in consultations that may lead to 4+1 or 2+3 models. Participants also discussed collaborations in the SHARP budget model context, and learned that the Provost's Office continues work on a framework for sharing costs and revenues. Discussion raised the distinction between SHARP as a shadow model of how teaching (primarily undergraduate) that occurs as dedicated service or general/elective education cost sharing and the capacity to create new arrangements with cost-sharing and shared administrative elements

The Sub-Committee will re-engage with the School and Program in September, and will respond promptly to requests for assistance before then. Members thanked colleagues from SAS and DEM for positive and productive contributions.

Record of Consultation

Date	Wednesday, June 12, 2019
Unit	School of Public Policy and Administration (SPPA)
Attendees	Alena Kimakova, Director Joanne Magee, Undergraduate Program Director
Sub-Committee Members	Kim Michasiw, Chair of ASCP, Chair Liette Gilbert, Co-Coordinator (FES) Alice Pitt, Vice-Provost Academic Tarmo Remmel, Co-Coordinator (Geography) Robert Everett, Secretary

Perspectives

The discussion opened with general impressions of the initiative and elements of the draft proposal circulated in April. SPPA is grateful for opportunities to consult on initiatives that touch on aspects of its curriculum and is open to exploring opportunities for collaboration. The School does not have strength in Environmental Policy *per se* but can imagine welcoming students from the new Faculty who wish to round off their education with generalist curriculum or courses in the areas of public administration, public policy and law that would complement interests.

The FES-Geography curriculum working group is currently focusing on five themes – which could be organized around streams or majors. The School's Director and Undergraduate Program Director offered advice based on recent experience. For example, it was noted that it can prove difficult to move from streams to degree programs (due to regulatory and administrative burdens of different degree programs, student retention when changing program v. changing streams within a program). However, it is possible to have streams included on the OUAC application forms for 101s and 105s. Too much choice in degree programs can lead to confusion and reduce retention rates. The ability to profile a suite of diverse streams has proven advantageous.

The SPPA undergraduate program – the Bachelor of Public Administration (BPA) - is structured in ways that encourage students to declare their stream early in order to track progress, but maximizes flexibility by having a common core curriculum for the first two years of study and making changes to the selection of stream easy for students. It was suggested that the new Faculty not have a major GPA, which is currently quite difficult to monitor. PPA courses are constructed on functional lines. Courses fill early but it is possible that space could be reserved for students from the new Faculty. Twenty-four

credit certificates are popular with non-PPA students, and could accommodate students from the new Faculty. There could also be articulation with the thirty-six credit minor in public administration.

On the graduate side, 1-2 students could be accommodated in courses under the GS/PPAL rubric, which is part of the Master of Public Policy, Administration and Law (MPPAL) program.

Participants discussed aspects of the School's expertise in refugee and migration studies and its course offerings. This is a focus in FES and Geography (along with other units and programs) and suggested opportunity for cooperation.

As proponents work on academic standards at the graduate level, the Director and UPD commented that narrative evaluation (i.e. variations on pass/fail grading) would not be appropriate to the MPPAL for reasons specific to the program and as a general proposition.

Undergraduate students benefit greatly from structured networking with graduate students, alumni and professionals who offer practical advice and motivational leadership. Similarly, experiential learning, placements and courses with an explicit professional orientation are rewarding for students and conducive to the School's mission and values.

One successful way of promoting certificate enrolment is to identify and contact students who have selected courses that put them on a path to attain the requirements. Generally speaking, students are more interested in certificates that are different in their subject area foci yet closely relate to their degree programs.

Outcomes and Next Steps

At the meeting's conclusion, the Chair noted that the curriculum working group might make special note of the utility of minors and certificates as they design the overall curriculum schema. Co-ops and experiential education (the latter associated with priorities highlighted in the UAP and Strategic Mandate Agreements) should be built into the new Faculty curriculum. It was noted that Glendon and Health have policy-oriented curriculum. In this light the working group should review offerings there with a view to assessing opportunities

Participants from the School expressed a desire to remain engaged and it was agreed that the Sub-Committee will invite the Director and others to return for further discussion in September at which point curriculum proposals will be further refined.

The record of consultation will be forwarded with the FES-Geography curriculum working group, shared with Professors Kimakova and Magee, and posted on the Sub-Committee's Website.

In a more general vein, discussants observed the following:

- it would be appropriate to review the University's migration and refugee-themed curriculum in a wide context.
- students should be made aware of offerings in other Faculties that complement or extend their interests.

Record of Consultation

Date	Wednesday, June 12, 2019
Unit and Programs	Department of Social Science and constituent programs
Attendees	Amanda Glasbeck, Chair Uwa Idemudia (Current IDS Coordinator, Incoming Chair of SOSC) Doug Young (Coordinator, Urban Studies) Viviana Patroni (GPD, Development Studies) Mark Peacock (UPD and Incoming Coordinator, BUSO) Jay Goulding (Social Science Executive)
Sub-Committee Members	Kim Michasiw, Chair of ASCP, Chair Liette Gilbert, Co-Coordinator (FES) Alice Horvoka, Dean, Environmental Studies Alice Pitt, Vice-Provost Academic Tarmo Remmel, Co-Coordinator (Geography) Robert Everett, Secretary

Status of the April Proposal / Consultation History

The meeting began with clarifications about the status of the draft proposal circulated for feedback in April (which contained preliminary ideas about curriculum intended to stimulate thinking and open channels) and the history of consultations with the Department and its constituent programs. Past consultations had been both formal and informal in nature. They subsided abruptly and were inconclusive. It was somewhat surprising to colleagues to see that the proposal referenced possibilities that directly or indirectly impacted on Social Science activities and plans. Proponents confirmed that the draft proposal neither prescribed partnerships nor precluded other possibilities. Dean Hovorka stressed that the narrative has evolved from asking programs about their interest in joining the new Faculty to emphasizing opportunities for collaboration. Participants at the meeting had access to a "menu of options" that emerged from discussions with the School of Administrative Studies / Disaster and Emergency Management illustrating a range of possibilities – not exhaustive and not necessarily applicable in all situations - and this helped formed a backdrop as the meeting progressed. Colleagues in Social Science reiterated their commitment to the integrity of the current array of programs in the Department. There are already many curricular affinities and collegial interactions between Social Science and the new Faculty (crosslistings, summer courses, courses on extended lists, supervision, teaching and research) upon which to build relationships.

The Evolving Curriculum Context

The discussion touched on a variety of topics relevant to curriculum planners:

- the Provost's Office is in the process of developing a new inter-Faculty framework for funding and administrative arrangements that will facilitate cooperation within the SHARP model
- in general, there need to be focused conversations aimed at greater clarity for students along with facilitation of the kind of mobility that permits them to explore a rich, pan-University curriculum

One way to imagine the overall curriculum structure and relationship between programs is an evolving series of clearly marked pathways that foster mobility and collaboration.

Focus on International Development Studies / Development Studies

Social Science is home to both an undergraduate and graduate degree. FES has a dual credential degree program in conjunction with Humber (although there are no current enrolments). Proponents of the new Faculty also place an accent on Global dimensions. Participants discussed how they might collaborate as a PhD program proposal emerging from Social Science. This resulted in agreement that there should be a focused, sustained discussion aimed at greater clarity of role and non-competition. It was suggested that it would be helpful to think in terms of pathways.

Focus on Business and Society

BUSO currently has an Environment Stream that relies almost exclusively on FES courses. The most recent CPR included a closure recommendation due to insufficient enrolments and curriculum deficiency. Faculty members attached to BUSO are, however, unwilling to abandon the stream and are willing to develop in house curriculum to sustain it. Even so, the stream could only prosper in cooperation with FES and BUSO, suggesting a timely moment for deeper conversations. BUSO has a well-developed practicum network that could encompass an eco-dimension. It was also suggested the new Faculty and BUSO consider major-minor combinations, service courses, multiple entry points to programs, and other connections.

Focus on Urban Studies

There will be a concentration of urbanists in the new Faculty, and there are worries about overlap, duplication and confusion among students. Bringing together urbanists in the new Faculty will stimulate interest in new programs and streams within the new Faculty and the urban at York more broadly. From the standpoint of Urban Studies, a recent curriculum refresh (for example, all new courses have Urban in their title) has revitalized interest. These and other facets argue in favour of a portal concept rather than integration into the new Faculty. The following may be germane as consultations unfold:

- development of joint programming
- laddering degrees (a number of Urban Studies graduates already pursue higher degrees in FES and Geography)
- cluster hires
- purpose-build shared courses
- alignment of existing course offerings and resources

It was agreed that the program and new Faculty curriculum designers would explore scenarios. There was also agreement on how certain areas might be apportioned.

Outcomes and Next Steps

Urbanists should form a table at which ideas about ramping up this interdisciplinary area can be further developed. In the meantime, the FES-Geography curriculum working group can continue its development of ideas regarding urban planning, urban environments, global and the like. The discussions will be long term in nature but should be continuous. One question to be resolved is resource balancing and how the complement can be deployed with greater effectiveness.

It is expected that discussions involving BUSO will be scheduled for the autumn of 2019 and with IDS in 2019-2020.

Since strengthening and profiling the "Urban @ York" is a shared priority, planners should seek institutional backing for collegial efforts.

The Sub-Committee extended an invitation to Social Science colleagues to renew discussions when a proposal for the establishment of the new Faculty is refined (September). This was readily accepted.

Social Science agreed to designate a point person, likely the Chair, for liaison with the Sub-Committee.

Record of Consultation (Follow-Up Meeting)

Date	Wednesday, September 18, 2019
Attendees	Sarah Bay-Cheng, Dean, AMPD Leslie Sanders, University Professor, Humanities
Sub-Committee Members	Kim Michasiw, Chair of ASCP, Chair Alice Hovorka, Dean FES Alice Pitt, Vice-Provost Academic Tarmo Remmel, Co-Coordinator (Geography) Robert Everett, Secretary

As the follow-up consultation meeting opened, Dean Hovorka provided an update on developments as the formal proposal nears completion. A focus for the meeting was on the Environmental Arts and Justice proposal, but the conversation ranged over other matters including possibilities for the kind of collaboration that could result in a unique orientation and profile for the new Faculty and York. Further work on program proposals, including consultations, will be conducted in the autumn with a view toward meeting the January – February window for Senate approval. The new Faculty remains very much open to cooperation on programs and courses.

Dean Bay-Cheng provided feedback from AMPD chairs on the program, and relayed concerns about over-promising on the curriculum and misleading students about their learning outcomes ("professional artist" would not be among them, for example). Chairs were also concerned about duplication; but it was reported that AMPD is searching for appointees in community-based arts practice and computation art. These colleagues may be in a position to enrich the new Faculty's offerings

With all that is happening in the autumn, consultation time lines may be daunting. One possibility is for AMPD and Humanities individuals to be at the working group table. In general, there are anxieties about resources, but there are ways to address them (such as MOUs on equitable sharing).

Professor Sanders advised that Humanities had recently approved a departmental "makeover" (although there is still work to be done). Humanities will continue to feature cultural production through class room pedagogy and experiential education. Documentation will be shared with the new Faculty's curriculum designers.

It was agreed that three-way consultations would be scheduled. Proponents were encouraged to think of what makes related programs distinctive but also how they can contribute to a broader curriculum milieu.

Record of Consultation (Follow-Up Meeting)

Date	Monday, September 16, 2019
Attendees	Linda Peake, Director, The CITY Institute
Sub-Committee Members	Kim Michasiw, Chair of ASCP, Chair Liette Gilbert, Co-Coordinator (FES) Alice Hovorka, Dean, FES Philip Kelly, Chair Geography Alice Pitt, Vice-Provost Academic Robert Everett, Secretary

This follow-up meeting began with an update provided by Dean Hovorka on developments since the first consultation. Colleagues have determined that the program in Cities, Communities and Planning should be a BA in Urbanization. Consensus has also been reached to adopt the name of "Faculty of Urban and Environmental Change." It was also reported that a follow-up meeting with colleagues from Social Science and Urban Studies had concluded with agreement to form a working group under the auspices of the Vice-Provost Academic to explore further cooperation.

