

SCHOOL OF GRADUATE STUDIES

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www.mun.ca/sgs/contacts/sgscontacts.php

Associate Vice-President (Academic) and Dean of Graduate Studies

Surprenant, A.M., B.A. *New York*, M.S., Ph.D. *Yale*; Professor, Department of Psychology

For an up-to-date listing of personnel and graduate officers see www.mun.ca/sgs/contacts/sgscontacts.php.

1 The Memorial University of Newfoundland Code

The attention of all members of the University community is drawn to the section of the University Calendar titled **The Memorial University of Newfoundland Code**, which articulates the University's commitment to maintaining the highest standards of academic integrity.

2 Student Code of Conduct

Memorial University of Newfoundland expects that students will conduct themselves in compliance with University Regulations and Policies, Departmental Policies, and Federal, Provincial and Municipal laws, as well as codes of ethics that govern students who are members of regulated professions. The *Student Code of Conduct* outlines the behaviors which the University considers to be non-academic misconduct offences, and the range of remedies and/or penalties which may be imposed. Academic misconduct is outlined under **General Regulations - Academic Misconduct** in the University Calendar.

For more information about the *Student Code of Conduct*, see www.mun.ca/student.

3 General Information and Regulations Governing All Graduate Students

3.1 School Description

Memorial University of Newfoundland's School of Graduate Studies (SGS) is home to over 3,500 graduate students enrolled in over 100 graduate diploma, and master's and doctoral degree programs.

The School is a central agency responsible for the collection, maintenance, and distribution of materials on graduate students. It maintains graduate files and administers graduate applications, admissions, comprehensive examinations, thesis examinations, and doctoral defences. SGS is also responsible for registrarial functions, graduate enrolment management, and recruitment, and administers graduate student funding including assistantships, external and internal scholarships, baseline fellowships, supervisor support, and Tricouncil global payments.

The School assists academic units in developing new program proposals and administers their approval. Through its Academic Council, SGS also provides a forum for representatives from all faculties, schools, and the Graduate Students' Union to discuss matters pertaining to graduate education. The Council ensures maintenance of standards across all graduate programs by considering policies relating to graduate studies, approving regulation changes and appeals, receiving reports from standing and ad hoc committees, and making recommendations on matters affecting graduate studies.

Additional information regarding the School of Graduate Studies is available at www.mun.ca/sgs.

Students must meet all regulations of the School in addition to the **General Regulations**, the Degree Regulations and any additional requirements of the appropriate Department.

For information concerning fees and charges, see the Financial and Administrative Services website at www.mun.ca/finance/fees/.

For information concerning scholarships, bursaries and awards, see www.mun.ca/scholarships/scholarships.

3.2 Admission

The deadline for admission/readmission to programs offered by the School for the Fall, Winter, or Spring semesters is May 1, September 1, and January 1, respectively. Applications received after this date will be processed as time and resources permit. Graduate application deadlines vary by program. For specific program deadline dates see Application Deadlines. Early applications are encouraged.

3.3 Programs

The following graduate diploma and degree programs are offered by Memorial University of Newfoundland. Interdisciplinary study is encouraged by the University, and prospective applicants should make enquiries about their interests from all the areas of study concerned.

Graduate students may enrol in certain graduate courses with the permission of the instructor and graduate officer of the academic unit offering the course, and the graduate officer of the student's home academic unit. For more information visit the School of Graduate Studies website under Graduate Studies, Interdisciplinary graduate courses.

3.3.1 Graduate Diplomas

Business Administration

Graduate Diploma in Business Administration

Education

Graduate Diploma in Education (Educational Leadership Studies)

Graduate Diploma in Education (Reading Development and Instruction)

Graduate Diploma in Post-Secondary Studies (Health Professional Education)

Engineering

Graduate Diploma in Engineering

Fisheries and Marine

Graduate Diploma in Applied Ocean Technology (Ocean Mapping)

Graduate Diploma in Marine Studies (Fisheries Resource Management)

Humanities and Social Sciences

Graduate Diploma in Humanities and Social Sciences

Medicine

Graduate Diploma in Medicine (Clinical Epidemiology)
 Graduate Diploma in Medicine (Community Health)

Nursing

Graduate Diploma in Nursing (Post Master's Nurse Practitioner)

3.3.2 Graduate Degrees

Master of Applied Ocean Technology
 Master of Applied Science
 Master of Applied Psychological Science (Co-operative)
 Master of Applied Statistics
 Master of Arts
 Master of Arts and Education (Education and Francophone Literatures and Cultures)
 Master of Business Administration
 Master of Education
 Master of Employment Relations
 Master of Engineering
 Master of Environmental Science
 Master of Fine Arts
 Master of Gender Studies
 Master of Health Ethics
 Master of Human Kinetics and Recreation
 Master of Management
 Master of Marine Studies
 Master of Maritime Management
 Master of Music
 Master of Occupational Health and Safety
 Master of Philosophy
 Master of Public Health
 Master of Science
 Master of Science in Applied Geomatics
 Master of Science in Boreal Ecosystems and Agricultural Sciences
 Master of Science in Kinesiology
 Master of Science in Management
 Master of Science in Maritime Studies (Safety: The Human Element)
 Master of Science in Medicine
 Master of Science in Nursing
 Master of Science in Pharmacy
 Master of Social Work
 Master of Technology Management
 Doctor of Philosophy
 Doctor of Psychology

