

2024-25 School of Graduate Studies Calendar

Collaborative Specializations

The School of Graduate Studies offers approximately 40 graduate collaborative specializations (CSs). This specialization category emerges from cooperation between two or more graduate units and their graduate programs. The student has a broader base from which to explore a novel interdisciplinary area or some special development in a particular discipline.

The student must be admitted to, and enrol in, one of the collaborating graduate units (known as a “home” unit) and must fulfil all the requirements of the degree program in the home unit and any additional requirements of the CS. Each CS is designed to allow a focus in the area of specialty. On successful completion of the specialization, the student receives a transcript notation indicating completion of the collaborative specialization, in addition to the degree.

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Addiction Studies

Addiction Studies: Introduction

Lead Faculty of the Collaborative Specialization

Public Health

Participating Degree Programs

Counselling and Clinical Psychology — MA, PhD
 Criminology and Sociological Studies — MA, PhD
 Medical Science — MSc, PhD
 Nursing Science — PhD
 Pharmaceutical Sciences — MSc, PhD
 Pharmacology — MSc, PhD
 Psychology — MA, PhD
 Public Health Sciences — MPH, MSc, PhD
 Social Work — MSW, PhD
 Sociology — MA, PhD

Overview

The graduate programs listed above, in collaboration with the Centre for Addiction and Mental Health and the Ontario Tobacco Research Unit, participate in the Collaborative Specialization in Addiction Studies at the University of Toronto. The purpose of the Addiction Studies specialization is to develop and integrate graduate training in the multidisciplinary field of addictions, an area that includes the use and abuse of alcohol, tobacco, and psychoactive substances, as well as gambling and other addictive behaviours. Master's programs requiring a thesis, practicum, or research paper, and doctoral programs are included. Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Addiction Studies" on their transcript.

Contact and Address

Web: www.dlsph.utoronto.ca/program/collaborative-specialization-in-addiction-studies

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 33 Ursula Franklin Street
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 Telephone: 416-535-8501 ext. 34428
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Addiction Studies: Master's Level

Minimum Admission Requirements

- Applicants must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units. They must contact the collaborating professor within their graduate unit directly.

Completion Requirements

- Students must meet all requirements of their home graduate unit in terms of coursework and thesis work, or equivalent.
- Master's students in the collaborative specialization are required to complete:
 - PAS3700H *Multidisciplinary Aspects of Addictions*
 - 0.5 full-course equivalent (FCE) selected from the following list of approved elective courses or an approved directed reading course:
 - APD1291H *Addictive Behaviours: Approaches to Assessment and Intervention*
 - CHL5120H *Population Health Perspectives on Mental Health and Addictions*
 - CHL5417H *Tobacco and Health: From Cells to Society*
 - MSC1085H *Molecular Approaches to Mental Health and Addictions*
 - PAS3701H *Advanced Research Issues in Addictions*
 - PCL3100H *Behavioural Pharmacology I*
 - PCL3101H *Behavioural Pharmacology II*
 - SWK4616H *Drug Dependencies: Interventive Approaches*
- The student's thesis must deal with a subject in the field of addictions. The thesis is supervised and evaluated in the same manner as others in the home graduate unit, but normally involves, as appropriate, supervisory and examining professors from other disciplines represented in the collaborative specialization. In collaborating graduate units that do not require a thesis, a practicum or major research paper will be accepted instead of a thesis, as long as the topic or focus is directly related to addictions. In collaborating graduate units that do not have a thesis or equivalent requirement, students must take a third 0.5 FCE from the list of approved electives.

Addiction Studies: Doctoral Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units. They must contact the collaborating professor within their graduate unit directly.

Completion Requirements

- Students must meet all requirements of their home graduate unit in terms of coursework and thesis work, or equivalent.
- Doctoral students in the collaborative specialization are required to complete:
 - PAS3700H *Multidisciplinary Aspects of Addictions*, if they have not already done so
 - an additional 0.5 full-course equivalent (FCE) (not taken previously) from the following list of approved elective courses or an approved directed reading course:
 - APD1291H *Addictive Behaviours: Approaches to Assessment and Intervention*
 - CHL5120H *Population Health Perspectives on Mental Health and Addictions*
 - CHL5417H *Tobacco and Health: From Cells to Society*
 - MSC1085H *Molecular Approaches to Mental Health and Addictions*
 - PAS3701H *Advanced Research Issues in Addictions*
 - PCL3100H *Behavioural Pharmacology I*
 - PCL3101H *Behavioural Pharmacology II*
 - SWK4616H *Drug Dependencies: Interventive Approaches*
- The student's thesis must deal with a subject in the field of addictions. The thesis is supervised and evaluated in the same manner as others in the home graduate unit, but normally involves, as appropriate, supervisory and examining professors from other disciplines represented in the collaborative specialization. In collaborating graduate units that do not require a thesis, a practicum or major research paper will be accepted instead of a thesis, as long as the topic or focus is directly related to addictions. In collaborating graduate units that do not have a thesis or equivalent requirement, students must take a third 0.5 FCE from the list of approved electives.

Addiction Studies: Courses

Core Course

Course Code	Course Title
PAS3700H	Multidisciplinary Aspects of Addictions

Elective Courses

Course Code	Course Title
APD1291H	Addictive Behaviours: Approaches to Assessment and Intervention
CHL5120H	Population Health Perspectives on Mental Health and Addictions
CHL5417H	Tobacco and Health: From Cells to Society
MSC1085H	Molecular Approaches to Mental Health and Addictions
PAS3701H	Advanced Research Issues in Addictions
PCL3100H	Behavioural Pharmacology I
PCL3101H	Behavioural Pharmacology II
SWK4616H	Drug Dependencies: Interventive Approaches

Aging, Palliative and Supportive Care Across the Life Course

Aging, Palliative and Supportive Care Across the Life Course: Introduction

Lead Faculty of the Collaborative Specialization

Social Work

Participating Degree Programs

Adult Education and Community Development — MA, MEd, PhD
 Anthropology — MA, MSc, PhD
 Counselling and Clinical Psychology — MA, PhD
 Counselling Psychology — MEd, EdD
 Dentistry — MSc, PhD
 Health Administration — MHSc
 Health Policy, Management and Evaluation — MSc, PhD
 Information — MI, PhD
 Medical Science — MSc, PhD
 Music — MA, PhD
 Nursing Science — MN, PhD
 Pharmaceutical Sciences — MSc, PhD
 Psychology — MA, PhD
 Public Health Sciences — MPH, MSc, PhD
 Rehabilitation Science — MSc, PhD
 Social Work — MSW, PhD
 Sociology — MA, PhD
 Women and Gender Studies — MA

Overview

The Collaborative Specialization in Aging, Palliative and Supportive Care Across the Life Course prepares students for specialization in the field of aging and/or the field of palliative and supportive care, with an emphasis on viewing aging and palliative issues within the perspective of the life course. The collaborative specialization offers students two options of study:

- aging and the life course;
- palliative and supportive care.

Students must apply to and register in a home participating unit (i.e., one of the graduate programs listed above), and follow a course of study acceptable to both the graduate unit and the Collaborative Specialization in Aging, Palliative and Supportive Care Across the Life Course.

Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Aging, Palliative and Supportive Care Across the Life Course" on their transcript.

Contact and Address

Web: www.aging.utoronto.ca
 Telephone: (416) 978-0377
 Email: aging@utoronto.ca

Collaborative Specialization in Aging, Palliative and Supportive Care Across the Life Course
 University of Toronto
 Room 214, 246 Bloor Street West
 Toronto, Ontario M5S 1V4
 Canada

Aging, Palliative and Supportive Care Across the Life Course: Master's Level

Minimum Admission Requirements

- Applicants must apply to a participating graduate unit and comply with the admission procedures of that unit. Applicants may apply concurrently to their participating graduate unit and to the Collaborative Specialization in Aging, Palliative and Supportive Care Across the Life Course.
- Applicants must forward the following to the committee of the Collaborative Specialization in Aging, Palliative and Supportive Care Across the Life Course:
 - a. A copy of the School of Graduate Studies application form submitted to the participating graduate unit.
 - b. Copies of official undergraduate and graduate transcripts from all institutions previously or currently attended.
 - c. A resumé or curriculum vitae (CV).
 - d. A letter explaining how their course of study and specific research interests relate to either option 1 in aging and the life course, or option 2 in palliative and supportive care at the graduate level.
- Students may use copies of official documents (a. and b. above) for their application to the Collaborative Specialization in Aging, Palliative and Supportive Care Across the Life Course. These may be obtained from their home participating graduate unit.

Completion Requirements

MA in Adult Education and Community Development;
MA and MSc in Anthropology;
MA in Counselling and Clinical Psychology;
MEd in Counselling Psychology;
MSc in Dentistry;
MHSc in Health Administration;
MSc in Health Policy, Management and Evaluation;
Master of Information (Thesis and Co-op Options);
MSc in Kinesiology;
MSc in Medical Science;
MA in Music;
Master of Nursing Science;
MSc in Pharmaceutical Sciences;
MA in Psychology;

Master of Public Health;
MSc in Rehabilitation Science;
Master of Social Work;
MA in Sociology;
MSc in Speech-Language Pathology;
MA in Women and Gender Studies

In addition to meeting the program requirements of their home graduate unit, students must complete:

- The core course for the chosen option (i.e., aging and the life course or palliative and supportive care): AGE1000H *Multidisciplinary Research Concepts in Palliative and Supportive Care* or AGE2000H *Principles of Aging*.
- One elective course (0.5 FCE) from a) the chosen option's pre-approved elective list **or** b) the student's home graduate unit list of courses and/or other graduate-level elective courses, provided the focus of the student's assignments is in the area of this specialization (aging or palliative) and the course is approved by the specialization committee as a suitable elective.
- The major research paper, thesis, or practicum in the participating degree program will be on a topic in the chosen option of this specialization.

Master of Information (Coursework-Only Option)

In addition to meeting the program requirements of their home graduate unit, students must complete:

- The core course for the chosen option (i.e., aging and the life course or palliative and supportive care): AGE1000H *Multidisciplinary Research Concepts in Palliative and Supportive Care* or AGE2000H *Principles of Aging*.
- Four elective courses (2.0 FCEs), one of which can be a practicum course, from a) the chosen option's pre-approved elective list **or** b) the student's home graduate unit list of courses and/or graduate-level elective courses, where the topic of the major paper or practicum field is in the area of the chosen specialization (aging or palliative). Courses not on the pre-approved list must be approved by the collaborative specialization director and/or committee, after consultation with the Information faculty member associated with the collaborative specialization and, as needed, the course instructor, to count towards the collaborative specialization requirements.

MEd in Adult Education and Community Development

In addition to meeting the program requirements of their home graduate unit, students must complete:

- The core course for the chosen option (i.e., aging and the life course or palliative and supportive care): AGE1000H *Multidisciplinary Research Concepts in Palliative and Supportive Care* or AGE2000H *Principles of Aging*.
- Two elective courses (1.0 FCE) from a) the chosen option's pre-approved elective list **or** b) the student's home graduate unit list of courses and/or other graduate-level courses, provided the focus of the student's assignments is in the area of this specialization (aging or palliative) and the course is approved by the specialization committee as a suitable elective.

Aging, Palliative and Supportive Care Across the Life Course: Doctoral Level

Minimum Admission Requirements

- Applicants must apply to a participating graduate unit and comply with the admission procedures of that unit.
- Applicants may apply concurrently to their participating graduate unit and to the Collaborative Specialization in Aging, Palliative and Supportive Care Across the Life Course.
- Applicants must forward the following to the collaborative specialization committee:
 - A copy of the School of Graduate Studies application form submitted to the participating graduate unit.
 - Copies of official undergraduate and graduate transcripts from all institutions previously or currently attended.
 - A resumé or curriculum vitae (CV).
 - A letter explaining how their course of study and specific research interests relate to either option 1 in aging and the life course, or option 2 in palliative and supportive care at the graduate level.
 - Two letters of reference.
- Students may use copies of official documents (i.e., application form and transcripts) for their application to the Collaborative Specialization in Aging, Palliative and Supportive Care Across the Life Course. These may be obtained from the participating home graduate unit.

Completion Requirements

- In addition to meeting the program requirements of their home graduate unit, students will be required to complete both the
 - master's-level core course: AGE1000H *Multidisciplinary Research Concepts in Palliative and Supportive Care* or AGE2000H *Principles of Aging* and
 - doctoral-level core course: AGE1500H *Advanced Research Methodologies in Palliative and Supportive Care* or AGE3000H *Advanced Research Seminar in Aging and the Life Course*, and
 - one elective course (0.5 FCE) for either of the two options.
- The master's-level course must be completed before enrolling in the doctoral-level course.
- It is expected that the student's thesis or practicum (whichever is included in his or her program of study) would be in his or her chosen study areas (i.e., in either aging and the life course or palliative and supportive care).

Aging, Palliative and Supportive Care Across the Life Course: Courses

Core Courses for Option 1: Aging and the Life Course

Master's Level

Course Code	Course Title
AGE2000H	Principles of Aging

Doctoral Level

Course Code	Course Title
AGE3000H	Advanced Research Seminar in Aging and the Life Course

Core Courses for Option 2: Palliative and Supportive Care

Master's Level

Course Code	Course Title
AGE1000H	Multidisciplinary Research Concepts in Palliative and Supportive Care

Doctoral Level

Course Code	Course Title
AGE1500H	Advanced Research Methodologies in Palliative and Supportive Care

Elective Courses for Option 1 or 2

Special topics courses can be taken as part of the program requirements of this collaborative specialization. Students must check their home graduate unit's website for course availability in any given session.

Course Code	Course Title
DEN1003H	Preventive Dentistry

Course Code	Course Title
NUR1057H	Interventions to Enhance Health, Abilities, and Well-Being
SLP1533Y	Aphasia
SLP1534H	Motor Speech Disorders
SOC6707H	Intermediate Data Analysis
SWK4614H	Social Work Practice in Palliative Care (Social Work students only)
SWK4618H	Special Issues in Gerontological Social Work
SWK4634H	Family Practice Across the Life Cycle
SWK4641H	Special Topics in Social Work in Gerontology
SWK4803H	Special Studies III

Requests to approve other courses as equivalent to fulfil collaborative specialization requirements may be made to the collaborative specialization committee. Students taking either option may choose the master's core course in the other option as an elective.

Additional Electives for Option 2 Only

Course Code	Course Title
HAD5301H	Introduction to Clinical Epidemiology and Health Care Research
HAD5730H	Economic Evaluation Methods for Health Systems Research
HAD5771H	Resource Allocation Ethics
MSC1090H	Introduction to Computational Biostatistics with R
NUR1021H	Nursing Ethics
NUR1024H	Foundations of Qualitative Inquiry
NUR1025H	Doing Qualitative Research: Design and Data Collection
NUR1045H	Theories of Pain: Impact on the Individual, Family, and Society
NUR1046H	Persistent Illness: Theoretical, Research, and Practice Implications
NUR1050H	Coping With Illness
PHL2145H	Bioethics
PHL2146Y	Topics in Bioethics

Ancient and Medieval Philosophy

Ancient and Medieval Philosophy: Introduction

Lead Faculty of the Collaborative Specialization

Arts and Science

Participating Degree Programs

Classics — PhD
Medieval Studies — PhD
Philosophy — PhD

Overview

The graduate units listed above participate in the Collaborative Specialization in Ancient and Medieval Philosophy. The three units contribute courses and provide facilities and supervision of doctoral research. Ancient and Medieval Philosophy operates only at the doctoral level. The specialization is administered by a committee, which is drawn from all three units and is chaired by the director, who is a member of the committee.

Students who wish to enrol in the collaborative specialization must apply to and be admitted to both the doctoral program in one of the collaborating graduate units and the collaborative specialization. Upon successful completion of the doctoral degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Ancient and Medieval Philosophy" on their transcript.

Interested students should contact the director and the graduate coordinator of the unit in which they intend to register.

Contact and Address

Web: csamp.utoronto.ca
Email: csamp@utoronto.ca
Telephone: (416) 978-3178
Fax: (416) 978-8703

Ancient and Medieval Philosophy: Doctoral Level

Minimum Admission Requirements

- All applicants must meet the admission criteria of the unit through which they wish to enrol.

Completion Requirements

- Students must fulfil the normal requirements of the PhD in their home unit.
- Students will normally concentrate in either ancient or medieval philosophy, though it is not necessary to indicate such specialization formally. Their plan of study must also be approved by the collaborative specialization committee and must include the following elements:
 - 1.0 full-course equivalent (FCE) in some area of philosophy other than the history of philosophy.
 - Successful completion of the proseminar (AMP2000Y).
 - A language competence examination at the appropriate level (in at least one of Greek, Classical or Medieval Latin, or Arabic, as relevant) consisting of unseen translation must be successfully completed before the major field or area examinations are first attempted.
 - Area, qualifying, or major field examinations must contain a paper involving translation from at least one of Greek, Classical or Medieval Latin, or Arabic (as appropriate to the area or field). This examination will be based on a substantial list of texts relevant to the field or area.
 - A reading knowledge of two modern languages other than English.
- In most cases, some of these elements will be fulfilled by program requirements in the doctoral program of the home unit.

Ancient and Medieval Philosophy: Courses

Required Course

AMP2000Y *Collaborative Specialization in Ancient and Medieval Philosophy (CSAMP) Proseminar*

Bioethics

Bioethics: Introduction

Admissions to this collaborative specialization have been administratively suspended.

Lead Faculty of the Collaborative Specialization

Public Health

Participating Degree Programs

Health Administration — MSc
 Health Policy, Management and Evaluation — MSc, PhD
 Law — LLM, SJD
 Medical Science — MSc, PhD
 Nursing Science — MN, PhD
 Pharmaceutical Sciences — MSc, PhD
 Philosophy — MA, PhD
 Public Health Sciences — MPH, MSc, PhD
 Rehabilitation Science — MSc, PhD
 Religion — MA, PhD
 Social Work — PhD
 Women and Gender Studies — MA

Overview

The graduate units listed above participate in the Collaborative Specialization in Bioethics at the master's and doctoral levels.

Applicants with an interest in bioethics register in one of the graduate units associated with the Collaborative Specialization in Bioethics. Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Bioethics" on their transcript.

Contact and Address

Web: jcb.utoronto.ca
 Email: jcb.ea@utoronto.ca
 Telephone: (416) 978-1906
 Fax: (416) 978-1911

Collaborative Specialization in Bioethics
 Joint Centre for Bioethics (JCB)
 University of Toronto
 Suite 754, 155 College Street
 Toronto, Ontario M5T 1P8
 Canada

Bioethics: Master's Level

Minimum Admission Requirements

- Applicants to the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units.
- Students interested in the master's programs apply to both the collaborating graduate unit and the Collaborative Specialization in Bioethics. Applications for admission to the collaborative specialization are considered only after admission to the collaborating graduate unit. If a student applies to more than one unit, a copy of each file must be submitted to the collaborative specialization at the contact above.
- Visit the Collaborative Specialization in Bioethics website for the application form and details about supporting documentation. The application must be accompanied by:
 - application form
 - an up-to-date curriculum vitae (CV)
 - up-to-date copies of all transcripts
 - a one-page letter of intent
 - two letters of reference.
- Where a thesis is required, an email or note from the proposed supervisor indicating willingness to supervise the student should be submitted to the Collaborative Specialization in Bioethics at the contact above. The JCB website lists faculty and bioethicists who are available for advice relating to research proposals.

Completion Requirements

- Students will be expected to meet the requirements of the home graduate unit as well as those of the Collaborative Specialization in Bioethics. Students should check with their home graduate program whether the collaborative specialization course requirements may be counted towards the degree.
- Students must complete:
 - SRM3333Y, a credit/no credit graduate seminar series in bioethics.
 - PHL2145H, a review of the philosophical foundations of bioethics. Students who have completed an equivalent graduate course in philosophical bioethics may apply to the Program Director to have this requirement waived.
 - Bioethics-related 0.5 full-course equivalent (FCE), normally from the suggested list below.
- Master's programs require either a thesis or equivalent research project as determined by the home unit. The thesis will be supervised by a thesis committee comprising a supervisor and two other members, at least one of whom is identified as an affiliated Collaborative Specialization in Bioethics faculty member. The thesis is evaluated according to the procedures and standards of the home graduate unit and must fall within the broad area of bioethics. Non-thesis projects require supervision; requirements for such projects will be determined by the home unit. Students in coursework-only degree programs must complete additional coursework in approved bioethics electives.
 For the Master of Laws (LLM) coursework-only option, 1.0 FCE in additional courses in bioethics are required.

Bioethics: Doctoral Level

Minimum Admission Requirements

- Applicants to the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units.
- Students interested in the doctoral programs apply to both the collaborating graduate unit and the Collaborative Specialization in Bioethics. Applications for admission to the collaborative specialization are considered only after admission to the collaborating graduate unit. If a student applies to more than one unit, a copy of each file must be submitted to the collaborative specialization at the contact above.
- Visit the Collaborative Specialization in Bioethics website for the application form and details about supporting documentation. The application must be accompanied by:
 - application form
 - an up-to-date curriculum vitae (CV)
 - up-to-date copies of all transcripts
 - a one-page letter of intent
 - two letters of reference
- For the doctoral thesis, an email or note from the proposed supervisor indicating willingness to supervise the student should be submitted to the Collaborative Specialization in Bioethics at the contact above. The JCB website lists [faculty](#) and [bioethicists](#) who are available for advice relating to research proposals.

Completion Requirements

- Students will be expected to meet the requirements of the home graduate unit as well as those of the Collaborative Specialization in Bioethics. Students should check with their home graduate program whether the collaborative specialization course requirements may be counted towards the degree.
- Students must complete:
 - [SRD4444Y](#), a credit/no credit graduate seminar series in bioethics.
 - [PHL2145H](#), a review of the philosophical foundations of bioethics. Students who have completed an equivalent graduate course in philosophical bioethics may apply to the collaborative specialization director to have this requirement waived.
 - Bioethics-related 0.5 full-course equivalent (FCE), normally from the suggested list below.
- All doctoral candidates must complete a thesis. The thesis will be supervised by a thesis committee comprising a supervisor and normally two other members, at least one of whom is identified as an affiliated Collaborative Specialization in Bioethics faculty member. The thesis is evaluated according to the procedures and standards of the home graduate unit and must fall within the broad area of bioethics.

Bioethics: Courses

Please note that these courses are not offered every year. Consult each unit's website for details.

Health Policy, Management and Evaluation

Course Code	Course Title
HAD5011H	Canada's Health Care System and Health Policy
HAD5306H	Introduction to Health Services Research and the Use of Health Administrative Data
HAD5741H	Health Law and Ethics
HAD5771H	Resource Allocation Ethics

Law

Participation in LAW courses is at the discretion of the Faculty of Law upon presentation, to the Faculty of Law Records Office, of a signed permission form from the student's home graduate unit. Note that preference is given to JD students and that many LAW courses are full by the end of the Faculty of Law add/drop period.

Course Code	Course Title
LAW6003Y	Health Law and Bioethics
LAW6006H	Public Health Law
LAW582H	Privacy, Property, and the Human Body

Nursing Science

Course Code	Course Title
NUR1021H	Nursing Ethics

Philosophy

Course Code	Course Title
PHL2131H	Ethics
PHL2132H	Seminar in Ethics
PHL2133H	Topics in Ethics

Public Health Sciences

Course Code	Course Title
CHL3001Y	Core Topics in Bioethics
CHL3002Y	Teaching Bioethics
CHL3003Y	Empirical Approaches in Bioethics
CHL3004Y	Ethics and Health Institutions
CHL3051H	Research Ethics
CHL5121H	Genomics, Bioethics, and Public Policy
CHL5401H	Epidemiologic Methods I
JRH5124H	Public Health Ethics

Social Work

Course Code	Course Title
SWK6308H	Designing and Implementing Quantitative Social Work Research

Biomedical Engineering

Biomedical Engineering: Introduction

Effective September 1, 2024, admissions to this collaborative specialization are administratively suspended.

Lead Faculty of the Collaborative Specialization

Applied Science and Engineering

Participating Degree Programs

Biochemistry — MSc, PhD
 Biomedical Engineering — MASc, PhD
 Chemical Engineering and Applied Chemistry — MASc, PhD
 Chemistry — MSc, PhD
 Dentistry — MSc, PhD
 Electrical and Computer Engineering — MASc, PhD
 Laboratory Medicine and Pathobiology — MSc, PhD
 Materials Science and Engineering — MASc, PhD
 Mechanical and Industrial Engineering — MASc, PhD
 Medical Biophysics — MSc, PhD
 Medical Science — MSc, PhD
 Pharmaceutical Sciences — MSc, PhD
 Physics — MSc, PhD
 Physiology — MSc, PhD
 Rehabilitation Science—MSc, PhD

Overview

The graduate programs listed above participate in the Collaborative Specialization in Biomedical Engineering at the University of Toronto. This specialization offers the opportunity for research in biomedical engineering leading to master's and doctoral degrees. The collaborative specialization is housed in the Institute of Biomedical Engineering (IBME).

Biomedical engineering is a multidisciplinary field that integrates engineering with biology and medicine. It uses methods, principles, and tools of engineering, physical sciences, and mathematics to solve problems in the medical and life sciences. Biomedical engineering consists of the application of the concepts and methods of engineering and physics to the study of living systems, to the enhancement and replacement of those systems, to the design and construction of systems to measure basic physiological parameters, to the development of instruments, materials, and techniques for biological and medical practice, and to the development of artificial organs. By its nature the field is interdisciplinary and involves close collaboration between many departments of the university and associated hospitals.

Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Biomedical Engineering" on their transcript.

Contact and Address

Web: bme.utoronto.ca
 Email: contact.bme@utoronto.ca
 Telephone: (416) 978-4841
 Fax: (416) 978-4317

Collaborative Specialization in Biomedical Engineering
 Institute of Biomedical Engineering
 University of Toronto
 Rosebrugh Building, Room 407, 164 College Street
 Toronto, Ontario M5S 3G9 Canada

Biomedical Engineering: Master's Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units.
- Applicants must be graduates in dentistry, engineering, engineering science, medicine, or one of the physical or biological sciences and must be accepted to the Collaborative Specialization in Biomedical Engineering through one of the collaborating graduate units (home graduate units) listed above.

Completion Requirements

Students register in the School of Graduate Studies through their home graduate unit; they will meet all respective degree requirements as described by SGS and the collaborative specialization committee. As part of these requirements:

- The program of study for each MASc or MSc degree student registered in the collaborative specialization must meet the requirements of the collaborating unit and will normally comprise **at least 2.0 full-course equivalents (FCEs) and a thesis** in the biomedical field.
 - Engineering and physical science students will be required to take a biological sciences course such as JPB1022H *Human Physiology as Related to Biomedical Engineering* (or an equivalent).
 - Biological science students will be expected to take a physical sciences course such as JPB1055H *Bioengineering for Life Scientists* (or an equivalent).
 - Students will be expected to take BME1477H *Biomedical Engineering Project Design and Execution* and pursue a thesis topic relevant to biomedical engineering.

- In addition to the 2.0 FCEs, students registered in a graduate degree program involving research are required to participate in **two seminar courses**: one of BME1010H or BME1011H *Graduate Seminar Series* and JDE1000H *Ethics in Research*.
- Students are required to have a supervisory committee approved by the collaborative specialization committee and consisting of a supervisor from IBME, with a cross-appointment in the home unit, and other members from other collaborating units as required.
- The examination committee will be constituted according to procedures in the home graduate unit and will include a member from that collaborating unit.

- Each PhD student is normally required to have a supervisory committee consisting of at least three persons, including a supervisor who has an appropriate graduate appointment and who is also a member of the graduate faculty in the home unit. When appropriate, an additional member of the supervisory committee may be from outside the University of Toronto, with approval from the School of Graduate Studies.
- For doctoral degrees, the examination committee will be constituted according to procedures in the home graduate unit and will include a member from that collaborating unit.

Biomedical Engineering: Doctoral Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units.
- Applicants must be graduates in dentistry, engineering, engineering science, medicine, or one of the physical or biological sciences and must be accepted to the Collaborative Specialization in Biomedical Engineering through one of the collaborating graduate units (home graduate units) listed above.
- Before PhD students are accepted, the collaborative specialization committee must be satisfied with the applicant's ability to undertake advanced graduate studies.

Completion Requirements

- A **qualifying examination** may be required by the collaborating unit.
- Students admitted to the collaborative specialization who are admitted to a PhD program in their home unit will be subject to the requirements of the collaborating unit. The plan of study for each PhD student registered in the Collaborative Specialization in Biomedical Engineering must be approved by the collaborating unit and the collaborative specialization committee; the plan of study will normally comprise **at least 1.0 full-course equivalent (FCE) and a thesis**.
 - Engineering and physical science students will be required to take a biological sciences course such as JPB1022H *Human Physiology as Related to Biomedical Engineering* (or an equivalent).
 - Biological science students will be expected to take a physical sciences course such as JPB1055H *Bioengineering for Life Scientists* (or an equivalent).
 - Students will be expected to take BME1477H *Biomedical Engineering Project Design and Execution* and pursue a thesis topic relevant to biomedical engineering.
- In addition to the 1.0 FCE, students are required to participate in **two seminar courses**: one of BME1010H or BME1011H *Graduate Seminar series*, and JDE1000H *Ethics in Research*.

Biomedical Engineering: Courses

Not all courses are offered every year. Students should contact the BME office for details.

Course Code	Course Title
BME1010H	Graduate Seminar
BME1011H	Graduate Seminar
BME1405H	Clinical Engineering Instrumentation I
BME1436H	Clinical Engineering Surgery
BME1439H	Clinical Engineering Instrumentation II
BME1453H	Genomics and Synthetic Nucleic-Acid Technologies
BME1454H	Regenerative Medicine: Fundamentals and Applications
BME1459H	Protein Engineering
BME1460H	Quantitative Fluorescence Microscopy: Theory and Application to Live Cell Imaging
BME1477H	Biomedical Engineering Project Design and Execution
BME1478H	Coding for Biomedical Engineers
BME1480H	Experimental Design and Multivariate Analysis in Bioengineering
BME4444Y	Practice in Clinical Engineering
CHE1107H	Applied Mathematics
CHE1141H	Advanced Chemical Reaction Engineering
CHE1143H	Transport Phenomena
CHE1310H	Chemical Properties of Polymers
DEN1070H	Advances in Dental Materials Science
DEN1081H	Bone Interfacing Implants
ECE1228H	Electromagnetic Theory
ECE1352H	Analog Circuit Design I
ECE1475H	Bio Photonics
ECE1502H	Information Theory

Course Code	Course Title
ECE1511H	Signal Processing
ECE1521H	Detection and Estimation Theory
ECE1647H	Introduction to Nonlinear Control Systems
JCB1349H	Molecular Assemblies: Structure/Function/Properties
JEB1433H	Medical Imaging
JEB1444H	Neural Engineering
JEB1447H	Sensory Communications
JMB1050H	Biological and Bio-inspired Materials
JNP1017H	Current Topics in Molecular and Biochemical Toxicology
JNP1018H	Molecular and Biochemical Basis of Toxicology
JNR1444Y	Fundamentals of Neuroscience: Cellular and Molecular
JNS1000Y	Fundamentals of Neuroscience: Systems and Behaviour
JPB1022H	Human Physiology as Related to Engineering II
JPB1055H	Bioengineering for Life Scientists
JTC1135H	Applied Surface Chemistry
JTC1331H	Biomaterials Science
MIE1001H	Advanced Dynamics
MIE1052H	Signal Processing for Bioengineering
MIE1101H	Advanced Classical Thermodynamics
MIE1201H	Advanced Fluid Mechanics I
MSE1026H	Analytical Electron Microscopy
PHM1109H	Recent Developments in Dosage Form Design
PSL1432H	Theoretical Physiology
PSL1452H	Fundamentals of Ion Channel Function
REH1100H	Theory and Research in Rehabilitation Science

Book History and Print Culture

Book History and Print Culture: Introduction

Lead Faculty of the Collaborative Specialization

Arts and Science

Participating Degree Programs

Art History — MA, PhD
 Classics — MA, PhD
 Comparative Literature — MA, PhD
 East Asian Studies — MA, PhD
 English — MA, PhD
 French Language and Literature — MA, PhD
 Germanic Languages and Literatures — MA
 Germanic Literature, Culture and Theory — PhD
 History — MA, PhD
 History and Philosophy of Science and Technology — MA, PhD
 Information — MI, PhD
 Italian Studies — MA, PhD
 Medieval Studies — MA, PhD
 Museum Studies — MMSt
 Music — MA, PhD
 Near and Middle Eastern Civilizations — MA, PhD
 Religion — MA, PhD
 Slavic Languages and Literatures — MA, PhD
 Spanish — MA, PhD

Overview

Histoire du livre, History of the Book, Textual Studies, Print Culture, Sociology of the Text: all these names have been used to describe a growing international academic movement. The graduate programs listed above, in conjunction with Massey College, sponsor an interdisciplinary study in Book History and Print Culture (BHPC) in which the rich physical and human resources of the University of Toronto are brought to bear on multiple aspects of the creation, transmission, and reception of the written word. BHPC brings together graduate students from a variety of disciplines based on their common research interest in the physical, cultural, and theoretical aspects of the book. As a collaborative specialization, it is designed to augment the learning and research potential of existing master's and doctoral programs by pooling the expertise of University of Toronto faculty members in this field from several disciplines.