The CITY Institute is deemed an important partner in helping to realize the vision for the new Faculty. This lead to a discussion of the advantages and disadvantages of moving to a Faculty-based charter. In any event, Director Peake agreed that it would be desirable to work closely together in the future in the cause of enhancing the Urban @ York.

Record of Consultation (Follow-Up Meeting)

Date	Wednesday, September 18, 2019
Attendees	Ruth Koleszar-Green, Co-Chair, Indigenous Council Bonita Lawrence, Chair of the Department of Equity Studies Coordinator of the Indigenous Studies Program
Sub-Committee Members	Kim Michasiw, Chair of ASCP, Chair Alice Hovorka, Dean, Environmental Studies Alice Pitt, Vice-Provost Academic Tarmo Remmel, Co-Coordinator (Geography) Robert Everett, Secretary

As discussion opened, participants were reminded of the theme of "a marathon not a sprint" when it comes to working out relationships. Dean Hovorka provided an update on developments and confirmed that those who had been consulted will receive a copy of the proposal distributed to FES and Geography colleagues on September 19.

Professor Koleszar-Green had briefed FES colleagues on the broad picture at York, which lead them to reflect seriously on responsibilities and actions. There is agreement that engagement must be deep and meaningful and not be tokenism. A goal in curriculum development has been to address Indigeneity widely. One possibility consists in an explicitly linked major/minor (it was observed that the University does not do enough to profile minors).

A curriculum committee of the Indigenous Council has not yet been formed but a proposal is in train. In any event channels of communication must remain open. To that end Dean Hovorka will be invited to meet with the Council. Professor Lawrence will continue to be the liaison with Indigenous Studies.

There was interest in the possibility of a new course in land-based learning. It was noted that Associate Vice-President Research Haig-Brown has experience with this type of offering and would be a valuable resource.

Record of Consultation (Follow Up Meeting)

Date	Monday, September 9, 2019
Attendees	Gary Klaassen, Professor, Lassonde Neil Tandon, Professor, Lassonde Peter Taylor, Professor, Lassonde
Sub-Committee Members	Kim Michasiw, Chair of ASCP <i>Chair</i> Alice Hovorka, Dean, Environmental Studies Tarmo Remmel, Co-Coordinator (Geography) Robert Everett <i>Secretary</i> Julie Parna, Office of the Vice-Provost Academic

Discussion at this follow up meeting focused on developments since the first consultation held in August. Participants paid particular attention to the EATS revisioning exercise underway and the curriculum emerging from FES and Geography with an emphasis on climate change.

It was agreed that there should be a widened, ongoing dialogue about Environmental Science. Participants were encouraged to suggest the names of individuals who should be at the table in an exploration of opportunities for collaboration. In the short term, colleagues from EATS and FES/Geography will share proposals as they are refined.

Record of Consultation (Follow-Up Meeting)

Date	Monday, September 16, 2019
Attendees	Jane Goodyer Dean Lassonde Alex Mills, Associate Dean, Science
Sub-Committee Members	Kim Michasiw, Chair of ASCP, Chair Liette Gilbert, Co-Coordinator (FES) Alice Hovorka, Dean FES Philip Kelly, Chair Geography Alice Pitt, Vice-Provost Academic Robert Everett, Secretary

A meeting of the Environmental Science working group was held the week of September 9. A colleague from Atmospheric Chemistry had attended. The program overview will be incorporated into the text of the proposal slated for distribution on September 19. Text of the proposal will stress that the four Faculties are continuing to hone the proposal. The modified program will have a core and three streams, along with a wider space for students to choose electives.

One of the questions that was posed turned on the alignment of the Environmental Studies program proposal aligns with the revisioning exercise in EATS. Dean Goodyer confirmed that ideas will be presented soon. Associate Dean Mills confirmed that Environmental Biology will be closed but another environmental option will be developed.

Record of Consultation (Follow-Up Meeting)

Date	Wednesday, September 18, 2019
Unit and Programs	School of Administrative Studies Disaster and Emergency Management
Attendees	Nelson Waweru, Director, SAS Nirupama Agrawa, Faculty Member, Disaster and Emergency Management Aaida Mamuji, Area Coordinator, Disaster & Emergency Management Eric Kennedy, Faculty Member, Disaster and Emergency Management
Sub-Committee Members	Kim Michasiw, Chair of ASCP, Chair Alice Hovorka, Dean, FES Alice Pitt, Vice-Provost Academic Tarmo Remmel, Co-Coordinator (Geography) Robert Everett, Secretary

Dean Hovorka provided an update on curriculum developments during the summer, timelines for their review and approval, and consultation plans. The proposal drafted for Senate and Board consideration will be released to colleagues in FES and Geography on September 19. Those who have consulted with the Sub-Committee will also receive the document that day,

Colleagues from DEM helpfully prepared a paper on possible forms of collaboration which at once contextualized and animated the discussion. DEM saw this as a bridgebuilding exercise and not necessarily inclusive of all options. Participants offered preliminary thoughts on possibilities and shared perspectives on how, for example, a foundational science course could inform the curriculum of multiple programs by fostering basic science literacy without requiring students to have a robust background in a scientific discipline.

Given the intense curriculum development activity expected in the new Faculty in the months ahead, it was thought advisable for joint initiatives to emerge from DEM at the outset. There were opportunities for co-taught courses (which struck participants as promising, not least since colleagues in DEM and the new Faculty have overlapping research interests). Collaboration could start with a single course – such as "Climate and Catastrophe" -- to gauge student interest and set the stage for more ambitious arrangements. Initial points of contact between programs could also take the form of cross-listing, supervision, cross-membership in graduate programs, or new Faculty colleagues serving as second readers of research papers in the MDEM programs.

Promotional material could also express York's strengths in curriculum spanning related programs.

It was agreed that the next step would be to think about co-taught courses, a model that may also be highly transportable to other joint curriculum ventures. DEM colleagues will be invited to attend meetings of the working group(s) tasked with fully developing curriculum.

Record of Consultation (Follow-Up Meeting)

Date	Monday, September 9, 2019
Unit	School of Public Policy and Administration (SPPA)
Attendees	Alena Kimakova, Director Joanne Magee, Undergraduate Program Director
Sub-Committee Members	Kim Michasiw, Chair of ASCP, Chair Liette Gilbert, Co-Coordinator (FES) Alice Pitt, Vice-Provost Academic Tarmo Remmel, Co-Coordinator (Geography) Robert Everett, Secretary Julie Parna, Office of the Vice-Provost Academic

Discussion opened with expressions of gratitude to colleagues from SPPA for the advice given during the first consultation. Participants at this follow up meeting were provided with updates on the development of curriculum for the new Faculty, especially a proposal to establish a degree in Sustainable Environmental Management. Professor Kimakova and Professor Magee reiterated their interest in reviewing the program brief as it is fleshed out. Students enrolled in this program may round out their studies with courses offered by the School. Similarly, those pursuing a degree in Public Policy and Adminstration may be interested in courses that cover environmental management (as they do with Disaster and Emergency Management). The discussion also touched on topics such as designing programs that maintain flexibility for students as they progress and attracting enrolments through, for example, second degrees.

Record of Consultation

Date	Wednesday, September 11, 2019	
Unit and Programs	Department of Social Science and constituent programs	
Attendees	Amanda Glasbeck (past Chair of SOSC) Paul Baxter (Undergraduate Program Director) Uwa Idemudia (Chair of SOSC) Doug Young (Coordinator, Urban Studies) Viviana Patroni (GPD, Development Studies) Mark Peacock (Coordinator, BUSO) JJ McMurtry, Dean; LA&PS	
Sub-Committee Members	Kim Michasiw, Chair of ASCP, Chair Liette Gilbert, Co-Coordinator (FES) Alice Horvoka, Dean, Environmental Studies Alice Pitt, Vice-Provost Academic Tarmo Remmel, Co-Coordinator (Geography) Robert Everett, Secretary	

As discussion resumed at this follow-up meeting, members of the FES-Geography Curriculum Working Group provided an update on the development of proposals over the summer. Of particular importance were proposals of potential relevance to Business and Society, International Development Studies and Urban Studies

Outcomes and Next Steps

The Sustainable Environmental Management program brief will be shared with BUSO colleagues as it is refined and well before a BUSO retreat scheduled for the end of October.

The development of a PhD in Development Studies proposal will be the subject of consultations led by Social Science.

The *Cites, Communities and Planning* program proposal that emerged responded to concerns raised by Social Science colleagues in June. However, FES and Geography faculty members felt strongly that the program should have the word urban in the title given the concentration of urbanists in the new Faculty and the curriculum orientation. The term "Urban Studies" will not be in the title. Other terminology will be used to express the strong urban orientation of the program.

Participants explored various models for collaboration and agreed on the importance of consultation. As a result, participants determined that:

- there is a consensus around the need to enhance the "Urban at York" in terms of research, curriculum, pedagogy, reputation and impact
- there should be great coherence in the University's urban-oriented curriculum, together with a commitment to student mobility
- there should be direct connections between Urban Studies and the new Faculty's curriculum designers
- an urban working group will be established under the auspices of the Vice-Provost Academica who will call for expressions of interest

A COMPARATIVE ANALYSIS OF ENVIRONMENTAL PROGRAMS

Report for York University



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Introduction

Higher Education Strategy Associates (HESA) was commissioned by York University to conduct a comparative research study examining environment-related programs in institutions across Canada. Our objective with this study is to provide options concerning how the environmental-related programs at York: Environmental Sciences, Environmental Studies, the BA in Geography and Urban Studies and the BA in Urban Studies, might best be reorganized and how the units might effectively enhance their cooperation in order to facilitate the development of new programs and initiatives. The report focuses particularly on options that exist at other programs.

This report provides discussion relating to the three Statement of Work elements (York Program/Depth Analysis; Analysis of Programs at Other Institutions; and Market Analysis). In the final section, we provide a discussion of the labour market as it pertains to graduates from the examined programs.

We note that this report focuses on undergraduate programming, since many of the questions around specializations and program composition emerge at the undergraduate level.

Some key findings we wish to emphasize are:

- 1. Environmental Studies and Environmental Sciences can be coordinated to offer more student choice. The bifurcation between its Environmental Studies and Environmental Sciences programs is a bit stronger than most equivalent programs. While there are reasons for this division, there are some programs that partially bridge this gap and provide students in both studies and sciences with shared courses and experiences.
- 2. There are several paths to studying urban issues at York, which is confusing to students. The distinction between the Faculty of Environment Studies Urban and Regional Environment, the BA in Geography and Urban Studies, and the BA in Urban Studies is limited and may not merit separate program structures.
- 3. Environmental Studies at York may not be attractive to people interested in resource management/stewardship or in the green economy. While we appreciate that York's Faculty of Environmental Studies has a strong and important tradition of critique and asking questions that challenge our dominant economic models, we found that other programs in environmental studies provide students with more explicit options for learning about sustainable resource management and developing or managing green businesses.
- 4. *The Faculty of Environmental Studies benefits from a strong identity*. The FES public identity is strong and assertive, which can attract some students who are deeply concerned with issues around environmental sustainability and degradation. However, this mission does not come across in the recruitment material for the Environmental Sciences program (which furthers the bifurcation between the two).
- 5. More information on program outcomes should be shared with prospective students. Some insight into the sorts of career outcomes these studies would have for students would help attract students who are attracted to a career in environmental studies or sciences but who are a bit unclear about how it might lead to a career. To this end, our final section provides



evidence for specific career outcomes and real job postings that students may pursue following graduation.

6. There is considerable overlap between jobs requiring training in Environmental Studies and Environmental Sciences. Our scan of job postings in the environmental sector suggest that employers are seeking people who are well-rounded and able to take on a range of technical, management, and communications roles. While some positions are more scientifically orientated, few positions in the sector require no exposure or knowledge of the life and physical sciences behind environmental forces.

A Note on Enrollment Patterns

York's enrollment in Environmental Studies, Environmental Sciences, and Geography and Urban Studies are all declining. For instance, between 2012-13 and 2016-17, full-time enrollment in the Environmental Studies program fell from 726 students to 443 students, or a decline of approximately forty percent. According to Ministry of Training, Colleges and Universities data, other Environmental Studies programs have faced similar declines during the same period, including Windsor (31% decline), Ottawa (40%), and Toronto (27%). However, other programs have held enrollment numbers or even increased them, including Waterloo, Queen's, and Lakehead.