Students register first for a master's or doctoral degree in their home graduate unit and then apply to the collaborative specialization. Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Book History and Print Culture" on their transcript.

Contact and Address

Web: bhpctoronto.com
 Email: bookhistory@masseycollege.ca
 Telephone: (416) 978-2893

Yulia Ryzhik, Director
 Collaborative Specialization in Book History and Print Culture
 University of Toronto
 Massey College, 4 Devonshire Place
 Toronto, Ontario M5S 2E1 Canada

Book History and Print Culture: Master's Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and one of the participating degree programs (home unit). Applicants to the collaborative specialization write to the director giving information about their background and relevant interests, identifying the degree and home unit for which they are applying, and outlining a proposed plan of study by April 10 for September admission. Applicants need not wait for a final decision from the home unit before applying to the collaborative specialization. Academic transcript(s) should be included in the application; unofficial transcripts are acceptable and may be sent either as scans attached to your email or as printouts from a student web service mailed to the BHPC office. Advice is available from the director and the collaborative specialization committee.
- Applications from the participating units have priority in admissions. If there is space in the collaborative specialization, students from other units may apply; they should consult the graduate coordinator in their home unit and the director of the BHPC specialization. Since course requirements vary from unit to unit, it is essential that there be close consultation between the collaborative specialization and the home unit at the time of the application.

Completion Requirements

Master of Arts in Art History;
Master of Arts in Classics;
Master of Arts in East Asian Studies (Thesis Option);
Master of Arts in English (Creative Writing Field);
Master of Arts in French Language and Literature;
Master of Arts in Germanic Languages and Literatures;
Master of Arts in History;
Master of Arts in History and Philosophy of Science and Technology;
Master of Arts in Medieval Studies (Thesis Option);

**Master of Arts in Near and Middle Eastern Civilizations
(One-Year and Two-Year Thesis Options);
Master of Arts in Religion;
Master of Information (Thesis Option);
Master of Museum Studies**

- Students must fulfil the degree requirements of the unit in which they are enrolled.
- BKS1001H *Introduction to Book History* and BKS1002H *Book History in Practice*, both of which should be taken in Year 1.
- The thesis or capstone project (MSL4000Y, for example) in the participating degree program will be on a topic related to book history and print culture, approved by the collaborative specialization committee.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

**Master of Arts in Comparative Literature;
Master of Arts in East Asian Studies (Coursework-Only Option);
Master of Arts in English;
Master of Arts in Italian Studies;
Master of Arts in Medieval Studies (Coursework-Only Option);
Master of Arts in Near and Middle Eastern Civilizations (One-Year Coursework-Only Option);
Master of Arts in Slavic Languages and Literatures (One-Year Coursework-Only Option);
Master of Arts in Spanish**

- Students must fulfil the degree requirements of the unit in which they are enrolled.
- BKS1001H *Introduction to Book History* and BKS1002H *Book History in Practice*, both of which should be taken in Year 1.
- At least 0.5 FCE in additional elective courses related to book history and print culture.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

Master of Information (Coursework-Only Option)

- Students must fulfil the degree requirements of the unit in which they are enrolled.
- BKS1001H *Introduction to Book History* and BKS1002H *Book History in Practice*, both of which should be taken in Year 1.
- At least 1.5 FCEs in additional elective courses related to book history and print culture.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

**Master of Arts in Music;
Master of Arts in Near and Middle Eastern Civilizations
(Two-Year Coursework Option)**

- Students must fulfil the degree requirements of the unit in which they are enrolled.
- BKS1001H *Introduction to Book History* and BKS1002H *Book History in Practice*, both of which should be taken in Year 1.
- At least 1.0 FCE in additional elective courses related to book history and print culture.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

Elective courses will come from the BHPC roster of cross-listed courses, though students may substitute other courses with the director's approval. Students are encouraged to take courses outside their home graduate unit, if possible.

Book History and Print Culture: Doctoral Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and one of the participating degree programs (home unit). Applicants to the collaborative specialization write to the director giving information about their background and relevant interests, identifying the degree and home unit for which they are applying, and outlining a proposed plan of study by April 10 for September admission. Applicants need not wait for a final decision from the home unit before applying to the collaborative specialization. Academic transcript(s) should be included in the application; unofficial transcripts are acceptable and may be sent either as scans attached to your email or as printouts from a student web service mailed to the BHPC office. Advice is available from the director and the collaborative specialization committee.
- Applications from the participating units have priority in admissions. If there is space in the collaborative specialization, students from other units may apply; they should consult the graduate coordinator in their home unit and the director of the BHPC specialization. Since course requirements vary from unit to unit, it is essential that there be close consultation between the collaborative specialization and the home unit at the time of the application.

Completion Requirements

- Students must fulfil the degree requirements of the unit in which they are enrolled.

- The plan of study must also be approved by the BHPC specialization committee. The plan of study includes BKS1001H *Introduction to Book History* (if that course has not been taken previously at the master's level), BKS2000H *Advanced Seminar in Book History and Print Culture*, and BKS2001H *Individual Practicum in Book History and Print Culture*. BKS1001H must be taken as a prerequisite or corequisite to BKS2000H and BKS2001H.
- The dissertation topic will be in the area of book history and print culture. The advisory committee will include at least one faculty member affiliated with BHPC, and students are encouraged, but not required, to seek representation on the committee from outside the home unit.
- The collaborative specialization may be completed on a flexible-time basis only by Faculty of Information students registered for the Information flexible-time PhD.

Book History and Print Culture: Courses

Course Code	Course Title
BKS1001H	Introduction to Book History
BKS1002H	Book History in Practice
BKS2000H	Advanced Seminar in Book History and Print Culture
BKS2001H	Individual Practicum in Book History and Print Culture

Get further details and listings of appropriate courses in various graduate units.

Cardiovascular Sciences

Cardiovascular Sciences: Introduction

Lead Faculty of the Collaborative Specialization

Medicine

Participating Degree Programs

Biomedical Engineering — MSc, PhD
 Chemical Engineering and Applied Chemistry — MSc, PhD
 Kinesiology — MSc, PhD
 Laboratory Medicine and Pathobiology — MSc, PhD
 Medical Biophysics — MSc, PhD
 Medical Science — MSc, PhD
 Pharmaceutical Sciences — MSc, PhD
 Pharmacology — MSc, PhD
 Physiology — MSc, PhD
 Rehabilitation Science — MSc, PhD

Overview

The graduate programs listed above, together with the clinical departments of Anesthesia, Medicine, and Surgery, participate in the graduate Cardiovascular Sciences Collaborative Specialization at the University of Toronto. Units participating in the collaborative specialization contribute graduate courses and provide facilities and supervision for graduate research. Applicants must first be accepted by one of the participating graduate units and then complete a separate application to register in the collaborative specialization.

Students follow a plan of study acceptable to both the participating unit and the Cardiovascular Sciences specialization. Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Cardiovascular Sciences" on their transcript.

Contact and Address

Web: www.cscp.utoronto.ca
 Email: cv.program@utoronto.ca
 Telephone: (416) 978-0746

Cardiovascular Sciences Collaborative Specialization
 University of Toronto
 Room 413, 4th Floor, 263 McCaul Street
 Toronto, Ontario M5T 1W7
 Canada

Cardiovascular Sciences: Master's Level

Minimum Admission Requirements

- Normally, an A– average in previous coursework (publications and research work may be considered for mature students).
- The student has already been accepted into a home graduate unit that participates in the Cardiovascular Sciences Collaborative Specialization.
- Acceptance by a supervisor who is a faculty member of the Cardiovascular Sciences Collaborative Specialization.
- Research area falls within the mandate of the Cardiovascular Sciences Collaborative Specialization.

Completion Requirements

- Students must meet the requirements of their home graduate unit in terms of coursework and thesis work.
- Write a thesis under the supervision of a faculty member of the collaborative specialization. The thesis topic will be in the area of cardiovascular sciences. An electronic copy of the accepted thesis in final form must be submitted to the Cardiovascular Sciences Collaborative Specialization.
- Complete 0.5 full-course equivalent (FCE) in an approved cardiovascular course listed under the approved Course List.
- Students must attend the annual Student Research Day each year they are in this collaborative specialization, and make one presentation during training. The presentation must demonstrate excellence in cardiovascular research.

Cardiovascular Sciences: Doctoral Level

Minimum Admission Requirements

- Normally, an A– average in previous coursework (publications and research work may be considered for mature students).
- The student has already been accepted into a home graduate unit that participates in the Cardiovascular Sciences Collaborative Specialization.
- Acceptance by a supervisor who is a faculty member of the Cardiovascular Sciences Collaborative Specialization.
- Research area falls within the mandate of the Cardiovascular Sciences Collaborative Specialization.

Completion Requirements

- Students must meet the requirements of their home graduate unit in terms of coursework and thesis work.
- Write a thesis under the supervision of a faculty member of the collaborative specialization. The thesis topic will be in the area of cardiovascular sciences. An electronic copy of the accepted thesis in final form must be submitted to the Cardiovascular Sciences Collaborative Specialization.

- Complete two half courses or 1.0 full-course equivalent (FCE) chosen from among the following seven courses: JCV1060H, JCV3060H, JCV3061H, JCV3062H, JCV3063H, JCV3064H, and JCV3065H.
- Students must attend the annual Student Research Day each year they are in this collaborative specialization, and make one presentation during training. The presentation must demonstrate excellence in cardiovascular research.

Cardiovascular Sciences: Courses

Cardiovascular sciences courses offered by the participating units are listed below. Not all courses are offered each year. For course details, consult the Cardiovascular Sciences website.

Course Code	Course Title
JCV1060H	Developmental Cardiovascular Physiology
JCV3060H	Advanced Topics in Cardiovascular Sciences — Molecular Biology and Heart Signal Transduction
JCV3061H	Advanced Topics in Cardiovascular Sciences — Hormones and the Cardiovascular System
JCV3062H	Advanced Topics in Cardiovascular Sciences — Heart Function
JCV3063H	Advanced Topics in Cardiovascular Sciences — Vascular
JCV3064H	Advanced Topics in Cardiovascular Sciences — Microvascular Medicine
JCV3065H	Advanced Topics in Cardiovascular Sciences — Systems Biology
JTC1331H	Biomaterials Science
KIN5508H	Cardiovascular Disease and Exercise
LMP1104H	Current Understanding of Ischemic Heart Disease
LMP1105H	Current Understanding of Atherosclerosis
PSL1462H	Molecular Aspects of Cardiac Function

Community Development

Community Development: Introduction

Admissions have been administratively suspended. This collaborative specialization will close on August 31, 2027.

Lead Faculty of the Collaborative Specialization

Public Health

Participating Degree Programs

Adult Education and Community Development — MA, MEd
 Counselling and Clinical Psychology (Clinical and Counselling Psychology field) — MA
 Counselling Psychology — MEd
 Geography — MA
 Planning — MScPI
 Public Health Sciences — MPH
 Social Work — MSW

Overview

The Collaborative Specialization in Community Development provides students with a multidisciplinary graduate education in community development. Community development involves working with community members and groups to effect positive change in the social, economic, organizational, or physical structures of a community that improve both the welfare of community members and the community's ability to direct its future.

Students must first apply to and register in one of the participating master's degree programs listed above, and then apply to the collaborative specialization. Students must follow a course of study acceptable to both the home unit and the collaborative specialization. Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Community Development" on their transcript.

Contact and Address

Web: www.dlsph.utoronto.ca/program/collaborative-specialization-in-community-development-cdc
 Email: blake.poland@utoronto.ca
 Telephone: (416) 978-7542

Collaborative Specialization in Community Development
 Dalla Lana School of Public Health
 University of Toronto
 155 College Street, 6th Floor
 Toronto, Ontario M5T 3M7
 Canada

Community Development: Master's Level

Minimum Admission Requirements

- Collaborative specializations are administered under the auspices of the School of Graduate Studies.
- Applicants must be accepted for admission to a participating graduate unit and comply with the admission procedures of that unit before applying to the Collaborative Specialization in Community Development.
- Applicants must submit the following to the collaborative specialization committee:
 - A copy of the letter accepting you into one of the participating graduate units.
 - A resumé or curriculum vitae (CV).
 - A letter explaining how your plan of study, your specific interests, and your career goals relate to community development (i.e., why you want to enrol in the Collaborative Specialization in Community Development); maximum length: 500 words. Include reference to any relevant experience (volunteer, work, education, etc.).

Completion Requirements

- Students must register in the master's degree program through one of the participating home graduate units. They must meet all respective degree requirements of the School of Graduate Studies and their participating home graduate unit.
- To fulfil the requirements of the Collaborative Specialization in Community Development, students must complete the following:
 - The core course UCS1000H *Community Development*.
 - An additional 1.0 full-course equivalent (FCE) in the subject area of the collaborative specialization, to be approved by the collaborative specialization director, of which at least 0.5 FCE must be external to the student's home graduate unit.
 - Participation in a non-credit coordinating seminar on community development.
 - Where required by the home degree program, a thesis or a major research paper (as designated by the home degree program) on a topic related to community development; a member of the thesis committee or the reader of the major research paper must be a faculty member associated with the collaborative specialization. Or where required by the home degree program, a practicum placement with community development content as approved by the collaborative specialization director or core faculty member from that home degree program.
- Normally, the required courses listed below are taken as options within regular departmental or faculty degree requirements, not as additional courses.

Community Development: Courses

Core Course

Course Code	Course Title
UCS1000H	Community Development

In addition to the core course (UCS1000H), students must take an additional 1.0 FCE in the subject area of the collaborative specialization, to be approved by the collaborative specialization director. The following is a list of the currently approved courses; the list is reviewed annually and posted on the Community Development website.

Adult Education

Course Code	Course Title
LHA1102H	Introduction to Community Development
LHA1182H	Nonprofits, Co-operatives, and the Social Economy: An Overview
LHA1190H	Community Healing and Peacebuilding
LHA1194H	Cyberliteracy and Adult Education
LHA1196H	Walking Together, Talking Together: The Praxis of Reconciliation
LHA5100H	Special Topics in Adult Education and Community Development: Master's Level (with approval of the Director)
LHA6100H	Special Topics in Adult Education and Community Development: Doctoral Level (with approval of the Director)

Counselling Psychology

Course Code	Course Title
APD1290H	Indigenous Studies in Mental Health and Disability Justice

Nursing

Course Code	Course Title
NUR1047Y	Community Participation and Health
NUR1083H	Comparative Politics of Health Policy in a Globalizing World

Planning

Course Code	Course Title
JPG1507H	Housing Markets and Housing Policy Analysis
JPG1512H	Place, Politics, and the Urban
JPG1518H	Sustainability and Urban Communities
JPG1615H	Planning the Social Economy
JPG1812Y	Planning for Change: Community Development in Practice

Public Health Sciences

Course Code	Course Title
CHL5126H	Building Community Resilience
CHL7001H	Directed Reading

Social Work

Course Code	Course Title
SWK4210H	Promoting Empowerment: Working at the Margins
SWK4304H	Social Work Policy Practice and Advocacy in the Context of Neoliberal Globalization
SWK4306H	Theoretical Approaches to Defining Social Injustice and Engaging in Social Change
SWK4422H	Social Housing and Homelessness
SWK4512H	Research Knowledge for Social Justice

Comparative, International and Development Education

Comparative, International and Development Education: Introduction

Lead Faculty of the Collaborative Specialization

Ontario Institute for Studies in Education (OISE)

Participating Degree Programs

Adult Education and Community Development — MA, MEd, PhD
 Curriculum and Pedagogy — MA, MEd, PhD
 Educational Leadership and Policy — MA, MEd, EdD, PhD
 Higher Education — MA, MEd, EdD, PhD
 Language and Literacies Education — MA, MEd, PhD
 Social Justice Education — MA, MEd, EdD, PhD

Overview

Comparative, International and Development Education (CIDE) is one of the world's largest, most diverse and dynamic graduate specializations in the field of comparative education. Research interests span an exciting range of theoretical and practical issues, from the study of ethnicity and identity to the issues of globalization and global governance, from non-formal learning and citizenship education to concrete problems of educational reform, social equality, language education, conflict resolution, and community development. These issues are approached from a range of theoretical and disciplinary frames including: economic, political, sociological, historical, and philosophical approaches taught alongside vibrant interpretations of feminist, critical, post-structuralist, and cultural theories.

The broad and diverse scope of the CIDE graduate specialization will appeal to both Canadian and international students interested in applying a comparative and international lens in their professional and scholarly work at home or abroad.

CIDE students can take courses in multiple fields within education, political science, feminist studies, sociology, and geography. The CIDE collaborative specialization is linked with events and programming at the Munk School of Global Affairs and Public Policy at the University of Toronto.

Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students receive the notation "Completed Collaborative Specialization in Comparative, International and Development Education" on their transcript and parchment.

Contact and Address

Web: www.oise.utoronto.ca/cidec
 Email: cidec.oise@utoronto.ca

Telephone: (416) 978-0892
 Fax: (416) 926-4749

Collaborative Specialization in Comparative, International and Development Education
 Comparative, International and Development Education Centre (CIDECE)
 Ontario Institute for Studies in Education, University of Toronto
 252 Bloor Street West, 7th Floor
 Toronto, Ontario M5S 1V6
 Canada

Comparative, International and Development Education: Master's Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units. Applicants should apply to the appropriate degree program in one (or more) of the collaborating graduate units that corresponds most closely to their general background and interests.
- Applicants to the CIDE collaborative specialization are normally expected to have had at least one year of international or cross-cultural experience (includes Indigenous nation settings).
- Applicants who have questions concerning their eligibility should contact the CIDECE administrator.
- Prospective applicants should review the detailed information about the CIDE collaborative specialization.

Completion Requirements

- Individual student programs of study must meet the requirements of both the home graduate unit and the collaborative specialization. Normally, a careful selection of cross-listed courses will satisfy this requirement without any additional course load.
- Course requirements are as follows:
 - CIE1001H *Introduction to Comparative, International and Development Education*. CIE1001H must be taken in Year 1 of the full-time student's academic course load, or within the first four courses of the part-time and flexible-time student's academic work.
 - 0.5 core FCE CIDE graduate course.
 - 1.0 FCE (equivalent to two half courses) other core CIDE or elective graduate courses. CIDE courses must be taught by CIDE affiliated graduate faculty members.
- Regular participation in and attendance at the CIDE Seminar Series. Participation at a minimum of five seminars is required; some may be attended live online.

- Students who write a thesis or major research paper as part of their program are also required to make at least one presentation to the CIDE community related to their research/development work.
- In master's programs requiring a major research paper or a thesis, the topic must relate to and demonstrate master's-level understanding of the research/ theory base of CIDE. Participating CIDE faculty and the home graduate unit must be represented on the thesis committee.

Comparative, International and Development Education: Doctoral Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units. Applicants should apply to the appropriate degree program in one (or more) of the collaborating graduate units that corresponds most closely to their general background and interests.
- Applicants to the CIDE collaborative specialization are normally expected to have had at least one year of international or cross-cultural experience (includes Indigenous nation settings).
- Applicants who have questions concerning their eligibility should contact the CIDE administrator.
- Prospective applicants should review the detailed information about the CIDE collaborative specialization. They are strongly advised to contact one of the participating CIDE faculty members in their home graduate unit to discuss their research interests and goals.

Completion Requirements

- Individual student programs of study must meet the requirements of both the home graduate unit and the collaborative specialization. Normally, a careful selection of cross-listed courses will satisfy this requirement without any additional course load.
- Course requirements are as follows:
 - 0.5 full-course equivalent (FCE) required introduction: CIE1001H *Introduction to Comparative, International and Development Education*, if not already taken, or equivalent if transferring from another university. CIE1001H must be taken in Year 1 of the full-time student's academic course load, or within the first four courses of the part-time and flexible-time student's academic work. Students who have completed CIE1001H at the master's level must select (in lieu, in addition to the requirements below) a 0.5 FCE course from the list of core courses, with approval from the CIDE Specialization Director at the time of course selection.
 - 0.5 FCE core CIDE graduate (preferably doctoral-level) course.

- 1.0 FCE (equivalent to two half courses) additional core CIDE or elective graduate (preferably doctoral-level) courses. CIDE courses must be taught by CIDE affiliated graduate faculty members.
- Regular participation in and contribution to the CIDE Seminar Series (at least one major presentation to the seminar group related to the student's thesis research/development work in addition to regular participation). Participation at a minimum of five seminars is required; some may be attended live online.
- Completion of a thesis that contributes to the research/theory base of CIDE. Participating CIDE faculty and the home graduate unit must be represented on the thesis committee.

Comparative, International and Development Education: Courses

Not all courses are offered each year. Visit the Comparative, International, and Development Education (CIDE) website for current course offerings, including special topics courses that do not appear in the list below.

In addition to the courses listed here, a defined list of special topics courses, taught by CIDE participating faculty members in any of the participating graduate departments, can be taken to meet core or elective graduate course requirements for CIDE.

Core Courses

Comparative Education

Course Code	Course Title
CIE1001H	Introduction to Comparative, International, and Development Education
CIE1002H	Practicum for Comparative, International, and Development Education
CIE1006H	Transnational Perspectives on Democracy, Human Rights, and Democratic Education in an Era of Globalization
CIE6000H	Special Topics in Comparative, International, and Development Education

Curriculum, Teaching and Learning

Curriculum and Pedagogy Program

Course Code	Course Title
CTL1037H	Teacher Development: Comparative and Cross-Cultural Perspectives
CTL1060H	Education and Social Development
CTL1312H	Democratic Citizenship Education: Comparative International Perspectives

Course Code	Course Title
CTL1319H	Religious Education: Comparative and International Perspectives
CTL1330H	Education and Peacebuilding in Conflict Zones: International Comparative Perspectives

Language and Literacies Education Program

Course Code	Course Title
CTL3040H	The Education of Students of Refugee Background in Canada and Beyond
CTL3811H	Critical Perspectives on Language, Racism, and Settler-Colonialism

Leadership, Higher and Adult Education

Adult Education and Community Development Program

Course Code	Course Title
LHA1146H	Women, War, and Learning
LHA3064H	Global Governance and Educational Change: The Politics of International Cooperation in Education
LHA3104H	Adult Education, Marxism, and Feminism
LHA3182H	Participatory Democracy, Activism, and Citizenship Learning

Educational Leadership and Policy Program

Course Code	Course Title
LHA1065H	Global Educational Equity and Quantitative Policy Research
LHA1066H	Comparative and International Perspectives on Gender and Education Policy and Practice

Higher Education Program

Course Code	Course Title
LHA1806H	Systems of Higher Education
LHA1807H	System-Wide Planning and Policy for Higher Education
LHA1825H	Comparative Education Theory and Methodology (RM)
LHA1826H	Comparative Higher Education

Course Code	Course Title
LHA1846H	Internationalization of Higher Education in a Comparative Perspective
LHA3810H	International Academic Relations

Social Justice Education

Course Code	Course Title
SJE1924H	Modernization, Development, and Education in African Contexts
SJE1927H	Migration and Globalization
SJE1976H	Critical Media Literacy Education
SJE3911H	Cultural Knowledges, Representation, and Colonial Education

Elective Courses

Curriculum, Teaching and Learning

Curriculum and Pedagogy Program

Course Code	Course Title
CTL1011H	Anti-Oppression Education in School Settings
CTL1031H	Language, Culture, and Identity: Using the Literary Text in Teacher Development
CTL1063H	Pedagogies of Solidarity
CTL1218H	Culture and Cognition in Mathematics, Science, and Technology Education
CTL1221H	Education for Human Goals Local and Global: How's Science Education Helping?
CTL1307H	Identity Construction and Education of Minorities
CTL1318H	Teaching Conflict and Conflict Resolution
CTL1320H	Introduction to Indigenous Land-centered Education: Historical and Contemporary Perspectives
CTL1321H	Indigenous Civilizations of Turtle Island: Language, Culture, and Identity
CTL1332H	Introduction to Decolonization in Education
CTL1406H	The Origins of Modern Schooling: Issues in the Development of the North American Educational System
CTL1430H	Gendered Colonialisms, Imperialisms, and Nationalisms in History

Language and Literacies Education Program

Course Code	Course Title
CTL3000H	Foundations of Bilingual and Multicultural Education
CTL3008H	Critical Pedagogy, Language, and Cultural Diversity
CTL3011H	Cognitive Sociolinguistic and Sociopolitical Orientations in Bilingual Education Research
CTL3015H	Language and Literacies Education in Multilingual Contexts
CTL3018H	Language Planning and Policy
CTL3024H	Language Teacher Education
CTL3025H	Educational Sociolinguistics
CTL3026H	Pragmatics in Language Education
CTL3031H	Children's Literature Within a Multicultural Context
CTL3100H	Communication and Second Language Learning in the Workplace
CTL3805H	Multilingualism and Pluralism

Leadership, Higher and Adult Education

Adult Education and Community Development Program

Course Code	Course Title
LHA1102H	Introduction to Community Development
LHA1113H	Gender and Race at Work
LHA1115H	Learning for the Global Economy
LHA1142H	Young Adulthood in Crisis: Learning, Transitions, and Activism
LHA1145H	Participatory Research in the Community and the Workplace [RM]
LHA1147H	Migration, Resettlement, and Learning
LHA1148H	An Introduction to Workplace, Organizational, and Economic Democracy
LHA1180H	Indigenous Worldviews: Implications for Education
LHA1181H	Embodied Learning and Alternative Approaches to Community Wellness
LHA1184H	Aboriginal Knowledge: Implications for Education
LHA1190H	Community Healing and Peacebuilding
LHA1196H	Walking Together, Talking Together: The Praxis of Reconciliation

Course Code	Course Title
LHA3103H	Teaching about Global and Social Issues

Educational Leadership and Policy Program

Course Code	Course Title
LHA1029H	Special Applications of the Administrative Process
LHA1041H	Social and Policy Contexts of Schooling
LHA1043H	Decolonizing and Antiracist Approaches to Educational Leadership
LHA3040H	Administrative Theory and Educational Problems I: People and Power in Organizations
LHA3041H	Doctoral Seminar on Policy Issues in Education
LHA3055H	Democratic Values, Student Engagement, and Democratic Leadership
EDP3145H	Methodological Approaches for Researching Education Policy [RM]

Higher Education Program

Course Code	Course Title
LHA1814H	Lifelong Learning and Professional and Vocational Education

Social Justice Education

Course Code	Course Title
SJE1438H	Democratic Approaches to Pedagogy
SJE1447H	Technology in Education: Philosophical Issues
SJE1912H	Foucault and Research in Education and Culture: Discourse, Power, and the Subject
SJE1921Y	The Principles of Anti-Racism Education
SJE1922H	Sociology of Race and Ethnicity
SJE1925H	Indigenous Knowledge and Decolonization: Pedagogical Implications
SJE1926H	Race, Space, and Citizenship: Research Methods
SJE1951H	The School and the Community
SJE1956H	Social Relations of Cultural Production in Education
SJE2941H	Bourdieu: Theory of Practice in Social Sciences

Course Code	Course Title
SJE3905H	Interdisciplinary Approaches to Research: Theory and Praxis
SJE3910H	Advanced Seminar on Race and Anti-Racism Research Methodology in Education
SJE3912H	Race and Knowledge Production: Research Methods
SJE3914H	Anti-Colonial Thought and Pedagogical Challenges
SJE3915H	Franz Fanon and Education
SJE3933H	Globalisation and Transnationality: Feminist Perspectives

Contemporary East and Southeast Asian Studies

Contemporary East and Southeast Asian Studies: Introduction

Lead Faculty of the Collaborative Specialization

Arts and Science

Participating Degree Programs

Anthropology — MA
 East Asian Studies — MA
 Geography — MA
 Global Affairs — MGA
 History — MA
 Management — MBA
 Planning — MScPI
 Political Science — MA
 Public Policy — MPP
 Social Work — MSW
 Sociology — MA
 Women and Gender Studies — MA

Overview

The Collaborative Master's Specialization in Contemporary East and Southeast Asian Studies (CESEAS) is designed to provide graduates with advanced training in a particular discipline and in the historical and social science studies of modern East and Southeast Asia. The major topics of emphasis are political economy, modern and contemporary social history, international relations, gender, political and social change, economic development, and cultural studies. The collaborative specialization contributes to the development of an integrated and interdisciplinary research community in Contemporary East and Southeast Asian Studies at the University.

The graduate programs listed above participate in the Collaborative Specialization in CESEAS at the University of Toronto. The collaborating units contribute courses and provide facilities and supervision for master's-level research. This specialization is administered by a committee chaired by a director.

Applicants are expected to meet the admission and degree requirements of both their home unit and the collaborative specialization in Contemporary East and Southeast Asian Studies. The specialization requirements can be met concurrently with, or in addition to, home unit requirements. Upon successful completion of the master's degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Contemporary East and Southeast Asian Studies" on their transcript.

Contact and Address

Web: munkschool.utoronto.ca/ai/collaborative-masters-specialization-contemporary-east-and-southeast-asian-studies
 Email: ai.asianstudies@utoronto.ca
 Telephone: (416) 946-8832
 Fax: (416) 946-8838

Collaborative Master's Specialization in Contemporary East and Southeast Asian Studies
 Asian Institute, Munk School of Global Affairs and Public Policy
 University of Toronto
 1 Devonshire Place, Room 228N
 Toronto, Ontario M5S 3K7 Canada

Contemporary East and Southeast Asian Studies: Master's Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units.
- To be considered for admission to the collaborative specialization in Contemporary East and Southeast Asian Studies, applicants are expected to have completed coursework on Asia or have had relevant working or living experience in East or Southeast Asia.

Completion Requirements

- Students must satisfy the degree requirements of both the home graduate unit and the collaborative specialization. This can be done concurrently with, or in addition to, home unit requirements.
- Attend the year-long, interdisciplinary core seminar *ASI1000Y Issues in Contemporary East and Southeast Studies*. Topics vary from year to year.
- Complete 0.5 elective FCE on East or Southeast Asia, or in Asia-related courses within the home graduate unit or any other units (subject to approval from the collaborative specialization director).
- Complete a Major Research Paper (MRP), usually written in the context of a 0.5 FCE independent study course (for example, *ASI1001H Independent Research in Asia-Pacific Studies*). If an MRP is required in the home graduate unit (or discipline), it must address a topic on contemporary East and Southeast Asian Studies, and be based on original and in-depth research that goes beyond a normal seminar paper at the graduate level. The length is approximately 50 to 60 pages, although certain types of research might well be communicated in formats of shorter length. The MRP requirement can be met in the home graduate unit for an MRP, as long as the topic is related to Asia and is approved by the collaborative specialization director. If there is no such requirement in the home department, students should complete the MRP within the context of a 0.5 FCE reading course. In rare cases when a student undertakes a master's thesis in a home unit, the additional MRP will be waived. Students

must seek approval for topics and format from the collaborative specialization director.

- By the time of graduation from the master's degree program, every student is strongly encouraged to have a working knowledge of an East or Southeast Asian language as needed for his or her course of study.

Contemporary East and Southeast Asian Studies: Courses

Course List

Course Code	Course Title
ASI1001H	Independent Research in Contemporary East and Southeast Asian Studies
ASI1000Y	Issues in Contemporary East and Southeast Asian Studies
ASI4140H	The Public Event in Asia
ASI4200H	Asia and the New Global Economy
ASI4300H	Nationalism and Revolution in Asia
ASI4900H	Special Topics in Contemporary Asian Studies

Please consult the website for courses offered by participating graduate units.

Development Policy and Power

Development Policy and Power: Introduction

Lead Faculty of the Collaborative Specialization

University of Toronto Scarborough

Participating Degree Programs

Anthropology — MA, MSc
 Environmental Science — MEnvSc
 Geography — MA
 Political Science — MA
 Public Health Sciences — MPH (field in Social and Behavioural Health Sciences)
 Social Justice Education — MA, MEd
 Sociology — MA
 Women and Gender Studies — MA

Supporting Unit

Department of Global Development Studies

Overview

The Collaborative Specialization in Development Policy and Power is designed to provide master's students with a critical and historicized understanding of the nature of some of the main policy debates within the field of international development. These include: power dynamics and their shifts over time within particular development policy domains at the global, national, and local levels of analysis; the role of the power struggles around development policy making in the processes of program design and implementation; and the ways in which these power struggles shape the institutionalization of policies that are (or are not) equitable and social justice oriented.

In addition to examining contestations around the development field's major historical and theoretical threads, students will be immersed in thematic discussions around development policy fields such as: trade, financialization, and (illicit) financial flows; food, agriculture, and land struggles; political ecology and extractivism; the politics of sustainability and environmental survival; inclusive social policies; health governance and health inequities; displacement, immigration, and citizenship; foreign aid and South-South cooperation; Indigenous resistance and popular mobilization against racism, patriarchy, and class oppression; political economy of knowledge production; commodity booms, poverty reduction, and the exercise of state power; neoliberal globalization and corporate power; and associated resistance and popular mobilization, writ large.

The graduate programs listed above participate in the Collaborative Specialization in Development Policy and Power at the University of Toronto. The collaborating graduate units contribute courses and provide facilities, support, and supervision for master's-level research and practicum placements.

Upon successful completion of the master's degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Development Policy and Power" on their transcript.

Contact and Address

Department of Global Development Studies:
www.utscc.utoronto.ca/dgds/
 Development Policy and Power:
ccdsccsutoronto.wixsite.com/ccds
 Email: gds-cs-ma@utscc.utoronto.ca
 Telephone: (416) 287-71113

Collaborative Specialization in Development Policy and Power
 Department of Global Development Studies
 University of Toronto Scarborough
 1265 Military Trail
 Toronto, Ontario M1C 1A4
 Canada

Development Policy and Power: Master's Level

Minimum Admission Requirements

Applicants must:

- Meet the admission requirements of both the home graduate unit and the collaborative specialization.
- Be enrolled in, or applying to, a participating master's degree program.
- Submit a copy of their CV/resumé.
- Submit a one-page essay describing why and how their interests coincide with the Collaborative Specialization in Development Policy and Power.

Optional Preparation

- The Department of Global Development Studies will provide students interested in the collaborative specialization with a Summer Reading list of key background readings. Students with no critical development studies exposure through their undergraduate studies, a placement or internship, or relevant work experience are strongly encouraged to review the material identified in the list. Students with a critical development background are encouraged to review texts to which they have not been exposed.

Completion Requirements

MA and MSc in Anthropology;
 MA in Geography;
 MA in Political Science (Fields: Political Economy of International Development; Political Science);
 Master of Public Health (Field: Social and Behavioural Health Sciences);
 Social Justice Education (MA; MEd Coursework Plus Major Research Paper Option; MEd Coursework Plus Thesis Option);
 MA in Sociology (Research Paper Option);
 MA in Women and Gender Studies

- Students must meet all the respective degree requirements of the School of Graduate Studies and the participating graduate unit.
- Students must meet the requirements of the collaborative specialization as follows:
 - IDS1000H *Development Policy and Power*: a core course meeting every other week throughout the academic year involving a mix of classes covering a substantive theme.
 - Participate regularly and actively in SRM3333H *Master's Seminar Series*.
 - The major research paper, thesis, or practicum placement in the participating degree program will be on a topic in critical development studies, approved by the collaborative specialization committee.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

MEd in Social Justice Education (Coursework Only Option)

- Students must meet all the respective degree requirements of the School of Graduate Studies and the participating graduate unit.
- Students must meet the requirements of the collaborative specialization as follows:
 - IDS1000H *Development Policy and Power*: a core course meeting every other week throughout the academic year involving a mix of classes covering a substantive theme.
 - Participate regularly and actively in the SRM3333H *Master's Seminar Series*.
 - 1.0 elective FCE related to development policy and power.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

MA in Sociology (Coursework Only Option)

- Students must meet all the respective degree requirements of the School of Graduate Studies and the participating graduate unit.
- Students must meet the requirements of the collaborative specialization as follows:
 - IDS1000H *Development Policy and Power*: a core course meeting every other week throughout the academic year involving a mix of classes covering a substantive theme.
 - Participate regularly and actively in SRM3333H *Master's Seminar Series*.
 - 0.5 elective FCE related to development policy and power.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

Master of Environmental Science (Research Paper Option)

- Students must meet all the respective degree requirements of the School of Graduate Studies and the participating graduate unit.
- Students must meet the requirements of the collaborative specialization as follows:
 - IDS1000H *Development Policy and Power*: a core course meeting every other week throughout the academic year involving a mix of classes covering a substantive theme. This course must be taken in addition to the 5.5 FCEs required for the MEnvSc program.
 - Participate regularly and actively in the SRM3333H *Master's Seminar Series*.
 - The major research paper in the participating degree program will be on a topic in critical development studies, approved by the collaborative specialization committee.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

Master of Environmental Science (Internship Option)

- Students must meet all the respective degree requirements of the School of Graduate Studies and the participating graduate unit.
- Students must meet the requirements of the collaborative specialization as follows:
 - IDS1000H *Development Policy and Power*: a core course meeting every other week throughout the academic year involving a mix of classes covering a substantive theme. This course must be taken in addition to the 5.5 FCEs required for the MEnvSc program.
 - Participate regularly and actively in the SRM3333H *Master's Seminar Series*.

- 1.5 elective FCEs from the following: EES1122H *Global Environmental Security and Sustainable Development*, EES1134H *Climate Change Policy*, EES1135H *Environmental Change and Human Health*, EES3002H *Conservation Policy*.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

Development Policy and Power: Courses

Core Courses

Course Code	Course Title
IDS1000H	Development Policy and Power
SRM3333H	Master's Seminar Series

Elective Courses by Graduate Unit

These courses may have prerequisites and enrolment limits and may not be offered every year. Students may take courses not listed here with approval of the collaboration specialization director.

Anthropology

Course Code	Course Title
ANT6019H	Anthropology of Neoliberalism
ANT7002H	Medical Anthropology II

Comparative, International and Development Education

Course Code	Course Title
CIE1001H	Introduction to Comparative, International, and Development Education
CIE1006H	Transnational Perspectives on Democracy, Human Rights, and Democratic Education in an Era of Globalization

Curriculum, Teaching and Learning

Course Code	Course Title
CTL1060H	Education and Social Development

Geography and Planning

Course Code	Course Title
GGR1807H	Special Topics: Geographies of Postcoloniality and Development: Exploring the 'Infrastructure Turn'
JPG1426H	Natural Resources, Difference, and Conflict
JPG1429H	Political Ecology of Food and Agriculture
JPG1502H	Global Urbanism and Cities of the Global South
JPG1520H	Contested Geographies of Class-Race Formation
JPG1706H	Violence and Security

Physical and Environmental Sciences

Course Code	Course Title
EES1122H	Global Environmental Security and Sustainable Development
EES1134H	Climate Change Policy
EES1135H	Environmental Change and Human Health
EES3002H	Conservation Policy

Political Science

Course Code	Course Title
POL2205H	Topics in International Politics I
POL2212H	Human Rights, Politics, and International Relations
POL2226H	Ethics and International Relations
POL2322H	Topics in Comparative Politics II
POL2345H	Politics of Growth in Developing Countries
POL2391H	Topics in International Politics III
POL2392H	Topics in International Politics IV
POL2405H	Topics in Latin American Politics
POL2408H	Political Economy of International Development
POL2418H	Topics in Middle East Politics

Public Health Sciences

Course Code	Course Title
CHL5113H	Global Migration and Health
CHL5702H	History of International Health
CHL8001H	Selected Topics in Public Health Issues

Social Justice Education

Course Code	Course Title
SJE1909H	Environmental Sustainability and Social Justice 1
SJE1954H	Marginality and the Politics of Resistance

Sociology

Course Code	Course Title
SOC6008H	Network Analysis I
SOC6009H	Ethnicity I
SOC6101H	Sociological Theory II
SOC6119H	Gender Relations II
SOC6210H	Political Sociology III

Women and Gender Studies

Course Code	Course Title
WSG1010H	Special Topics in Feminist Studies 2
WSG1013H	Special Topics in Feminist Theory 1
WSG1014H	Special Topics in Feminist Theory 2
WSG1016H	Migration, Mobility, and Displacement in Contemporary Africa
WSG1017H	Special Topics in Feminist Studies
WSG1019H	Special Topics in Feminist Studies
WSG1020H	Gender and Globalization: Transnational Perspectives

Developmental Biology

Developmental Biology: Introduction

Lead Faculty of the Collaborative Specialization

Medicine

Participating Degree Programs

Biochemistry — MSc, PhD
 Biomedical Engineering — MSc, PhD
 Cell and Systems Biology — MSc, PhD
 Immunology — MSc, PhD
 Laboratory Medicine and Pathobiology — MSc, PhD
 Medical Science — MSc, PhD
 Molecular Genetics — MSc, PhD
 Physiology — MSc, PhD

Overview

The graduate programs listed above participate in the Collaborative Specialization in Developmental Biology. The objectives of the specialization are to:

- promote and foster excellence in developmental biology research in Toronto;
- provide a means for master's and PhD graduate students working on developmental biology projects to be exposed to a broad range of issues and approaches in modern developmental biology;
- provide a single, comprehensive, advanced PhD-level graduate course to complement a number of introductory courses provided by different graduate units;
- provide a forum for interaction between investigators in developmental biology in different graduate units via participation in student seminars, supervisory committees, journal clubs, retreats, and seminars/symposia.

Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Developmental Biology" on their transcript.

Contact and Address

Web: devbio.utoronto.ca
 Email: ian.scott@sickkids.ca
 Telephone: (416) 813-7654 ext. 301572

Dr. Ian Scott, Program Director
 Collaborative Specialization in Developmental Biology
 Department of Molecular Genetics, University of Toronto
 Peter Gilgan Centre for Research and Learning

686 Bay Street, Room 16-9707
 Toronto, Ontario M5G 0A4 Canada

Developmental Biology: Master's Level

Minimum Admission Requirements

- Students who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units.

Completion Requirements

Students must:

- Be registered in the master's program of one of the participating graduate units and must be undertaking research in developmental biology under the supervision of a member of the collaborative specialization.
- Complete all degree program requirements of the participating graduate unit. In addition, they must complete the interdepartmental course JDB1024Y.
- Complete an MSc thesis in the topic area of developmental biology.

Developmental Biology: Doctoral Level

Minimum Admission Requirements

- Students who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units.
- Prospective students should contact the collaborative specialization director for additional details on admission procedures and course requirements.

Completion Requirements

Students must:

- Meet all respective degree requirements of the School of Graduate Studies, the home graduate unit, and the collaborative specialization.
- Be registered in the doctoral program of one of the host graduate units and must be undertaking research in developmental biology under the supervision of a member of the collaborative specialization.
- Complete all degree requirements of the participating graduate unit. In addition, they must complete the interdepartmental course JDB1025H and the seminar course JDB1026Y. These courses may be taken in place of some host graduate unit courses.
- Complete a PhD thesis in the topic area of developmental biology.

Developmental Biology: Courses

The following courses are offered every year:

Course Code	Course Title
JDB1024Y	Topics in Developmental Biology
JDB1025H	Developmental Biology
JDB1026Y	Student Seminars in Developmental Biology

Diaspora and Transnational Studies

Diaspora and Transnational Studies: Introduction

Lead Faculty of the Collaborative Specialization

Arts and Science

Participating Degree Programs

Anthropology — MA, MSc, PhD
 Art History — MA, PhD
 Cinema Studies — MA
 Comparative Literature — MA, PhD
 Criminology and Sociolegal Studies — MA, PhD
 Drama, Theatre and Performance Studies — MA, PhD
 English — MA, PhD
 Geography — MA, MSc, PhD
 Germanic Languages and Literatures — MA
 Germanic Literature, Culture and Theory — PhD
 History — MA, PhD
 Near and Middle Eastern Civilizations — MA, PhD
 Political Science — MA, PhD
 Religion — MA, PhD
 Slavic Languages and Literatures — MA, PhD
 Social Justice Education — MA, MEd, EdD, PhD
 Sociology — MA, PhD
 Spanish — MA, PhD
 Women and Gender Studies — MA, PhD

Supporting Units

Anne Tanenbaum Centre for Jewish Studies;
 Centre for Diaspora and Transnational Studies

Overview

Diaspora in contemporary thought involves the shifting relations between homelands and host nations from the perspective of those who have moved, whether voluntarily or not. Diaspora emphasizes the inescapable lived translocal experiences of many migrant communities that exceed the boundaries of the nation-state. Questions of nostalgia, of the dynamics of co-ethnic identification, of the politics of homeland and host nation, and of the inter-generational shifts in responses to all these are central to studies of diaspora.

Transnationalism, on the other hand, focuses on flows and counterflows and the multistrated connections to which they give rise. It encompasses in its ambit not just the movement of people but also concepts of citizenship and multinational governance, the resources of information technology, and the realities of the global marketplace, among others.

Taken together, the two concepts of diaspora and transnationalism enable our understanding of the complex realities of vast movements of people, goods, ideas, images, technologies, and finance in the world today.

This collaborative specialization is designed to bring together both social science and humanities perspectives to augment our existing tri-campus undergraduate program and to contribute to increased research collaboration between participants in the collaborative specialization.

Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Diaspora and Transnational Studies" on their transcript.

Contact and Address

Web: cdts.utoronto.ca
 Email: cdts@utoronto.ca
 Telephone: (416) 946 8464
 Fax: (416) 978 7045

Diaspora and Transnational Studies Collaborative Specialization
 University of Toronto
 Suite 230, 170 St. George Street
 Toronto, Ontario M5R 2M8 Canada

Diaspora and Transnational Studies: Master's Level

Minimum Admission Requirements

- Applicants are enrolled in a participating master's degree program in the graduate unit in which the research is conducted, which is known as the participating home graduate unit. The applicant must meet the admission requirements of both the home graduate unit and the collaborative specialization.

Completion Requirements

- Students must meet all respective degree requirements of the School of Graduate Studies and the participating unit.
- Students must meet the requirements of the collaborative specialization as follows:
 - 0.5 full-course equivalent (FCE) seminar in *Comparative Research Methods in Diaspora and Transnational Studies* (DTS). As part of the Research Methods seminar, students are required to submit an ethnographic, archival, or documentary paper on a diasporic community in Toronto or elsewhere.
 - 0.5 FCE DTS topics course (DTS2000H, DTS2001H, or DTS2002H); course themes to be decided each year by the collaborative specialization committee. The DTS collaborative components may be taken as electives for the purpose of satisfying home unit requirements.

- The DTS collaborative components may be taken as electives for the purpose of satisfying home unit requirements.
- If the student undertakes a major paper or thesis in their home unit, this will be on a topic in diaspora and transnational studies, approved by the collaborative specialization committee.

Diaspora and Transnational Studies: Doctoral Level

Minimum Admission Requirements

- Applicants shall be enrolled in a participating doctoral degree program in the graduate unit in which the research is conducted, which is known as the participating home graduate unit. The applicant shall meet the admission requirements of both the home graduate unit and the collaborative specialization.
- Students who complete the collaborative specialization at the master's level will not be eligible for the program at the doctoral level.

Completion Requirements

- Students must meet all respective degree requirements of the School of Graduate Studies and the participating unit.
- Students must meet the requirements of the collaborative specialization as follows:
 - 0.5 full-course equivalent (FCE) seminar in *Comparative Research Methods in Diaspora and Transnational Studies* (DTS). As part of the Research Methods seminar, students are required to submit an ethnographic, archival, or documentary paper on a diasporic community in Toronto or elsewhere.
 - 0.5 FCE DTS topics course (DTS2000H, DTS2001H, or DTS2002H); course themes to be decided each year by the collaborative specialization committee. The DTS collaborative components may be taken as electives for the purpose of satisfying home unit requirements.
 - The DTS collaborative components may be taken as electives for the purpose of satisfying home department requirements.
 - The student's dissertation in their home department must be on a topic in diaspora and transnational studies, approved by the collaborative specialization committee.

Diaspora and Transnational Studies: Courses

Course Code	Course Title
DTS1000H	Comparative Research Methods in Diaspora and Transnationalism
DTS2000H	Graduate Topics in Diaspora Studies
DTS2001H	Graduate Topics in Diaspora Studies
DTS2002H	Graduate Topics in Diaspora Studies
JCD5135H	Race, Politics, and Jewishness
JCD5136H	Migration and Memory: Narratives of Jewish Exile and Displacement

Editing Ancient and Medieval Texts

Editing Ancient and Medieval Texts: Introduction

This collaborative specialization will close on August 31, 2026.

Lead Faculty of the Collaborative Specialization

Arts and Science

Participating Degree Programs

Classics — PhD
 English — PhD
 History — PhD
 Italian Studies — PhD
 Medieval Studies — PhD
 Music — PhD
 Philosophy — PhD
 Religion — PhD
 Spanish — PhD

Overview

The Collaborative Specialization in Editing Ancient and Medieval Texts offers intensive training in the editing of medieval Latin and vernacular texts, including music. Training in all areas is based on a sound knowledge of Latin, a facility in examining manuscript documents, and an understanding of the principles of editorial method.

Students can choose to focus on editing texts in Latin, texts in Old and Middle English, or texts in other vernacular languages. Students complete a series of courses that deal with the techniques of reading, transcribing, and editing manuscripts, and then complete an editorial project. Upon successful completion of the PhD requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Editing Ancient and Medieval Texts" on their transcript.

Contact and Address

Web: medieval.utoronto.ca
 Email: medieval.studies@utoronto.ca
 Telephone: (416) 978-4884
 Fax: (416) 978-8294

Collaborative Specialization in Editing Ancient and Medieval Texts
 Centre for Medieval Studies
 University of Toronto
 3rd Floor, 125 Queen's Park
 Toronto, Ontario M5S 2C7
 Canada

Editing Ancient and Medieval Texts: Doctoral Level

Minimum Admission Requirements

- The Collaborative Specialization in Editing Ancient and Medieval Texts is only available to doctoral students in one of the collaborating graduate units.
- Students who wish to be admitted to the collaborative specialization must have passed the Centre for Medieval Studies' Level One Latin examination.

Completion Requirements

- Students must complete a total of **1.0 full-course equivalent (FCE)** as follows:
 - The year-long core seminar MST1111H *Higher Seminar in Editing Ancient and Medieval Texts*
 - 0.5 FCE from a course in the relevant language and/or philology of the student's field, chosen with the approval of the home graduate unit and the collaborative specialization director.
- An approved editorial project, which can be a paper for a course in any of the collaborating graduate units, an independent publishable project, or the student's dissertation.
- The student's course of study and overall progress will be reviewed annually by the collaborative specialization director, though ultimate responsibility for the student's progress will remain with the graduate chair of the home program.

Editing Ancient and Medieval Texts: Courses

Course information may be obtained from the Centre of Medieval Studies' website.

Medieval Studies

Course Code	Course Title
MST1000Y	Medieval Latin I
MST1101H	Codicology
MST1104H	Latin Palaeography I
MST1105H	Latin Palaeography II
MST1107H	Latin Textual Criticism

Course Code	Course Title
MST1110H	Diplomatics and Diplomatic Editing
MST1111H	Higher Seminar in Editing Ancient and Medieval Texts
MST1115H	English Palaeography
MST1384H	The Exeter Book of Old English Verse
MST1392H	Editing and Appreciating Wulfstan's Prose

Education, Francophonies and Diversity

Education, Francophonies and Diversity: Introduction

This information is available in French.

Lead Faculty of the Collaborative Specialization

Ontario Institute for Studies in Education (OISE)

Participating Degree Programs

Curriculum and Pedagogy — MA, MEd, PhD
 French Language and Literature — MA
 Language and Literacies Education — MA, MEd, PhD
 Social Justice Education — MA, MEd, EdD, PhD

Overview

The Collaborative Specialization in Education, Francophonies and Diversity will critically examine educational issues in the context of Francophone linguistic minorities in Ontario, in Canada, and in the world, with the notions of equity, diversity, and minoritization at the core of this critical examination. The emphasis will be on understanding social practices in education, looking specifically at how difference gets constructed, problematized, and transformed.

Upon successful completion of the requirements of the home graduate unit and the collaborative specialization, students will receive the notation “Completed Collaborative Specialization in Education, Francophonies and Diversity” on their transcript.

Contact and Address

Web: oise.utoronto.ca/crafo
 Email: crefo.oise@utoronto.ca
 Telephone: (416) 978-1975

Collaborative Specialization in Education, Francophonies and Diversity
 Centre de recherches en éducation franco-ontarienne (CREFO)
 Ontario Institute for Studies in Education, University of Toronto
 252 Bloor Street West, 6th Floor
 Toronto, Ontario M5S 1V6 Canada

Education, Francophonies and Diversity: Master's Level

Minimum Admission Requirements

- Applicants must apply to and be accepted by both their home program and the Collaborative Specialization in Education, Francophonies and Diversity.
- In addition to corresponding to all home program requirements, applicants must submit:
 - a curriculum vitae
 - a personal statement explaining how their program of study and specific research interests relate to Francophone linguistic minorities education.

Completion Requirements

- Complete the core course CRE1001H *Séminaire d'études : Éducation, francophonies et diversité*.
- Complete two Education, Francophonies and Diversity elective courses (1.0 FCE).
- Attend at least three sessions in the CREFO Conference Series. Students who are enrolled in an MA or MEd program with a Major Research Project (MRP) component must present their research paper at the CREFO Conference Series (SRM3333H *Master's Seminar Series*).
- Prepare a thesis or major research paper (depending on the requirements of the home graduate unit) which relates to the focus of the collaborative specialization. Students will be supervised by one of the collaborative specialization's core faculty in their home graduate unit.

Education, Francophonies and Diversity: Doctoral Level

Minimum Admission Requirements

- Applicants must apply to and be accepted by both their home program and the Collaborative Specialization in Education, Francophonies and Diversity.
- In addition to corresponding to all home program requirements, applicants must submit:
 - a curriculum vitae
 - a personal statement explaining how their program of study and specific research interests relate to Francophone linguistic minorities education.

Completion Requirements

- Complete the core course CRE1001H *Séminaire d'études : Éducation, francophonies et diversité*.
- Complete two Education, Francophonies and Diversity elective courses (1.0 FCE).
- Attend at least three sessions in the CREFO Conference Series. Students must present their research paper at the CREFO Conference Series (SRM4444H *Doctoral Seminar Series*).

- Prepare a thesis which relates to the focus of the collaborative specialization. Students will be supervised by one of the collaborative specialization's core faculty in their home graduate unit.

Education, Francophonies and Diversity: Courses

Not all courses are offered every year. Please consult the respective graduate unit's course schedule for details.

Core Course

Course Code	Course Title
CRE1001H	Séminaire d'études : Éducation, francophonies et diversité

Elective Courses

Course Code	Course Title
CTL1000H	Les fondements du curriculum et de la pédagogie
CTL1011H	L'éducation pour l'anti-oppression en milieu scolaire
CTL1304H	Études culturelles et éducation
CTL1306H	La recherche qualitative en éducation : bases théoriques et pratiques
CTL1307H	Identité collective et éducation minoritaire de langue française
CTL3200H	Analyse du discours
CTL3201H	Bilinguisme et éducation
CTL3202H	Politique et aménagement linguistique
CTL3203H	Les approches pédagogiques plurilingues et pluriculturelles en éducation
SJE1415H	Méthodologies narratives en éducation : récits, contre-récits, et récits alternatifs RM
SJE1418H	Sociologie de l'enfance, éducation, et inégalités entre élèves
SJE1900H	Introduction à la sociologie de l'éducation
SJE1951H	L'école, la participation parentale et la communauté
JTE1952H	Langue, culture, et éducation

Educational Policy

Educational Policy: Introduction

Admissions to this collaborative specialization have been administratively suspended.

Lead Faculty of the Collaborative Specialization

Ontario Institute for Studies in Education (OISE)

Participating Degree Programs

Adult Education and Community Development — MA, MEd, PhD
 Curriculum and Pedagogy — MA, MEd, PhD
 Developmental Psychology and Education — MA, MEd, PhD
 Educational Leadership and Policy — MA, MEd, EdD, PhD
 Higher Education — MA, MEd, EdD, PhD
 Language and Literacies Education — MA, MEd, PhD
 Social Justice Education — MA, MEd, EdD, PhD

Overview

The Collaborative Specialization in Educational Policy serves students interested in developing an understanding of the factors associated with educational policy development and implementation, with particular emphasis on developing theoretical and practical strategies for improving educational processes. The collaborative specialization's intellectual objectives include providing students with exposure to cross-field and cross-disciplinary approaches to educational problem framing and problem solving in order to broaden the possibilities for innovative and effective policy analysis; helping students understand how to apply theoretical concepts to particular social and educational problems in particular settings; and understanding the broader social, institutional, and policy contexts within which educational policy processes occur. There are two required courses and an annual lecture series.

Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Educational Policy" on their transcript.

Contact and Address

Web: www.oise.utoronto.ca/lhae/collaborative-specializations/educational-policy

Collaborative Specialization in Educational Policy
 Ontario Institute for Studies in Education
 University of Toronto
 252 Bloor Street West
 Toronto, Ontario M5S 1V6
 Canada

Educational Policy: Master's Level

Minimum Admission Requirements

- Applicants must apply to and be accepted by both their home program and the Collaborative Specialization in Educational Policy.
- In addition to corresponding to all home program requirements, the applicant shall submit a sample of writing, no longer than three pages, that includes:
 - Relevant personal and/or professional experiences, a career plan, and motivation in seeking admission to the Collaborative Specialization in Educational Policy.
 - An indication of specific courses of interest.
 - For thesis students, a brief outline of a proposed research project.
 - For thesis students, indication of preference of supervisor.
- Applicants who are interested in applying to the collaborative specialization at the time of their initial application to their home graduate program should indicate this on their application and advise referees that letters of support will be used in application for both the home program and the collaborative specialization.
- Students who develop an interest in admission to the collaborative specialization after they have been admitted to their home program may also apply during their course of study. Please direct inquiries to the address listed above.

Completion Requirements

- All master's students in the collaborative specialization:
 - Take the core half course EDP3045H *Educational Policy Analysis*.
 - Attend the Collaborative Specialization in Educational Policy Seminar Series over two consecutive sessions. Collaborative Educational Policy Seminars occur once a month; attendance is required.
 - Are encouraged, but not required, to enrol in an elective half course in the area of educational policy selected from the list of electives below.
 - Take the remaining courses for the fulfillment of the degree requirements of the home program.
 - Enrolled in home programs requiring a master's research project or thesis will be required to incorporate educational policy issues in their research; a member of the collaborative specialization core faculty will serve as supervisor or committee member.
- MEd program:
 - The total number of courses required for graduation will equal 6, 8, or 10.
 - Course-only MEd students must take two electives from the list below.
- MA program:
 - The total number of courses required for graduation will equal 6 or 8.

Educational Policy: Doctoral Level

Minimum Admission Requirements

- Students interested in participating in the Collaborative Specialization in Educational Policy at the doctoral level must apply to and be accepted by both their home program and the collaborative specialization.
- In addition to corresponding to all home program requirements, the application shall include a sample of writing, no longer than three pages, that includes:
 - Relevant personal and/or professional experiences, a career plan, and motivation in seeking admission to the Collaborative Specialization in Educational Policy.
 - An indication of specific courses of interest.
 - A brief outline of proposed research project.
 - Indication of preference of supervisor.
- Applicants who are interested in applying to the collaborative specialization at the time of their initial application to their home graduate program should indicate this on their application and advise referees that letters of support will be used in application for both the home program and the collaborative specialization.
- Students who develop an interest in admission to the collaborative specialization after they have been admitted to their home program may also apply during their course of study. Please direct inquiries to the address listed above.

Completion Requirements

- All doctoral students in the collaborative specialization:
 - Take the core half course EDP3045H *Educational Policy Analysis*, if not already taken.
 - Take the core half course EDP3145H *Methodological Approaches for Researching Education Policy (RM)*.
 - Attend the Collaborative Specialization in Educational Policy Seminar Series over two consecutive sessions. Collaborative Educational Policy Seminars occur once a month; attendance is required.
 - Are encouraged, but not required, to consider one or more elective half courses in the area of educational policy selected from the list of electives below. The remaining half courses will be those required for the fulfillment of the degree requirements of the home program.
 - Are required to complete a thesis which incorporates issues of educational policy. A member of the collaborative specialization core faculty will serve as supervisor or committee member.
- The total number of courses required for graduation for both the EdD and PhD will equal eight, depending on the requirements of the student's home program.

Educational Policy: Courses

Not all courses are offered each year.

Master's-Level Core Course

Course Code	Course Title
EDP3045H	Educational Policy Analysis

Master's-Level Electives

Course Code	Course Title
APD1211H	Psychological Foundations of Early Development and Education
APD1241H	Outcomes of Early Education and Child Care
CTL1428H	Immigration and the Development of Canadian Education
CTL1429H	Ethnicity and the Development of Canadian Education
CTL7074H	Issues in Educational Law, Policy, and Ethics
LHA1016H	School Program Development and Implementation
LHA1018H	Political Skill in the Education Arena
LHA1020H	Teachers and Educational Change
LHA1035H	Sociology of Education
LHA1065H	Global Educational Equity and Quantitative Policy Research
LHA1806H	Systems of Higher Education
LHA5000H*	Special Topics in Educational Leadership and Policy: Master's Level*
LHA5004H	Special Topics in Educational Leadership and Policy: Master's Level
LHA5006H	Special Topics in Educational Leadership and Policy: Master's Level
LHA5800H*	Special Topics in Higher Education: Master's Level*
LHA5801H*	Special Topics in Higher Education: Master's Level*
LHA5807H	Special Topics in Higher Education: Master's Level
SJE1902H	Introductory Sociological Research Methods in Education
SJE1903H	Major Concepts and Issues in Social Justice Education
SJE1912H	Foucault and Research in Education and Culture: Disclosure, Power, and the Subject
SJE1922H	Sociology of Race and Ethnicity
SJE1951H	The School and the Community
SJE1954H	Marginality and the Politics of Resistance

Course Code	Course Title
SJE5000H*	Special Topics in Social Justice Research in Education: Master's Level*
SJE5005H	Special Topics in Social Justice Research in Education: Master's Level

* **Special topics courses:** Only the special topics course titles listed on the CSEP website can be counted toward CSEP program requirements in the current year. Please confirm current year courses with the CSEP program administrator.

Doctoral-Level Core Courses

Course Code	Course Title
EDP3045H	Educational Policy Analysis
EDP3145H	Methodological Approaches for Researching Education Policy (RM)

Doctoral-Level Electives

Course Code	Course Title
CTL3000H	Foundations of Bilingual and Multicultural Education
CTL3008H	Critical Pedagogy, Language, and Cultural Diversity
CTL3018H	Language Planning and Policy
JOI3048H	Intermediate Statistics in Educational Research: Multiple Regression Analysis (RM)
JSA5147H	Language, Nationalism, and Post-nationalism
LHA3041H	Doctoral Seminar on Policy Issues in Education
LHA3043H	Survey Research in Educational Leadership and Policy (RM)
LHA3064H	Global Governance and Educational Change: the Politics of International Cooperation in Education
LHA6000H*	Special Topics in Educational Leadership and Policy: Doctoral Level*
LHA6002H	Special Topics in Educational Leadership and Policy: Doctoral Level
LHA6005H	Special Topics in Educational Leadership and Policy: Doctoral Level
SJE2941H	Bourdieu: Theory of Practice in Social Sciences
SJE6000H*	Special Topics in Social Justice Research in Education: Doctoral Level*

Engineering Education

Engineering Education: Introduction

Lead Faculty of the Collaborative Specialization

Applied Science and Engineering

Participating Degree Programs

Chemical Engineering and Applied Chemistry — MSc, PhD
 Civil Engineering — MSc, PhD
 Curriculum and Pedagogy — MA, PhD
 Higher Education — MA, MEd, PhD
 Mechanical and Industrial Engineering — MSc, PhD

Overview

The Collaborative Specialization in Engineering Education is an interdisciplinary initiative designed for students within home programs in engineering or education who are interested in pursuing courses and research in engineering education. This collaborative specialization allows students to join a small community of scholars interested in research and learning at the nexus of education and engineering practice. A core course provides students with an introduction to engineering learning, knowledge, assessment, and culture and community, while the theoretical foundations, methods, and topics related to engineering education research are explored in a seminar course.

Research is supervised by a graduate faculty member in the student's home graduate unit. Opportunities exist to assess and apply research findings as part of instructional initiatives within the Faculty of Applied Science and Engineering. Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Engineering Education" on their transcript.

Contact and Address

Web: gradstudies.engineering.utoronto.ca/research-degrees/collaborative-program-engineering-education and istep.utoronto.ca/student-programming/enged/
 Email: istep@utoronto.ca
 Telephone: (416) 978-2821

Collaborative Specialization in Engineering Education
 Institute for Studies in Transdisciplinary Engineering Education & Practice (ISTEP)
 55 College Street, Room 723
 Toronto, Ontario M5S 0C9
 Canada

Engineering Education: Master's Level

Minimum Admission Requirements

- Applicants to the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units.
- Applicants to the collaborative specialization must submit the following:
 - curriculum vitae (CV)
 - personal statement explaining how the proposed plan of study and specific research interests relate to engineering education
 - letter of recommendation from a faculty member confirming their willingness to supervise and support the student's research and outlining why the student would be well suited for the Engineering Education Collaborative Specialization.

Completion Requirements

Students must meet all respective degree requirements of the School of Graduate Studies, the participating home graduate unit, and the collaborative specialization. Collaborative specialization students must:

- Successfully complete a total of 0.5 full-course equivalent (FCE) as follows:
 - the core course TEP1204H *Instructional Design in Engineering Education*.
- Participate continuously in a seminar series TEP1205Y *Engineering Education Research Seminar*.
- Undertake the major paper or thesis required by the home degree program with a focus on engineering education under the supervision of a collaborative specialization core faculty member.

Engineering Education: Doctoral Level

Minimum Admission Requirements

- Applicants to the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units.
- Applicants to the collaborative specialization must submit the following:
 - curriculum vitae (CV)
 - personal statement explaining how the plan of study and specific research interests relate to engineering education
 - letter of recommendation from a faculty member confirming their willingness to supervise and support the student's research and outlining why the student would be well suited for the Engineering Education Collaborative Specialization.