For Environmental Science, York's undergraduate enrollment has also declined during the same period, from 52 in 2012-13 to 36 in 2016-17, representing a decline of 31%. This decline is not replicated by most other universities in Ontario, where enrollment in Environmental Science has generally increased or at least held steady. For instance, Carleton's enrollment has increased 44%, Waterloo's has increased 51%, and Guelph's has increased 120%. Our interview with the Dean of Environment at Waterloo confirmed that enrollment in their programs remains quite strong, and their faculty history demonstrates they managed to overcome a decline in enrollment from the mid 2000s (see the Environmental Studies and Sciences Specialization section for further detail).

Finally, for Urban Studies/Urban Planning, York has seen a small decline in undergraduate enrollment from 79 students in 2012-13 to 65 students in 2016-17, representing a decline of 18%. Other programs at Carleton, Ryerson, Toronto, and Waterloo have seen enrollment in these programs increase during the same period. This may be partially be an effect of the ways in which urban studies are divided at York; for instance, some students pursuing urban studies are likely classified as geography students, and thus not be captured by the ministry numbers.

York Program/Depth Analysis

Here, we discuss some impressions of the four units (Faculty of Environmental Studies, the Environmental Science program, the Geography and Urban Studies, and the Urban Studies program) that have informed our comparative analysis.

Faculty of Environmental Studies (FES)

Any consideration of York's role in environmentally-related programming should acknowledge the long history that the university has in promoting environmental studies. As is prominently noted on the program landing page, York's Environmental Studies program has been in existence since 1968. The faculty benefits from a clear vision statement:

Our vision is to direct and combine the diverse energies, assets and activities of the Faculty of Environmental Studies to become the premier location for interdisciplinary, analytical and collaborative research, education and action on critical and changing environmental issues.

This vision statement shares some characteristics with other environmental studies programs, which emphasize both the urgency of their studies and the interdisciplinary nature of their work. FES' commitment to social justice is also strongly impressed in their equity statement, which helps to give the faculty an identity and a sense of community. This commitment is also expressed through their programming, particularly their Environmental Politics, Justice and the Arts concentration—a concentration which is unique amongst scanned Environmental Studies programs. While this statement would not be read by most prospective students, these sorts of statements shape the courses and the recruitment messaging read by prospective students. This is not to suggest that other programs are apolitical, but generally other programs have students take courses that reflect on the connections between environment, geography and power as opposed to offering full concentrations concerning those connections.

The course selection and structure for FES's undergraduate program also impress that this is a Faculty committed to sustainability, studying and understanding challenging themes such as environmental racism, and promoting ecological justice. While the Environmental Politics, Justice and Arts concentration is most explicitly politicized, there are courses around these themes for each concentration.

FES's undergraduate program also has students take a core course for each of its three concentrations (Environmental Politics, Justice and Arts; Urban and Regional Environments; and Environmental Management), which helps students with their decision selecting an area to concentrate in. These core courses are called the Foundation Requirement. This introduction to the various concentrations through the foundation courses stands out as an interesting feature of FES—while other programs have students take a common core of courses before moving into specializations, these courses are often not bound to a specialization, but rather give students a broad core to move into their specializations, which occurs in the upper years (i.e. year three) of their studies.



There is overlap between the different specializations. For instance, five courses at the 3000 level are available for both the Environmental Politics, Justice and Arts *and* the Environmental Management specializations. At the 4000 level, the courses Environmental Law and Justice, Environmental Disasters, and Food, Land and Culture are available to all three specializations. Two of the specializations also have a reasonably distinct identity, as there are 9 courses in Environmental Politics and 11 courses in Environmental Management available only to students in those the respective specializations. There are 5 courses for students in the Urban and Regional Environments specialization, though all these courses are also open to students in York's various Urban Studies programs, making that specialization a bit less distinct.

A commonality between all FES programs is the emphasis they place on the availability of experiential learning options, including learning at the EcoCampus in Costa Rica where students may take several courses that speak to conservation, history, and politics of environmental issues in the nation. We note that the Work Placement Program is a bit less well defined on the website, which may be particularly discouraging for students in the Urban and Regional Environments stream (who must get permission to take EcoCampus courses).

The FES Master's program is quite flexible. Students are encouraged to develop their own program of courses (there are 47 courses listed as options), for a total of 36 credits. Students also complete a major paper, project, or portfolio. Notably, students do not receive letter grades (unless they are needed for applications)—there is no explicit justification for this, which makes it a bit challenging to know what audience the program is for. The FES Master's of Environmental Studies, Planning, is a bit more professionally orientated, with connections to the Canadian Institute of Planners. This aligns with the professional focus of most degrees in planning and urban studies. However, the fact that the planning degree is affiliated with the FES is a bit unusual—it is more common for a planning degree to be affiliated with a Department or School of Architecture or Geography, although Guelph's MSc in Rural Planning and Development is part of the School of Environmental Design and Rural Development.

Environmental Science

The BSc in Environmental Science is offered through the Faculty of Science and offers two main streams: a Life Sciences and a Physical Sciences stream. Generally, students in this program acquire a strong core with Geography-listed courses before moving into the streams. Students in the program are offered a concurrent GIS and Remote Sensing certificate as part of their degree, which speaks to a departmental interest in facilitating the development and certification of a widely demanded skill.

While there are two streams, the core course selection indicates that students are expected to have a basic knowledge of physical geography, hydrology, and ecology. Notably, the Life Science stream has students take a range of Biology courses from a large list of options, whereas the Physical Science stream has a few set courses.

Since Environmental Sciences is part of a wider faculty, it does not have a mission statement or as much discussion about the core values that animate the program. It does note the distinction between



Environmental Science and Environmental Studies, noting that Environmental Science "emphasizes field experiences, undergraduate research, and environmental problem-solving," whereas students in Environmental Studies "will gain a broad educational background needed to assist in developing sustainable development policies to create positive social change within the environmental context."¹

Our scan suggests York's program is unusual in that there are few connections between the two areas. For instance, at UBC, students in both the Environmental Studies and in the Environment and Sustainability program can take the same courses in Hydrology and biogeography. Students in Lakehead's Environmental Science and Environmental Studies take several of the same courses, though both programs are within the Department of Geography and the Environment. Table 2 in the section below provides some further detail on this point.

Geography and Urban Studies

The BA in Geography and Urban Studies is an honours degree that is one of several streams available to students with the Department of Geography. The program structure highlights how students will be able to both specialize on urban studies while taking core courses in geography. The program generally draws widely on a range of disciplines—the Urban Studies list of courses has options in fifteen different departments/faculties, including twelve courses from the Faculty of Environmental Studies (many of which are courses that students in the Urban and Regional Environment specialization take).

The core courses are a mix of physical geography, quantitative analysis courses, and urban studies courses. There are set courses through all four years of study, and students are introduced to Urban Studies through the course City Lives, City Forms: An Introduction to Urban Studies. Comparing this course description with the foundational course for Urban and Regional Environments in the Faculty of Environment reveals both similarities and differences in the approach between the two.

City Lives, City Forms: An Introduction to Urban Studies (URST)	Foundations of Urban and Regional Environments: Analysis, Planning, and Design (ENVS)
"Introduces students to the tradition and practice of urban studies through an exploration of the social fabrics of cities as historical products that both reflect and influence economic, political and cultural realities in contemporary societies."	"Focuses on the interrelationships of the ecological, social, built and organizational environments within the urban and regional setting. It provides a critical understanding of urban and regional environments along with a solutions-based approach to addressing urban and regional issues with an explicitly environmental perspective. With the Greater Toronto Area as a field laboratory, there will be an emphasis on application and involvement."

¹ From the "Future Students" section, https://futurestudents.yorku.ca/program/environmental-science



The ecological focus of the Environmental Studies course stands out, whereas the Urban Studies course seems to focus more on political elements and questions. Students may wish to be able to access the course syllabuses to further understand the distinction.

The Department of Geography also offers "The City" as a program theme area, which encourages students to take courses that allow them to learn about urban, social, and cultural geographies and to think critically and politically to create social and environmentally sustainable cities. However, the precise relationship that this program theme has to the program structure is unclear, so it is difficult to evaluate the value that this thematic focus provides to students in terms of shaping their studies. Given that there is already an Urban and Regional Environment focus and a BA in Geography and Urban studies, this program theme area may confuse students considering their program options.

Urban Studies

Finally, York offers another urban studies degree, distinct from the Geography and Urban Studies degree, through the Faculty of Liberal Arts and Professional Studies, Department of Social Science. The program has students take a total of 54 credits (approximately half of an honours BA) in urban studies courses, which are cross listed with sociology, geography, environmental studies, political science, and history. Students are not *required* to take the same geography courses as students in the Geography and Urban studies stream but given the similar courses in the list of approved courses, there is overlap.

As with students in the Geography and Urban Studies stream, students take the course City Lives and City Forms: An Introduction to Urban Studies. Otherwise, the core courses are different, as students in the Urban Studies program take more theoretically orientated courses, such as a seminar in Critical Urban Studies and a seminar in Urban Theory.

Students in the urban studies program select one of three pathways (though this is not mandatory): Global Urbanism, Urban Governance (Policy, Politics and Finance), and Urban Community, Environment, and Planning. Courses for these pathways are exclusively in the upper years. The Urban Community, Environment, and Planning stream shares the most in common with FES' Urban and Regional Environment concentration, as the stream has nine Environmental Studies courses listed as approved options.

The table below provides an overview of the course disciplines that each of the pathways and that the Geography and Urban Studies program draw from.

Discipline	Urban Governance	Urban Community	Global Urbanism	Geography and Urban
Anthropology	0	0	2	2
Envrio. Studies	6	9	4	12
Geography	11	13	7	22
History	2	1	1	7
Political Sci.	3	3	1	4
Psychology	1	0	0	1
Sociology	3	4	2	7
Social Science	10	13	10	22

Table 1: Number of Course Options for Different Urban Studies Programs at York, by Discipline

As table 1 demonstrates, there is considerable overlap between the different streams. The Geography and Urban Studies program provides its students with the most options for course selection, whereas the Urban Studies pathways gives their students a bit more direction. However, whether the different streams offer enough to distinguish themselves to merit separate lists and administration, particularly when there is also an urban studies concentration in the FES, is debatable. This is particularly the case since the Geography and Urban Studies list is extensive enough that students in Urban Studies can effectively choose from the same course list during their upper years, at only the cost of having to take a few more courses in physical geography during their lower years. A student interested in Urban Studies at York is ultimately confronted with three different viable program options (with a fourth, if one also counts the "The City" stream within the Geography degree), which would likely be confusing to a student entering from high school who is generally already hazy about the distinctions between different disciplines.

Analysis of Programs at Other Institutions

Our program analysis provides a few observations about how environmental studies, sciences and urban studies programs are designed at other institutions. We consider the following key questions:

- How many science courses do students in an Environmental Studies course take?
- What are some different approaches for fostering different specializations in Environmental Studies?
- What are some differences between urban studies and urban planning programs?
- How do outcomes for external certifying bodies relate to different programs?

This section provides a provisional discussion of these questions in turn.

Overlap Between Science and Environmental Studies

York's Environmental Studies program places a bit less emphasis on required scientific courses than comparable programs across Canada. Students in Environmental Studies are required to take 6 credits of science courses as part of their general education requirement and take the 6-credit course "Introduction to Environmental Science." We calculate that students are thus *required* to take a minimum of 12 credits in the sciences, or 10% of the total number of credits required to graduate with an Honours Bachelors.

To compare this with other programs, we examined calendar entries for environmental studies programs at other institutions for *required* courses in the sciences. Generally, science courses were listed as a natural or physical science discipline course (e.g. biology, physics, chemistry), though in some cases (particularly for courses listed in Geography or Environmental Studies) we had to read course descriptions to determine whether a course could be defined as a physical or natural science course. The table below provides an overview of required science courses at other programs.

University	Number of Courses // Credits	Science Credits as % of Total Required for Graduation
Carleton ²	2 courses, 1 credit	5%
York	3 courses, 12 credits	10%
Manitoba	4 courses, 12 credits	10%
Ottawa	5 courses, 15 credits	12.5%
UTSC	5 courses, 12.5 credits	12.5%
Waterloo	5 courses, 12.5 credits	12.5%

Table 2: Required Science Courses in Environmental Studies Programs



² Carleton has a low number of required credits because it considers Environmental Studies courses to satisfy the general science breadth requirement. However, by our definition of science here, the course descriptions did not satisfy our definition of a course that is focused on natural or physical science.

University	Number of Courses // Credits	Science Credits as % of Total Required for Graduation
UBC	6 courses, 18 credits	15%
SFU	6 courses, 20 units	15%

The required courses provide some sense of the scientific emphasis of the various programs. However, in most cases, Environmental Studies programs also allow students to take many science courses as electives and we thus presume that many students will take more courses in the sciences than the minimum requirement. For instance, in Trent's Bachelor of Arts Environmental Studies program, students take as many as 7.5 of the required 20 credits for their Environmental Studies major in sciences and still graduate with a BA.

The University of Calgary's Environmental Science program is an interesting case study in how some programs largely have students move between the arts and the sciences. Students in the program can elect to take the program with a focus on Biology or with a focus on Geography and Arts.

Students in both streams take common core courses, including Introduction to Environmental Science which introduces students to a range of topics around climate change, aquatic systems, forestry, mining, and relevant policies), Special Problems in Environmental Management (exploring environmental science from a professional standpoint and exploring how people in the workforce engage with environmental issues), and Environmental Assessment and Hearings.

There are still substantial differences between the two paths—students in the biological science stream take primarily biology and chemistry courses during years two and three, and students in the geography and arts program focus on geography listed courses. However, for year four, students in both streams reunite to take courses in professional practice and in field studies. For this program, the common theme is particularly in field work, where students take a range of trips to areas that have been or will be impacted by industrial development and to the University of Calgary's Barrier Lake Field station.

This program serves as an example where Environmental Studies and Environmental Sciences are bridged, while still having reasonably distinct paths for students.

Environmental Studies and Environmental Sciences Specializations

This section briefly considers some approaches universities have for offering specializations, as many environmental studies programs offer different specializations for students. It particularly considers the University of Waterloo, whose Faculty of Environment is potentially the most comparable to York's in terms of size and diversity of offerings. The table below provides a summary of some select for Environmental Studies at York, Waterloo, and UNBC. UNBC is included to provide another small example of a Environment Studies program that has some focus on resource management.



11	

Institution	Specializations	
York	Environmental Politics, Justice and the Arts	
	 Urban and Regional Environments 	
	Environmental Management	
Waterloo	Environment and Business	
	 Environment, Resources and Sustainability 	
	 Geography and Environmental Management 	
	Geography and Aviation	
	Geomatics	
	International Development	
	Planning	
Northern British Columbia	Global Environmental Studies	
	Communities and Environmental Citizenship	
	Natural Resources Management	
	Indigenous Perspectives	

Table 3: Specializations in Environmental Studies

Like York, the University of Waterloo has a long-standing environmental faculty. The diversity of programming and the specific programs offered through Waterloo's Faculty of Environment is extensive and speaks to the utility of offering environmental programming at a faculty level. The diverse range of programming also seems to stimulate to student interest, as their enrollment figures have remained steadily in the high 500s between 2012 and 2017.

Within Waterloo's faculty, there are two Departments (Geography and Environmental Management; Knowledge Integration) and three Schools (Environment, Enterprise and Development; Environment, Resources and Sustainability; Planning). In total, there are eight undergraduate programs and one minor (in Urban Studies). As with York, Waterloo's Environmental Science program is part of the Faculty of Science as opposed to Environment. In their comparison between Environmental Science and Environmental Studies, they note that Studies is a more "flexible" program, where students learn about natural resource management, ecology, and environmental health, whereas students in sciences learn more about chemistry, microbiology, and hydrology. As noted in table 2 above, Waterloo's Environment students are required to take a couple more science courses.

Where Waterloo particularly differs from York is through its comparatively stronger emphasis on resource management and environmental business. The Faculty offers a program in Environment and Business that has students learn about marketing, economics, entrepreneurship (including social entrepreneurship), and business strategy. Their International Development program fuses environmental studies with courses in international development and ecology. Waterloo's Environmental Faculty emphasizes sustainability and green development but does not explicitly share York's faculty commitment to social justice and equity. According to a wide-ranging history of the

faculty, *sustainability* has emerged as an important key term that has guided a considerable amount of their program development and research.³

During a brief interview with the Dean of the faculty, their Knowledge Integration program came up as an interesting example of how Waterloo applies interdisciplinary learning concerning sustainability at a structural level. The KI program developed following a substantive rethinking of the faculty that came on the heels of a decline in student enrollment that led to a strategic plan in 2007. KI was developed to both expose students to interdisciplinary programming in planning, engineering, environmental studies and other disciplines and to promote thinking about how to apply learning to real-world problems ranging from policy questions to questions around technology and the environment. It was not designed for Environmental Studies, but the university felt that KI fit best in the Faculty of Environment, which had a tradition of interdisciplinary learning and fostering links between the university and the surrounding community. Over time, KI has taken on more education and research in sustainability.⁴

According to the Dean, this flexibility and adaptiveness emerged as a vitally important element of their planning. She described a process of constant evolution and adaptation, which required a lot of work planning and developing partnerships with different natural science, social science, technology, and even engineering programs. For developing or adapting new programs, they generally try to ensure that there is a natural and social science base, and then business or technology-based courses are added to that base. One professor evoked this interdisciplinary adaptiveness when the program renamed itself from the Faculty of Environmental Studies to simply the Faculty of Environment in 2008:

The name change seemed to reflect a maturing of the perspectives of what it meant to study the environment. For instance, the difference between 'science' versus a 'study', academically speaking. Changing the name to Faculty of Environmental signified that we weren't just about qualitative or policy orientated study of humans and the environment but that we did both science and social science and included humanities perspectives as well.⁵

The quote, from a recently released history of the faculty, captures the way that Waterloo interprets their interdisciplinary approach. The presence of a Planning degree within the Faculty, which has strong links to the Canadian Institute of Planners but also allows students to take more conceptual courses in urban studies, also illustrates their understanding of how interdisciplinary programming works best.

Turning briefly to Environmental Sciences, we outline some specializations below:



³ University of Waterloo, Faculty of Environment, "The First 50 Years," 108-9. As an aside, given the long history of York's FES, a similar study might be undertaken. Waterloo's Dean indicated that while she would hesitate to have a current professor work on such a project (it was completed by a recently retired professor), she found that it had considerable strategic value for their current round of planning, particularly in reflecting on some issues (such as their split with the School of Architecture).

⁴ University of Waterloo, Faculty of Environment, "The First 50 Years," 45-48 and notes from conversation with Dean Jane Adray.

⁵ University of Waterloo, Faculty of Environment, "The First 50 Years," 59.

Institution	Specialization
York	Life Sciences
	Physical Sciences
Simon Fraser	Applied Biology
	 Environmental Earth Systems
	Environmetrics
	Water Science
UBC	Land, Air and Water
	 Ecology and Conservation
Calgary	Biological Science
	Chemistry
	 Geography and the Arts
	Geology
	Physics
	Statistics

Table 4: Specializations in Environmental Science

In a few cases, the decision of whether to take an Environmental program as a science degree or an arts degree *is* the specialization: this is the case at Duke, Trent, Lakehead, and Victoria.

For both studies and sciences, York offers its students a considerable number of specializations compared to peer institutions, which is befitting of an institution of York's size. As noted, the Environmental Politics, Justice and the Arts specialization stands out as particularly unique. The Urban and Regional Environments stream also stands out, though as we note above, this may also serve to cause some confusion for prospective students who are seeking to distinguish between it and the urban studies program. There is no similar specialization at another program that we found.

For the sciences, we note that York's approach is functional, if not terribly descriptive. Both Simon Fraser and UBC provide a clearer sense with their specialization titles what it is that students might be learning about and how that could apply to a student's interest in the environment. From our perspective, "Life Sciences" does not particularly stand out from other biology or ecology programs, and "Physical Sciences" is hard to distinguish from fields like geology or physical geography.

Urban Studies and Urban Planning

Currently, York offers undergraduates courses in urban studies through its Urban and Regional Environments specialization in the Faculty of Environmental Science and as a degree in Geography and Urban Studies. The Faculty of Environmental Studies also offers students a MES Planning degree, which aligns with other gradate urban studies programs, which generally have a planning component.

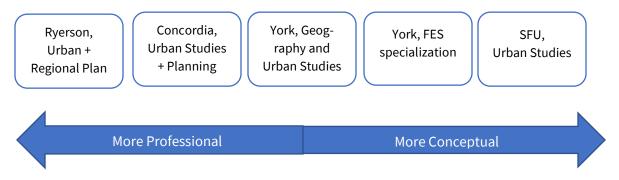
There are relatively few Urban Studies undergraduate programs in Canada. Three examples that we have considered are Bachelor of Arts in Urban Studies at the University of Calgary and the University of



Toronto (Innis College), the Bachelor of Urban and Regional Planning at Ryerson University, and the Bachelor of Arts in Urban Studies and Urban Planning at Concordia. There are also related minors in Urban Studies at UBC and at Waterloo.

Generally, these undergraduate programs resemble a mixture of urban studies courses in York's Faculty of Environmental Studies and its BA in Geography and Urban Studies. Some programs we considered can be classified in the following way:





By "More professional," we mean that the programs have more direct links to Urban Planning and to formal professional bodies such as the Canadian Institute of Planners. "More conceptual" programs tend to be interdisciplinary programs that encourage exploring urban environments from social, political, economic, and cultural approaches and that might lead to careers or interest in municipal affairs and reporting, government policy, or NGOs.

The difference between professional and conceptual courses can be illustrated through required courses. For instance, the University of Toronto's Innis College (which is more conceptual) and Concordia have some overlap in their questions and core courses, but a selection of their core courses illustrates how their focuses diverge. The table provides core courses for students in their second and third years. We do not provide options for York here, because the Urban Studies degree in the Geography department has few core urban studies courses (but rather has students plan their degree from lists of approved courses), and the Environmental Studies specialization has only the Foundations of Urban and Regional Environments before allowing students to chose courses in their third year. However, the Innis courses serve as a rough proxy for the Urban and Regional Environments specialization.

University of Toronto	Concordia University
A Multidisciplinary Introduction to	Urbanization: Global and Historical
Urban Studies: Theoretical Foundations	Perspectives
of City Building	Planning
 Urban Challenges and Theoretical 	Representation Methods in Urban
Applications	Studies
Critical Approaches in Urban Studies	 Analytical Methods in Urban Studies
Creative Cities	 Neighbourhood and Community
Studies in Contemporary Urban	Planning
Problems	• GIS
Divided City/United City	Quantitative Research Methods

Table 5: Sample Courses in Urban Studies/Urban Planning

The distinction between conceptual and professional programs is reasonably clear from the different course topics. In particular, the emphasis that Concordia (and similar programs, like Ryerson) place on the development of specific analytical tools and methods is distinct from the more conceptual program emphasis on exploring how planning and urban environments create various social and cultural challenges. Again, this distinction should not be overdrawn—students in conceptual programs can take rigorous methodological courses, and students in professional programs learn about the history and theoretical underpinnings of planning.

The Role of Accrediting Agencies

Professional Standards Board

External accreditation agencies can shape some of the curriculum choices and distinctions. For Urban Planning, the relevant agency is the Professional Standards Board (PSB) and their Accreditation Program Committee. The competencies required by the PSB include:

- Human Settlements (understanding settings, forms, and change in settlements);
- History and Principles of Planning;
- Government and Law;
- Issues in Planning and Policy Making;
- Processes of Planning and Policy-Making;
- Plan and Policy Implementation.

The PSB has accredited programs that are more explicitly focused on planning, including Ryerson and York's own Master in Environmental Studies (planning).