Completion Requirements

Students must meet all respective degree requirements of the School of Graduate Studies, the participating home graduate unit, and the collaborative specialization. Collaborative specialization students must:

- Successfully complete a total of **1.0 full-course equivalent (FCE)** as follows:
 - the core course TEP1204H *Instructional Design in Engineering Education*
 - an elective course in engineering education (0.5 FCE); see the elective course list.
- Participate continuously in a seminar series TEP1206Y *Engineering Education Research Seminar — Doctoral Level* beginning in Year 1; deliver a seminar on the research topic in Year 2; design and deliver one or more instructional workshops and make a final presentation on their research, both in the final year.
- Complete the thesis required by the home degree program with a focus on engineering education under the supervision of a collaborative specialization core faculty member.
- Complete the core course TEP1204H; students who have completed the course at the master's level may substitute an elective course at the doctoral level from the elective list and with the approval of the collaborative specialization director.

Engineering Education: Courses

Core Courses

Course Code	Course Title
TEP1204H	Instructional Design in Engineering Education
TEP1205Y	Engineering Education Research Seminar — Master's Level
TEP1206Y	Engineering Education Research Seminar — Doctoral Level

Elective Courses (PhD Level Only)

Department of Curriculum, Teaching and Learning

Course Code	Course Title
CTL1018H	Introduction to Qualitative Inquiry in Curriculum, Teaching, and Learning
CTL1041H	Research Methods in Education
CTL1042H	Instrument Development in Education
CTL1047H	Course Self-Assessment
CTL1206H	Teaching and Learning Science

Course Code	Course Title
CTL1207H	Teaching and Learning about Science: Issues and Strategies in Science, Technology, Society and Environment (STSE) Education
CTL1211H	Action Research in Science, Mathematics, and Technology Education
CTL1215H	Teaching and Learning about Science and Technology: Beyond Schools
CTL1218H	Culture and Cognition in Mathematics, Science, and Technology Education
CTL1306H	Qualitative Research Methods in Education: Concepts and Methods
CTL1603H	Introduction to Knowledge Building
CTL1608H	The Design of Online Environments: Theory and Practice

Faculty of Applied Science and Engineering

Course Code	Course Title
APS530H1	Appropriate Technology and Design for Global Development
APS1001H	Project Management
APS1012H	Managing Business Innovation and Transformational Change
APS1013H	Applying Innovation in Engineering and Business Operations
APS1018H	The Engineer in Society — Ethics, History, and Philosophy
MIE1402H	Experimental Methods in Human Factors Research
MIE1403H	Analytical Methods in Human Factors Research
MIE1413H	Statistical Models in Empirical Research
MIE1415H	Analysis and Design of Cognitive Work
TEP1010H	Cognitive and Psychological Foundations of Effective Leadership
TEP1011H	Authentic Leadership and Teaming
TEP1501H	Leadership and Leading in Groups and Organizations
TEP1502H	Leadership in Product Design

Environment and Health

Environment and Health: Introduction

Lead Faculty of the Collaborative Specialization

Arts and Science

Participating Degree Programs

Adult Education and Community Development — MA, MEd, PhD
 Architecture, Landscape, and Design — PhD
 Chemical Engineering and Applied Chemistry — MAsC, MEng, PhD
 Community Health — MScCH
 Environmental Science — MEnvSc, PhD
 Forest Conservation — MFC
 Forestry — MScF, PhD
 Geography — MA, MSc, PhD
 Landscape Architecture — MLA
 Medical Science — MSc, PhD
 Music — MA, MMus, PhD
 Planning — MScPl, PhD
 Public Health Sciences — MPH, PhD
 Women and Gender Studies — MA, PhD

Overview

The graduate degree programs listed above participate in the Collaborative Specialization in Environment and Health (CSEH), which is offered through the School of the Environment. Graduate students admitted to a participating graduate degree program in a degree-granting unit, also called the home department or home unit, can apply to the CSEH and pursue coursework and research in areas related to environment and health. The School of the Environment currently has graduate students from across the disciplinary spectrum.

The study of environment and health recognizes that human health is fundamentally dependent on a healthy environment. With a focus on understanding the human health implications of chemical, biological, and physical hazards in our environment, it encompasses topics such as the health impacts of air and water quality, climate change, contaminated lands and urban design, and the need for interdisciplinary approaches to address them. The CSEH exposes students in the health sciences to broader environmental perspectives on related health issues, while students in environmental studies and sciences can have the opportunity to gain insight about the health implications of environmental quality. This specialization may also be of interest to students who are concerned with ethical, pedagogical, and policy approaches to understanding and addressing environment and health issues.

Upon successful completion of the degree requirements of the participating home department and the CSEH, students will receive the notation "Completed Collaborative Specialization in Environment and Health" on their transcript.

Contact and Address

Web: environment.utoronto.ca/graduate
 Email: grad.director.env@utoronto.ca or
grad.office.env@utoronto.ca
 Telephone: (416) 978-5174

Collaborative Specialization in Environment and Health
 School of the Environment, Earth Sciences Centre
 University of Toronto
 Room 1021, 33 Willcocks Street
 Toronto, Ontario M5S 3E8
 Canada

Environment and Health: Master's Level

Minimum Admission Requirements

- Students who wish to enrol in the CSEH offered by the School of the Environment must first apply to and be accepted into a master's program in a degree-granting unit, also called a home department or home unit. Information about applying to a home unit can be found on the School of Graduate Studies website as well as on the respective websites of participating degree-granting units.
- Prospective students who are planning to enrol in the CSEH are strongly encouraged to submit the Collaborative Specialization enrolment form (PDF) after receiving their letter of acceptance or at the start of their program of study. Students are able to join the CSEH beyond the start of their degree, provided they are able to complete the CSEH requirements by the time they are ready to graduate from their degree program.

Completion Requirements

- The requirements listed below must be completed in combination with that expected for the master's degree program requirements of the home department. These are normally counted as electives toward the degree program requirements of the student's home unit. Typically, students complete a minimum of 1.0 full-course equivalent (FCE) and conduct research on an environment and health related topic. Note that specific requirements for participating degree programs can vary. The CSEH requirements for each participating degree program are listed below as well as on the School of the Environment's website under the Collaborative Specialization in Environment and Health.
- Master's students who are enrolled in a coursework-based degree must complete 30% of their program requirements within their collaborative specialization.

Master's Degree Thesis or Major Research Paper Option

Master of Applied Science in Chemical Engineering and Applied Chemistry;

Master of Arts in Adult Education and Community Development;

Master of Arts in Women and Gender Studies;

Master of Arts in Geography;

Master of Science in Forestry;

Master of Science in Geography;

Master of Science in Medical Science

- ENV4001H *Graduate Seminars in Environment and Health*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below.
 - Geography MA and MSc students are strongly encouraged to complete a cross-listed elective course such as GGR1422H, JGE1425H, or JPG1428H.
 - Courses (including special topics) that have an environment and health focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- Complete a thesis or major research paper in their home unit on an environment and health topic. A copy of the final thesis or research paper must be submitted to the School of the Environment prior to convocation.

Master of Arts in Music, Field in Ethnomusicology

- ENV4001H *Graduate Seminars in Environment and Health*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment and health focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- For students who complete MUS1002H *Fieldwork Methods and Practicum*, the practicum should have an environment and health focus. A completion letter must be submitted to the School of the Environment prior to convocation.

Master of Arts in Music, Field in Music Education

- ENV4001H *Graduate Seminars in Environment and Health*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment and health focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.

- For students who complete MUS2990Y *MA Major Essay*, the paper should include an environment and health component. A final copy of the paper must be submitted to the School of the Environment prior to convocation.

Master of Arts in Music, Field in Music and Health Sciences

- ENV4001H *Graduate Seminars in Environment and Health*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment and health focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- For students who complete MUS7407H *Clinical Research Practicum*, the practicum should have an environment and health focus. A completion letter must be submitted to the School of the Environment prior to convocation.

Master of Music in Applied Music and Health

- ENV4001H *Graduate Seminars in Environment and Health*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment and health focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- 1.5 FCEs completed through MUS7407H *Clinical Research Practicum* and MUS4112Y *Clinical Performance Practicum*, provided there is an environment and health related component to each course.

Master's Degree Coursework Option

Master of Arts in Music, Field in Musicology

- ENV4001H *Graduate Seminars in Environment and Health*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment and health focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- Additional 0.5 FCE completed through either a second approved elective, an individual reading and research course, or ENV5555Y *Research Paper*.

Master of Arts in Music, Field in Music Theory

- ENV4001H *Graduate Seminars in Environment and Health*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment and health focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- Additional 0.5 FCE completed through either a second approved elective, an individual reading and research course, or ENV5555Y *Research Paper*.

Master of Education in Adult Education and Community Development;

Master of Engineering in Chemical Engineering and Applied Chemistry

- ENV4001H *Graduate Seminars in Environment and Health*.
- 1.0 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment and health focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.

Master of Environmental Science

- ENV4001H *Graduate Seminars in Environment and Health*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- Either EES1116Y *Internship* or EES1101Y *Research Paper in Environmental Science*, provided there is an environment and health focus. Students completing a research paper must submit a final copy to the School of the Environment prior to convocation. Students completing an internship must submit a letter of completion to the School of the Environment prior to convocation.

Master of Forest Conservation

- ENV4001H *Graduate Seminars in Environment and Health*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- FOR3007H *Internship in Forest Conservation*, provided there is an environment and health theme or component.

A copy of the internship completion letter must be submitted to the School prior to convocation.

- FOR3008H *Case Study Capstone in Forest Conservation*, provided there is an environment and health theme or component. A copy of the final research paper must be submitted to the School of the Environment prior to convocation.

Master of Landscape Architecture and Design

3-Year Option

- ENV4001H *Graduate Seminars in Environment and Health*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- Up to 4.0 FCEs from the following courses may count towards the remaining CSEH requirements: LAN1011Y, LAN1021Y, LAN2013Y, LAN1037H, LAN1038H, LAN1041H, LAN1043H, LAN1047H, LAN1048H, LAN2045H, LAN2046H, LAN2047H, LAN2048H, LAN3016Y, and LAN3017Y, provided there is an environmental component. Students completing the research paper must submit a final copy to the School of the Environment prior to convocation.

2-Year Option

- ENV4001H *Graduate Seminars in Environment and Health*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- Up to 2.0 FCEs from the following courses may count towards the remaining CSEH requirements: LAN2013Y, LAN2045H, LAN2046H, LAN2047H, LAN2048H, LAN3016Y, and LAN3017Y, provided there is an environment and health component. Students completing the research paper must submit a final copy to the School of the Environment prior to convocation.

Master of Public Health

- ENV4001H *Graduate Seminars in Environment and Health*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.

- A minimum 1.0 FCE practicum placement with the home unit, provided there is an environment and health component.
- An additional 0.5 to 1.0 FCE, depending on the practicum length, can be completed through electives from the CSEH course list.

Master of Science in Community Health

- ENV4001H *Graduate Seminars in Environment and Health*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- 0.5 FCE practicum placement with the home unit, provided there is an environment and health component.

Master of Science in Planning

- ENV4001H *Graduate Seminars in Environment and Health*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- Additional 1.5 FCEs which can be completed through a combination of PLA4444H *Internship* and/or PLA1107Y *Current Issues Paper*, provided there is an environment and health component, or additional electives from the CSEH course list.

Environment and Health: Doctoral Level

Minimum Admission Requirements

- Students who wish to enrol in the CSEH offered by the School of the Environment must first apply to and be accepted into a doctoral program in a degree-granting unit, also called a home department or home unit. Information about applying to a home department can be found on the School of Graduate Studies website as well as on the respective websites of participating degree-granting units.
- Prospective students who are planning to enrol in the CSEH are strongly encouraged to submit the Collaborative Specialization Enrolment Form (PDF) after receiving their letter of acceptance or at the start of their program of study. Students are able to join the CSEH beyond the start of their degree, provided they are able to complete the CSEH requirements by the time they are ready to graduate from their degree program.

Completion Requirements

- The requirements listed below must be completed in combination with the PhD degree program requirements of the student's respective home department. These are normally counted as electives toward the degree program requirements of the student's home department. Typically, students complete up to 1.0 full-course equivalent (FCE) and conduct research on an environment and health topic. Note that specific requirements for participating degree programs can vary. Therefore, students are encouraged to check the calendar entries of their respective home department programs. Specific CSEH requirements for each participating degree program are listed on the School of the Environment website under the Collaborative Specialization in Environment and Health.
- Complete the mandatory core course ENV4001H *Graduate Seminars in Environment and Health*, unless already completed at the master's level.
- Complete one elective course (0.5 FCE) from the School's list of approved courses. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- Give an oral presentation of their doctoral research as part of the School of the Environment's Research Day, which is held once per year in the spring.
- Complete a thesis on a theme in environment and health. Normally, the thesis committee will include a supervisor from the student's home department who holds a graduate faculty membership (GFM) in the School of the Environment. If the student's primary thesis supervisor does not hold a GFM in the School of the Environment, the School's Director will either initiate the process of assigning a GFM to the primary supervisor or review the composition of the thesis committee to ensure it has appropriate expertise. A copy of the final thesis must be submitted to the School of the Environment prior to graduation.
- Additional courses may be required by the home department and/or by the supervisor or supervisory committee, depending on academic and/or career goals of the student, as well as departmental regulations.
 - For programs with limited elective space, such as the PhD in Geography, students are strongly encouraged to select a cross-listed elective course.

Environment and Health: Courses

The School of the Environment offers individual credit courses that are open to graduate students from all units of the University, subject to enrolment limits. Except for the core course, ENV4001H, not all courses are offered every year.

Graduate students enrolled in the CSES may also request to count non-listed electives towards their collaborative specialization pending approval from the School's Graduate Associate Director. (Non-listed electives are those not on 1) the pre-approved list of School of the Environment courses or 2) those that are formally cross-listed with other graduate units.) For a current graduate course listing, please refer to the School of the Environment website.

Core Course

Course Code	Course Title
ENV4001H	Graduate Seminars in Environment and Health

Elective Courses

Course Code	Course Title
ENV1703H	Water Resources Management and Policy
ENV1704H	Environmental Risk Analysis and Management
ENV3000H	Topics in Environment and Health
ENV3000Y	Topics in Environment and Health

Other Elective Courses

Adult Education and Community Development (Department of Leadership, Higher and Adult Education)

Course Code	Course Title
LHA1197H	The Pedagogy of Food

Chemical Engineering and Applied Chemistry

Course Code	Course Title
CHE1435H	Fundamentals of Aerosol Physics and Chemistry
JNC2503H	Environmental Pathways

Chemistry

Course Code	Course Title
CHM1401H	Transport and Fate of Chemical Species in the Environment
CHM1410H	Analytical Environmental Chemistry
CHM1415H	Atmospheric Chemistry

Course Code	Course Title
CHM1420H	Environmental Chemistry of Soil
CHM1425H	Modelling the Fate of Organic Chemicals in the Environment

Environmental Science (Department of Physical and Environmental Sciences)

Course Code	Course Title
EES1139H	Perspectives in Environmental Health: Mechanisms of Toxicity
EES1704H	Environmental Risk Assessment

Forestry

Course Code	Course Title
FOR1575H	Urban Forest Conservation

Geography and Planning

Course Code	Course Title
GGR1422H	The Geography of Urban Air Pollution
JGE1425H	Livelihoods, Poverty, and Environment in the Global South
JPG1428H	Greening the City: Urban Environmental Planning and Management

Landscape Architecture (Department of Architecture, Landscape, and Design)

Course Code	Course Title
LAN1037H	Plants and Design
LAN1041H	Field Studies 1
LAN2045H	Landscape Ecology
LAN2047H	Landscape Hydrology
LAN3045H	Advanced Site Technologies

Pharmacology (Department of Pharmacology and Toxicology)

Course Code	Course Title
JNP1016H	Graduate Seminar in Toxicology
JNP1019H	Biomedical Toxicology
JNP1020H	Interdisciplinary Toxicology

Public Health Sciences

Course Code	Course Title
CHL5126H	Building Community Resilience
CHL5413H	Public Health Sanitation
CHL5416H	Environmental Epidemiology
CHL5809H	Ecological Public Health
CHL5903H	Environmental Health
CHL5910H	Occupational and Environmental Hygiene I
CHL5911H	Occupational and Environmental Hygiene II
CHL5921H	Protecting the Public from Air Pollution

Environmental Studies

Environmental Studies: Introduction

Lead Faculty of the Collaborative Specialization

Arts and Science

Participating Degree Programs

Adult Education and Community Development — MA, MEd, PhD
 Anthropology — MA, MSc, PhD
 Architecture, Landscape, and Design — PhD
 Chemical Engineering and Applied Chemistry — MSc, MEng, PhD
 Chemistry — MSc, PhD
 Civil Engineering — MSc, MEng, MEngCEM, PhD
 Computer Science — MSc, PhD
 Earth Sciences — MSc, MSc, PhD
 English — MA, PhD
 Ecology and Evolutionary Biology — PhD
 Environmental Science — MEnvSc, PhD
 Forest Conservation — MFC
 Forestry — MScF, PhD
 Geography — MA, MSc, PhD
 Global Affairs — MGA
 Information — MI, PhD
 Landscape Architecture — MLA
 Management — MBA, PhD
 Music — MA, PhD
 Physics — MSc, PhD
 Planning — MScPI, PhD
 Political Science — MA, PhD
 Public Policy — MPP
 Religion — MA, PhD
 Social Justice Education — MA, MEd, EdD, PhD
 Sociology — MA, PhD
 Sustainability Management — MScSM
 Women and Gender Studies — MA, PhD

Overview

The School of the Environment's Collaborative Specialization in Environmental Studies (CSES) provides graduate students from across all three U of T campuses the opportunity to expand the focus of their research and study to reflect an interdisciplinary approach to thinking about the environment. Students admitted to a graduate degree program in a participating degree-granting unit (listed above), also called the "home department" or "home unit," can apply to the CSES and pursue coursework and research on topics related to the environment. The CSES is intended to provide a unique opportunity for interdisciplinary dialogue and learning about complex environmental challenges. These challenges demand a serious commitment to enhancing awareness and imagining possibilities that can serve to construct more sustainable and just futures.

The main objectives of the CSES are to:

- Introduce students to the world of graduate-level interdisciplinary research in environmental studies;
- Enhance student learning in the home unit, by providing opportunities to interact with students and faculty from other units who are also interested in environment;
- Develop students' communication skills on environmental issues across disciplinary boundaries.

The introductory nature of some of these learning outcomes is often surpassed. Students admitted to a graduate degree program in a participating degree-granting unit (listed above) can apply to the CSES and pursue coursework and research on topics related to the environment. The purpose is to complement the discipline-based learning and research focus of their home units by providing students an interdisciplinary forum to examine, discuss, and address environmental issues.

Learning takes place in both the formal courses offered by the School of the Environment (or electives in other units) and through informal interactions and engagements with other students and faculty at seminars and School events, such as the annual Research Day event where doctoral students present their dissertation work. With participating students from almost 30 disciplines, the core course, ENV1001H *Environmental Decision Making*, gives students a unique opportunity to engage with faculty and peers coming from a range of academic backgrounds and perspectives.

Upon successful completion of the degree requirements of the participating home graduate unit and the CSES, students will receive the notation "Completed Collaborative Specialization in Environmental Studies" on their transcript.

Contact and Address

Web: environment.utoronto.ca/graduate
 Email: grad.director.env@utoronto.ca or grad.office.env@utoronto.ca
 Telephone: (416) 978-5174

Collaborative Specialization in Environmental Studies
 School of the Environment, Earth Sciences Centre
 University of Toronto
 Room 1021, 33 Willcocks Street
 Toronto, Ontario M5S 3E8
 Canada

Environmental Studies: Master's Level

Minimum Admission Requirements

- Students who wish to enrol in the Collaborative Specialization in Environmental Studies (CSES) offered by the School of the Environment must first apply to and be accepted into a master's program in a degree-granting unit, also called a home department or home unit. Information about applying to a master's program can be found on the School of Graduate Studies website as well as on the respective websites of participating degree-granting units.

- Prospective students who are planning to enrol in the CSES are strongly encouraged to submit the collaborative specialization enrolment form (PDF) after receiving their letter of acceptance or at the start of their program of study. Students are able to join the CSES beyond the start of their degree, provided they are able to complete the CSES requirements by the time they are ready to graduate from their degree program.

Completion Requirements

- The requirements listed below must be completed in combination with that expected for the master's degree program of the home department. These are normally counted as electives toward the degree program requirements of the student's home department. Typically, students complete a minimum of 1.0 full-course equivalent (FCE) and conduct research on an environmental topic. Note that specific requirements for participating programs can vary. The CSES requirements for each participating degree program are listed below as well as on the School of the Environment website under the Collaborative Specialization in Environmental Studies.
- Master's students who are enrolled in a coursework-based degree must complete 30% of their program requirements within their collaborative specialization as specified below.

Master's Degree Thesis or Major Research Paper Option

Master of Applied Science in Chemical Engineering and Applied Chemistry;
Master of Applied Science in Civil and Mineral Engineering;
Master of Applied Science in Earth Sciences;
Master of Arts in Adult Education and Community Development;
Master of Arts in Anthropology;
Master of Arts in Geography;
Master of Arts in Political Science;
Master of Arts in Religion;
Master of Arts in Social Justice Education;
Master of Arts in Sociology (Research Paper Option);
Master of Arts in Women and Gender Studies;
Master of Education in Social Justice Education (Major Research Paper Option);
Master of Information (Thesis Option);
Master of Science in Anthropology;
Master of Science in Chemistry;
Master of Science in Computer Science;
Master of Science in Earth Sciences (Doctoral Stream);
Master of Science in Geography;
Master of Science in Physics

- ENV1001H *Environmental Decision Making*.
- 0.5 elective FCE from the School of the Environment's list of approved courses. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.

- **Anthropology MA and MSc** students are strongly encouraged to complete a cross-listed elective course such as ANT4051H, ANT6018H, or ANT6066H.
- **Chemical Engineering MSc** students are strongly encouraged to complete a cross-listed elective course such as CHE1435H or JNC2503H.
- **Chemistry MSc** students are strongly encouraged to complete a cross-listed elective course such as CHM1401H, CHM1404H, CHM1410H, CHM1415H, CHM1420H, or CHM1425H.
- **Computer Science MSc** students can complete one of the following courses as their CSES elective, which will also count towards their degree program: CSC2537H, CSC2552H, CSC2615H, or CSC2720H.
- **Earth Sciences MSc and MSc** (doctoral-stream) students are strongly encouraged to complete a cross-listed elective course such as ESS2303H or ESS2304H.
- **Geography MA and MSc** students are strongly encouraged to complete a cross-listed elective course such as GGR1216H, GGR1407H, GGR1408H, GGR1411H, JGE1425H, JPG1428H, JPG1429H, JPG1518H, or JPG1814H.
- **Political Science MA** students are strongly encouraged to complete a cross-listed elective course such as POL2213H.
- **Sociology MA** students are required to obtain permission from the Department of Sociology's Graduate Coordinator in order to enrol in outside electives. Students may request environment-related electives that are not from the School's list of approved courses to count towards their CSES by seeking approval from the School of the Environment's Graduate Associate Director.
- **Women and Gender Studies MA** students are strongly encouraged to complete a cross-listed elective course such as WGS1016H.
- Write a thesis or major research paper in the home department on an environment-related topic. A copy of the final thesis or research paper must be submitted to the School of the Environment prior to graduation.

Master of Arts in Music, Field in Ethnomusicology

- ENV1001H *Environmental Decision Making*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below.
- MUS1002H *Fieldwork Methods and Practicum*, provided the practicum includes an environmental component. A completion letter must be submitted to the School of the Environment prior to convocation. Alternatively, students can complete 0.5 FCE through either an additional approved elective, an individual reading and research course, or ENV555Y *Research Paper*.
- Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.

Master of Arts in Music, Field in Music Education

- ENV1001H *Environmental Decision Making*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- For students who complete MUS2990Y *MA Major Essay*, the paper should include an environmental component. A final copy of the paper must be submitted to the School prior to convocation.

Master of Science in Forestry

- ENV1001H *Environmental Decision Making*.
- FOR1001H *Graduate Seminar*, will count as the 0.5 FCE elective requirement towards the collaborative specialization.
- Thesis on an environmental topic. A copy of the final thesis must be submitted to the School of the Environment prior to convocation.

Master's Degree Coursework Option

Master of Arts in English;

Master of Arts in Sociology (Coursework Option);

Master of Education in Adult Education and Community Development;

Master of Education in Social Justice Education (Coursework Option);

Master of Engineering in Chemical Engineering and Applied Chemistry;

Master of Engineering in Civil and Mineral Engineering;

Master of Science in Earth Sciences (All-Course Option)

- ENV1001H *Environmental Decision Making*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below.
 - Sociology MA students are required to obtain permission from the Department of Sociology's Graduate Coordinator in order to enrol in outside electives. Students may request environment-related electives that are not from the School's list of approved courses to count towards their CSES by seeking approval from the School's Graduate Associate Director.
- ENV4444H *Internship*. A letter confirming the completion of the internship must be submitted to the School of the Environment prior to convocation.
- ENV5555Y *Research Paper*. A copy of the final research paper must be submitted to the School of the Environment prior to convocation. Note: students with a research project/paper course component in their degree program may count this course towards the collaborative specialization in place of ENV5555Y, provided the project/paper they complete has an environmental component or theme.

Master of Arts in Music, Field in Musicology

- ENV1001H *Environmental Decision Making*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below.
- Additional 0.5 FCE completed through either an additional approved elective, an individual reading and research course, ENV4444H *Internship*, or ENV5555Y *Research Paper*.
- Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.

Master of Arts in Music, Field in Music Theory

- ENV1001H *Environmental Decision Making*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below.
- Additional 0.5 FCE completed through either an additional approved elective, an individual reading and research course, ENV4444H *Internship*, or ENV5555Y *Research Paper*.
- Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.

Master of Business Administration

- ENV1001H *Environmental Decision Making*.
- 1.0 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- 0.5 FCE practicum within the Management program (for example, RSM27XXH). The practicum must include an environment-related component. A letter confirming the completion of the internship must be submitted to the School of the Environment prior to convocation.
- ENV5555Y *Research Paper*. A copy of the final research paper must be submitted to the School prior to convocation.

Master of Engineering in Cities Engineering and Management

- ENV1001H *Environmental Decision Making*.
- 0.5 elective FCE from the Department of Civil and Mineral Engineering's infrastructure engineering elective list, provided there is an environmental component to the course.
- 1.0 FCE practicum to be completed with the Department of Civil and Mineral Engineering, provided there is an environmental component.

Master of Environmental Science

- ENV1001H *Environmental Decision Making*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- Either EES1116Y *Internship* or EES1101Y *Research Paper in Environmental Science*, provided there is an environmental component. Students completing a research paper must submit a final copy to the School prior to graduation. Students completing a placement must submit a letter of completion to the School prior to convocation.

Master of Forest Conservation

- ENV1001H *Environmental Decision Making*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- FOR3007H *Internship in Forest Conservation*, provided there is an environmental component. A letter confirming the completion of the internship must be submitted to the School prior to convocation.
- FOR3008H *Case Study Capstone in Forest Conservation*, provided there is an environmental component. A copy of the final research paper must be submitted to the School of the Environment prior to convocation.

Master of Global Affairs

- ENV1001H *Environmental Decision Making*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- GLA1007H *Global Internship*, which satisfied the internship requirement provided there is an environmental component. A letter confirming the completion of the internship must be submitted to the School of the Environment prior to convocation.
- Either GLA2095H *MGA Reading Course* or GLA2888H *MGA Research Paper*, which satisfies the research paper requirement provided there is an environmental component. A copy of the final research paper must be submitted to the School of the Environment prior to convocation.
- GLA2000H, which counts towards the collaborative specialization requirements.

Master of Information (Coursework Option)

- ENV1001H *Environmental Decision Making*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- INF2173H *Information Professional Practicum*, which satisfies the internship requirement provided there is an environment related component. A letter confirming the completion of the internship must be submitted to the School of the Environment prior to convocation.
- ENV5555Y *Research Paper*. A copy of the final research paper must be submitted to the School of the Environment prior to convocation. Note: students with a research paper course component in their degree program may count this course towards the collaborative specialization in place of ENV5555Y, provided the project/paper they complete has an environmental component or theme.

Master of Landscape Architecture and Design

3-Year Option

- ENV1001H *Environmental Decision Making*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- Up to 4.0 FCEs from the following courses may count towards the remaining CSES requirements: LAN1011Y, LAN1021Y, LAN2013Y, LAN1037H, LAN1038H, LAN1041H, LAN1043H, LAN1047H, LAN1048H, LAN2045H, LAN2046H, LAN2047H, LAN2048H, LAN3016Y, and LAN3017Y, provided there is an environmental component. Students completing the research paper must submit a final copy to the School of the Environment prior to convocation.

2-Year Option

- ENV1001H *Environmental Decision Making*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- Up to 2.0 FCEs from the following courses may count towards the remaining CSES requirements: LAN2013Y, LAN2045H, LAN2046H, LAN2047H, LAN2048H, LAN3016Y, and LAN3017Y, provided there is an environmental component. Students completing the research paper must submit a final copy to the School of the Environment prior to convocation.

Master of Public Policy

- ENV1001H *Environmental Decision Making*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- GLA2029H *The Sustainability Imperative: Implications for Global Affairs and Public Policy*.
- PPG2006Y *MPP Internship*, provided there is an environmental component. A copy of the internship completion letter and the final paper must be submitted to the School of the Environment prior to convocation.

Master of Science in Planning

- ENV1001H *Environmental Decision Making*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- PLA4444H Internship, which satisfies the internship requirement, provided there is an environmental component. A copy of the internship completion letter must be submitted to the School of the Environment prior to convocation.
- PLA1107Y *Current Issues Paper*, which satisfies the research paper requirement, provided there is an environmental component. A copy of the final research paper must be submitted to the School of the Environment prior to convocation.

Master of Science in Sustainability Management

- ENV1001H *Environmental Decision Making*.
- 0.5 elective FCE from the School of the Environment's list of approved electives below. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
- SSM1110H *Sustainability Management Internship*, which satisfies the internship requirement, provided there is an environmental component. A copy of the internship completion letter must be submitted to the School of the Environment prior to convocation.
- Either SSM1100Y *Research Paper* or SSM1101Y *Research Paper II*, which satisfies the research paper requirement, provided there is an environmental component. A copy of the final research paper must be submitted to the School of the Environment prior to convocation.

Environmental Studies: Doctoral Level

Minimum Admission Requirements

- Students who wish to enrol in the CSES offered by the School of the Environment must first apply to and be accepted into a doctoral program in a degree-granting unit, also called a home department or home unit. Information about applying to a home graduate unit can be found on the School of Graduate Studies website as well as on the respective websites of participating degree-granting units.
- Prospective students are strongly encouraged to submit the Collaborative Specialization enrolment form (PDF) after receiving their letter of acceptance or at the start of their program of study. Students are able to join the CSES beyond the start of their degree, provided they are able to complete the CSES requirements by the time they are ready to graduate from their degree program.

Completion Requirements

- The requirements listed below must be completed in combination with the PhD degree program requirements of the student's home department. These are normally counted as electives toward the degree program requirements of the student's respective home department. Typically, students complete up to 1.0 full-course equivalent (FCE) and conduct research on an environmental topic. Note that specific requirements for participating degree programs can vary. Therefore, students are encouraged to check the calendar entries for their respective home department programs. Specific requirements for each participating degree program are listed on the School of the Environment's website under the Collaborative Specialization in Environmental Studies.
- Complete the mandatory core course ENV1001H *Environmental Decision Making*, unless already completed at the master's level. If this is the case, an alternative elective course is required.
- Complete one elective course (0.5 FCE) from the School's list of approved courses. Courses (including special topics) that have an environment focus but are not included in the School's approved list can be counted as an elective, pending approval from the Graduate Associate Director.
 - Computer Science PhD students can complete one of the following courses as their elective, which will also count towards their degree program: CSC2537H, CSC2552H, CSC2615H, or CSC2720H.
 - Earth Sciences PhD students are strongly encouraged to complete a cross-listed elective course such as ESS2303H or ESS2304H.
 - Geography PhD students are strongly encouraged to complete a cross-listed elective course such as GGR1216H, GGR1407H, GGR1408H, GGR1411H, JGE1425H, JPG1428H, JPG1429H, JPG1518H, or JPG1814H.

- Sociology PhD students are required to obtain permission from the Department of Sociology Graduate Coordinator in order to take outside electives. Students may request environment-related electives that are not on the official Environmental Studies elective list to count towards their collaborative specialization by seeking approval from the School of the Environment's Graduate Associate Director.
- Give an oral presentation of their doctoral research as part of the School's Research Day, which is held once per year in the spring. For the latter, the oral presentation may or may not be done in conjunction with a summary poster, depending on the decided format of the School's Research Day in any given year.
- Complete a thesis on an environmental topic in the home department. Normally, the thesis committee will include a supervisor from the student's home department who holds a graduate faculty membership (GFM) in the School of the Environment. If the student's primary thesis supervisor does not hold a GFM in the School of the Environment, the School's Director will either initiate the process of assigning a GFM to the primary supervisor, or review the composition of the thesis committee to ensure it has appropriate expertise. A copy of the final thesis must be submitted to the School of the Environment prior to graduation.
- Additional courses may be required by the home department and/or by the supervisor or supervisory committee, depending on academic and/or career goals of the student, as well as graduate unit regulations.