Since the PSB requires that approximately half of its instructors are certified by a Provincial or Territorial Institute or Association, there is an expectation that instruction will likely be done in part by



current or former planning professionals, which may explain why Urban Studies programs are mostly not certified. The University of Waterloo's Faculty of Environment has a Planning Department that is certified and that illustrates the role that planning professionals play in shaping curriculum. According to the Dean, that program is largely co-designed by Waterloo faculty and accredited planning professionals. Urban Studies is offered as a minor to provide students in planning, the broader faculty, and students in other social sciences a chance to take more theoretical and conceptual courses on urban issues. Referring to the spectrum in Figure 1, Waterloo's program would land towards the more professional end.

ECO Canada Certification

The ECO Canada certification is useful for shaping thinking about how to arrange the relationship between Studies and Science. There are three main sectors in their *Competencies for Environmental Professionals in Canada*: Environmental Protection, Resource Management, and Environmental Sustainability. During a self-assessment that professionals in the environmental sector take to begin the process for certification, test takers are asked to identify at least one of the three sectors that they see themselves as specializing in.

Broadly, Environmental Protection maps closer to sciences, since it focuses on activities aimed at protecting human and ecological health through "the measurement, maintenance, protection, and restoration of environmental quality." Environmental Sustainability is closer to Studies, as it includes stakeholder engagement, communication, ethical considerations, and policy creation. Resource Management exists somewhere between the two, since it includes both natural resource monitoring and management, which requires understanding how to balance ecological and economic imperatives. There is flexibility in defining the skills that a professional need in order to be able to be recognized as an "Environmental Professional." Generally, ECO Canada's certification reinforces how interdisciplinary the field is and demonstrates that students from both sciences and studies would benefit from some exposure to the other field to demonstrate as wide a range of competencies as possible.

ECO Canada also certifies programs that give graduates from certified programs a head-start in applying for its Environmental Professional in Training Certification, which is offered to new professionals. Most university programs certified are Environmental Science programs, but Environmental Studies programs at Lakehead, Winnipeg, and King's University (Edmonton) are also certified. Nevertheless, the list of certified programs suggests that there is a slight preference for people with at least some exposure to the scientific dimension of environmental studies.



Market Analysis

This section provides a discussion of how various programs present themselves to prospective students. As interdisciplinary programs, the three programs under consideration all must take some pains to explain what precisely their program is and what students will get from them.

The review largely draws on the landing pages of relevant programs, with some consideration of calendar entries. Our effort is to provide a brief overview of any significant differences in how programs present themselves and to explore if there are any points that York should consider in order to clarify and refine their program marketing.

Environmental Studies

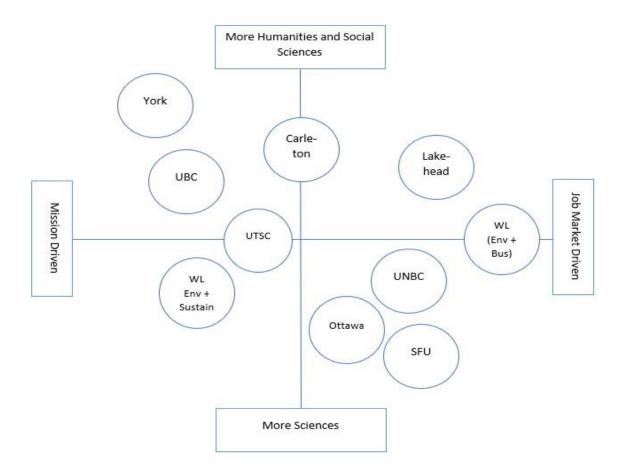
The following matrix demonstrates how the website or calendar copy positions a variety of environmental studies programs. Our intention is to provide a sense of how York's program is an outlier in terms of how the website descriptions present the program. This is not a perfect or objective measure—for instance, we note that York's program does have a considerable amount of space devoted to the work placement opportunities that students will be able to have. We provide it as a suggestive tool.

When positioning these different programs, we considered the following questions:

- Does the program present any sort of guiding mission or agenda that influences the program? (Example: "The Honours BA in Environmental Studies is an interdisciplinary program that focuses on environmental issues faced by our world, which affect our health, economy, and global ecosystem.") Depending on the language used, we then assessed whether a program was more mission driven, or more job market driven.
- What sort of programs or course work does the copy emphasize? Depending on the specific disciplines noted, we then positioned a program as veering towards the humanities/social sciences or towards the physical and life sciences.
- What sort of employment or skill development outcomes are emphasized? The extent and specificity to which the program copy discussed employable skills then influenced where a program is positioned along the Mission-Job Market axis.



Figure 2: Environmental Studies Marketing Matrix



Another way to consider the differences between the programs is to directly compare the some of the copy. The table below provides a few examples of how the Environmental Studies programs present themselves. (These quotes are not the only examples used to situate programs on the above axis).

Table 6: Sample Environmental Studies Marketing Copy

Institution	Sample Copy
York	How do we change the world? How do we construct a just society in creative ways? This Area focuses on facing today's environmental challenges through politics, art, philosophy, education and media. You will examine the relationships between humans and environments using literary texts, digital images, pop art and performance.
Simon Fraser	Combine the insights of human geography with the strengths of spatial information systems and a good grounding in biophysical processes. The Environmental Specialty BA is especially relevant to the human and physical dynamics evident in what is called "Supernatural" British Columbia.



Institution	Sample Copy
Carleton	The Environmental Studies Program is a multidisciplinary program, based on social sciences, humanities and sciences. Students can develop innovative interdisciplinary approaches to understanding the environment and human roles and responsibilities.
Waterloo	Our vision is to use our unique position as a leading teaching and research institute for the environment to create sustainable solutions needed to address the complex challenges facing our world.
University of Toronto at Scarborough	Environmental Studies at UTSC aims to equip students with the education & experience necessary to deal with environmental issues in their professional and personal lives. At UTSC, we understand that environmental issues are no longer someone else's problem, so we aim to raise environmental awareness and ethical behavior that can permeate into our communities.

The references to the surrounding location are particularly common for programs in British Columbia. In Ontario, Lakehead University also notes how its campus is situated by extensive hiking trails and outdoors. Some other Ontario universities may profit from noting some of the nearby environmental features that people in their program might enjoy. York students are not too far afield from urban environments like the Humber River, the Holland Marsh (where students might reflect on the relationship between environmental studies and agriculture), or various conservation areas to the north west of the campus. In other words, York may benefit from taking a bit more pride in the environmental features that it finds itself near—British Columbian universities do not hesitate to do so.

Environmental Studies advertising also shares some features. Notably, almost all the programs present themselves as highly interdisciplinary (Lakehead bizarrely tries to pitch their interdisciplinary approach as "unique to Lakehead University"—it is anything but). York's copy stands out in the sorts of disciplines and evidence it refers to, noting the importance of philosophy and art and using materials such as pop art and literary texts.⁶ Carleton's description comes closest when it notes that students can take courses in law and philosophy, but it does not take the same effort to incorporate humanities-based approaches as core to the program that York's does.

Environmental Sciences

Environmental Science pitches are generally the most consistent of the three programs considered in thus study. In effectively every case, the pitches focus on the following features:



⁶ The exact relevance pop art—an artistic movement in vogue particularly during the 1950s and 1960s—and the contemporary concerns arising from climate change should be clarified for potential students. Historical visual mediums may be useful for understanding and for context, but many students may not immediately grasp the connection without relevant examples or evidence.

- The interdisciplinary nature of the programming. Environmental Sciences shares this characteristic with Environmental Studies, though the sciences tend to define interdisciplinary studies in terms of different science programs. For instance, UBC notes that their program "provides a significant background in physical sciences, earth and ocean sciences, and life sciences."
- *Potential for Lab Work*: Generally featured in both copy and in accompanying images are students working in outdoor labs. Environmental Sciences are aimed at people who see their potential workplace as being outdoors. Ideally, copy should highlight *where* students might go to study—York featuring studies in Algonquin Park is one of the best examples of this.
- Interest in mitigating environmental problems: As with Environmental Studies, Environmental Sciences also seeks to attract students who are interested in confronting environmental challenges head on. For instance, Ottawa's program contends that "Society has a growing need for specialists able to recognize, understand, solve and prevent environmental problems."

In terms of job market outcomes, programs tend to highlight work with government agencies (such as Environment Canada), in resource management, and in non-profit environmental agencies.

Environmental Studies and Environmental Sciences

For universities that offer both Environmental Studies and Environmental Science programs, there is a challenge in ensuring that students understand the differences between the two. York provides one of the clearer distinctions between the two programs in their pages for future students. The table below provides a summary of some keyword differences between the two programs, drawing on York's distinction and on distinctions made by other programs. It draws on both directly comparing descriptions of both types of programs and by visually comparing the relative weight of text in program descriptions by inserting them into a word cloud generator.

Table 7: Environmental Studies and Environmental Sciences Keywords

Environmental Studies	Environmental Science	
Human Development	Environmental Systems	
Policies and Politics	Field Experiences	
Social Change	Climate Change	
Sustainability	Conservation	
Relationships	Biodiversity and ecology	

Generally, the marketing distinction highlights how environmental studies is more focused on the social and political elements of environmental issues, whereas science tends towards examining the humanenvironmental interface on the ground and how it manifests biologically, ecologically, and chemically.

However, it may be a mistake to overdraw this distinction. Environmental scientists are generally not politically neutral, and their work engages in fundamental questions pertaining to how we exist in the



world. The University of Calgary's program gestures towards this by noting some key questions their program addresses:

Environmental Science scholars ask questions such as: How can colony collapse disorder be prevented? Should genetically modified food be labeled as such? How does intensive farming impact plant biodiversity?

There are also programs that highlight the overlap between their Environmental Studies and Environmental Science programs. Trent's School of the Environment servs as an example of this. Their main undergraduate program from the School of the Environment is "Environmental and Resource Science/Studies." In their program, students take either a B.A. or a B.Sc option, or a distinct "B.E.S.S." option, where students will "gain an understanding of the scientific aspects of contemporary environmental issues, how they're linked to policy and planning decisions, and how that can lead to an environmentally sustainable future."

Duke University's Nicholas School of the Environment blankets both their science and arts undergraduate degree in a mission that seeks to combine scientific investigation and policy:

Consistent with the Nicholas school's mission to create knowledge and global leaders for a sustainable future, the overarching goal of our undergraduate program is to provide training to expand and spread our understanding of environmental science and policy.

The Nicholas School example is a compelling example of how a clear mission statement can be used to animate marketing copy for a program. While there are cases where mission statements can seem like simple box-checking, in the case of environmental studies/sciences, which will generally attract students who are aware of and concerned about environmental issues, a strong mission statement aligned with a program description could make a compelling case. York's FES already has such a mission statement and it may wish to consider explicitly bringing that language into its program descriptions.

Urban Studies

The professional/conceptual orientation noted in the Analysis of Programs section guides how programs present themselves. The more conceptual programs, such as Simon Fraser's Urban Studies program (which offers only graduate studies), present as more mission driven:

The comprehensive study of cities – in all of their social, economic, environmental, and political complexity – is crucial to a sustainable global future.

Such a statement aligns with York's model. The Urban Studies copy in the Future Students section notes that:



Urban Studies is the attempt to understand cities and city life — how they function, the current and future concerns of their residents. This encompasses the political institutions, economic and social relations, physical landscapes and cultural frameworks that constitute the city.⁷

A unique challenge for York is distinguishing between their different program streams. The Geography and Urban Studies BA notes that it "investigates the shared characteristics of diverse urban places and the complex ways in which global issues play out as local communities struggle over resources, services, and public spaces." This copy shares some characteristics with the FES copy, though it is closer still to environmental studies copy at other programs. It is also quite similar to the Urban Studies copy quoted above. Both programs also emphasize how they study various social, environmental, and political forces thorough "the city" (Urban Studies) or through "the urban landscape" (Geography and Urban Studies). Ultimately, the distinction in the copy between the programs is quite slight.

While York's various urban studies programs are a bit more academically and theoretically orientated, Ryerson's professionally orientated urban and regional planning program emphasizes what sorts of tools and careers their graduates can look forward to:

Guide the operation and promote the growth of communities. Understand land-use concepts and strategies to create and implement plans that develop and enhance regional, urban, suburban and rural communities. Advise on planning decisions related to social, economic, environmental, cultural, land development, transportation and other issues.

However, it is important to emphasize that the professional/conceptual figure is a continuum, and the program intentions can overlap. For instance, the Faculty of Environmental Studies description of its Urban and Regional Environment highlights some potential career outcomes and describes Toronto and the area as a "field lab," and proceeds to highlight how the program might lead to careers in urban planning and design.



⁷ Taken from the Future Students section, Major in Urban Studies, https://futurestudents.yorku.ca/program/urbanstudies

Labour Market Observations

This section provides a few observations concerning potential labour market outcomes for students graduating with credentials in environmental studies, environmental science, and urban studies. What follows are some trends that emerge from an analysis of job postings from job boards across Ontario (for the environmental disciplines) and across Canada (for urban studies). HESA used Burning Glass' Labour Insight tool to draw out metadata from relevant job postings to present some information about potential job titles, employers, and in demand skills for these fields.

Environmental Studies and Sciences

Since part of this exercise's intent is to consider potential connections between environmental studies and environmental sciences, we present data concerning these fields comparatively. When searching positions in these fields, we also restricted the searches to positions that explicitly required 0 to 2 years of work experience. This is in order to primarily consider positions that graduating students may be eligible for.

There is some overlap between positions requiring an environmental studies degree versus those that require an environmental science degree, such as the steady demand for employees with these credentials from engineering and construction firms. For Environmental Studies, companies such as AECOM Technology, Stantec, and AMEC require people for positions such as a Junior Environmental Planner or as an Environmental Health and Safety Coordinator. For Sciences, recent graduates may acquire careers as an Environmental Constructor Monitor or a Terrestrial Ecologist. The tables below illustrate these trends by providing the top ten job titles for people with environmental studies degrees and with environmental science degrees (with 0 to 2 years experience). The associated number of jobs for each category are provided in parenthesis—to be clear, these numbers are not meant to represent all possible jobs in the area, but rather indicate the number of jobs that were found using our search parameters. These positions were posted between 2014 and 2018.

Job Title (337)	Sample Employer	Sample Job Role
Environmental Planner (29)	WSP Global	Assisting planners with Infrastructure,
		Transportation and Electrical Impact Assessment projects and proposals
Special Project Technologist (17)	York Region	Conducting activities related to environmental water/wastewater or waste management programs or environmental assessment processes
Environmental Specialist (6)	Hydro One	Support the provision of environmental services including scope of work preparation, technical

Table 8: Environmental Studies Jobs, Ontario, 2014 to 2018



Job Title (337)	Sample Employer	Sample Job Role
		report writing, permitting, and program coordination.
Program Manager (6)	Goodwork Canada	Develops programs and initiatives aimed at reducing Single Occupancy Vehicle mode share and inciting behavior change.
Project Coordinator (6)	Federation of Canadian Municipalities	Provides programming, research, administrative and logistical support for the delivery of the Partners for Climate Protection program.
Service Planner (6)	Regional Municipality of York	Responsible for designing tran routes, monitoring new routes a route extensions, and using statistic applications to forecast transit dema and plan transit services.
Planner (6)	AECOM	Assisting with the implementation Environmental Assessments and pub consultation programs
Environmental Occupational Health Technician	T Harris Management	Perform fieldwork associated w sampling and monitoring of chemic physical and biological agents.
Environmental Technician (5)	Amec	Conduct site visits to make observations and gather information to evaluate compliance with environmental permits
Environmental Coordinator (5)	Compass Group Canada	The Environmental Program Coordinator will assist in developing, implementing and communicating a campus-wide reduction/diversion program at Fanshawe College

As Table 8 demonstrates, there is some overlap between the technical skills that would be more associated with environmental sciences, communication and management skills that would emerge from studies, and a smattering of roles that call for some awareness of urban issues.

Table 9 demonstrates the results for a similar search, this time examining Environmental Sciences. The same search parameters are applied. Notably, GIS positions emerge from this search.

Table 9: Environmental Sciences Jobs, Ontario, 2014 to 2018

Job Title (337)	Sample Employer	Sample Job Role
Environmental Scientist (33)	Mte Consultants	Conduct a variety of field sampling and data collection activities to support Phase I and Phase II Environmental Site Assessments, UST removals, site remediation projects and Risk Assessments.
Laboratory Technician (21)	SGS	Duties include: Sample reception, sample identification, sample preparation, sample dilutions, setting up analytical batches and analysis, batch Quality Control.
Environmental Planner (18)	AECOM	Provide researching and technical writing for a variety of environmental regulatory documents such as environmental assessments, environmental impact statements, and other compliance documents
Environmental GIS Technologist (12)	York Region	Reporting to the Program Manager, Source Water Protection, is responsible for maintaining and evolving the Branch and Department's geospatial data
Environmental Field Technician (9)	EXP	Responsible for the completion of various field investigations (test pits, borehole drilling, sampling), monitoring and associated reporting for a variety of Environmental Services
Ecologist (7)	AECOM	Lead or support a field crew to undertake data collection and field investigations to document baseline terrestrial ecology conditions according to study requirements.
Sustainability Coordinator (6)	Durham College	Coordinate, design and implement campus sustainability initiatives, programs and activities to reduce consumption, maximize waste diversion and reduce gas emissions.
Project Coordinator (5)	Provision Coalition	Assisting the Industry Program Manager with the coordination of the "Processing Food Sustainably" industry program.

There is overlap between the jobs for sciences and for studies, though as Table 9 indicated, there are also some specific environmental science positions that someone with a degree in environmental studies would likely not be eligible for.

Another way to assess the required skills for positions in sciences and studies is to compare cooccurring skills in posts for each group. Table 10 provides the top ten skills that occur along with environmental studies and with environmental sciences, using the same search parameters as those used to generate the tables above. Skills in both groups are italicised.

Environmental Sciences (574)	Environmental Studies (337)
Project Management (104)	Scheduling (89)
Biology (102)	Project Management (81)
Quality Assurance and Control (91)	Budgeting (74)
Chemistry (74)	Environmental Science (54)
Technical Support (71)	Customer Service (50)
Occupational Health and Safety (70)	Staff Management (49)
Budgeting (65)	Occupational Health and Safety (49)
Scheduling (60)	Spreadsheets (42)
Data Analysis (60)	Program Development (38)
<i>Customer Service (59)</i>	Environmental Management (38)

Table 10: Comparison of Skills for Jobs in Environmental Sciences and Studies

Table 10 demonstrates that people in environmental science roles are indeed expected to have a wellrounded education in the physical and life sciences, though a substantial number of positions calling for environmental studies also need candidates with scientific knowledge. There are several management and project planning skills needed for both groups, but we see that for environmental studies, such skills tend to emerge a bit more frequently in job posts.

We also wish to briefly note demand for GIS training, given that the Environmental Science program provides the option to acquire a GIS certificate. A brief search of Ontario positions from 2018 using Burning Glass reveals that there were 312 positions that listed GIS as a desirable skill. This includes municipal positions with the Region of Peel, City of Toronto, and York Region, federal and provincial government positions, and work with utility companies like Hydro One and Telus. Along with positions like GIS Technician and Specialist, students may look for positions like Systems Analyst, Planning Forester, and Operations Analyst.

Urban Studies

Our scan of urban studies positions required a Canada-wide search in order to acquire enough positions to make some meaningful observations about employers and skills. In general, the employers for people with training in urban studies are reasonably consistent: municipal governments, consulting



firms (such as McKinsey) and higher education institutes. Likewise, job titles in our pool are as expected, including titles like:

- Research Analyst / Analyst, Research
- Community Research Assistant
- Planner
- Development Planner

There are likely positions to be found in more specialized job boards that are not captured by the Labour Insight tool, but we gathered a sample of 194 positions from between 2015 and 2018 to assess desired skills. These positions all called for a candidate with experience and knowledge in the key word "urban studies." The pool of positions was not large enough to filter for positions that required only 0 to 2 years of experience. Nevertheless, these skills are worth considering since presumably some skills people will require over their career will come from their undergraduate education. Therefore, a sample of skills that co-occur with urban studies is provided below (in two columns, with number of associated positions in parenthesis).

Table 11: Skills in Urban Studies Positions,	Canada, 2015 to 2018
--	----------------------

Discipline Specific Skills	General/Business Skills
Land Use (69) ⁸	Budgeting (61)
Urban Planning (49)	Financial Management (33)
Regional Planning (30)	Economics (25)
Environmental Studies (20)	Staff Management (20)
Policy Development (19)	Data Analysis (19)

Notably, there is substantial overlap between positions seeking training in urban studies and positions for urban planners. Nevertheless, there is not a total identity between the two categories: positions like a program analyst for York Region, examining policies that respond to service gaps in the community, or a Housing Program Administrator for the City of Kingston explicitly call for degrees in urban studies. While there are a range of policy and government positions for people with urban studies degrees, we expect that people will need to demonstrate some capacity and knowledge in planning, as "planning" orientated skills emerged quite commonly in positions calling for knowledge in urban studies.

Briefly, we will also note some career outcomes associated with urban planning. To do this, we examined positions where urban planning emerged as a keyword in the job description. This generated a larger pool of positions to analyze. To help make the posts more relevant, we filtered them to examine ones that allowed applications from people with 0 to 2 years of experience. We thus ended up with a pool of 297 Canadian job postings from between 2015 and 2018. This pool includes a wide range of planner positions for municipalities (including positions like "Junior Planner" and "Planning Assistant.") These positions regularly require that the candidate have membership (or are working



⁸ "Land Use" is shorthand for land use planning. For instance, a position with the Friends of the Greenbelt Foundation seeks someone with "Knowledge of land use planning, environmental, and/or agricultural issues."

towards membership) with the Canadian Institute of Planners; a keyword search of the pool revealed that at least 92 positions call for CIP accreditation.

Table 12 provides a range of frequent co-occurring skills for the planner positions. As with table 11, we divide them into discipline specific skills and general/business skills. Again, the number of positions with the skill is provided in parenthesis.

Discipline Specific Skills	General/Business Skills
Land Use (117)	Project Management (64)
Urban Design (71)	Adobe Acrobat (58)
Community Planning (52)	Adobe Indesign (55)/Photoshop (54)
Municipal Planning (42)	Customer Service (49)
Land Development (36)	Economics (47)
Landscape Architecture (31)	Budgeting (43)
Policy Development (29)	SketchUp (41)
Regional Planning (25)	Real Estate Experience (34)
GIS (24)	Public Speaking (30)
Community Development (21)	AutoCAD (29)

Table 12: Skills in Urban Planning Positions, Canada, 2015 to 2018

Comparing tables 11 and 12, we see several similarities, particularly in terms of the discipline specific skills that are called for. This is in part because there is some overlap between the two groups—some planning positions also accept urban studies as a related discipline. However, table 12 also demonstrates that people entering planning are expected to have more substantial training with a range of design and visualization software. Also note that "policy development" emerges lower down the list for planning positions that for positions in urban studies.

Conclusion

While York has some challenges concerning its environmental programming, our scan of programming there, along with the long and influential history of the Faculty of Environmental Studies, makes us believe that the programming is starting from a position of relative strength. In particular, York's sense of mission and their courses that challenge norms and that highlight the intersections between environmental change, power, and inequities are vital given the scope of environmental and social challenges that confront us. Every program offers students career outcomes to some degree or another—there are fewer programs that can pair this with an underlying sense of mission. This sense should be preserved in any administrative re-organization.

This report is a document to generate discussion and further thinking, and not to provide proscriptive steps. However, there are some examples and approaches at other Canadian universities that merit consideration, including some greater incorporation of environmental sciences, making more explicit links to the surrounding environment and landscape, and some links to resource development and management. Our discussion with the Dean of Environment at Waterloo and our review of their faculty history suggests that periods of transition and new directions can create considerable challenge—they faced declining enrollment in the mid 2000s. To combat this, the faculty kept open to changes, recovered from a split between environment and architecture, and developed links with new departments lead to some positive changes that have contributed to their student population stabilizing and then growing.

Perhaps the most pressing need identified by this report is to rectify confusion generated by the multiple streams for urban studies. This is a situation that seems to be unique to York—most universities have one program or two programs relating to urban studies, with the main distinction being between urban studies and urban planning programs. The distinctions that currently exist in York's urban programs may be academically important, but they are likely of limited value to students navigating the distinctions between disciplines and approaches for the first time.