Environmental Studies: Courses

The School of the Environment offers individual credit courses that are open to graduate students from all parts of the University, subject to enrolment limits. Except for the core course, ENV1001H, not all courses are offered every year.

Graduate students enrolled in the CSES may also request to count non-listed electives towards their collaborative specialization pending approval from the School's Graduate Associate Director. (Non-listed electives are those not on 1) the pre-approved list of School of the Environment courses or 2) those that are formally cross-listed with other graduate units.) For a current graduate course listing, please refer to the School of the Environment's website.

Core Course

Course Code	Course Title
ENV1001H	Environmental Decision Making

Elective Courses

Course Code	Course Title
ENV1002H	Environmental Policy

Course Code	Course Title
ENV1003H	Global Climate Politics and Policy
ENV1005H	Ecological Statistics
ENV1007H	The Warming Papers: The Scientific Foundation of Climate Change
ENV1008H	Worldviews and Ecology
ENV1063H	The Edible Campus
ENV1103H	Living Labs for Applied Sustainability
ENV1201H	Environmental Justice in an Age of Crisis
ENV1202H	Media, Democracy, and Climate Justice
ENV1444H	Capitalist Nature
ENV1701H	Environmental Law
ENV1703H	Water Resource Management and Policy
ENV1704H	Environmental Risk Analysis and Management
ENV1707H	Climate Finance
ENV2000H	Topics in Environment
ENV2000Y	Topics in Environment
ENV2002H	Special Topics in Environment
ENV4444H	Internship
ENV4444Y	Internship
ENV5555Y	Research Paper

Other Elective Courses

Adult Education and Community Development (Department of Leadership, Higher and Adult Education)

Course Code	Course Title
LHA1193H	Adult Education for Sustainability

Anthropology

Course Code	Course Title
ANT4051H	Archaeology and Climate Change
ANT6018H	Approaches to Nature and Culture
ANT6066H	More-than-Human Ethnography

Chemical Engineering and Applied Chemistry

Course Code	Course Title
CHE1435H	Fundamentals of Aerosol Physics and Chemistry
JNC2503H	Environmental Pathways

Chemistry

Course Code	Course Title
CHM1401H	Transport and Fate of Chemical Species in the Environment
CHM1404H	Molecular Analysis of Natural Systems
CHM1410H	Analytical Environmental Chemistry
CHM1415H	Atmospheric Chemistry
CHM1420H	Environmental Chemistry of Soil
CHM1425H	Modelling the Fate of Organic Chemicals in the Environment

Civil Engineering

Course Code	Course Title
APS1410H	Waterpower Essentials

Computer Science

Course Code	Course Title
CSC2537H	Information Visualization
CSC2552H	Topics in Computational Social Science
CSC2615H	Ethical Aspects of Artificial Intelligence
CSC2720H	Systems Thinking for Global Problems

Earth Sciences

Course Code	Course Title
ESS2303H	Earth Systems Evolution
ESS2304H	Geochemistry

Ecology and Evolutionary Biology

Course Code	Course Title
EEB1250H	Spatial Statistics
EEB1420H	Special Topics in Ecology
EEB1450H	Special Topics in Ecology and Evolution A

English

Course Code	Course Title
ENG5580H	American Pastoral

Forestry

Course Code	Course Title
FOR1270H	Forest Biomaterial Sciences: Fundamentals, Applications, and the Next Frontier
FOR1294H	Bioenergy and Biorefinery Technology
FOR1416H	Forest Fire Danger Rating
FOR1575H	Urban Forest Conservation
FOR1610H	Sustainable Forest Management and Certification
FOR3013H	Urban and Community Forestry: Leadership and Professional Practice

Geography and Planning

Course Code	Course Title
GGR1216H	Advanced Biogeochemical Processes
GGR1407H	Efficient Use of Energy
GGR1408H	Carbon-Free Energy
GGR1411H	Nature and Justice in the Anthropocene
JGE1425H	Livelihoods, Poverty, and Environment in the Global South
JPG1428H	Greening the City: Urban Environmental Planning and Management
JPG1429H	Political Ecology of Food and Agriculture
JPG1518H	Sustainability and Urban Communities
JPG1814H	Cities and Immigrants
PLA1601H	Environmental Planning in a Changing Climate

Global Affairs

Course Code	Course Title
JSE1708H	Sustainability and the Western Mind

Information

Course Code	Course Title
INF2235H	Outer Space and the City

Landscape Architecture

Course Code	Course Title
LAN1037H	Plants and Design
LAN1041H	Field Studies 1
LAN2045H	Landscape Ecology
LAN2047H	Landscape Hydrology
LAN3045H	Advanced Site Technologies

Mechanical and Industrial Engineering

Course Code	Course Title
MIE1120H	Current Energy Infrastructure and Resources

Music

Course Code	Course Title
MUS1135H	Music, Sound, and the Environment
MUS1169H	Listening to Cities: Music, Sound, and Noise in Urban Environment
MUS1272H	19C Music and Discourses of Nature

Physics

Course Code	Course Title
PHY1498H	Introduction to Atmospheric Physics
PHY2502H	Climate System Dynamics
PHY2504H	Geophysical Fluid Dynamics

Course Code	Course Title
PHY2505H	Atmospheric Radiative Transfer and Remote Sounding
PHY2506H	Data Assimilation and Retrieval Theory

Political Science

Course Code	Course Title
POL2213H	Global Environmental Politics

Religion

Course Code	Course Title
RLG2005H	Religion and Posthumanism

Social Justice Education

Course Code	Course Title
SJE1909H	Environmental Sustainability and Social Justice 1
SJE1919H	Advanced Topics in Environmental Justice Education

Sustainability Management

Course Code	Course Title
SSM2020H	Sustainability Ethics

Women and Gender Studies

Course Code	Course Title
WGS1016H	Migration, Mobility, Displacement in Contemporary Africa

Ethnic, Immigration and Pluralism Studies

Ethnic, Immigration and Pluralism Studies: Introduction

Lead Faculty of the Collaborative Specialization

Arts and Science

Participating Degree Programs

Anthropology — MA, PhD
 Educational Leadership and Policy — MA, MEd, EdD, PhD
 European and Eurasian Studies — MA
 Geography — MA, PhD
 Global Affairs — MGA
 History — MA, PhD
 Industrial Relations and Human Resources — MIRHR, PhD
 Language and Literacies Education — MA, MEd, PhD
 Political Science — MA, PhD
 Public Policy — MPP
 Religion — MA, PhD
 Social Justice Education — MA, MEd, EdD, PhD
 Social Work — MSW, PhD
 Sociology — MA, PhD
 Women and Gender Studies — MA, PhD

Overview

Ethnic, Immigration and Pluralism Studies at the University of Toronto offers students with interests in ethnic, immigration, and pluralism studies the opportunity to widen their horizons, to expand their knowledge beyond a single disciplinary base, and to take advantage of the wealth and diversity of academic resources available at the University of Toronto — a great university situated in a large and culturally cosmopolitan city.

The graduate programs listed above participate in the Collaborative Specialization in Ethnic, Immigration and Pluralism Studies. They contribute courses and provide facilities and supervision for graduate research.

Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Ethnic, Immigration and Pluralism Studies" on their transcript.

Contact and Address

Web: harneyprogram.ca
 Email: harneyprogram@utoronto.ca
 Telephone: (416) 978-4783

Collaborative Specialization in Ethnic, Immigration and Pluralism Studies
 Munk School of Global Affairs and Public Policy
 University of Toronto
 1 Devonshire Place, room 057S
 Toronto, Ontario M5S 3K7
 Canada

Ethnic, Immigration and Pluralism Studies: Master's Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization (CS) and a graduate degree program in one of the collaborating graduate units.
- Applicants to the Master of Arts, Master of Education, Master of Global Affairs, Master of Industrial Relations and Human Resources, Master of Public Policy, Master of Science, and Master of Social Work degree programs are admitted by the participating graduate unit under the General Regulations of the School of Graduate Studies.

Completion Requirements

- Students must follow a plan of studies acceptable to both the participating graduate unit and the CS in Ethnic, Immigration and Pluralism Studies.
- Collaborative specialization requirements may be met concurrent with, or in addition to, graduate unit requirements. Students should consult specific graduate unit listings for information.
- 0.5 full-course equivalent (FCE) in ethnicity, immigration, or pluralism. Normally, this course is taken as an option within regular graduate unit or Faculty degree requirements, not as an additional course. For coursework-only programs, students must complete an additional 0.5 FCE in ethnicity, immigration, or pluralism coursework.
- A coordinating 0.5 FCE seminar in ethnicity, immigration, and pluralism (EIP3000H). The seminar is the place to discuss, compare, and bring together the various approaches to the study of ethnicity, immigration, and pluralism.
- Attendance at a minimum of one lecture per session (two per year) from the Harney Lecture Series organized by the CS in Ethnic, Immigration and Pluralism Studies.
- When a practicum or other major activity is required, it will focus on ethnicity, immigration, and/or pluralism.
- It is understood that the major paper or thesis as required by the graduate unit will be in an area relevant to the specialization.

Ethnic, Immigration and Pluralism Studies: Doctoral Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization (CS) must apply to and be admitted to both the CS and a graduate degree program in one of the collaborating graduate units.
- Applicants to the Doctor of Education and Doctor of Philosophy degree programs are admitted under the General Regulations of the School of Graduate Studies.

Completion Requirements

- Students must follow a plan of studies acceptable to both the participating graduate unit and the CS in Ethnic, Immigration and Pluralism Studies.
- Collaborative specialization requirements may be met concurrent with, or in addition to, graduate unit requirements. Students should consult specific graduate unit listings for information.
- 0.5 full-course equivalent (FCE) in ethnicity, immigration, or pluralism including master's-level courses. Normally, this course is taken as an option within regular graduate unit or Faculty degree requirements, not as an additional course.
- A coordinating 0.5 FCE seminar in ethnicity, immigration, and pluralism (EIP3000H). The seminar is the place to discuss, compare, and bring together the various approaches to the study of ethnicity, immigration, and pluralism. Students who have taken this course for the master's degree need not repeat it.
- Attendance at a minimum of two lectures per session (four per year) from the Harney Lecture Series organized by the CS in Ethnic, Immigration and Pluralism Studies. Submission of one blog piece addressing an issue discussed during one of the attended Harney lectures.
- Presentation of research output (for example, thesis chapter, journal article) ready for submission at a work-in-progress session/conference organized by the CS.
- The PhD thesis will focus on ethnicity, immigration, and/or pluralism. The supervisor of the thesis committee will be a specialist in the area of ethnicity, immigration, and/or pluralism.

Ethnic, Immigration and Pluralism Studies: Courses

- Courses eligible for credit towards meeting specialization requirements in Ethnic, Immigration and Pluralism Studies are listed below.
- Students should check with the professor responsible for each course since a prerequisite may be required.
- Not all courses are offered each year. Please consult the collaborative specialization office or the appropriate graduate unit for course availability.
- Students wishing to use courses other than those listed below for credit towards meeting specialization requirements must submit a formal request in writing.

Coordinating Seminar

Course Code	Course Title
EIP3000H	Coordinating Seminar: Ethnic, Immigration and Pluralism Studies (formerly known as JTH3000H Coordinating Seminar: Ethnic Relations Theory, Research, and Policy)

Anthropology

Course Code	Course Title
ANT6056H	Decolonizing Diversity Discourse: Critical and Comparative Accounts of Multiculturalism and Settler Colonialism

Curriculum, Teaching and Learning

Course Code	Course Title
CTL1430H	Gendered Colonialisms, Imperialisms, and Nationalisms in History
CTL3008H	Pragmatics in Language Education

Economics

Course Code	Course Title
ECO3800H	Labour Economics I

Education, Francophonies and Diversity

Course Code	Course Title
CRE1001H	Séminaire d'études : Éducation, francophonies et diversité

European, Russian, and Eurasian Studies

Course Code	Course Title
ERE1170H	Conflicts and Para-States in the European Union's Backyard
ERE1175H	One Hundred Years of Cultures of Refugees in Europe, 1920–2020

Geography

Course Code	Course Title
GGR1822H	Queer Geographies
JPG1816H	Geographies of Secularism, and Islam and Gender
JPG1825H	Black Geographies of the Atlantic

Global Affairs

Course Code	Course Title
GLA2056H	The Populist Radical Right

History

Course Code	Course Title
HIS1013H	Intellectuals and Decolonization
HIS1180H	Race in the USA and Canada

Industrial Relations and Human Resources

Course Code	Course Title
IRE1615H	Labour and Globalization
IRE1725H	Cross Cultural Differences in Organizational Contexts

Law

Participation in LAW courses is at the discretion of the Faculty of Law upon presentation, to the Faculty of Law Records Office, of a signed permission form from the student's home graduate unit. Note that preference is given to JD students and that many LAW courses are full by the end of the Faculty of Law add/drop period.

Course Code	Course Title
LAW7052Y	Indigenous Peoples and the Constitution of Canada

Leadership, Higher and Adult Education

Course Code	Course Title
LHA1042H	Educational Leadership and Diversity

Political Science

Course Code	Course Title
POL2205H	Topics in International Politics I
POL2322H	Topics in Comparative Politics II
POL2391H	Topics in Comparative Politics III
JPR2058H	Post-secular Political Thought: Religion, Radicalism, and the Limits of Liberalism

Public Policy

Course Code	Course Title
PPG1005H	The Social Context of Policy-Making (this course often includes content related to ethnicity and immigration; please verify a particular instructor's course with the Ethnic, Immigration and Pluralism Studies specialization)
PPG2001H	Legal Analysis of Public Policy

Social Justice Education

Course Code	Course Title
SJE1922H	Sociology of Race and Ethnicity
SJE1979H	Race, Gender, and Empire in Socialist States
SJE5013H	Special Topics in Social Justice Research in Education: Master's Level

Social Work

Course Code	Course Title
SWK4304H	Social Work Policy Practice and Advocacy in the Context of Neoliberal Globalization
SWK4658H	Social Work with Immigrants and Refugees
SWK4804H	Special Studies IV

Sociology

Course Code	Course Title
SOC6309H	Indigeneity I

Women and Gender Studies

Course Code	Course Title
WGS1019H	Special Topics in Feminist Studies
WGS1028H	Queer of Colour Critique

Food Studies

Food Studies: Introduction

Lead Faculty of the Collaborative Specialization

University of Toronto Scarborough

Participating Degree Programs

Anthropology — MA, PhD
 East Asian Studies — MA, PhD
 Environmental Science — PhD
 Geography — MA, MSc, PhD
 History — MA, PhD
 Information — MI
 Medieval Studies — PhD
 Museum Studies — MMSt
 Nutritional Sciences — MSc, PhD
 Public Health Sciences — PhD
 Sociology — MA, PhD
 Spanish — PhD

Supporting Unit

Culinaria Research Centre

Overview

Food Studies is an interdisciplinary field dedicated to understanding where our food comes from and how it shapes our bodies and identities. The production and consumption of food has gone through tremendous changes in the past few hundred years. Before industrialization, most food was grown in the place where it was eaten. With the rise of global commodity agriculture, it is often hard to find out exactly what our food is and where it comes from. Then, famine was a constant spectre, whereas today, over-eating has become a significant health problem.

Particular attention will be given to the material nature of food, the way it tastes and smells, and the changes it undergoes through natural decomposition and through the human intervention of preservation and cooking. Students will learn the importance of food in religion, society, the family, gender roles, the environment, agriculture, urbanization, immigration, colonialism, and race and ethnicity. Food Studies will leverage the University's urban location and its proximity to Canada's agricultural heartland to broaden students' experience. The study of food provides both theoretical understanding and practical knowledge for professional careers in health care, business, government service, non-governmental organizations, and educational and community programs. This specialization will draw on a variety of disciplinary approaches emphasizing different knowledge and skills.

The collaborative specialization is open to master's and PhD students in the participating graduate programs listed above.

Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Food Studies" on their transcript.

Contact and Address

Web: www.utscc.utoronto.ca/culinaria
 Email: culinaria.utscc@utoronto.ca
 Telephone: (416) 208-8175

Collaborative Specialization in Food Studies
 University of Toronto Scarborough
 1265 Military Trail
 Toronto, Ontario M1C 1A4
 Canada

Food Studies: Master's Level

Minimum Admission Requirements

- Applicants must meet the admission requirements of both the home graduate unit and the collaborative specialization.
- Applicants must apply to and be admitted to both the collaborative specialization and a participating master's degree program.
- A curriculum vitae (CV).
- Applicants must demonstrate superior writing and research skills, as well as an interest in the socio-cultural aspects of food. Applicants will submit to the collaborative specialization committee a research paper (maximum 30 pages) that has been submitted to the home graduate unit, or one that is focused on food studies.
- Letters from two references. The letters of reference should describe the student's academic ability and career aspirations, and comment on the student's potential benefit from the collaborative specialization.
- Some undergraduate experience in food-related coursework is desired.

Completion Requirements

Master of Arts in Anthropology;
Master of Arts in East Asian Studies (Thesis Option);
Master of Arts in History;
Master of Arts and Master of Science in Geography;
Master of Arts in Sociology (Research Paper Option);
Master of Information (Concentration Plus Thesis Option);
Master of Museum Studies (Thesis Option);
Master of Science in Nutritional Sciences

- Students must meet all the degree requirements of the School of Graduate Studies, the participating home program, and the collaborative specialization.
- Successful completion of the seminar FST1000H *Comparative Research Methods in Food Studies*.
- Regular and active participation in SRM3333H *Culinaria Seminar Series*.

- The major research paper or thesis in the participating degree program will be on a topic in food studies, approved by the collaborative specialization committee.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

Master of Arts in East Asian Studies (Coursework-Only Option);

Master of Arts in Sociology (Coursework-Only Option)

- Students must meet all the degree requirements of the School of Graduate Studies, the participating home program, and the collaborative specialization.
- Successful completion of the seminar FST1000H *Comparative Research Methods in Food Studies*.
- Successful completion of 1.0 elective FCE related to food studies.
- Regular and active participation in SRM3333H *Culinaria Seminar Series*.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

Master of Information (Coursework-Only Option)

- Students must meet all the degree requirements of the School of Graduate Studies, the participating home program, and the collaborative specialization.
- Successful completion of the seminar FST1000H *Comparative Research Methods in Food Studies*.
- Successful completion of the practicum INF2173H *Information Professional Practicum I* in an area related to food studies.
- Successful completion of 1.5 elective FCEs related to food studies.
- Regular and active participation in SRM3333H *Culinaria Seminar Series*.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

Master of Museum Studies (Coursework-Only Option)

- Students must meet all the degree requirements of the School of Graduate Studies, the participating home program, and the collaborative specialization.
- Successful completion of the seminar FST1000H *Comparative Research Methods in Food Studies*.
- Successful completion of 2.0 FCEs from a combination of:
 - a capstone project MSL4000Y related to food studies;
 - up to 2.0 elective FCEs related to food studies.
- Regular and active participation in SRM3333H *Culinaria Seminar Series*.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

Food Studies: Doctoral Level

Minimum Admission Requirements

- Applicants must meet the admission requirements of both the home graduate unit and the collaborative specialization.
- Applicants must apply to and be admitted to both the collaborative specialization and a participating doctoral degree program.
- Students who complete the collaborative specialization at the master's level will be eligible for the program at the doctoral level, but will be expected to complete an additional topics course (see below).
- A curriculum vitae (CV).
- Applicants must demonstrate superior writing and research skills, as well as an interest in the socio-cultural aspects of food. Applicants will submit to the collaborative specialization committee a master's-level research project paper or thesis. Experience in a food-related field (either practical, scholarly, or policy/political/social service) is beneficial.

Completion Requirements

- Students must meet the degree requirements of the School of Graduate Studies, the participating home program, and the collaborative specialization.
- Successful completion of the seminar FST1000H *Comparative Research Methods in Food Studies*, if not already taken at the master's level. Students who have completed the Food Studies collaborative specialization at the master's level are exempted from this requirement.
- Successful completion of the topics course FST2000H *Food, Culture, and Society*. The course theme will be decided each year by the collaborative specialization committee.
- Regular and active participation in SRD4444H *Culinaria Seminar Series*.
- The student's dissertation in their home graduate unit must be on a topic in food studies, approved by the specialization committee.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

Food Studies: Courses

Required Courses

Course Code	Course Title
FST1000H	Comparative Research Methods in Food Studies
FST2000H	Food, Culture, and Society

Elective Courses

These courses may have prerequisites and enrolment limits. These courses may not be offered every year. Students may take courses not listed below with approval of the collaborative specialization director.

Course Code	Course Title
ANT4039H	Origin and Nature of Food Producing Societies
CHL5652H	Foundations of Practice III
HIS1301H	History of Food and Drink
JPG1429H	Political Ecology of Food and Agriculture
LHA1197H	The Pedagogy of Food
NFS1201H	Public Health Nutrition
NFS1212H	Regulation of Food Composition, Health Claims, and Safety
NFS1216H	Selected Topics in Nutrition
NFS1218H	Recent Advances in Nutritional Sciences I

Genome Biology and Bioinformatics

Genome Biology and Bioinformatics: Introduction

Lead Faculty of the Collaborative Specialization

Arts and Science

Participating Degree Programs

Biochemistry — PhD
 Biomedical Engineering — PhD
 Cell and Systems Biology — PhD
 Chemical Engineering and Applied Chemistry — PhD
 Computer Science — PhD
 Ecology and Evolutionary Biology — PhD
 Laboratory Medicine and Pathobiology — PhD
 Medical Biophysics — PhD
 Medical Science — PhD
 Molecular Genetics — PhD

Overview

The availability of complete genome sequences of many organisms has led to the appreciation that our knowledge of the function of the genome and other omes of any given organism is far from complete. A wide range of computational, theoretical, biochemical, structural, cell biological, and genetic approaches need to cooperate to establish the connections between sequence and function. The Collaborative Specialization in Genome Biology and Bioinformatics addresses this need for cooperation with a coherent course of study that educates, trains, and provides community for doctoral graduate students across these diverse disciplines.

The graduate programs listed above participate in the Collaborative Specialization in Genome Biology and Bioinformatics. Upon successful completion of the PhD requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Genome Biology and Bioinformatics" on their transcript.

Contact and Address

Web: gbb.csb.utoronto.ca
 Email: denise.horsley@utoronto.ca
 Telephone: (416) 978-8879

Collaborative Specialization in Genome Biology and Bioinformatics
 Department of Cell and Systems Biology
 Faculty of Arts and Science, University of Toronto
 25 Harbord Street, RW 424D
 Toronto, Ontario, M5S 3G5
 Canada

Genome Biology and Bioinformatics: Doctoral Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units. Since this is a doctoral-level course of study, students must be registered in the doctoral program of one of the host graduate units and must be undertaking research with a significant genome biology and/or bioinformatics component under the supervision of a member of the collaborative specialization.

Completion Requirements

- Complete a PhD thesis in the area of the collaborative specialization, and any core courses as required by the student's host graduate unit.
- Complete the seminar series in Genome Biology and Bioinformatics (GBB1001H). Students will be required to present and discuss their research projects in this seminar series.
- Participate in collaborative traineeships in which an aggregate time of two to four months is spent in a collaborating laboratory, thematically working on an aspect of the thesis project but with a complementary method. The goal of the collaborative traineeship is ideally a joint publication between the two member labs.

Genome Biology and Bioinformatics: Courses

Students are required to enrol in the seminar course GBB1001H.

Required Seminar Series

GBB1001H Seminar in Genome Biology and Bioinformatics

Elective

CSB1482H Readings in Genome Biology and Bioinformatics

Global Health

Global Health (U of T Global Scholar): Introduction

Lead Faculty of the Collaborative Specialization

Public Health

Participating Degree Programs

Anthropology — MA, MSc, PhD
 Chemical Engineering and Applied Chemistry — MASc, MEng, PhD
 Community Health — MScCH
 Dentistry — MSc (thesis only), PhD
 Geography — MA, MSc, PhD
 Health Policy, Management and Evaluation — MSc (thesis only), PhD
 Law — LLM, SJD
 Management — PhD
 Medical Science — PhD
 Nursing Science — MN, PhD
 Nutritional Sciences — PhD
 Pharmaceutical Sciences — MSc (thesis only), PhD
 Planning — MScPl, PhD
 Political Science — PhD
 Public Health Sciences — MPH, MSc (thesis only), PhD
 Rehabilitation Science — MSc, PhD

Overview

The graduate programs listed above participate in the Collaborative Specialization in Global Health (U of T Global Scholar). This specialization offers students collaborative and interdisciplinary graduate education and research opportunities in global health. Global health is viewed as an integrative construct that focuses on the inter-relationships between local, regional, national, and international factors influencing health and health equity and effective programs and policies that will address these factors.

The Collaborative Specialization in Global Health (U of T Global Scholar) enhances the student experience by exposing students to a broad base of faculty expertise and an opportunity to share research ideas and results from multiple disciplinary perspectives. This specialization signals the University's commitment to improving the well-being of people in Canada and around the world through higher education and advanced research in global health.

Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Global Health (U of T Global Scholar)" on their transcript.

Students who complete the requirements of the Collaborative Specialization in Global Health are considered University of Toronto Global Scholars.

Contact and Address

Web: www.dlsph.utoronto.ca/institutes/centre-for-global-health
 Email: globalhealth.dlsph@utoronto.ca
 Telephone: (416) 946-7909

Collaborative Specialization in Global Health (U of T Global Scholar)
 Centre for Global Public Health
 Dalla Lana School of Public Health
 University of Toronto
 155 College Street, Room 400
 Toronto, Ontario M5T 3M7
 Canada

Global Health (U of T Global Scholar): Master's Level

Minimum Admission Requirements

- Applicants must meet the admission requirements of both the home graduate program in which they are registered as well as the collaborative specialization.
- Applicants must be admitted to a master's program in one of the collaborating home graduate units before they may apply to the Collaborative Specialization in Global Health (U of T Global Scholar).

Completion Requirements

- Meet all the degree requirements of the School of Graduate Studies, the home graduate unit, and the Collaborative Specialization in Global Health (U of T Global Scholar).
- Students must successfully complete the global health core course, CHL5700H *Global Health*.
- Depending on the requirements of their core master's programs, collaborative specialization students must complete either a practicum placement, a major research paper, or a master's thesis related to global health.
- Master's students will be encouraged to participate in a series of shared co-curricular global health activities organized by the Dalla Lana School of Public Health and other participating graduate units.
- Students in coursework-only programs in Engineering (MEng) and Public Health (MScCH) must complete an additional 1.0 FCE in approved global health electives. Students in the coursework-only Law program (LLM) must complete an additional 1.5 FCE in approved global health electives.
- Students in the Master of Nursing (MN) field of Health Systems Leadership and Administration and the field of Nurse Practitioner will exceed the MN program course requirements by 0.5 FCE because students are required to complete CHL5700H outside their home program requirements.

Core Course

CHL5700H Global Health

Elective Courses

Students in coursework-only master's programs must take additional global health electives as outlined above. The elective must be approved by the program director of the collaborative specialization.

Global Health (U of T Global Scholar): Doctoral Level

Minimum Admission Requirements

- Applicants must meet the admission requirements of both the home graduate program in which they are registered as well as the collaborative specialization.
- Applicants must be admitted to a doctoral program in one of the collaborating home graduate units before they may apply to the Collaborative Specialization in Global Health (U of T Global Scholar).
- Applicants should have professional, academic, or volunteer experience in global health.

Completion Requirements

- Meet all the degree requirements of the School of Graduate Studies, the home graduate unit, and the Collaborative Specialization in Global Health (U of T Global Scholar).
- Students must successfully complete:
 - The global health research seminar series CHL5701H *Doctoral Seminar, Collaborative Specialization in Global Health* over two academic sessions. Students must attend all seminars offered during the two sessions.
 - One of the following courses:
 - 0.5 FCE: CHL5702H History of International Health, CHL5704H International Human Rights Law and Global Health: The Right to Health in Theory and Practice, NUR1038H Social Determinants of Health in a Global Context, NUR1083H Comparative Politics of Health and Health Policy in a Globalizing World, or
 - 1.0 FCE: JCR1000Y An Interdisciplinary Approach to Addressing Global Challenges.
 - One elective (0.5 FCE) from outside the home graduate unit, selected in consultation with the collaborative specialization director.
 - A thesis on an issue related to global health, to be approved by both the home unit and the Collaborative Specialization in Global Health Director (U of T Global Scholar).

Health Services and Policy Research

Health Services and Policy Research: Introduction

Admissions have been administratively suspended. This collaborative specialization will close on December 31, 2027.

Lead Faculty of the Collaborative Specialization

Public Health

Participating Degree Programs

Health Policy, Management and Evaluation — MSc, PhD
 Kinesiology — MSc, PhD
 Pharmaceutical Sciences — MSc, PhD
 Public Health Sciences — PhD
 Rehabilitation Science — MSc
 Social Work — PhD

Overview

The Collaborative Specialization in Health Services and Policy Research began in 2001 as a consortium of six Ontario universities, called the Ontario Training Centre. It was established in a response to the need for increased numbers of health services researchers to address critical issues in effective and efficient health-care delivery (which has been identified as a top priority by national research funding agencies). The Ontario Training Centre was part of a pan-Canadian initiative involving other provincial centres. After its first decade of operations, funding for the centre has concluded. However, the Collaborative Specialization in Health Services and Policy Research continues to attract graduate students from the University of Toronto from a variety of disciplines.

The overall goal of the collaborative specialization is to increase health research capacity in Ontario through an innovative training program that builds on existing strengths in university and decision-making environments.

Partnering with a number of health-care organizations, the Collaborative Specialization in Health Services and Policy Research offers graduate training leading to a Diploma in Health Services and Policy Research.

Specific objectives of the collaborative specialization include:

- providing training in health services research for graduate students;
- enhancing the quality and breadth of transdisciplinary training in health services research; and

- including decision makers as active partners in teaching, program and curriculum planning, and the provision of field placements for students.

This competency-based collaborative specialization focuses on the following five areas:

- understanding the Canadian health-care system;
- ability to carry out health services research;
- understanding theories regarding how the health of populations is produced;
- understanding theories of health and health services knowledge production; and
- knowledge exchange and development of research partnerships.

Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Health Services and Policy Research" on their transcript.

Contact and Address

Web: ihpme.utoronto.ca/collaborative-specializations/health-services-and-policy-research/
 Email: whit.berta@utoronto.ca
 Telephone: (416) 946-5223
 Fax: (416) 978-7350

Collaborative Graduate Specialization in Health Services and Policy Research
 c/o Dr. Whitney Berta
 Institute of Health Policy, Management and Evaluation
 University of Toronto
 Suite 428, 4th Floor, 55 College Street
 Toronto, Ontario M5T 3M6
 Canada

Health Services and Policy Research: Master's Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units.
- Master's students are admitted under the General Regulations of the School of Graduate Studies and the specific criteria of the participating unit.
- An overall B+ average in the last two years of an appropriate bachelor's degree from a recognized university.
- An interest in health services and policy research outlined in an autobiographical letter including the applicant's reasons for becoming a health services or policy researcher.

Completion Requirements

Students must meet all respective degree requirements of the School of Graduate Studies and the participating graduate unit.

- **Coursework.** Students must complete a total of **1.5 full-course equivalents (FCEs)** as follows:
 - HSR1000H *Research and/or Policy Practicum*
 - HSR1002H *Health Services Research Seminar*
 - 0.5 FCE from the elective course list.
- Students are required to write a **thesis** under the supervision of a core faculty member of the collaborative specialization. The thesis must address the theme of health services and policy research.

Health Services and Policy Research: Doctoral Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units.
- Doctoral students are admitted under the General Regulations of the School of Graduate Studies and the specific criteria of the participating unit.
- Applicants are required to:
 - demonstrate academic excellence in completed courses (B+ average in graduate courses), scholarships and academic awards received;
 - demonstrate aptitude for health services and policy research (letter of recommendation from a previous professor or thesis supervisor, commenting on the applicant's academic abilities and likelihood for success as a health services researcher);
 - outline career plans (in an autobiographical letter including their reasons for becoming a health services researcher and their career plans); and
 - propose a plan of study in the collaborative specialization.
- Students who complete the collaborative specialization at the master's level are not eligible to participate at the PhD level.

Completion Requirements

Students must meet all respective degree requirements of the School of Graduate Studies and the participating graduate unit.

- **Coursework.** Students must complete a total of **1.5 full-course equivalents (FCEs)** as follows:
 - HSR1000H *Research and/or Policy Practicum*
 - HSR1002H *Health Services Research Seminar*
 - 0.5 FCE from the elective course list.
- Students are required to complete a **dissertation** under the supervision of a core faculty member of the collaborative specialization. The dissertation must address the theme of health services and policy research.

Health Services and Policy Research: Courses

Required

Course Code	Course Title
HSR1000H	Research and/or Policy Practicum
HSR1002H	Health Services Research Seminar

Electives

Course Code	Course Title
HAD5011H	Canada's Health Care System and Health Policy
HAD5727H	Knowledge Transfer and Exchange
HAD5728H	Performance Measurement in Health Care: Theory and Application
HAD7001H	Reading Course
HSR1001H	Introduction to Qualitative Methods for Health Systems and Policy Research

Indigenous Health

Indigenous Health: Introduction

Effective September 2021, admissions to this collaborative specialization (CS) have been administratively suspended. The CS will close on August 31, 2028.