Our scan of job postings relating to the three fields indicates several potential career outcomes for students. The wide range of skills required for students in the environmental and planning sectors demonstrates the utility of providing an interdisciplinary education. Students might pursue a career with a construction and engineering firm, an NGO, or a municipal government. Our scan for urban studies and planning positions suggests that there are more positions in the latter field, suggesting that there is value in ensuring that students taking an urban studies degree should take some courses in urban planning to keep as many career directions open as possible. The labour market review also indicates that students in the environmental fields should have some exposure to the sciences to maximize the number of positions that they are eligible for.

Environmental programming remains timely and essential. We at HESA are hopeful that this report has provided points to generate discussion and to facilitate new questions for future program development to ensure that York's programming remains vibrant.



VPRI Annual Update 2019

APPRC - Appendix C

2

Dr. Rui Wang, Interim Vice-President Research & Innovation

Royal Society of Canada 2019

Academy of Social Sciences



Patrick Cavanagh Department of Psychology, Glendon

Academy of Arts & Humanities



Jonathan Edmondson Department of History, Faculty of Liberal Arts & Professional Studies



Anna Hudson Department of Visual Art & Art History, School of the Arts, Media, Performance & Design

College of New Scholars, Artists & Scientists



Rebecca Pillai Riddell Department of Psychology, Faculty of Health



Marlis Schweitzer Department of Theatre, School of the Arts, Media, Performance & Design



Zheng Hong (George) Zhu Department of Mechanical Engineering, Lassonde School of Engineering

Canada Research Chairs 2019

Tier 1



Manus (Johnny) Rungtusanatham Schulich School of Business CRC in Supply Chain Management



Nikolaus Troje Faculty of

Science CRC in Reality Research

Tier 2



Mary Bunch School of the Arts, Media, Performance & Design CRC in Vision, Disability and the Arts



Theodore J. Noseworthy Schulich School of Business CRC in Entrepreneurial Innovation and the Public Good (renewed)



Joel Zylberberg Faculty of Science CRC in Computational Neuroscience

York Research Chairs 2019

Tier 1



Benjamin L. Berger Osgoode Hall Law School YRC in Pluralism and Public Law



Janine Marchessault School of the Arts, Media, Performance & Design YRC in Media Arts and Community Engagement



Gary Sweeney Faculty of Science YRC in Mechanisms of Cardiometabolic Diseases





Uzo Anucha

Faculty of

Liberal Arts &

Professional

Studies

YRC in Youth

and Context of Inequity



Hany Farag Lassonde School of Engineering YRC in Integrated Smart Energy Grids



Ryan Hili Faculty of Science YRC in Molecular Evolution



Brent Lyons Schulich School of Business YRC in Stigmatization and Social Identity



John Moores Lassonde School of Engineering YRC in Space Exploration



Amy Muise Faculty of Health YRC in Relationships and Sexuality

Recognizing Leadership in Research 2019

President's Emerging Research Leadership (PERLA) Award 2019



Christine Till Department of Psychology, Faculty of Health President's Emerging Research Leadership (PERLA) Award 2019



Marcello Musto Department of Sociology, Faculty of Liberal Arts & Professional Studies



Recognizing Leadership in Research 2019

President's Research Impact (PRIA) Award 2019



Julia Creet Department of English, Faculty of Liberal Arts & Professional Studies President's Research Excellence (PREA) Award 2019



Deanne Williams Department of English, Faculty of Liberal Arts & Professional Studies



Other Notable Awards 2019

SSHRC Impact Award (Insight Award Category)



Leah F. Vosko Department of Politics, Faculty of LA&PS An expert on precarious employment, employment standards enforcement, and migrant work and Canada Research Chair in Political Economy of Gender and Work

Polanyi Prize in Chemistry & 2019 Petro-Canada Young Innovator Award



Christopher Caputo Department of Chemistry, Faculty of Science

BeeCSI: 'omic tools for assessing bee health -\$10M grant from Ontario Genomics and Genome Canada



Amro Zayed Department of Biology Faculty of Science

2019 Governor General's Awards in Visual and Media Arts



Ali Kazimi Department of Cinema & Media Arts, School of the Arts, Media, Performance & Design



Research Performance: Building Capacity for Research Success

SSHRC CRSH

- 30 Insight grants =\$4.1M
- 24 Insight Development grants = \$1.3M



- 48 Discovery grants =\$8.4M, (70% success rate)
- 2 Collaborative Research & Development Grant=\$2.1M
- 2 Research Tools & Instruments Grants =\$450,000



• 3 Project Grants= \$2.27M



CANADA FOUNDATION FONDATION CANADIENNE FOR INNOVATION POUR L'INNOVATION

• 3 awards in the John R. Evans Leaders Fund (JELF)



• 4 New Frontiers in Research Fund - 2018 Exploration Stream Competition (NFRF) =\$996,000



• 2 Early Researcher Awards





The Federal Network of Centres of Excellence Program

Making the Shift Youth Homelessness Solutions Impact Accelerator (MtS) is a partnership of networks and centres of excellence that will transform how we respond to youth homelessness in Canada

5 year grant (April 1, 2019-March 31, 2024) for \$17.9M. Operations began April 1, 2019

Making the Shift project partnership model includes over 100 researchers, 18 universities and 33 networks, centres and institutes

Partner and other matching cash and in kind total \$25M over 5 years (total = \$43M)



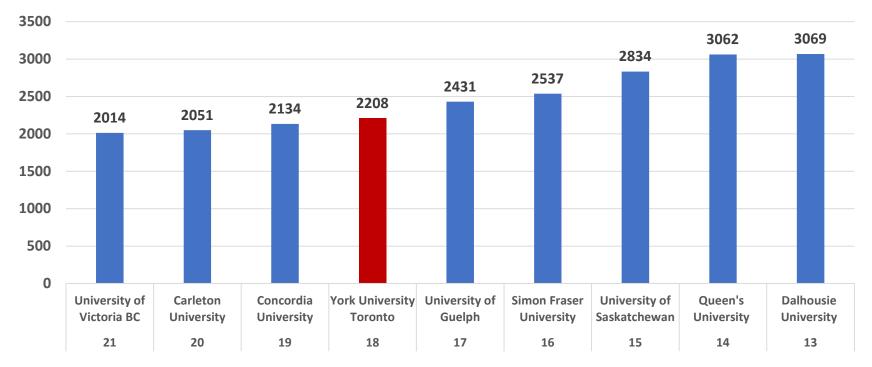
Announced at York on May 23



Research Productivity – Number of Publications 2018

Source: SciVal Data

Research Productivity- Number of Publications 2018 Source: SciVal Data



Ranking out of 49 Canadian Universities

*Scival Publications include articles, conference papers, reviews, books and book chapters



Research Success

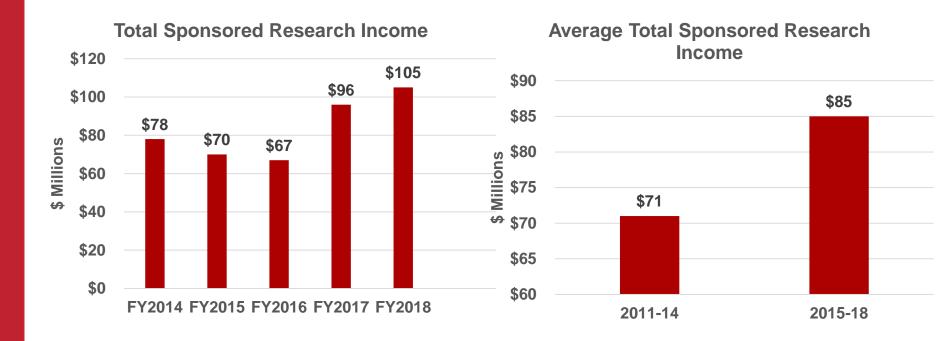
An increase of 9.5% over last year.

Currently York is over \$9M ahead of the previous years total sponsored research income

In fall 2019, York reported over \$100M (\$105M FY2018) in research income for the first time (Re\$earch Infosource)



York's Sponsored Research Income



Ranked #21 in Canada from 2014 onwards

- 2019 Research Infosource
- Sponsored research income: includes all funds to support research received in the form of a grant, contribution or contract from all sources external to the institution.

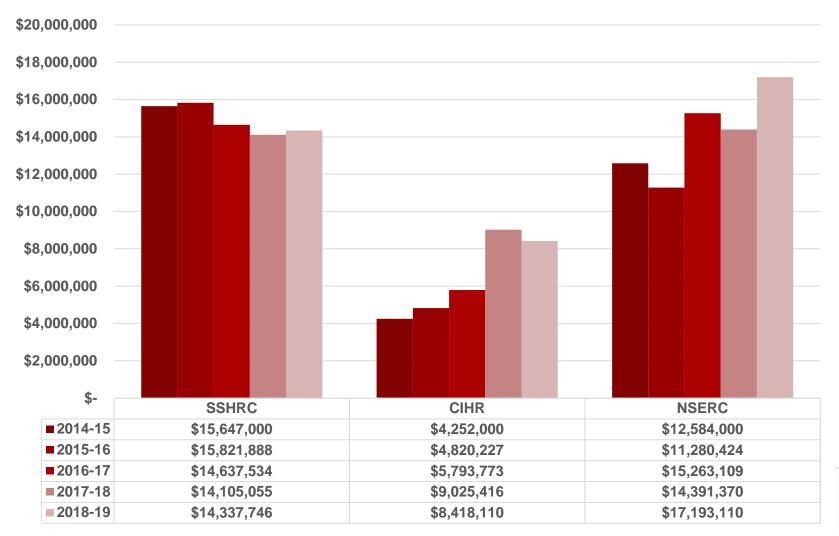
National Rankings 2019 RE\$EARCH Infosource

Rank			Sponsored Research Income			Research Intensity	
2018	2017	2016	University	FY2018 \$000	FY2017 \$000	FY2016 \$000	\$ per Faculty \$000
15	18	17	Sherbrooke	\$160,248	\$132,455	\$133,180	\$137.1
16	16	15	Guelph	\$149,829	\$140,294	\$148,911	\$188.5
17	17	18	Simon Fraser	\$142,598	\$138,964	\$109,916	\$160.9
18	15	16	Dalhousie	\$141,311	\$150,038	\$135,958	\$123.2
19	19	19	Victoria	\$118,599	\$114,922	\$99,589	\$164.0
20	20	20	Memorial	\$116,796	\$111,778	\$91,178	\$118.0
21	21	21	York	\$105,168	\$96,030	\$66,566	\$78.0
22	22	22	UQAM	\$70,947	\$67,790	\$63,935	\$64.3
23	24	23	Carleton	\$70,298	\$54,369	\$58,690	\$85.3
24	23	24	INRS	\$64,018	\$64,434	\$55,748	\$418.4
25	25	25	Concordia	\$55,999	\$53,099	\$50,810	\$67.6
26	27	26	Ryerson	\$48,664	\$47,832	\$47,130	\$60.8
27	28	30	Laurentian	\$44,013	\$32,068	\$23,444	\$110.3
28	26	27	New Brunswick	\$38,694	\$48,206	\$38,128	\$85.6

* Sponsored research income: includes all funds to support research received in the form of a grant, contribution or contract from all sources external to the institution.

York Tri-Council Research Funding 'Federal Grants' Funding

Source: COFO Financial Report of Ontario Universities



total values for the three agencies under sponsored research are the amount which Research Accounting provides for fund 500 revenue plus the SSHRC and NSERC scholarships in fund 600

Other Expressions of York's Scholarly & Creative Leadership

Creative Activity (eg:)

• A sampling of York's innovative research featured at CRAM, Canada's first learning festival bridging the gap between research and the public.