Lead Faculty of the Collaborative Specialization

Public Health

Participating Degree Programs

Adult Education and Community Development — MA, MEd, PhD
 Anthropology — MA, MSc, PhD
 Counselling and Clinical Psychology — MA, PhD
 Counselling Psychology — MEd, EdD
 Geography — MA, PhD
 Medical Science — MSc, PhD
 Nutritional Sciences — MSc, PhD
 Public Health Sciences — MPH, PhD
 Social Justice Education — MA, MEd, EdD, PhD

Supporting Units

Indigenous Studies program (undergraduate), Faculty of Arts and Science

Overview

The Collaborative Specialization in Indigenous Health (CSIH) is situated in the Dalla Lana School of Public Health at the Waakebiness Institute for Indigenous Health (WIIH). The main objective is to provide training in Indigenous health research and practice for graduate students across U of T, while enhancing mutually beneficial and authentic relationships with Indigenous peoples, communities, and organizations.

Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Indigenous Health" on their transcript.

Contact and Address

Web: www.dlsph.utoronto.ca/institutes/wiwh/collaborative-specialization-in-indigenous-health
 Email: mphih.dlsph@utoronto.ca
 Telephone: (416) 978-8502
 Fax: (416) 978-1883

Collaborative Specialization in Indigenous Health
 c/o Waakebiness Institute for Indigenous Health (WIIH)
 University of Toronto
 155 College Street, 4th Floor
 Toronto, Ontario M5T 3M7
 Canada

Indigenous Health: Master's Level

Minimum Admission Requirements

- Applicants who wish to enrol in a collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units.
- Applicants must submit a completed Collaborative Specialization in Indigenous Health (CSIH) application form (Word) to the CSIH committee.

Completion Requirements

- All master's students in the collaborative specialization will take the core course [CHL5520H Indigenous Health](#) that runs in August annually.
- In home graduate units where a thesis or major research paper is required, it must deal with an Indigenous health topic. At least one member of the student's thesis committee must be a core faculty member of the collaborative specialization.
- In home graduate units where students undertake a practicum or equivalent, it must focus on an Indigenous health topic and be supervised by a core faculty member of the collaborative specialization.
- Students in coursework-only programs must complete additional coursework in approved Indigenous health electives. For the MEd in Adult Education and Community Development and the MEd in Social Justice Education (Coursework Only Option), 1.0 FCE in additional courses in Indigenous Health are required.
- Students must participate in at least 80% of the Research Seminar Series, held monthly, as well as participate in at least one Indigenous land-based activity.
- Students must complete the requirements of the collaborative specialization in addition to those requirements for the degree program in their home graduate unit.

Indigenous Health: Doctoral Level

Minimum Admission Requirements

- Applicants who wish to enrol in a collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units.
- Applicants must submit a completed Collaborative Specialization in Indigenous Health (CSIH) application form (Word) to the CSIH committee.

Completion Requirements

- All doctoral students in the collaborative specialization will take the core course CHL5520H *Indigenous Health* that runs in August annually.
- Students who have previously taken the core course CHL5520H *Indigenous Health* during their master's program are required to take a different course, approved by the collaborative specialization director, during their doctoral program.
- Students must participate in at least 80% of the Research Seminar Series, held monthly, as well as participate in at least one Indigenous land-based activity
- Students must complete the requirements of the collaborative specialization in addition to those requirements for the degree program in their home graduate unit.

Indigenous Health: Courses

Core Course

CHL5520H Indigenous Health

Jewish Studies

Jewish Studies: Introduction

Lead Faculty of the Collaborative Specialization

Arts and Science

Participating Degree Programs

Anthropology — MA, PhD
 Art History — MA, PhD
 Classics — MA, PhD
 Comparative Literature — MA, PhD
 Drama, Theatre and Performance Studies — MA, PhD
 English — MA, PhD
 European and Eurasian Studies — MA
 Geography — PhD
 Germanic Languages and Literatures — MA
 Germanic Literature, Culture and Theory — PhD
 History — MA, PhD
 Information — PhD
 Law — LLM, MSL, SJD
 Linguistics — PhD
 Medieval Studies — MA, PhD
 Museum Studies — MMSt
 Music — MA, PhD
 Music Performance — DMA
 Near and Middle Eastern Civilizations — MA, PhD
 Philosophy — MA, PhD
 Political Science — MA, PhD
 Religion — MA, PhD
 Slavic Languages and Literatures — MA, PhD
 Sociology — MA, PhD
 Women and Gender Studies — MA

Overview

The Collaborative Specialization in Jewish Studies offers both broad and intensive exposure to the constituent fields within Jewish Studies. Because of Jewish civilization's vast chronological and geographical range, as well as its constant interaction and cross-fertilization with other cultures, graduate work within Jewish Studies demands intensive exposure to a wide variety of languages, textual traditions, and scholarly disciplines.

The collaborative specialization involves the graduate master's and doctoral programs listed above. Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Jewish Studies" on their transcript.

Contact and Address

Web: www.jewishstudies.utoronto.ca
 Email: cjs.director@utoronto.ca

Telephone: (416) 978-1624
 Fax: (416) 946-7719

Collaborative Specialization in Jewish Studies
 Anne Tanenbaum Centre for Jewish Studies
 University of Toronto
 170 St. George Street, Suite 218
 Toronto, Ontario M5R 3M8
 Canada

Jewish Studies: Master's Level

Minimum Admission Requirements

- In addition to the admission requirements of the home graduate unit, sufficient linguistic knowledge, textual training, and familiarity with relevant scholarship in order to carry out graduate work in Jewish Studies within the chosen field are required.

Completion Requirements

- Completion of CJS1000H, the core methods seminar in Jewish Studies. This seminar will introduce students to the different disciplines, methods, and approaches within Jewish Studies.
- 0.5 full-course equivalent (FCE) in Jewish Studies taken within the student's home graduate unit or in another unit (may count towards the course requirements of the student's home unit).
- A comprehensive exam in Jewish Studies, supervised by a faculty member chosen from Jewish Studies and in consultation with the graduate chair from the student's home unit, in which the student will be asked to show knowledge of areas of Jewish Studies relevant to his or her disciplinary focus.
- If the student's home program requires a major research paper or thesis, the focus of the paper must pertain to Jewish Studies, and the topic must be approved by the collaborative specialization director.

Jewish Studies: Doctoral Level

Minimum Admission Requirements

- In addition to the admission requirements of the home graduate unit, sufficient linguistic knowledge, textual training, and familiarity with relevant scholarship in order to carry out graduate work in Jewish Studies within the chosen field are required.

Completion Requirements

- Completion of CJS2000H, the core research colloquium in Jewish Studies that runs biweekly throughout the year.
- Two half courses (1.0 full-course equivalent [FCE]), one within and one outside of the student's home unit, taught by a member of the CJS faculty (may count towards the course requirements of the student's home unit).

- A doctoral dissertation that deals substantively with topics in Jewish Studies and is supervised or co-supervised by a Jewish Studies graduate faculty member.
- Students will be required to give one presentation at the Jewish Studies graduate student conference over the course of their doctoral program. The conference will be held each year in the spring. The paper presentation must be completed before the completion of the doctoral program.

Jewish Studies: Courses

Not all courses are offered every year. Please consult the graduate unit for information about course availability. **Courses marked with # are taught by Jewish Studies faculty members and incorporate themes within and outside of Jewish Studies.** Major research and writing assignments for such courses must focus on topics in Jewish Studies.

Core Courses

Course Code	Course Title
CJS1000H	Jewish Studies Master's Seminar
CJS2000H	Jewish Studies Doctoral Seminar

Elective Courses

Reading Course

Course Code	Course Title
CJS1012H	Jewish Studies Directed Reading Course
CJS2010H	Jewish Studies Directed Reading Course

History

Course Code	Course Title
HIS1279H	World War II in East Central Europe
HIS1287H	Polish Jews Since the Partitions of Poland

Medieval Studies

Course Code	Course Title
MST3225H#	Jews and Christians in Medieval and Renaissance Europe

Music

Course Code	Course Title
CJS1010H	Representations of Jews and Jewishness in Opera

Near and Middle Eastern Civilizations

Course Code	Course Title
NMC1100Y#	Biblical Aramaic
NMC1101Y#	Classical Syriac
NMC1102Y	Western Aramaic — Jerusalem Talmud
NMC1105Y#	Syriac Historical Texts
NMC1106Y#	Syriac Exegetical Texts
NMC1111Y#	Eastern Aramaic — Babylonian Talmud
NMC1306H	Scribes, Manuscripts, and Translations of the Hebrew Bible
NMC1308H#	Readings in Hebrew Bible
NMC1318H	Halakhic Midrashim
NMC1608Y	Life Cycle and Personal Status in Judaism: Reproductive Technology and Jewish Law

Philosophy

Various courses, depending upon their content in a given year. Consult the collaborative specialization director.

Course Code	Course Title
PHL2084H#	Seminar in Nineteenth-Century Continental Philosophy
PHL2089H#	Seminar in Twentieth-Century Continental Philosophy
PHL2090H	Hermeneutics

Religion

Course Code	Course Title
RLG3621H	Modern Jewish Thought
RLG3622H	Maimonides and His Modern Interpreters
RLG3634H#	Worship and Scripture at Qumran
RLG3641H	Interpretations of Jewish Tradition
RLG3645Y	The Jewish Legal Tradition

Course Code	Course Title
RLG3647H	Jewish Traditions in Antiquity: Configuring the Text

Slavic Languages and Literatures

Course Code	Course Title
SLA1207H	The Imaginary Jew

Knowledge Media Design

Admissions to this collaborative specialization have been administratively suspended.

Knowledge Media Design: Introduction

Lead Faculty of the Collaborative Specialization

Information

Participating Degree Programs

Architecture — MArch
 Computer Science — MSc, PhD
 Curriculum and Pedagogy — MA, MEd, PhD
 Drama, Theatre and Performance Studies — MA, PhD
 Information — MI, PhD
 Landscape Architecture — MLA
 Language and Literacies Education — MA, MEd, PhD
 Mechanical and Industrial Engineering — MSc, MEng, PhD
 Medical Science — MSc, PhD
 Museum Studies — MMSt
 Religion — MA, PhD
 Urban Design — MUD

Overview

The Collaborative Specialization in Knowledge Media Design (KMD) was launched in 2002 as the teaching arm of the Knowledge Media Design Institute (KMDI). KMD provides a specialization for graduate students from a variety of academic backgrounds to engage in the design, prototyping, evaluation, and use of knowledge media. In keeping with KMDI's human-centred approach, students explore the design and use of new media in the context of real-world practices of individuals and communities. Access to an intensely collaborative and cross-disciplinary faculty encourages students to take a broader view of technological and social change and to be constructively critical of technological utopian and dystopian visions alike. The goal is for students to take into account heritage and history, to understand the realities of today, and to design for tomorrow.

Students have access to a community of scholars and the network of relationships that the institute coordinates. They gain first-hand experience of a living network of innovation, an environment in which the resources are people and knowledge, and the social capital and value that are generated through collaboration.

The collaborative specialization is open to master's and PhD students in the participating graduate programs listed above. Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Knowledge Media Design" on their transcript.

Contact and Address

Web: kmdi.utoronto.ca
 Email: admin.kmdi@utoronto.ca
 Telephone: (416) 978-5634

Collaborative Specialization in Knowledge Media Design
 Knowledge Media Design Institute, University of Toronto
 Faculty of Information
 John P. Robarts Library Building, 7023A
 130 St. George Street
 Toronto, Ontario M5S 1A5
 Canada

Mailing address:
 Faculty of Information
 Knowledge Media Design Institute
 University of Toronto
 140 St. George Street
 Toronto, ON M5S 3G6
 Canada

Knowledge Media Design: Master's Level

Minimum Admission Requirements

- Students wanting to apply to the collaborative specialization must be enrolled, or anticipate being enrolled, in a participating degree program. They must apply separately to the collaborative specialization and the home graduate unit.
- Please consult the KMDI website for [application guidelines](#). Admission will be subject to the approval of the graduate unit concerned and the collaborative specialization committee.

Completion Requirements

Master of Applied Science in Mechanical and Industrial Engineering (MEng Project Option);
Master of Architecture;
Master of Arts in Curriculum and Pedagogy;
Master of Arts in Drama, Theatre and Performance Studies;
Master of Arts in Language and Literacies Education;
Master of Arts in Religion;
Master of Landscape Architecture;
Master of Museum Studies;
Master of Science in Computer Science;
Master of Science in Medical Science;
Master of Urban Design

- Students must meet all the requirements of their home program.
- Students must successfully complete a total of **1.0 full-course equivalent (FCE)**:
 - KMD1001H *Theory and Methods in Knowledge Media Design*.
 - 0.5 elective FCE related to knowledge media and design. Courses are subject to availability.

- Students must attend two KMDI Speaker Series Lectures during one academic year of their degree program. Attendance will be monitored and appear on the transcript as *KMD2100Y Master's Seminar*.
- The thesis or major research project in the participating degree program should be relevant to the area of knowledge media design, as approved by the home graduate unit and the collaborative specialization committee.
- Students must submit a portfolio that includes completed student coursework and research in knowledge media design. The collaborative specialization committee will review all portfolios for their quality and contribution to the area of knowledge media design. Students' thesis or major research project will be a component of their portfolios.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

Master of Education in Curriculum Studies and Teacher Development;

Master of Education in Language and Literacies Education; Master of Engineering in Mechanical and Industrial Engineering (Coursework-Only Option)

- Students must meet all the requirements of their home program.
- Students must successfully complete a total of **1.5 full-course equivalents (FCEs)**:
 - KMD1001H *Theory and Methods in Knowledge Media Design*;
 - 1.0 elective FCE related to knowledge media and design. Courses are subject to availability.
- Students must attend two KMDI Speaker Series Lectures during one academic year of their degree program. Attendance will be monitored and appear on the transcript as *KMD2100Y Master's Seminar*.
- Students must submit a portfolio that includes completed student coursework in knowledge media design. The collaborative specialization committee will review all portfolios for their quality and contribution to the area of knowledge media design.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

Master of Information (Coursework-Only Option)

- Students must meet all the requirements of their home program.
- Students must successfully complete a total of **2.5 full-course equivalents (FCEs)**:
 - KMD1001H *Theory and Methods in Knowledge Media Design*;
 - 2.0 elective FCEs related to knowledge media and design. Courses are subject to availability.
- Students must attend two KMDI Speaker Series Lectures during one academic year of their degree program.

Attendance will be monitored and appear on the transcript as *KMD2100Y Master's Seminar*.

- Students must submit a portfolio that includes completed student coursework in knowledge media design. The collaborative specialization committee will review all portfolios for their quality and contribution to the area of knowledge media design.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

Master of Information (Thesis Option)

- Students must meet all the requirements of their home program.
- Students must successfully complete a total of **1.0 full-course equivalent (FCE)**:
 - KMD1001H *Theory and Methods in Knowledge Media Design*;
 - 0.5 elective FCE related to knowledge media and design. Courses are subject to availability.
- Students must attend two KMDI Speaker Series Lectures during one academic year of their degree program. Attendance will be monitored and appear on the transcript as *KMD2100Y Master's Seminar*.
- Students must submit a portfolio that includes completed student coursework and research in knowledge media design. The collaborative specialization committee will review all portfolios for their quality and contribution to the area of knowledge media design. Students' thesis will be a component of their portfolios.
- The thesis in the participating degree program should be relevant to the area of knowledge media design, as approved by the home graduate unit and the collaborative specialization committee.
- Collaborative specialization courses may be taken as electives for the purpose of satisfying home program requirements.

Knowledge Media Design: Doctoral Level

Minimum Admission Requirements

- Students wanting to apply to the collaborative specialization must be enrolled, or anticipate being enrolled, in a participating degree program. They must apply separately to the collaborative specialization and the home graduate unit.
- Please consult the KMDI website for application guidelines. Admission will be subject to the approval of the graduate unit concerned and the collaborative specialization committee.

Completion Requirements

- Students must meet all the requirements of their home program.

- Students must successfully complete a total of **1.5 full-course equivalents (FCEs)**:
 - KMD1001H *Theory and Methods in Knowledge Media Design* and KMD1002H *Applications in Knowledge Media*, if not already taken in the master's program, and
 - 0.5 FCE from the KMD series or a list of recognized affiliate courses.
- Students must attend four KMDI Speaker Series Lectures during one academic year of their degree program. Attendance will be monitored and appear on the transcript as KMD2200Y *Doctoral Seminar*.
- Students must submit a portfolio that includes completed student coursework and research in knowledge media design. The collaborative specialization committee will review all portfolios for their quality and contribution to the area of knowledge media design. Students' portfolios will most often be connected with one or more chapters of their dissertation.
- The dissertation topic must be in the area of knowledge media design. The thesis advisor and at least one other committee member must be from participating graduate units.
- The home graduate unit and the student's supervising committee will determine further requirements. The participating graduate units cooperate in jointly developing a program that is tailored to meet the needs of each student.

Knowledge Media Design: Courses

For courses offered in a particular year, check the Knowledge Media Design website.

Knowledge Media Design

Required

Course Code	Course Title
KMD1001H	Theory and Methods in Knowledge Media Design (Required for master's and PhD students.)
KMD1002H	Applications in Knowledge Media (Credit/No Credit. Required for PhD students only; elective for master's students. Offered once every two years.)
KMD2100Y	Master's Seminar (Credit/No Credit)
KMD2200Y	Doctoral Seminar (Credit/No Credit)

Electives

Course Code	Course Title
KMD2002H	Technologies for Knowledge Media

Course Code	Course Title
KMD3000H	Readings in Knowledge Media Design

Participating Graduate Unit Electives

Not all courses are offered every year. Please consult the KMD website for a full list of eligible electives that meet the KMD collaborative specialization requirements. Courses that are mandatory for a student's degree from the home graduate unit cannot normally be counted. Some of the elective courses may require a significant amount of background knowledge and experience. Enrolment in such courses may require the permission of the instructor.

Architecture; Landscape Architecture; Urban Design; Visual Studies

Course Code	Course Title
LAN1021H	Visual Communication 1
LAN1022H	Visual Communication 2
LAN1031H	History, Theory, Criticism 1
LAN1032H	History, Theory, Criticism 2
URD1031H	The History of Toronto Urban Form
URD1041H	Introduction to Urban Design Theory and Practice
VIS1010H	Contemporary Art Since 1960
VIS1020H	Contemporary Art: Theory and Criticism
VIS1101H	Paradigmatic Exhibitions: History, Theory, Criticism

Computer Science

Course Code	Course Title
CSC2514H	Human-Computer Interaction
CSC2526H	HCI: Topics in Ubiquitous Computing
CSC2537H	Information Visualization
CSC2552H	Topics in Computational Social Science
CSC2556H	Algorithms for Collective Decision Making
CSC2720H	Systems Thinking for Global Problems

Curriculum and Pedagogy; Language and Literacies Education

Course Code	Course Title
CTL1602H	Introduction to Computers in Education
CTL1608H	The Design of Online Environments: Theory and Practice
CTL1609H	Perspectives on the Development of Computer-Mediated Communication in Education
CTL1617H	Social Media and Education
CTL1926H	Knowledge Media and Learning

Drama, Theatre and Performance Studies

Course Code	Course Title
DRA3904H	Topics in Theatre, Drama, and Performance
DRA3908H	Topics in Theatre, Drama, and Performance

Information

Course Code	Course Title
INF1602H	Fundamentals of User Experience
INF2122H	Digital Preservation and Curation
INF2169H	User-Centred Information Systems Development
INF2170H	Information Architecture
INF2191H	User Interface Design
INF2192H	Representing UX
INF2197H	Special Topics in Information (Topics may vary each year and may not be applicable.)
INF2241H	Critical Making: Information Studies, Social Values, and Physical Computing
INF2242H	Studying Information and Knowledge Practice
INF2243H	Critical Histories of Information and Communication Technologies
INF2300H	Special Topics in Information (Topics may vary each year and may not be applicable.)
INF2303H	Special Topics in Information (Topics may vary each year and may not be applicable.)

Course Code	Course Title
INF2306H	Special Topics in Information (Topics may vary each year and may not be applicable.)
INF2320H	Remix Culture
INF2330H	Information Ethnography
INF2331H	The Future of the Book

Mechanical and Industrial Engineering

Course Code	Course Title
MIE1401H	Human Factors Engineering
MIE1402H	Experimental Methods in Human Factors Research

Museum Studies

Course Code	Course Title
MSL2000H	Curatorial Practice
MSL2325H	Museums and New Media Practice
MSL2330H	Interpretation and Meaning Making in Museums

Mediterranean Archaeology

Mediterranean Archaeology: Introduction

Lead Faculty of the Collaborative Specialization

Arts and Science

Participating Degree Programs

Anthropology — PhD
 Art History — PhD
 Classics — PhD
 Near and Middle Eastern Civilizations — PhD
 Religion — PhD

Supporting Units

Archaeology Centre

Overview

The Mediterranean Archaeology Collaborative Specialization (MACS) will expose students to the range of current approaches on the cutting-edge of Mediterranean archaeology. The Mediterranean offers unrivalled opportunities for exploring the complexities of economic, social, political, and religious change over centuries and millennia, across a vast area that is at once a coherent unit and a region with incredible diversity.

Students will be trained in the various methods required to undertake innovative research in the Mediterranean's varied prehistoric and historic contexts. Upon successful completion of the PhD requirements of the home graduate unit and the collaborative specialization, students will receive the notation "Completed Mediterranean Archaeology Collaborative Specialization" on their transcript.

Contact and Address

Web: macs.utoronto.ca
 Email: archaeology@utoronto.ca
 Telephone: (416) 978-5248
 Fax: (416) 978-3217

Mediterranean Archaeology Collaborative Specialization
 Archaeology Centre, University of Toronto
 19 Russell Street
 Toronto, Ontario M5S 2S2
 Canada

Mediterranean Archaeology: Doctoral Level

Minimum Admission Requirements

- Applicants to the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units. Applicants must meet the admission requirements of the graduate unit in which they intend to enrol. Admission will be subject to the approval of the graduate unit concerned and the collaborative specialization committee.
- Students requesting admission to the collaborative specialization following admission to a degree program should contact the specialization committee in order to formalize their admission to MACS.

Completion Requirements

- **Coursework.** Students must complete **1.0 full-course equivalent (FCE)**: MAC1000Y *Methods in Mediterranean Archaeology*.
- **Fieldwork** (MAC2000H) four weeks of participation on an approved archaeological excavation, survey, or study season in the Mediterranean.
- **Thesis.** The topic must be in the area of Mediterranean archaeology, ancient history, or classical archaeology.

Mediterranean Archaeology: Courses

Core Courses

Course Code	Course Title
MAC1000Y	Methods in Mediterranean Archaeology
MAC2000H	Mediterranean Archaeology Fieldwork

Musculoskeletal Sciences

Musculoskeletal Sciences: Introduction

Lead Faculty of the Collaborative Specialization

Medicine

Participating Degree Programs

Biomedical Engineering — MAsC, PhD
 Dentistry — MSc, PhD
 Kinesiology — MSc, PhD
 Laboratory Medicine and Pathobiology — MSc, PhD
 Medical Science — MSc, PhD
 Pharmacology and Toxicology — MSc, PhD
 Rehabilitation Science — MSc, PhD

Supporting Unit

Department of Laboratory Medicine and Pathobiology

Overview

There is an increasing burden of illness related to musculoskeletal disorders. The Collaborative Specialization in Musculoskeletal Sciences focuses on educating and training graduate students to carry out musculoskeletal research and helping them see how their work fits into the larger community of musculoskeletal research that ranges from bench to bedside to society.

The collaborative specialization nurtures leaders in the field of musculoskeletal sciences who possess the knowledge and capability to promote transformational change.

The University of Toronto has a cohort of stellar faculty with expertise in all related medical research disciplines, constituting one of the largest musculoskeletal research communities in the world. Research areas include immunology, cell biology, molecular medicine and genomics, muscle physiology, imaging, pathology, bioengineering, and related clinical areas such as orthopaedics, rheumatology, dentistry, kinesiology, rehabilitation, injury prevention, and pain management.

Advances in these areas are converging to allow major advances in translating research to musculoskeletal care and health. This collaborative specialization builds on this community to provide a unique education and training program.

Musculoskeletal Sciences interests graduate students wishing to enhance their interdisciplinary knowledge and advance their careers. Participation in this collaborative specialization enhances professional contacts throughout the international musculoskeletal research community. Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will

receive the notation “Completed Collaborative Specialization in Musculoskeletal Sciences” on their transcript.

Contact and Address

Web: tmc.utoronto.ca
 Email: msk.admin@utoronto.ca
 Telephone: (416) 978-0841
 Fax: (416) 978-6395

Collaborative Specialization in Musculoskeletal Sciences
 Dr. Jane Mitchell
 1 King's College Circle, Room 4342
 Toronto, Ontario M5S 1A8
 Canada

Musculoskeletal Sciences: Master's Level

Minimum Admission Requirements

- Applicants who wish to enrol in Musculoskeletal Sciences must apply to and be admitted to both a graduate degree program in one of the participating units and to the collaborative specialization. In addition to the application requirements of the home degree program, the collaborative specialization requires:
 - a curriculum vitae (CV)
 - a one-page letter explaining how the applicant's plan of study and specific research interests relate to musculoskeletal science
 - a letter of recommendation from a faculty member (if possible the thesis supervisor in a thesis-based graduate program), commenting on the applicant's academic abilities and likelihood for research success.

Completion Requirements

- Meet all requirements of the home degree program and the collaborative specialization.
- Complete the required core course: LMP1211H *Foundations In Musculoskeletal Science*.
- Attend and participate in 12 seminars of the SRM3335H *Master's Seminar Series — Compulsory Attendance*.
- Complete a thesis or major project or placement in the area of musculoskeletal sciences under the supervision of a collaborative specialization core faculty member.

Musculoskeletal Sciences: Doctoral Level

Minimum Admission Requirements

- Applicants who wish to enrol in Musculoskeletal Sciences must apply to and be admitted to both a graduate degree program in one of the collaborating units and to the collaborative specialization. In addition to the application requirements of the home degree program, the collaborative specialization requires:
 - a curriculum vitae (CV)

- one-page letter explaining how the applicant's plan of study and specific research interests relate to musculoskeletal science
- a letter of recommendation from a faculty member (usually the thesis supervisor in a thesis-based graduate program), commenting on the applicant's academic abilities and likelihood for research success at the doctoral level.

Completion Requirements

- Meet all requirements of the home degree program and collaborative specialization.
- Complete the required core course: LMP1211H *Foundations in Musculoskeletal Science*. Students who have completed LMP1211H at the master's level and who transfer to a doctoral degree and the doctoral level of the collaborative specialization are not required to complete an additional core course.
- Attend and participate in 18 seminars of the SRD4445H *Doctoral Seminar Series*. Students who transfer from a master's degree and master's collaborative specialization to a doctoral degree and the doctoral collaborative specialization will be required to attend 18 seminars in total; the total will include the number of seminars attended at both the master's and doctoral levels.
- Complete a thesis in the area of musculoskeletal sciences under the supervision of a collaborative specialization core faculty member.
- In the rare instance that a student who has completed the collaborative specialization at the master's level wishes to also enrol in the collaborative specialization at the doctoral level, the student will not be required to repeat the core course, LMP1211H. However, the student will be required to attend and participate in 18 seminars of the SRD4445H *Doctoral Seminar Series* and complete the doctoral thesis in the area under the supervision of a core faculty member.

Musculoskeletal Sciences: Courses

Course Code	Course Title
LMP1211H	Foundations in Musculoskeletal Science
SRM3335H	Master's Seminar Series — Compulsory Attendance
SRD4445H	Doctoral Seminar Series — Compulsory Attendance

Neuromodulation

Neuromodulation: Introduction

Lead Faculty of the Collaborative Specialization

Faculty of Applied Science and Engineering

Participating Degree Programs

Biomedical Engineering — MAsC, PhD
 Chemical Engineering and Applied Chemistry — MAsC, PhD
 Electrical and Computer Engineering — MAsC, PhD
 Materials Science and Engineering — MAsC, PhD
 Mechanical and Industrial Engineering — MAsC, PhD
 Medical Science — MSc, PhD

Supporting Units

University of Toronto CRANIA Neuromodulation Institute (CNMI);
 Institute of Biomedical Engineering

Overview

The primary goal of the Collaborative Specialization in Neuromodulation is to introduce students to various neuromodulation modalities, provide students with the knowledge to be prepared for research or industrial endeavours in neuromodulation, and provide hands-on experience performing neuromodulation research.

Essentially, this specialization will train future researchers and clinicians alongside engineers and provide students with cross-disciplinary exposure to the various aspects of neuromodulation-based therapeutic innovation.

The collaborative specialization is open to master's and PhD students in the participating graduate degree programs listed above. Upon successful completion of the degree requirements of the home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Neuromodulation" on their transcript.

Contact and Address

Web: www.engineering.utoronto.ca/research-innovation/research-institutes-and-centres/crania-neuromodulation-institute-cnmi
 Email: info.cnmi@utoronto.ca

Suhail Asrar, Program Coordinator
 CRANIA NeuroModulation Institute (CNMI)
 Toronto Western Hospital
 399 Bathurst Street, McLaughlin Wing, 14th Floor

Room 14MC413
 Toronto, Ontario M5T 2S8

Neuromodulation: Master's Level

Minimum Admission Requirements

- Applicants must meet the admission requirements of both the home graduate unit and the collaborative specialization (CS).
- Applicants must apply to and be admitted to both the CS and a participating master's degree program.

Completion Requirements

- The thesis topic must be in the neurotechnology/neuromodulation area. Participating students are encouraged to have a co-supervisor or a member of their supervisory committee with research expertise in an area of study different from their home department.
- The course BME1500H *Topics in Neuromodulation* is mandatory for all students. Students must attend all lectures in the course and present a project for course evaluation.
- In addition, all master's-level students must complete at least 0.5 full-course equivalent (FCE) chosen from the list of courses approved by CNMI (see below for a complete list of approved elective courses).
- Students must attend the professional development workshops organized by CNMI as part of the CS.
- Participating students from graduate units in the Faculty of Applied Science and Engineering cannot count the modular (0.25 FCE) MSC courses that are not letter graded towards the total FCE requirements of their home program.
- Participating Institute of Medical Science students may double-count the courses taken as part of the CS towards their degree, except for some of the 0.25 FCE modular MSC courses, which are not letter graded. These students should consult with their graduate coordinator or the CNMI program coordinator to confirm this before opting for the modular elective courses.

Neuromodulation: Doctoral Level

Minimum Admission Requirements

- Applicants must meet the admission requirements of both the home graduate unit and the collaborative specialization (CS).
- Applicants must apply to and be admitted to both the CS and a participating doctoral degree program.
- Students who have already taken the CS during their master's degree program will not be eligible to take it again during their PhD.

Completion Requirements

- The thesis topic must be in the neurotechnology/ neuromodulation area.
- Participating students are encouraged to have a co-supervisor or a member of their supervisory committee with research expertise in an area of study different from their home graduate unit.
- The course BME1500H *Topics in Neuromodulation* is mandatory for all students. Students must attend all lectures in the course and present a project for course evaluation.
- In addition, all doctoral-level students must complete at least 0.5 full-course equivalent (FCE) chosen from the list of courses approved by CNMI (see below for a complete list of approved elective courses).
- Students must attend the professional development workshops and seminars organized by CNMI as part of the CS.
- In addition, doctoral students must attend the Annual CRANIA Research Day every year and are encouraged to present their research work at least once.
- Participating students from graduate units in the Faculty of Applied Science and Engineering cannot count the modular (0.25 FCE) MSC courses that are not letter graded towards the total FCE requirements of their home program.
- Participating Institute of Medical Science students may double-count the courses taken as part of the CS towards their degree, except for some of the 0.25 FCE modular courses, which are not letter graded. These students should consult with their graduate coordinator or the CNMI program coordinator to confirm this before opting for the modular elective courses.

Neuromodulation: Courses

Required Course

Course Code	Course Title
BME1500H	Topics in Neuromodulation

Elective Courses

Biomedical Engineering

Course Code	Course Title
BME1466H	Advanced Topics on Magnetic Resonance Imaging
BME1472H	Fundamentals of Neuromodulation Technology and Clinical Applications
BME1473H	Acquisition and Processing of Bioelectric Signals
BME1802H	Applying Human Factors to the Design of Medical Devices

Course Code	Course Title
JEB1444H	Neural Engineering
JPB1071H	Advanced Topics: Computational Neuroscience

Chemical Engineering and Applied Chemistry

Course Code	Course Title
CHE1053H	Electrochemistry
CHE1333H	Biomaterials Engineering for Nanomedicine
CHE1334H	Organ-on-a-Chip Engineering

Electrical and Computer Engineering

Course Code	Course Title
ECE516H1	Intelligent Image Processing
ECE537H1	Random Processes
ECE1475H	Bio Photonics
ECE1647H	Introduction to Nonlinear Control Systems
ECE1656H	Nonlinear Modeling and Analysis of Biological Systems
ECE1774H	Sensory Cybernetics
ECE1777H	Computer Methods for Circuit Simulations

Materials Science and Engineering

Course Code	Course Title
JMB1050H	Biological and Bio-Inspired Materials
MSE1038H	Computational Materials Design

Mechanical and Industrial Engineering

Course Code	Course Title
MIE1080H	Introduction to Healthcare Robotics
MIE1208H	Microfluidic Biosensors
MIE1232H	Microfluidics and Laboratory-on-a-Chip Systems
MIE1359H	Engineering Cell Biology and Micro-Nanoengineered Platforms

Medical Science

Course Code	Course Title
MSC1006H	Neuroanatomy
MSC1085H	Molecular Approaches to Mental Health and Addictions
MSC1087H	Neuroimaging Methods Using Magnetic Resonance Imaging
MSC1102H	Psychiatric Implications of Traumatic Brain Injury
MSC1104H	Neurodegenerative Disease
MSC1109H	Introduction to Neuroimaging
MSC1113H	Radiomics and Machine Learning for Medical Imaging

Neuroscience

Neuroscience: Introduction

Lead Faculty of the Collaborative Specialization

Medicine

Participating Degree Programs

Biochemistry — MSc, PhD
 Bioethics — MHSc
 Biomedical Engineering — MASc, PhD
 Cell and Systems Biology — MSc, PhD
 Community Health — MScCH
 Computer Science — MSc, PhD
 Dentistry — MSc, PhD
 Developmental Psychology and Education — MA, PhD
 Immunology — PhD
 Laboratory Medicine and Pathobiology — MSc, PhD
 Medical Biophysics — MSc, PhD
 Medical Science — MSc, PhD
 Music — MA, PhD
 Pharmaceutical Sciences — MSc, PhD
 Pharmacology — MSc, PhD
 Physiology — MSc, PhD
 Psychology — MA, PhD
 Public Health Sciences — MPH, MSc, PhD
 Rehabilitation Science — MSc, PhD

Overview

The graduate programs listed above participate in the Collaborative Specialization in Neuroscience.

Participating graduate units contribute courses and provide facilities and supervision for graduate research. Students must follow a plan of studies acceptable to both the participating unit and the Neuroscience collaborative specialization. Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Neuroscience" on their transcript.

Students interested in joining the specialization should visit the [Neuroscience website](#) and complete the application form. Students should register within one month of initial registration in their participating degree unit. The Neuroscience website provides areas of research for all faculty in the collaborative specialization, their graduate unit affiliations and contact information, as well as additional information on neuroscience courses.

Students in the specialization receive the Neuroscience newsletter and notification about neuroscience lectures held on campus. The collaborative specialization runs a Distinguished Lectureship Series of talks by eminent neuroscientists and an annual research day; students are required to attend and present at this event.

Contact and Address

Web: www.neuroscience.utoronto.ca
 Email: p.neuroscience@utoronto.ca
 Telephone: (416) 978-8637

Collaborative Specialization in Neuroscience
 University of Toronto
 Room 3306, 1 King's College Circle
 Toronto, ON M5S 1A8
 Canada

Neuroscience: Master's Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating units.

Completion Requirements

- The thesis topic must be in the neuroscience area.
- The student's supervisor must be a core faculty member of the Collaborative Specialization in Neuroscience.
- All master's-level students must complete at least 0.5 full-course equivalent (FCE) chosen from the list of courses approved by the collaborative specialization.
- The student must attend and present their work as first author at the Annual Collaborative Specialization in Neuroscience Research Day at least once.
- The student must complete NEU1000H *Neuroscience Distinguished Lecture Series (Master's)* by attending at least 70% of the lectures in the CPIN Distinguished Lectureship Series (including the Julius Axelrod Distinguished Visiting Neuroscientist Lecture) or CPIN Emerging Leaders in Neuroscience Lecture Series, during one academic year (or a minimum of seven lectures in total over the program). As part of the seminar series, the student must present his/her work at least once at the CPIN Research Day.

Neuroscience: Doctoral Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating units.

Completion Requirements

- The thesis topic must be in the neuroscience area.
- The student's supervisor must be a core faculty member of the Collaborative Specialization in Neuroscience.
- All PhD students must complete at least 1.0 full-course equivalent (FCE) course, such as JNR1444Y

Fundamentals of Neuroscience: Cellular and Molecular, or JNS1000Y *Fundamentals of Neuroscience: Systems and Behaviour*, or one of several additional courses in cognitive psychology or imaging, or neuroscience-related course to be determined by the collaborative specialization committee and posted on the Neuroscience website in July of each year.

- The student must attend and present their work as first author at the Annual Collaborative Specialization in Neuroscience Research Day at least twice.
- The student must complete NEU2000H *Neuroscience Distinguished Lecture Series (Doctoral)* by attending at least 70% of the lectures in the CPIN Distinguished Lectureship Series (including the Julius Axelrod Distinguished Visiting Neuroscientist Lecture) or CPIN Emerging Leaders in Neuroscience Lecture Series, during three academic years (or a minimum of 21 lectures in total over the program). As part of the seminar series, the student must present his/her work at least twice at the CPIN Research Day.
- MSc or MA students who have completed the Neuroscience specialization and who wish to continue on to complete at the doctoral level must register in NEU2000H *Neuroscience Distinguished Lecture Series (Doctoral)* and fulfil the doctoral requirements.

Neuroscience: Courses

Neuroscience courses offered by the participating units are listed below. Not all courses are offered each year.

Course Code	Course Title
APD3286H	Developmental Neurobiology
CSC2506H	Probabilistic Learning and Reasoning
CSC2515H	Introduction to Machine Learning
CSC2523H	Object Modelling and Recognition
CSC2545H	Kernel Methods and Support Vector Machines
DEN1009H	Pain: From Basic Science to Patient Care
DEN1060H	Craniofacial Neurophysiology: Sensory, Pain, and Neuromuscular Functions
JEB1444H	Neural Engineering
JNP1017H	Current Topics in Molecular and Biochemical Toxicology
JNP1018H	Molecular and Biochemical Basis of Toxicology
JNR1444Y	Fundamentals of Neuroscience: Cellular and Molecular
JNS1000Y	Fundamentals of Neuroscience: Systems and Behaviour
JPB1071H	Advanced Topics: Computational Neuroscience
JYG1555H	Advanced Topics: Cellular and Molecular Neurobiology

Course Code	Course Title
LMP1209H	Neurodegenerative Disease — Mechanisms, Models, and Methods
MSC1006H	Neuroanatomy
MSC1081H	Studies in Schizophrenia
MSC1085H	Molecular Approaches to Mental Health and Addictions
MSC1087H	Neuroimaging Methods Using Magnetic Resonance Imaging
MSC6000H	Individualized Reading/Research Course (requires prior permission of the Neuroscience Program Director)
MUS7110H	Neurosciences of Music: Scientific Foundations, Clinical Translations
NEU1000H	Neuroscience Distinguished Lecture Series (Master's)
NEU2000H	Neuroscience Distinguished Lecture Series (Doctoral)
PCL3100H	Behavioural Pharmacology I
PCL3101H	Behavioural Pharmacology II
PSL1024H	Advanced Topics: Neuroendocrinology
PSL1026H	Advanced Topics: Experimental Cell Physiology
PSL1047H	Advanced Topics: Somatosensory and Pain Neuroscience
PSL1050H	Advanced Topics: The Hippocampus from Cell to Behaviour
PSL1053H	Advanced Topics: Critical Assessment of Ion Channel Function
PSL1068H	Advanced Topics: Molecular Basis of Behaviour
PSL1075H	Biology In Time
PSL1441H	Systems Level Neuroplasticity
PSL1445H	Mechanistic Molecular and Cellular Neuroscience
PSL1446H	Molecular and Cellular Aspects of Neural Disorders
PSL1452H	Fundamentals of Ion Channel Function
PSY1200H	Selected Topics in Psychology
PSY5101H	Mechanisms of Behaviour
PSY5110H	Advanced Topics in Behavioural Neuroscience I
PSY5111H	Advanced Topics in Behavioural Neuroscience II
PSY5112H	Advanced Topics in Behavioural Neuroscience III

Course Code	Course Title
PSY5120H	Advanced Topics in Animal Behaviour and Motivation I
PSY5121H	Advanced Topics in Animal Behaviour and Motivation II
PSY5130H	Advanced Topics in Neuropsychology I
PSY5201H	Audition
PSY5203H	Higher Cognition
PSY5204H	Attention
PSY5205H	Memory
PSY5210H	Advanced Topics in Perception I
PSY5211H	Advanced Topics in Perception II
PSY5212H	Advanced Topics in Perception III
PSY5220H	Advanced Topics in Cognition I
PSY5221H	Advanced Topics in Cognition II
PSY5222H	Advanced Topics in Cognition III
PSY5310H	Advanced Topics in Development I
PSY5311H	Advanced Topics in Development II
REH1510H	Disordered and Restorative Motor Control
REH5100H	Introduction to Cognitive Rehabilitation Neuroscience I: Basic Science to Clinical Applications

Other Courses

Courses not specifically in neuroscience which do not fulfil the requirements as neuroscience courses but might be useful for neuroscience students.

Course Code	Course Title
JDB1025H	Developmental Biology
SLP1522Y	Speech Physiology and Acoustics
SLP1533Y	Aphasia

Next-Generation Precision Medicine

Next-Generation Precision Medicine: Introduction

Lead Faculty of the Collaborative Specialization

Pharmacy

Participating Degree Programs

Chemistry — PhD
Chemical Engineering and Applied Chemistry — PhD
Molecular Genetics — PhD
Pharmaceutical Sciences — PhD

Supporting Units

Graduate Department of Pharmaceutical Sciences;
Precision Medicine Initiative at U of T (PRIME)

Overview

The graduate programs listed above participate in the doctoral Collaborative Specialization (CS) in Next-Generation Precision Medicine, which offers the opportunity for cross-disciplinary research leading to doctoral degrees.

This CS is designed to foster cross-disciplinary training and collaboration across diverse departments at the University. The academic research focus is on cutting-edge technologies and methods to develop novel therapeutic strategies, create new tools for disease diagnosis, and enable a deeper understanding of disease biology through integration of principles and methods across the physical and life sciences and engineering.

Future advances in precision medicine will require a multidisciplinary perspective and creative solutions beyond conventional genomics and mutational profiling. This CS aims to equip researchers with novel approaches to address unmet human health challenges by providing an understanding of commercialization and translation activities that will help advance research discoveries into impactful outcomes.

Upon successful completion of the PhD degree requirements of the participating home graduate unit and the CS, students will receive the notation “Completed Collaborative Specialization in Next-Generation Precision Medicine” on their transcript.

Contact and Address

Web: www.education.prime.utoronto.ca
Email: prime.education@utoronto.ca
Telephone: (416) 978-5516

Collaborative Specialization in Next-Generation Precision Medicine
144 College Street, room 904
Toronto, Ontario M5S 3M2
Canada

Next-Generation Precision Medicine: Doctoral Level

Minimum Admission Requirements

- Applicants must meet the admission requirements of both the home graduate unit and the collaborative specialization (CS).
- Applicants must apply to and be admitted to both the CS and a participating doctoral degree program.
- Applicants must be supervised by a core faculty member of the CS and are encouraged to have a co-supervisor or a member of their supervisory committee with research expertise in a different field of study.
- Applicants must have a thesis project focused on drug discovery, diagnostic development, or another topic related to next-generation precision medicine.

Completion Requirements

- Students must meet the degree requirements of the School of Graduate Studies, the participating home graduate program, and the collaborative specialization.
- The student's thesis in their home program must be in the area of next-generation precision medicine.
- The plan of study will include at least **1.0 full-course equivalent (FCE)** (combined course modules and seminar course as described below):
 - Students must complete PHM1500H *Next-Generation Precision Medicine Seminar Series*, offered through the Graduate Department of Pharmaceutical Sciences.
 - Course modules (0.25 or 0.5 FCE each) will be offered through the CS and participating departments. Students must take any (one or two) of the modules recognized by the CS for a total of 0.5 FCE.

Next-Generation Precision Medicine: Courses

Required Course

Course Code	Course Title
PHM1500H	Next-Generation Precision Medicine Seminar Series

Modular Courses

Course Code	Course Title
CHE1125H	Modelling and Optimization in Biochemical Networks
CHE1134H	Advances in Bioengineering
CHE1333H	Biomaterials Engineering for Nanomedicine
CHE1334H	Organ-on-a-Chip Engineering
CHE1450H	Bioprocess Engineering
CHE1471H	Modelling in Biological and Chemical Systems
CHM1056H	Techniques for Studying the Chemical, Structural, and Dynamic Properties of Biomolecules
JTC1331H	Biomaterials Science
LMP2342H	Intellectual Property Fundamentals
LMP2343H	Applied Intellectual Property
LMP2345H	Procurement, Privacy, and Regulatory Affairs
LMP2346H	Grant Writing
LMP2347H	Economics of Healthcare
MMG1319H	Genomics of Infectious Diseases
MMG1324H	Mitochondrial Genetics in Health and Disease
MMG3204H	Practical Applications of Genome Interpretation
MMG3205H	Research Topics in Medical Genomics
PHM2101H	Pharmaceutical Sciences Module: Precision in vitro Diagnostics

Psychology, Psychiatry and Engineering

Psychology, Psychiatry and Engineering: Introduction

Lead Faculty of the Collaborative Specialization

Applied Science and Engineering

Participating Degree Programs

Aerospace Science and Engineering — MSc, PhD
 Civil Engineering — MSc, PhD
 Electrical and Computer Engineering — MSc, PhD
 Mechanical and Industrial Engineering — MSc, PhD
 Medical Science — MSc, PhD
 Psychology — MA, PhD

Supporting Units

Department of Mechanical and Industrial Engineering

Overview

The Collaborative Master's and Doctoral Specialization in Psychology, Psychiatry and Engineering (PsychEng) includes participating programs offered by the Departments of Mechanical and Industrial Engineering, Civil and Mineral Engineering, Electrical and Computer Engineering and the University of Toronto Institute of Aerospace Studies in the Faculty of Applied Science and Engineering, the Department of Psychology in the Faculty of Arts and Science, and the Institute of Medical Science in the Temerty Faculty of Medicine.

Engineering involves the creative application of science to the design of systems, processes, structures, and technologies. Psychology is a science that focuses on the mind and behaviour of people and animals to understand individuals and groups across all levels of analyses, from the cellular to the cultural. Psychiatry the study and treatment of mental illness, emotional disturbance, and abnormal behaviour.

The Psychology, Psychiatry and Engineering collaborative specialization supports graduate students and faculty interested in contributing to the growing interdisciplinary scholarship at the nexus of psychology, psychiatry, and engineering. Fields of study that may benefit from this collaborative specialization include, but are not limited to: human factors, design theory and methodology, artificial intelligence and information engineering, mental health, operations research, and robotics. This specialization strengthens ties between the three Faculties, and may propel research of interest to both beyond what is possible individually.

Upon successful completion of the master's and/or doctoral degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Psychology, Psychiatry and Engineering" on their transcript.

Contact and Address

Web: gradstudies.engineering.utoronto.ca/collaborative-specialization-psychology-engineering-psycheng
 Email: psych_eng@mie.utoronto.ca
 Telephone: (416) 946-3028
 Fax: (416) 978-7753

Collaborative Specialization in Psychology, Psychiatry and Engineering
 Department of Mechanical and Industrial Engineering
 University of Toronto
 5 King's College Road, Toronto, Ontario M5S 3G8 Canada

Psychology, Psychiatry and Engineering: Master's Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units.
- Applicants must provide:
 - A statement of purpose that describes background experience relating to psychology, psychiatry, and engineering, and motivation for pursuing studies in PsychEng. Complete the online registration form.
 - A supervisor's letter of recommendation in support of the student's application to PsychEng.

Completion Requirements

- Two sessions of APS1305H *PsychEng Seminar Series* — Master's Level.
- Two PsychEng elective half courses (1.0 FCE). One of the courses must be from the other discipline. Students from one discipline (psychology, psychiatry, or engineering) should first consult with the instructor before registering for a course in the other discipline to ensure adequate fit in terms of interest and preparation. Psychology and Medical Science students must complete at least one graduate course in Engineering, and Engineering students must complete at least one graduate course in either Psychology or Medical Science.
- A thesis focused on a topic in the area of the collaborative specialization.
- All students enrolled in the collaborative specialization must complete the requirements of the collaborative specialization, in addition to those requirements for the degree program in their home graduate unit. The collaborative specialization director and/or specialization committee is/are responsible for certifying the completion of the collaborative specialization requirements. The home graduate unit is solely responsible for the approval of the student's home degree requirements.

Psychology, Psychiatry and Engineering: Doctoral Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to a doctoral-level graduate degree program in one of the collaborating graduate units.
- Applicants must provide:
 - A statement of purpose that describes the applicant's background experience relating to psychology, psychiatry, and engineering, and motivation for pursuing studies in PsychEng. Complete the online registration form.
 - A supervisor's letter of recommendation in support of the student's application to PsychEng.

Completion Requirements

- Two sessions of APS1308H *PsychEng Seminar Series — PhD Level*.
- Two PsychEng elective half courses (1.0 FCE). One of the courses must be from the other discipline. Students from one discipline (psychology, psychiatry, or engineering) should first consult with the instructor before registering for a course in the other discipline to ensure adequate fit in terms of interest and preparation. Psychology and Medical Science students must complete at least one graduate course in Engineering, and Engineering students must complete at least one graduate course in either Psychology or Medical Science.
- A thesis focused on a topic in the area of the collaborative specialization.
- Students who have completed the PsychEng collaborative specialization at the master's level must take the core seminar course at the PhD level, which requires a higher level of participation; i.e., present more frequently and/or take a leadership role in seminar activities such as the discussion of research papers. Students take two further (different) PsychEng electives during their doctoral program, and their research will be at a level appropriate to a PhD degree.
- All students enrolled in the collaborative specialization must complete the requirements of the collaborative specialization, in addition to those requirements for the degree program in their home graduate unit. The collaborative specialization director and/or specialization committee is/are responsible for certifying the completion of the collaborative specialization requirements. The home graduate unit is solely responsible for the approval of the student's home degree requirements.

Psychology, Psychiatry and Engineering: Courses

Core Course

Course Code	Course Title
APS1305H	PsychEng Seminar Series — Master's Level
APS1308Y	PsychEng Seminar Series — Doctoral Level

Elective Courses

Aerospace Studies

Course Code	Course Title
AER1601H	Aerospace Engineering and Operations Management

Civil Engineering

Course Code	Course Title
CIV1320H	Indoor Air Quality

Electrical and Computer Engineering

Course Code	Course Title
ECE1774H	Sensory Cybernetics (suitable for Engineering students only)
ECE1778H	Creative Applications for Mobile Devices
JEB1444H	Neural Engineering (suitable for Engineering students only)

Mechanical and Industrial Engineering

Course Code	Course Title
MIE1070H	Intelligent Robots for Society
MIE1402H	Experimental Methods in Human Factors Research
MIE1403H	Analytical Methods in Human Factors Research
MIE1412H	Human-Automation Interaction
MIE1415H	Analysis and Design of Cognitive Work
MIE1444H	Engineering for Psychologists and Psychiatrists

Course Code	Course Title
MIE1505H	Enterprise Modelling
MIE1510H	Formal Techniques in Ontology Engineering
MIE1720H	Creativity in Conceptual Design

Medical Science

Course Code	Course Title
MSC1006H	Neuroanatomy
MSC1085H	Molecular Approaches to Mental Health and Addictions
MSC1087H	Neuroimaging Methods Using Magnetic Resonance Imaging
MSC1089H	The Biopsychosocial Basis of Mental Health and Addictive Disorders
MSC6000H	Individualized Reading/Research Course

Psychology

Course Code	Course Title
PSY1000H	Directed Studies
Department of Psychology courses offered in the 5000 series; contact the department for exclusions.	

Public Health Policy

Public Health Policy: Introduction

Admissions have been administratively suspended. This collaborative specialization will close on August 31, 2029.

Lead Faculty of the Collaborative Specialization

Public Health

Participating Degree Programs

Global Affairs — MGA
 Health Administration — MHS
 Health Policy, Management and Evaluation — MSc, PhD
 Kinesiology — MSc, PhD
 Nutritional Sciences — MSc, PhD
 Public Health Sciences — MPH, MSc, PhD
 Public Policy — MPP
 Social Work — MSW, PhD

Supporting Units

Dalla Lana School of Public Health

Overview

The Collaborative Specialization in Public Health Policy provides students with exemplary training in public health policy, which fosters synergies and cross-disciplinary learning. It gives students the capacity to engage in current events and contribute to the development, refinement, and evaluation of policies to address society's pressing and emerging public health priorities.

The collaborative specialization is cross-disciplinary, bringing together a broad range of disciplines, substantive foci, and theoretical and methodological underpinnings, to synergistically build an engaged community of practice of students and faculty focused on public health policy. It contributes to the creation of the next generation of public health policy research leaders and creative agents for change, able to address current health issues and challenges.

Through the direction of the stellar team of academics and policy-makers associated with the collaborative specialization, students are provided with real-world skills to address the complex and demanding task of public health policy-making (including insight into a wide array of legislative and regulatory interventions, administrative practices, financing and funding decisions, and various forms of soft law, such as guidelines and informal processes) which operate at the international, federal, provincial, and municipal levels in ways that are both cross-jurisdictional and cross-sectoral.

Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative

specialization, students will receive the notation "Completed Collaborative Specialization in Public Health Policy" on their transcript.

Contact and Address

Web: www.dlsph.utoronto.ca/program/collaborative-specialization-in-public-health-policy/
 Email: publichealthpolicy@utoronto.ca
 Telephone: (416) 978-6512
 Fax: (416) 946-0340

Collaborative Specialization in Public Health Policy
 University of Toronto
 Suite 534, 155 College Street
 Toronto, Ontario M5T 3M7
 Canada

Public Health Policy: Master's Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units.
- Complete the application form available on the website.
- Curriculum vitae (CV); maximum length: five pages.
- Two-page, free-form essay outlining:
 - interest in public health policy
 - aspirations
 - learning goals
 - career plans
 - specific research plans (if in a research program of study)
 - experience relevant to public health policy.
- Letters from two references. The letters of reference should describe the student's academic ability and career aspirations and comment on the student's potential benefit from the collaborative specialization.

Completion Requirements

- Individual student plans of study must meet the requirements of both the home graduate unit and the collaborative specialization. To fulfil the requirements of the collaborative specialization, students must complete the following:
 - Undertake the major paper, thesis, or practicum placement with a public health policy focus under the supervision of one of the collaborative specialization's core faculty members.
 - Complete 1.0 full-course equivalent (FCE) in public health policy from the following list: CHL5300H *Public Health Policy*, CHL5308H *Tools and Approaches for Public Health Policy Analysis and Evaluation*, HAD5011H *Canada's Health Care System*, or PPG2000H *Politics and the Policy Process*.
 - Complete the *Master's Seminar Series* course, SRM3333H.

- All students enrolled in the collaborative specialization must complete the requirements of the collaborative specialization, in addition to those requirements for the degree program in their home graduate unit.

Public Health Policy: Doctoral Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units.
- Complete the application form available on the website.
- Curriculum vitae (CV); maximum length: five pages.
- Two-page, free-form essay outlining:
 - interest in public health policy
 - aspirations
 - learning goals
 - career plans
 - specific research plans
 - experience relevant to public health policy.
- Letters from two references. One letter should come from the prospective supervisor and should describe availability of resources necessary to carry out research, including the type of mentoring the supervisor will be able to provide, comments on academic progress, and the student's potential benefit from the collaborative specialization.

Public Health Policy: Courses

Course Code	Course Title
CHL5300H	Public Health Policy
CHL5308H	Tools and Approaches for Public Health Policy Analysis and Evaluation
CHL5309H	Advanced Analysis of Topical Issues in Public Health Policy
HAD5011H	Canada's Health Care System and Health Policy (Doctoral Stream)
PPG2000H	Politics and the Policy Process
SRM3333H	Public Health Policy Seminar Series (Master's Level)

Completion Requirements

- Individual student plans of study must meet the requirements of both the home graduate unit and the collaborative specialization.
- To fulfil the requirements of the collaborative specialization, students must complete the following:
 - Undertake thesis research with a public health policy focus under the supervision of one of the collaborative specialization's core faculty members.
 - Complete 1.0 full-course equivalent (FCE) in public health policy from the following list: CHL5300H *Public Health Policy*, CHL5308H *Tools and Approaches for Public Health Policy Analysis and Evaluation*, HAD5011H *Canada's Health Care System*, or PPG2000H *Politics and the Policy Process*. Students who have completed two of the four courses listed above may be considered for a course reduction of up to 1.0 FCE in the PhD program.
 - Completion of the graduate seminar series course CHL5309H.
- All students enrolled in the collaborative specialization must complete the requirements of the collaborative specialization, in addition to those requirements for the degree program in their home graduate unit.

Resuscitation Sciences

Resuscitation Sciences: Introduction

Admissions to the collaborative specialization in Resuscitation Sciences have been administratively suspended.

Lead Faculty of the Collaborative Specialization

Medicine

Participating Degree Programs

Biomedical Engineering — PhD
 Community Health — MScCH
 Health Policy, Management and Evaluation — MSc, PhD
 Immunology — MSc, PhD
 Laboratory Medicine and Pathobiology — MSc, PhD
 Mechanical and Industrial Engineering — MASc, MEng, PhD
 Medical Science — MSc, PhD
 Nursing Science — MN, PhD
 Pharmacology — MSc, PhD
 Physiology — MSc, PhD
 Public Health Sciences — MPH, MSc, PhD
 Rehabilitation Science — MSc, PhD

Overview

The goal of the Collaborative Specialization in Resuscitation Sciences is to train scientists pursuing research in the optimal care of the acutely ill and injured patient and, ultimately, to create leaders in the discipline who will supervise others providing this level of scientific inquiry. The collaborative specialization appeals to students from a wide variety of backgrounds with an interest in any aspect of resuscitation science.

Resuscitation Sciences includes a number of medical areas such as trauma, critical care, emergency medicine, neurotrauma, anaesthesia, shock, sepsis, acute coronary syndrome, paediatric care, cardiovascular, peripheral vascular, and rehabilitation medicine. Many non-medicine disciplines such as engineering, basic science, and public health, as well as allied health professions such as nursing, pharmacy, and paramedicine, will find synergies in the Resuscitation Sciences specialization. Research programs can use methodologies ranging from molecular medicine and genomics through clinical trials and outcomes to engineering, health administration, and health prevention strategies. Resultant advances in knowledge will ultimately be applied to the clinical setting.

Interested students must first apply to and be accepted in one of the participating degree programs listed above, and then apply to the collaborative specialization. Students must follow a course of study acceptable to both the home unit and the collaborative specialization. Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation

"Completed Collaborative Specialization in Resuscitation Sciences" on their transcript.

Contact and Address

Web: www.resuscitationscience.ca
 Email: csrsinfo@smh.ca
 Telephone: (416) 864-6060 ext. 7843
 Fax: (416) 864-5934

Collaborative Specialization in Resuscitation Sciences
 c/o Rescu, St. Michael's Hospital
 30 Bond Street
 Toronto, Ontario M5B 1W8
 Canada

Resuscitation Sciences: Master's Level

Minimum Admission Requirements

- Collaborative specializations are administered under the auspices of the School of Graduate Studies.
- Applicants must be accepted for admission to a participating graduate unit and comply with the admission procedures of that unit before applying to the Collaborative Specialization in Resuscitation Sciences.
- Applicants must submit the following to the collaborative specialization committee:
 - a resumé or curriculum vitae (CV)
 - a personal statement explaining how their course of study and specific research interests relate to resuscitation science
 - a letter of recommendation from a faculty member, usually the thesis supervisor in a thesis-based graduate program, commenting on the student's academic abilities and likelihood for research success in the field of resuscitation sciences.

Completion Requirements

- Students must register in the master's degree program through one of the participating home graduate units. They must meet all respective degree requirements of the School of Graduate Studies and their participating home graduate unit.
- In addition to meeting the home graduate unit program requirements, students will be required to:
 - take the core course MSC4001H *Foundations in Resuscitation Science Research*
 - attend at least 75% of the SRM3333H *Resuscitation Sciences Graduate Seminar Series* over two consecutive sessions
 - complete a thesis, comprehensive paper, or practicum (whichever is included in their course of study) in the area of resuscitation sciences under the supervision of a faculty member affiliated with the collaborative specialization
 - present their research at least once at either the Resuscitation in Motion scientific meeting or in the Foundations MSC4001H core course.

Resuscitation Sciences: Doctoral Level

Minimum Admission Requirements

- Collaborative specializations are administered under the auspices of the School of Graduate Studies.
- Applicants must be accepted for admission to a participating graduate unit and comply with the admission procedures of that unit before applying to the Collaborative Specialization in Resuscitation Sciences.
- Applicants must submit the following to the collaborative specialization committee:
 - a resumé or curriculum vitae (CV)
 - a personal statement explaining how their course of study and specific research interests relate to resuscitation science
 - a letter of recommendation from a faculty member, usually the thesis supervisor in a thesis-based graduate program, commenting on the student's academic abilities, and likelihood for research success in the field of resuscitation sciences.

Completion Requirements

- Students must register in the degree program through one of the participating home graduate units. They must meet all respective degree requirements of the School of Graduate Studies and their participating home graduate unit.
- In addition to meeting the home graduate unit program requirements, students will be required to:
 - take the core course MSC4001H *Foundations in Resuscitation Science Research* (doctoral students who have already taken this course as part of their master's program will be exempted)
 - take MSC4002H *Advanced Topics in Resuscitation Science Research*, a type 2 graduate seminar series
 - complete a thesis in the area of resuscitation sciences
 - attend at least 75% of the SRD4444H *Resuscitation Sciences Graduate Seminar Series* over two consecutive years
 - present their research at least twice at either the Resuscitation in Motion scientific meeting or in the Foundations MSC4001H core course.

Resuscitation Sciences: Courses

Course Code	Course Title
MSC4001H	Foundations in Resuscitation Science Research
MSC4002H	Advanced Topics in Resuscitation Science Research (PhD students only)
SRM3333H	Resuscitation Sciences Graduate Seminar Series (master's level)
SRD4444H	Resuscitation Sciences Graduate Seminar Series (doctoral level)

Robotics

Robotics: Introduction

Lead Faculty of the Collaborative Specialization

Faculty of Applied Science and Engineering

Participating Degree Programs

Aerospace Science and Engineering — MSc, PhD
 Biomedical Engineering — MSc, PhD
 Computer Science — MSc, PhD
 Electrical and Computer Engineering — MSc, PhD
 Mechanical and Industrial Engineering — MSc, PhD
 Rehabilitation Science — MSc, PhD

Supporting Units

University of Toronto Institute for Aerospace Studies
 University of Toronto Robotics Institute

Overview

The graduate programs listed above participate in the Collaborative Specialization (CS) in Robotics, which aims at building a structured community of practice that combines engineering and computer science approaches to robotics.

The CS in Robotics is designed to foster cross-disciplinary training and collaboration across diverse departments at the University. Upon successful completion of the degree requirements of the participating home graduate unit and the CS, students will receive the notation “Completed Collaborative Specialization in Robotics” on their transcript.

Contact and Address

Web: robotics.utoronto.ca
 Email: robotics@utoronto.ca

Timothy Barfoot
 Collaboration Specialization in Robotics
 University of Toronto Robotics Institute
 Myhal Centre for Engineering Innovation and Entrepreneurship
 55 St. George Street
 Toronto, Ontario M5S 1A4

Robotics: Master's Level

Minimum Admission Requirements

- Applicants must meet the admission requirements of both the home graduate unit and the collaborative specialization (CS).
- Applicants must apply to and be admitted to both the CS and a participating research-stream master's degree program.
- Applicants must be supervised by a core faculty member of the CS.

Completion Requirements

- Students must meet the degree requirements of the School of Graduate Studies, the participating home graduate program, and the CS.
- The student's thesis in their home graduate program must be in the area of robotics.
- The plan of study will include **at least 0.5 full-course equivalent (FCE)**:
 - Courses will be offered through the CS and participating graduate units. Students must take one half course recognized by the CS to total 0.5 FCE.
 - Students must complete ROB1830Y *Robotics Seminar Series* in addition to their home program requirement; it is offered through the University of Toronto Institute for Aerospace Studies.

Robotics: Doctoral Level

Minimum Admission Requirements

- Applicants must meet the admission requirements of both the home graduate unit and the collaborative specialization (CS).
- Applicants must apply to and be admitted to both the CS and a participating doctoral degree program.
- Applicants must be supervised by a core faculty member of the CS.
- Students who have completed the CS at the master's level are not eligible to take it during their PhD program.

Completion Requirements

- Students must meet the degree requirements of the School of Graduate Studies, the participating home graduate program, and the CS.
- The student's thesis in their home graduate program must be in the area of robotics.
- The plan of study will include **at least 0.5 full-course equivalent (FCE)**:
 - Courses will be offered through the CS and participating graduate units. Students must complete one half course recognized by the CS to total 0.5 FCE.

- Students must complete ROB1830Y *Robotics Seminar Series* in addition to their home program requirement; it is offered through the University of Toronto Institute for Aerospace Studies.