- Collaborative project brings together filmmakers to create short IMAX films in a fine art tradition- showcased across Canada
- Celebrated art sculptures speak to the power and connectivity of public art and relationship to history
- Several York documentaries receive international acclaim and awards.
- Medieval historic discovery made through accurate dating of a Canterbury Cathedral stained glass panel
- Commemorating a WWII tragedy through song
- Intermedia artists continue to blur the lines between the real and the virtual through art and performance



Communicating York's Research

Over the last three years the VPRI website has seen a 4-fold increase in traffic with a 1145% increase in content creation/output on VPRI website



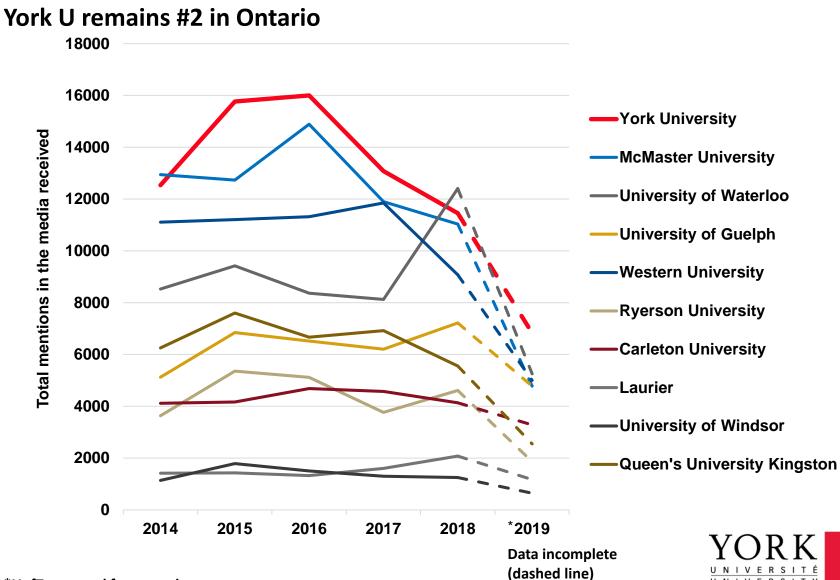
@YUResearch has seen nearly 1,500 new Twitter followers since September 2016
@YUResearch is No. 2 in Ontario, second only to U of T.
@YUResearch is No. 3 in Canada, after U of Alberta and U of T

2 MINUTES 3 QUESTIONS York's research video series "2 Minutes, 3 Questions" has been seen by 10,000 viewers since it launched in January 2017



Mass Media- Online Mentions- York Research

Source: SciVal

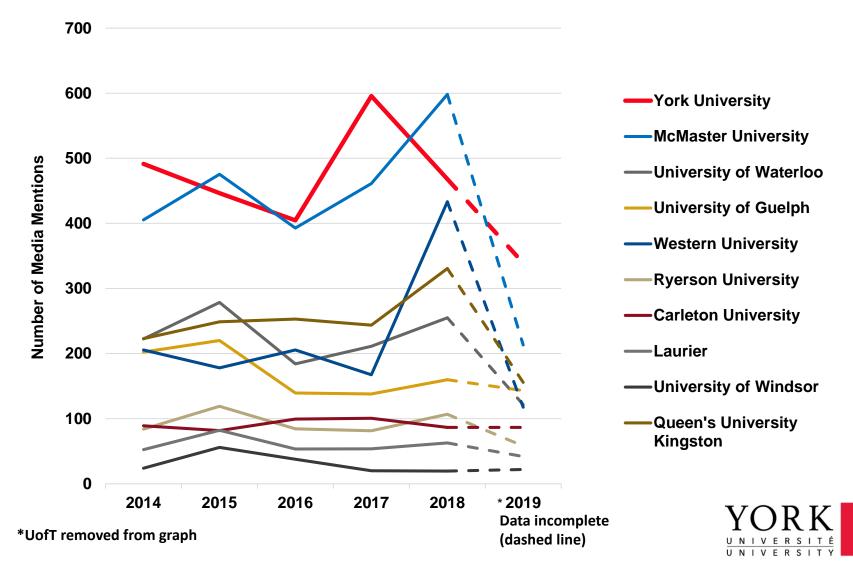


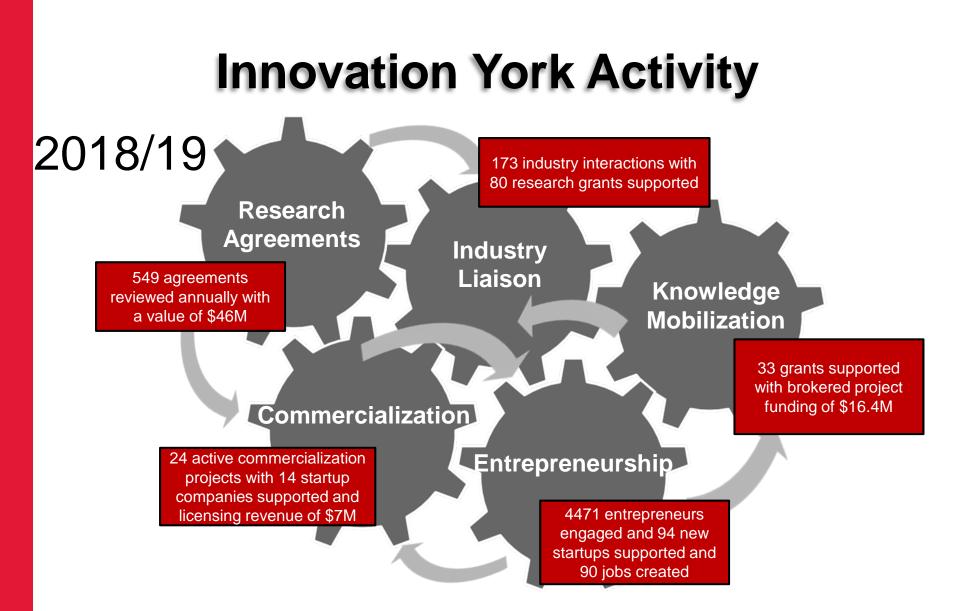
*UofT removed from graph

Media Exposure Print Mentions- York Research

Source: SciVal

York U remains #2 in Ontario







Supporting Entrepreneurs



Innovation York has been awarded \$1.9M in funding to develop and launch an entrepreneurship program under the Federal Government's Women's Entrepreneurship Strategy (WES).

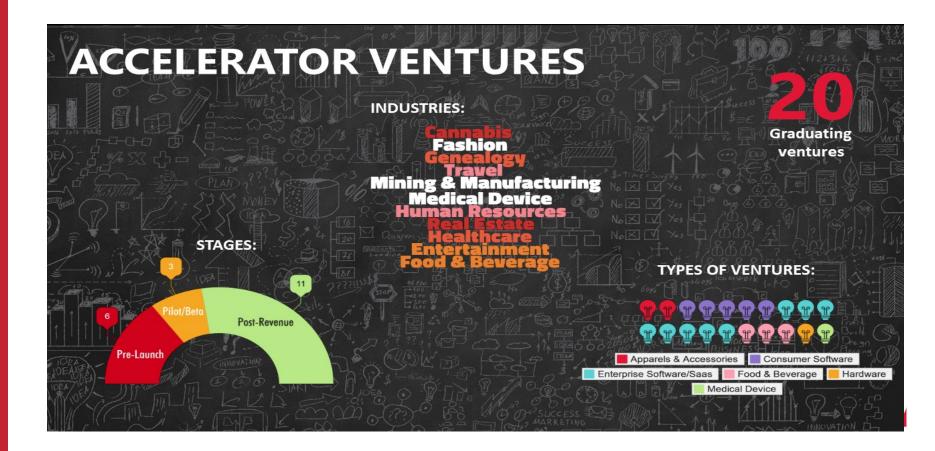
Working with small business enterprise centres in York Region, Innovation York will develop and launch the Entrepreneurial Leadership and Learning Alliance (ELLA), a program created for women and delivered by women focusing on issues that create barriers to successful business creation and growth





LaunchYU Accelerator

The LanuchYU Accelerator is a 4-month program designed to support a mix of students, alumni and community member entrepreneurs as they build, launch and scale their ventures. Program ran for the fifth time this summer.





LaunchYU Accelerator

Featured Startups





Blade Filters Inc. creates activated, indoor, carbon air filters for odour removal and filtration purposes. Aird & Berlis Startupsource Market Entry Award in winter 2019. The \$25,000 award includes \$12,500 in cash and an equal amount in Aird & Berlis StartupSource legal services.

-Raised \$350K CDN Seed Round

-\$85k in Grant Funding

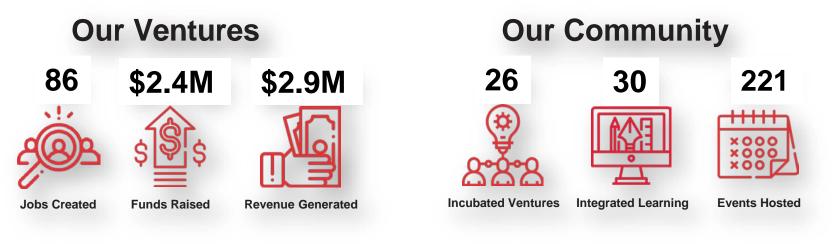
-\$500k Purchase Orders Confirmed

-\$5 million of Purchase Orders pipeline based on success of initial pilot in September ARFront provides Augmented reality solutions for industrial, and commercial uses .The patented solution connects experts and novices on an Augmented reality enabled live video call where the expert can annotate, use PDFs, 3D models, and more all at once.

Raised a pre-Series A round with \$4.5 million USD. Since they started commercializing their product in early 2018, they have generated over \$1.7 million USD in revenues around the world.



YSpace opened its doors in January 2018, and in less than a year, YSpace has experienced significant growth in all activity areas and, as a result, has doubled the size of its incubator. The innovation hub is currently home to 33 startup ventures and 11 entrepreneurs in residence (EiRs), and has held over 221 events for the community. It has generated over \$2.9 million of revenue and raised over \$2.4 million in funding.









In the News

YSpace has been recently featured in a number of high profile publications, helping to raise the visibility and promote the overall success of YSpace:







York Region

A magnet for talent

The Greater Toronto region is ready to break out as a leading global tech hub, outpacing established regions like Seattle and San Francisco's Bay Area in job creation, talent and workforce diversity.

The secret of its success may be greater than Toronto itself. "When we talk about the startup community, people think of downtown," says Sarah Howe of York University. "But you need to get out of downtown to get the full story."

Howe would know. She is director of Innovation York, the university's innovation unit, and last year presided over the launch of **YSpace**, a tech accelerator that serves the Regional Municipality of York, which runs 70 kilometres north to Lake Simcoe and has a population of more than 1.2 million.

Within six months of opening, Howe says, YSpace had to double its floorspace. "The demand from startups who were raising seed or series A rounds, hiring people, looking for co-op students and interns was just unbelievable." And in just one year, YSpace's 22 startups have raised



\$1.3 million in funding and generated \$2.4 million in revenue.

Thanks to the support of accelerators like YSpace, the Applied Research, Innovation and Entrepreneurship (ARIE) program at Seneca College, and the ventureI.AB Regional Innovation Centre in Markham, many talented workers have found jobs at rapidly scaling local companies like SkyX, Densify, Doxim and Pond Technologies, which together have raised over \$90 million. In fact, York Region has more workers employed in tech per capita than any other place in Canada.

A total of 4,300 technology companies call York Region home, including multinationals like IBM, Siemens, GM, Qualcomm, Oracle and GE. And many of these companies—for example, Magna International, ATI Technologies and Compugen—were actually founded in the region. "I don't think people recognize the potential that has already come to fruition here," says Howe.





Supporting Entrepreneurs

Food Accelerator Program-One of the first of its kind in the GTA, our five month



help promising food and beverage consumer-packaged goods (CPG) ventures build their strategy, grow their network and scale their business.

Launched 6 companies with high potential products



Coming Attractions

- Artificial Intelligence & Society Task Force to report
 - Examining options for building and featuring York's research strengths and curriculum offerings in AI
 - Recommendations report will be released in early December
- Electronic Curriculum Vitae (ECV)
 - Task Force developed to evaluate ECV management software systems for implementation
 - RFP published, vendors shortlisted and invited to present in early December.
- Research Commons
 - Developing a series of research development and mentoring workshops throughout the winter term for all Faculty that offer critical intelligence on how to do research at York.
- Enhancing Indigenous initiatives that enable research in Indigenous context
 - Continue to support Indigenous research and reduce barriers
 - Including a charter application for the creation of an institutionally based ORU

Comments, Questions, Discussion