Robotics: Courses

Required Course

Course Code	Course Title
ROB1830Y	Robotics Seminar Series

Elective Courses

Group 1: Planning and Control

Course Code	Course Title
AER1516H	Robot Motion Planning
AER1517H	Control for Robotics
ECE557H1	Linear Control Theory
ECE1635H	Special Topics in Control I
ECE1636H	Control of Discrete-Event Systems I
ECE1647H	Introduction to Nonlinear Control Systems
ECE1653H	Hybrid Systems and Control Applications
ECE1657H	Game Theory and Evolutionary Games
MIE1064H	Control Analysis Methods with Applications to Robotics

Group 2: Perception and Learning

Course Code	Course Title
AER1513H	State Estimation for Aerospace Vehicles
AER1515H	Perception for Robotics
CSC2503H	Foundations of Computer Vision
CSC2506H	Probabilistic Learning and Reasoning
CSC2515H	Introduction to Machine Learning
CSC2541H	Topics in Machine Learning
CSC2548H	Machine Learning in Computer Vision
ECE516H1	Intelligent Imaging Processing
ECE1511H	Signal Processing

Course Code	Course Title
ECE1512H	Digital Image Processing and Applications
JEB1433H	Medical Imaging
ROB501H1	Computer Vision for Robotics

Group 3: Modelling and Dynamics

Course Code	Course Title
AER506H1	Spacecraft Dynamics and Control
AER1503H	Spacecraft Dynamics and Control II
AER1512H	Multibody Dynamics
JEB1444H	Neural Engineering
MIE1001H	Advanced Dynamics

Group 4: Systems Design and Integration

Course Code	Course Title
AER525H1	Robotics
AER1216H	Fundamentals of Unmanned Aerial Vehicles
AER1217H	Development of Autonomous Unmanned Aerial Systems
CSC2621H	Topics in Robotics
MIE505H1	Micro/Nano Robotics
MIE506H1	MEMS Design and Microfabrication
MIE1070H	Intelligent Robots for Society
MIE1075H	AI Applications in Robotics
MIE1076H	AI Applications in Robotics II
MIE1080H	Introduction to Healthcare Robotics
MIE1809H	Advanced Mechatronics
REH2000H	Individual Reading and Research Course
ROB521H1	Mobile Robotics and Perception
ROB1514H	Mobile Robotics

Sexual Diversity Studies

Sexual Diversity Studies: Introduction

Lead Faculty of the Collaborative Specialization

Arts and Science

Participating Degree Programs

Adult Education and Community Development — MA, MEd, PhD
 Anthropology — MA, MSc, PhD
 Art History — MA, PhD
 Cinema Studies — MA
 Classics — MA, PhD
 Comparative Literature — MA, PhD
 Counselling and Clinical Psychology — MA, PhD
 Counselling Psychology — MEd, EdD
 Criminology and Sociolegal Studies — MA, PhD
 Curriculum and Pedagogy — MA, MEd, PhD
 Drama, Theatre and Performance Studies — MA, PhD
 East Asian Studies — MA, PhD
 Educational Leadership and Policy — MA, MEd, EdD, PhD
 English — MA, PhD
 French Language and Literature — MA, PhD
 Geography — MA, PhD
 Higher Education — MA, MEd, EdD, PhD
 History — MA, PhD
 History and Philosophy of Science and Technology — MA, PhD
 Immunology — PhD
 Information — MI, PhD
 Italian Studies — MA, PhD
 Kinesiology — MSc, PhD
 Law — LL.M., MSL, SJD
 Linguistics — MA, PhD
 Medieval Studies — MA, PhD
 Museum Studies — MMS
 Music — MA, PhD
 Near and Middle Eastern Civilizations — MA, PhD
 Philosophy — MA, PhD
 Political Science — MA, PhD
 Psychology — MA, PhD
 Public Health Sciences — MPH, MSc, PhD
 Public Policy — MPP
 Religion — MA, PhD
 Slavic Languages and Literatures — MA, PhD
 Social Justice Education — MA, MEd, EdD, PhD
 Social Work — MSW, PhD
 Sociology — MA, PhD
 Sustainability Management — MScSM
 Visual Studies — MVS
 Women and Gender Studies — MA, PhD

Supporting Unit

Mark S. Bonham Centre for Sexual Diversity Studies

Overview

The interdisciplinary Collaborative Specialization (CS) in Sexual Diversity Studies (SDS), offered by the Mark S. Bonham Centre for Sexual Diversity Studies, is designed to bring together students from a variety of academic fields based on their common research interests in queer, trans, and sexuality studies. The CS provides students with the analytical competencies needed to pursue sexuality studies research through an intersectional lens by fostering critical conversations and analyses of queer, trans, and gender non-conforming lived experience at the intersections of race, class, gender, empire, migration, disability, citizenship status, and the legacies of settler colonialism. During their time in the CS, SDS students gain a distinctive approach to the materials of their home subject and become part of a diverse community of scholars through public lectures, student-focused workshops, and intellectual exchange among members of the Bonham Centre.

The graduate degree programs listed above participate in the CS. From their home graduate units, students take up questions from their own disciplinary or programmatic perspective and explore it through the theoretical and methodological lens of queer, trans, and sexuality studies. Upon successful completion of the degree requirements of the participating home graduate unit and the CS, students will receive the notation "Completed Collaborative Specialization in Sexual Diversity Studies" on their transcript.

Contact and Address

Web: sds.utoronto.ca
 Email: sexual.diversity@utoronto.ca
 Telephone: (416) 978-6276 for general inquiries
 Fax: (416) 971-2027

Director, Sexual Diversity Studies Collaborative Specialization
 Mark S. Bonham Centre for Sexual Diversity Studies
 University of Toronto
 Room 251, University College
 15 King's College Circle
 Toronto, Ontario M5S 3H7
 Canada

Sexual Diversity Studies: Master's Level

Minimum Admission Requirements

- Each graduate student in the collaborative specialization shall be enrolled in a participating degree program in the graduate unit where the research is conducted, which is known as the home graduate unit. The student shall meet the admission requirements of both the home graduate unit and the collaborative specialization.

Completion Requirements

- Students must meet all respective degree requirements of the School of Graduate Studies and the participating graduate unit, and meet the requirements of the collaborative specialization as follows:

- 0.5 full-course equivalent (FCE) core course in Sexual Diversity Studies (SDS1000H)
- 0.5 FCE in other courses with substantial treatment of sexual diversity
- thesis or major research paper (if applicable) must be on a sexual diversity studies topic.
- Courses may be counted towards the 0.5 FCE beyond the core course if a significant portion of the course addresses questions related to sexuality, or if most of the session work completed in association with it explores such questions.
- All course selection for the additional 0.5 FCE must be approved by the collaborative specialization director.

Sexual Diversity Studies: Courses

Course Code	Course Title
SDS1000H	Theoretical and Methodological Issues in Sexual Diversity Studies
SDS1999H	Special Topics in Sexuality

Sexual Diversity Studies: Doctoral Level

Minimum Admission Requirements

- Each graduate student in the collaborative specialization shall be enrolled in a participating degree program in the graduate unit where the research is conducted, which is known as the home graduate unit. The student shall meet the admission requirements of both the home graduate unit and the collaborative specialization.

Completion Requirements

- Students must meet all respective degree requirements of the School of Graduate Studies and the participating graduate unit; and meet the requirements of the collaborative specialization as follows:
 - 0.5 FCE core course in Sexual Diversity Studies (SDS1000H)
 - 0.5 FCE in other courses with substantial treatment of sexual diversity
 - thesis or major research paper (if applicable) must be on a sexual diversity studies topic.
- Doctoral students in the program who have completed the collaborative specialization at the master's level will not be required to repeat SDS1000H. All course selection for the additional 0.5 FCE must be approved by the collaborative specialization director.
- The doctoral thesis committee should include at least one faculty member associated with Sexual Diversity Studies. In most cases, the supervisor would be associated with Sexual Diversity Studies, though in some cases, the student's particular analytical perspective will suggest another faculty member in her or his discipline.
- The student's course of study and overall progress will be reviewed annually by the collaborative specialization director, though ultimate responsibility for the student's progress will remain with the graduate chair of the home program.

South Asian Studies

South Asian Studies: Introduction

Lead Faculty of the Collaborative Specialization

Arts and Science

Participating Degree Programs

Anthropology — MA, MSc, PhD
 Comparative Literature — MA, PhD
 Drama, Theatre and Performance Studies — MA, PhD
 East Asian Studies — MA, PhD
 English — MA, PhD
 Geography — MA, PhD
 History — MA, PhD
 Music — MA, PhD
 Political Science — PhD
 Religion — MA, PhD
 Social Justice Education — MA, MEd, EdD, PhD
 Women and Gender Studies — MA, PhD

Overview

The interdisciplinary Collaborative Master's and Doctoral Specialization in South Asian Studies is designed for students who wish to acquire a nuanced understanding of South Asia as a secondary area of specialization while pursuing graduate studies in another discipline. The focus of South Asian Studies is necessarily broad in that it provides students with an understanding of ancient and modern history, social change, economic development, contemporary politics, religious traditions, literary culture, and a spectrum of related topics.

The Centre for South Asian Studies, which administers the collaborative specialization, provides a nucleus for the participation of South Asian Studies scholars from across the University. Students will benefit from the physical presence of the centre and its regular activities of research fora, conferences, and visiting lecturer and scholar programs. In addition, the University's library collection in South Asian studies is the largest in Canada.

Master's and doctoral students wishing to be admitted to the collaborative specialization must apply to one of the participating graduate programs.

Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in South Asian Studies" on their transcript.

Contact and Address

Web: munkschool.utoronto.ca/ai/collaborative-masters-specialization-south-asian-studies
 Email: ai.asianstudies@utoronto.ca
 Telephone: (416) 946-8832
 Fax: (416) 946-8838

Collaborative Master's and Doctoral Specialization in South Asian Studies
 Asian Institute, Munk School of Global Affairs and Public Policy
 University of Toronto
 Room 228N, 1 Devonshire Place
 Toronto, Ontario M5S 3K7
 Canada

South Asian Studies: Master's Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units. Applicants must meet the admission requirements of the graduate unit in which they intend to enrol. Admission will be subject to the approval of the graduate unit concerned and the collaborative specialization committee.

Completion Requirements

- A mandatory half-year core course, SAS2004H *Issues in South Asian Studies*, taught by the core faculty. The core course will be the same for both master's and doctoral students. Master's students who proceed to the doctoral program will not be required to take the core course again. With the permission of the home graduate unit, the core course can be taken in lieu of one of the courses required by the home unit.
- Attendance at a minimum of two lectures per session from the lecture series organized by the Centre for South Asian Studies during the academic year in which the student takes the core course (September to May).
- If writing a thesis, it is expected to include a significant South Asian component.
- For master's students writing a research paper, the home unit will determine whether a South Asian component is required in the research paper.
- For master's students writing a thesis and master's students writing a research paper, language requirements will be assessed on a case-by-case basis.

South Asian Studies: Doctoral Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units. Applicants must meet the admission requirements of the graduate unit in which they intend to enrol. Admission will be subject to the approval of the graduate unit concerned and the collaborative specialization committee.

Course Code	Course Title
SAS2000Y	Directed Reading in South Asian Studies
SAS4900H	Special Topics in South Asian Studies

Completion Requirements

- A mandatory half-year core course, SAS2004H *Issues in South Asian Studies*, taught by the core faculty (unless already taken in the master's program). With the permission of the home graduate unit, the core course can be taken in lieu of one of the courses required by the home unit.
- Attendance at a minimum of two lectures per session from the lecture series organized by the Centre for South Asian Studies (CSAS) for a total of two years, including the academic year in which the student takes the core course (September to May).
- Submission of two short articles responding to CSAS events (one per year during the two years of attendance at the CSAS lecture series), to be submitted to the collaborative specialization administrator for review by the collaborative specialization director and potentially shared online.
- The thesis to include a significant South Asian component.
- A research presentation to the collaborative specialization committee on a South Asian topic in Year 3 or Year 4.
- Language requirement, depending on the student's area of specialization.

South Asian Studies: Courses

Core Course

Course Code	Course Title
SAS2004H	Issues in South Asian Studies

Elective Courses

Course Code	Course Title
SAS2000H	Directed Reading in South Asian Studies

Toxicology

Toxicology: Introduction

Lead Faculty of the Collaborative Specialization

Medicine

Participating Degree Programs

Laboratory Medicine and Pathobiology — MSc, PhD
 Medical Science — MSc, PhD
 Nutritional Sciences — MSc, PhD
 Pharmaceutical Sciences — MSc, PhD
 Pharmacology — MSc, PhD

Overview

The Collaborative Specialization in Toxicology provides graduate students with a unique opportunity to gain breadth and depth of knowledge in toxicology beyond their thesis research area. This collaborative specialization aims to prepare participants for careers related to toxicology. It emphasizes the development of critical thinking and effective communication skills in addition to acquiring greater knowledge of basic principles and specific aspects of toxicology.

The graduate programs listed above participate in this collaborative specialization. Students may pursue an MSc or PhD degree. Graduate units participating in the program contribute graduate courses, provide facilities, and provide supervision for graduate research.

Graduate students from units other than the participating units listed who are interested in pursuing a program in toxicology should speak to the Director of the Collaborative Specialization in Toxicology and the graduate advisor(s) in their home graduate unit to discuss the possibility. Detailed information is available on the Toxicology website and from the Department of Pharmacology and Toxicology.

Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Toxicology" on their transcript.

Contact and Address

Web: pharmtox.utoronto.ca/collaborative-specialization-toxicology
 Email: pharmtox.dept@utoronto.ca
 Telephone: (416) 978-3851

Collaborative Specialization in Toxicology
 Department of Pharmacology and Toxicology
 University of Toronto

777 Bay Street, Suite 945
 Toronto, Ontario M5G 2C8 Canada

Toxicology: Master's Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must first apply to and be admitted by one of the participating home graduate units under its regulations. Once students have been admitted to their home graduate unit, they should register in the Collaborative Specialization in Toxicology by contacting the collaborative specialization director.

Completion Requirements

- Students must complete JNP1016H *Graduate Seminar in Toxicology*.
- Students may be required to take JNP1019H *Biomedical Toxicology* and JNP1020H *Interdisciplinary Toxicology* if they have not previously completed coursework in advanced toxicology.
- Students must attend a minimum of six academic seminars related to toxicology during the master's program.
- Students must complete a research thesis or project as required by the home graduate unit. It is understood that the research topic will be in the area of toxicology.

Toxicology: Doctoral Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must first apply to and be accepted by one of the participating home graduate units under its regulations. Once students have been admitted to their home graduate unit, they should register in the Collaborative Specialization in Toxicology by contacting the collaborative specialization director.

Completion Requirements

- Students must complete JNP1016H *Graduate Seminar in Toxicology*, plus a 0.5 full-course equivalent (FCE) in the area of toxicology (approved by the collaborative specialization director). The home unit and the collaborative specialization director will decide whether these courses are in addition to, or substitutions for, requirements of the home graduate unit.
- Students may be required to take JNP1019H *Biomedical Toxicology* and JNP1020H *Interdisciplinary Toxicology* if they have not previously completed coursework in advanced toxicology.
- Students must attend a minimum of 12 academic seminars related to toxicology during the doctoral specialization.

- Students must complete a research thesis or project as required by the home graduate unit. It is understood that the research topic will be in the area of toxicology.

Toxicology: Courses

Course Code	Course Title
JNP1016H	Graduate Seminar in Toxicology
JNP1019H	Biomedical Toxicology
JNP1020H	Interdisciplinary Toxicology

Women and Gender Studies

Women and Gender Studies: Introduction

Lead Faculty of the Collaborative Specialization

Arts and Science

Participating Degree Programs

Adult Education and Community Development — MA, MEd, PhD
 Anthropology — MA, MSc, PhD
 Cinema Studies — MA
 Classics — MA, PhD
 Comparative Literature — MA, PhD
 Counselling and Clinical Psychology — MA, PhD
 Counselling Psychology — MEd, EdD
 Criminology and Sociolegal Studies — MA, PhD
 Curriculum and Pedagogy — MA, MEd, PhD
 Drama, Theatre and Performance Studies — MA, PhD
 East Asian Studies — MA, PhD
 Educational Leadership and Policy — MA, MEd, EdD, PhD
 English — MA, PhD
 French Language and Literature — MA, PhD
 Geography — MA, MSc, PhD
 Germanic Languages and Literatures — MA
 Germanic Literature, Culture and Theory — PhD
 Health Administration — MHS
 Health Policy, Management and Evaluation — MSc, PhD
 Higher Education — MA, MEd, EdD, PhD
 History — MA, PhD
 Information — MI, PhD
 Kinesiology — MSc, PhD
 Language and Literacies Education — MA, MEd, PhD
 Law — LL.M., SJD
 Medieval Studies — MA, PhD
 Near and Middle Eastern Civilizations — MA, PhD
 Philosophy — MA, PhD
 Planning — MScPl, PhD
 Political Science — MA, PhD
 Public Health Sciences — MPH, PhD
 Religion — MA, PhD
 Social Justice Education — MA, MEd, EdD, PhD
 Social Work — MSW, PhD
 Sociology — MA, PhD
 Spanish — MA, PhD

Overview

The Graduate Collaborative Specialization in Women and Gender Studies (CWGS) provides students with an opportunity for advanced feminist studies in concert with an MA or PhD degree in another discipline. The Collaborative Specialization offers a rich interdisciplinary environment in which to grapple with how gender and sexuality are entangled with questions of race, citizenship, embodiment, colonialism, nation, global capitalism, violence, political economy, cultural formations, aesthetics, and other pressing concerns.

The graduate programs listed above participate in the Collaborative Specialization in Women and Gender Studies at the University of Toronto. The collaborating units contribute courses and provide facilities and supervision for graduate research. The collaborative specialization is administered by the Women and Gender Studies Institute (WGSi), bringing together 34 graduate programs, more than 100 courses, and more than 100 graduate faculty members. Core faculty members bring transnational feminist commitments to the study of diverse sites and their interconnection with particular focus on Canada, the Caribbean, Africa, the Middle East, South Asia, East Asia, and the United States.

Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Women and Gender Studies" on their transcript.

Contact and Address

Web: www.wgsi.utoronto.ca/graduate/collaborative-program
 Email: wgsi.programs@utoronto.ca
 Telephone: (416) 978-3668
 Fax: (416) 946-5561

Graduate Collaborative Specialization in Women and Gender Studies
 Women and Gender Studies Institute
 University of Toronto,
 Wilson Hall, New College
 40 Willcocks Street, Room 2035,
 Toronto, Ontario M5S 1C6 Canada

Women and Gender Studies: Master's Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units. Applicants must fulfil all the degree requirements in the home graduate unit.
- Applicants to the collaborative specialization should have a substantial undergraduate background in gender and feminist studies or an equivalent focus within a discipline. In exceptional cases, extensive work or activist experience which also requires academic knowledge of research on women and/or gender will also be considered.
- In order to be considered for the collaborative specialization, applicants must submit a two-page, tailored letter of intent focusing on work in women and gender studies. This letter should be addressed to the Admissions Committee for the Collaborative Specialization in Women and Gender Studies. Please note that this letter is separate and distinct from any letters submitted to the home graduate unit. In this letter, students must demonstrate their background and knowledge of the field. The collaborative specialization will only accept students who are able to demonstrate strength in the field of women and gender studies. The application deadline is May 31, 2025.

- Two letters of reference outlining the applicant's background in women and gender studies.

Completion Requirements

- The course of study should be planned in consultation with the CWGS graduate coordinator as well as the coordinator of graduate studies in the student's home graduate unit.
- Courses should be selected from the established cross-listed courses or approved by the graduate coordinator of the collaborative specialization.

Non-thesis Master's

- WGS5000H *Feminist Theories, Histories, Movements I*.
- 0.5 full-course equivalent (FCE) of cross-listed or approved courses with a focus on women/gender/feminist/sexuality/critical race/postcolonial studies.
- Regular attendance at the WGS Research Seminar (WGS2000H).

Thesis Master's

- WGS5000H *Feminist Theories, Histories, Movements I*.
- 0.5 FCE of cross-listed or approved courses with a focus on women/gender/feminist/sexuality/critical race/postcolonial studies.
- Regular attendance at the WGS Research Seminar (WGS2000H).
- The thesis, or major paper, dealing with a subject in the area of women and gender studies.
- Theses will be supervised and evaluated in the same manner as those in the home graduate unit. Normally, at least one cross-listed or core graduate faculty member of WGSI will be a member of the thesis or supervisory committee of collaborative specialization students.

gender studies. This letter should be addressed to the Admissions Committee for the Collaborative Specialization in Women and Gender Studies. Please note that this letter is separate and distinct from any letters submitted to the home graduate unit. In this letter, students must demonstrate their background and knowledge of the field. The collaborative specialization will only accept students who are able to demonstrate strength in the field of women and gender studies. The application deadline is May 31, 2025.

- Two letters of reference outlining the applicant's background in women and gender studies.

Completion Requirements

- The course of study should be planned in consultation with the CWGS graduate coordinator as well as the coordinator of graduate studies in the student's home graduate unit.
- Courses should be selected from the established cross-listed courses approved by the graduate coordinator of the collaborative specialization.
- A required 0.5 full-course equivalent (FCE selected from WGS5000H *Feminist Theories, Histories, Movements I* or WGS5001H *Feminist Theories, Histories, Movements II*.
- Any other 0.5 FCE course in women and gender studies.
- 1.0 FCE of cross-listed or approved courses with a focus on women/gender/feminist/sexuality/critical race/postcolonial studies.
- Regularly participate in the WGS Research Seminar (WGS2000H).
- Students are required to present their work in the seminar at least once before graduating.
- Doctoral thesis dealing with a subject in the area of women and gender studies. Theses will be supervised and evaluated in the same manner as those in the home graduate unit. Normally, at least one cross-listed or core graduate faculty member with WGSI will be a member of the thesis or supervisory committee of collaborative specialization students.

Women and Gender Studies: Doctoral Level

Minimum Admission Requirements

- Applicants who wish to enrol in the collaborative specialization must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units. Students must fulfil all the degree requirements in the home graduate unit.
- Applicants to the collaborative specialization should have a substantial undergraduate or graduate background in gender and feminist studies or an equivalent focus within a discipline. In exceptional cases, extensive work or activist experience which also requires academic knowledge of research on women and/or gender will also be considered.
- In order to be considered for the collaborative specialization, applicants must submit a two-page, tailored letter of intent focusing on work in women and

Women and Gender Studies: Courses

Core Courses

Course Code	Course Title
WGS5000H	Feminist Theories, Histories, Movements I
WGS5001H	Feminist Theories, Histories, Movements II

Elective Courses

For courses offered by WGSI and cross-listed by the participating units offered in a particular year, check the collaborative specialization website.

Women's Health

Women's Health: Introduction

Lead Faculty of the Collaborative Specialization

Public Health

Participating Degree Programs

Anthropology — MA, MSc, PhD
 Dentistry — MSc, PhD
 English — MA, PhD
 Health Policy, Management and Evaluation — MSc, PhD
 Immunology — MSc, PhD
 Kinesiology — MSc, PhD
 Medical Science — MSc, PhD
 Nursing Science — MN, PhD
 Nutritional Sciences — MSc, PhD
 Occupational Therapy — MScOT
 Pharmacology — MSc, PhD
 Psychology — MA, PhD
 Public Health Sciences — MPH, PhD
 Rehabilitation Science — MSc, PhD
 Religion — MA, PhD
 Social Work — MSW, PhD
 Women and Gender Studies — MA, PhD

Overview

The Collaborative Graduate Specialization in Women's Health provides interdisciplinary training in women's health research and practice for graduate students at the University of Toronto with the goal of:

- helping students develop shared understandings of the complex interactions of biology and environment, sex and gender;
- providing students with the necessary skill set to undertake and lead interdisciplinary, collaborative health-care research projects; and
- enhancing mutually beneficial relationships among researchers and practitioners of women's health across the University and its affiliated teaching hospitals.

Students must be registered in the School of Graduate Studies through one of the participating graduate units in order to apply to the Collaborative Specialization in Women's Health. Applicants must comply with the admission procedures of that unit. There is no deadline to apply to this collaborative specialization; applications will be reviewed as they are received.

Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Women's Health" on their transcript.

Contact and Address

Web: www.dlsph.utoronto.ca/programs/collaborative-specialization-in-womens-health

Kristen Dileo, Administrator
 Collaborative Specialization in Women's Health
 Email: Kristen.Dileo@wchospital.ca
 Telephone: (416) 323-6100 ext. 2180

Janice Du Mont, Director
 Collaborative Specialization in Women's Health
 c/o Women's College Research Institute, Women's College Hospital
 76 Grenville Street, 6th floor
 Toronto, Ontario M5S 1B2 Canada

Women's Health: Master's Level

Minimum Admission Requirements

- Applicants must be registered with the School of Graduate Studies through an affiliated home graduate unit. Before applying to the Women's Health collaborative specialization, applicants must comply with the admission procedures of their home graduate unit.
- Applicants must submit the following for review by the Executive Committee:
 - a curriculum vitae (CV)
 - a personal statement (via a concise letter no longer than two pages) describing relevant personal and/or professional experiences, a career plan, and motivation in seeking advanced training in women's health.

Completion Requirements

- To successfully complete the collaborative specialization, students must also successfully complete the requirements of their home graduate unit.
- Complete the core course (CHL5109H *Gender and Health*).
- Participate in at least six monthly sessions in the Student Research Seminar Series. Students will be encouraged to build relationships with peers and faculty that cross disciplinary boundaries.
- In instances where home graduate units require a thesis, it is desirable, but not required, that this work be relevant to women's health.

Women's Health: Doctoral Level

Minimum Admission Requirements

- Applicants must be registered with the School of Graduate Studies through an affiliated home graduate unit. Before applying to the Women's Health collaborative specialization, applicants must comply with the admission procedures of their home graduate unit.

- Applicants must submit the following for review by the Executive Committee:
 - a curriculum vitae (CV)
 - a personal statement (via a concise letter no longer than two pages) describing relevant personal and/or professional experiences, a career plan, and motivation in seeking advanced training in women's health.

Completion Requirements

- To successfully complete the collaborative specialization, students must also successfully complete the requirements of their home graduate unit.
- Complete the core course (CHL5109H *Gender and Health*). Doctoral students who have satisfactorily completed the core course during their master's program are not required to repeat the course during their doctoral program.
- Students must participate in at least six monthly sessions in the Student Research Seminar Series and present their completed or in-progress research at a seventh student research seminar. Students will be encouraged to build relationships with peers and faculty that cross disciplinary boundaries.
- In addition to their home graduate unit supervisor, students must also identify a mentor — a faculty member of the collaborative specialization whose own methodologies represent a different approach than that used by the student's primary mentor.
- Devise a research plan that builds interdisciplinary research skills in women's health. The plan is developed with guidance from the graduate supervisor from their home unit and the mentor, who both sign the study/research plan.
- Complete a dissertation on a topic relevant to women's health.

Women's Health: Courses

Core Course

CHL5109H Gender and Health

Workplace Learning and Social Change

Workplace Learning and Social Change: Introduction

Lead Faculty of the Collaborative Specialization

Ontario Institute for Studies in Education (OISE)

Participating Degree Programs

Adult Education and Community Development — MA, MEd, PhD
 Industrial Relations and Human Resources — MIRHR, PhD
 Rehabilitation Science — MSc, PhD
 Social Justice Education — MA, MEd, PhD, EdD
 Women and Gender Studies — MA

Overview

The Collaborative Specialization in Workplace Learning and Social Change is particularly suited to students interested in developing their understanding of work and learning trends in Canada and internationally, with a focus on the relationships between workplace learning and social change. The collaborative specialization has three intellectual objectives:

- to situate workplace learning within broader social trends such as globalization, neoliberalism, and organizational restructuring;
- to allow exploration of the connections between learning as an individual phenomenon and learning as a social/organizational and public policy phenomenon; and
- to highlight the learning strategies that seek to foster social change through greater equality of power, inclusivity, participatory decision-making, and economic democracy.

Applicants to participating programs who are interested in participating in the collaborative specialization must apply to and be accepted by both the graduate unit and the collaborative specialization. For admission, applicants should submit a statement of interest to the collaborative specialization director.

Upon successful completion of the degree requirements of the participating home graduate unit and the collaborative specialization, students will receive the notation "Completed Collaborative Specialization in Workplace Learning and Social Change" on their transcript.

Contact and Address

Web: www.oise.utoronto.ca/lhae/collaborative-specializations/workplace-learning-social-change

Collaborative Specialization in Workplace Learning and Social Change
 The Ontario Institute for Studies in Education
 University of Toronto
 252 Bloor Street West
 Toronto, Ontario M5S 1V6
 Canada

Workplace Learning and Social Change: Master's Level

Minimum Admission Requirements

- Applicants must apply to and be admitted to both the collaborative specialization and a graduate degree program in one of the collaborating graduate units.
- Applicants must submit a statement of interest which includes:
 - relevant personal and/or professional experiences and motivation in seeking training in workplace learning and social change (all applicants)
 - a brief outline of their proposed research project (thesis students)
 - indication of their preference of supervisor, if any (thesis students).

Completion Requirements

- Individual student programs of study must meet the requirements of both the home graduate unit and the collaborative specialization. Normally, the selection of courses to satisfy the collaborative specialization requirements will not extend the program length.
- Course requirements are as follows:
 - 0.5 core full-course equivalent (FCE) — WPL1131H *Introduction to Workplace Learning and Social Change*
 - 0.5 elective FCE in the area of workplace learning and social change.
- In addition, students in a thesis-based MA program will be required to complete a thesis which incorporates issues of workplace learning and social change. A member of the collaborative specialization core faculty will serve as supervisor or committee member.
- Course-only MEd students will be required to complete an additional 0.5 elective FCE in the area of workplace learning and social change.

Workplace Learning and Social Change: Doctoral Level

Minimum Admission Requirements

- Applicants should apply to the collaborating degree program that corresponds most closely to their general background and interests.
- Applicants must submit a statement of interest which includes:

- relevant personal and/or professional experiences and motivation in seeking training in workplace learning and social change (all applicants)
- a brief outline of their proposed research project
- indication of their preference of supervisor, if any.

Completion Requirements

Doctor of Education

Offered to students in the Social Justice Education program only.

- Individual student programs of study must meet the requirements of both the home graduate unit and the collaborative specialization. Normally, the selection of courses to satisfy the collaborative specialization requirements will not extend the program length.
- Course requirements are as follows:
 - 0.5 core full-course equivalent (FCE) — WPL3931H *Advanced Studies in Workplace Learning and Social Change*
 - 0.5 elective FCE in the area of workplace learning and social change.
- In addition, students will be required to complete a thesis which incorporates issues of workplace learning and social change. A member of the collaborative specialization core faculty will serve as supervisor or committee member.

Doctor of Philosophy

- Individual student programs of study must meet the requirements of both the home graduate unit and the collaborative specialization. Normally, the selection of courses to satisfy the collaborative specialization requirements will not extend the program length.
- Course requirements are as follows:
 - 0.5 core full-course equivalent (FCE) — WPL3931H *Advanced Studies in Workplace Learning and Social Change*
 - 0.5 elective FCE in the area of workplace learning and social change.
- In addition, students will be required to complete a thesis which incorporates issues of workplace learning and social change. A member of the collaborative specialization core faculty will serve as supervisor or committee member.

Workplace Learning and Social Change: Courses

Not all elective courses are offered each year.

Master's-Level Core Course

Course Code	Course Title
WPL1131H	Introduction to Workplace Learning and Social Change

Master's-Level Electives

The list of electives is subject to change.

Course Code	Course Title
IRE1362H	Organizational Behaviour
IRE1611H	Sociology of Work and Organizations
IRE1615H	Labour and Globalization
IRE1620H	Labour Relations Problems in Historical Perspective
LHA1113H	Gender and Race at Work
LHA1115H	Learning for the Global Economy
LHA1119H	Creating a Learning Organization
LHA1146H	Women, War, and Learning
LHA1147H	Migration, Resettlement, and Learning
LHA1148H	Introduction to Workplace, Organizational, and Economic Democracy
LHA1150H	Critical Perspectives on Organizational Change
LHA1182H	Nonprofits, Co-operatives, and the Social Economy: An Overview
LHA1195H	Technology @ Work: The Internet in Workplace Learning and Change
LHA5100H*	Special Topics in Adult Education and Community Development (Master's Level)*
LHA5800H*	Special Topics in Higher Education: Master's Level*
SJE3916H	Women in Leadership Positions: Intersectionalities and Leadership Practices: Sociological Implications in Education
SJE5000H*	Special Topics in Social Justice Research in Education: Master's Level*
WGS426H1 / WGS1020H*	Gender and Globalization: Transnational Perspectives
WPL3930H	Practitioner Communities in Workplace Learning

***Special topics courses: Only the special topics course titles listed can be counted toward the WLSC specialization requirements in the current year. Please confirm current year courses with the WLSC administrator.**

Doctoral-Level Core Course

Course Code	Course Title
WPL3931H	Advanced Studies in Workplace Learning and Social Change

Doctoral-Level Electives

The list of electives is subject to change. Doctoral students can select an elective course from the list above **or** take one of the following to meet their elective requirement:

Course Code	Course Title
LHA1108H	Adult Learning
LHA3183H	Introduction to Institutional Ethnography (RM)
LHA5105H	Special Topics in Adult Education and Community Development: Master's Level
LHA6100H*	Special Topics in Adult Education and Community Development: Doctoral Level*
WPL3930H	Practitioner Communities in Workplace Learning

***Special topics courses: Only the special topics course titles listed can be counted toward the WLSC specialization requirements in the current year. Please confirm current year courses with the WLSC administrator.**