3.4 Definition and Explanation of Terms Used in this Calendar**3.4.1 Special/Selected Topics Courses**

Where a block of courses has been approved under a general heading such as selected topics, special areas, directed readings or like heading, each new course offered from that block of courses shall be approved in advance by the Faculty/School Council (or delegated Graduate Studies Committee). To ensure an orderly use of the courses and non-duplication between course numbers, titles and contents, the Council (or Committee) shall require the same quality and type of information as is needed for the approval of a regular course. (*Consult the School of Graduate Studies or Deputy Registrar for administrative procedures.*)

3.4.2 Associate Vice-President (Academic) and Dean of Graduate Studies

In all regulations following, reference to the "Associate Vice-President (Academic)" and the Dean of Graduate Studies, "the Dean" refers specifically to the Dean of Graduate Studies.

3.4.3 Credit Hour

A credit hour is the measure used to reflect the relative weight of a given course towards the fulfilment of appropriate degree, diploma, certificate, major, minor, or other program requirements. Normally, a course has a credit value of 3 credit hours. A weight of one credit hour normally means that the course meets for lectures one hour per week for the duration of a semester or two hours per week for the duration of a session. The number of hours of required instruction, outside of lecture time, such as laboratory instruction, tutorials, etc. may or may not impact on the number of credit hours assigned to a particular course and academic units may recommend to the Senate a greater or lesser whole number of credit hours for a particular course.

3.4.4 Graduate Course

1. A graduate course comprises a unit/units of work in a particular subject normally extending through one semester, the completion of which carries credit toward the fulfilment of the requirements for a postbaccalaureate degree, diploma, or certificate.
2. Accelerated courses are not normally permissible in graduate programs.
3. Courses required as part of a graduate student's program are known as program courses. Tuition for such courses is covered by the semester fee.
4. Courses which are not required as part of a graduate student's program are known as non-program courses. Students registering for such courses will be required to pay the appropriate per-course fee.

3.4.5 Policy Governing the Auditing of Courses

1. In order to audit any course, an individual must receive permission from the instructor in that course, the Supervisor/advisor, and the

administrative Head of the unit in which the course is offered. Matters to be considered shall include class size, impact on students registered for credit, and other factors judged relevant by the academic unit. Permission cannot be given until the number of registrations for credit is known.

2. Individuals auditing courses shall limit their participation to that deemed appropriate by the instructor; auditors are not permitted to write formal examinations, nor to have their work formally assessed.
3. Students who require a testamur of audition may request the same from the instructor of the course. Students will not register for audit courses nor will a record of audit courses appear on students' transcripts.

3.4.6 Semester

A semester means a period of approximately 14 consecutive weeks during which the University is in regular session and in which period there are at least 12 teaching weeks as defined by the Senate. Normally the Fall semester commences in early September, the Winter semester in early January, and the Spring semester in early May.

3.4.7 Academic Year

The academic year is from September 1 of one year to August 31 of the following year.

3.4.8 Graduate Student

1. A graduate student is one who has been admitted to a graduate degree or a graduate diploma program.
2. A full-time graduate student is one who registers as such, devotes full time to the student's academic program and may not commit more than 24 hours a week working time, including teaching assistant or research assistant duties, to matters other than the degree program.
3. A part-time graduate student is one who is registered for the duration of a semester and is not classified as full-time.
4. Graduate students facing extenuating circumstances, including financial need, may be allowed by the Dean to work more than 24 hours a week outside of the degree program and still be deemed a full-time graduate student. Such requests must be made to the Dean of the School of Graduate Studies by the student's supervisor (when applicable) and the Head of the appropriate academic unit, and should include grounds for the request, expected duration of the extra work, and a revised study plan that accounts for the extra work to be undertaken.

3.4.9 Visiting Graduate Student

1. A student who is registered in good standing in a graduate program at another recognized institution who comes to Memorial University of Newfoundland to conduct research under the supervision of Memorial University of Newfoundland faculty members is considered to be a visiting graduate student. In order to obtain access to University resources such a student will be required to register each semester of their visit for GRAD 9900 using a Course Change Form.
2. To be eligible to register, a visiting graduate student must submit an Application for Admission form to the School of Graduate Studies, accompanied by: a) a letter from their home institution verifying graduate student status, and b) a letter from the host faculty member confirming the duration of the visit. The student will then be admitted to the School of Graduate Studies to a "non-degree" program.
3. Visiting graduate students will be exempt from tuition fees. However, all visiting graduate students will be required, as a condition of registration, to purchase health insurance (international students should contact the International Student Advisor, whereas Canadian citizens or permanent residents of Canada should contact the Graduate Students' Union for more information). If a visiting graduate student wishes to register for a course while at Memorial University of Newfoundland, the student must meet the University admission requirements and pay the undergraduate per course fee as indicated at the Financial and Administrative Services website at www.mun.ca/finance/fees/.

Note: A student enrolled in a graduate program at another university who wishes to complete courses at Memorial University of Newfoundland for transfer of credit to the student's home institution is not considered to be a visiting graduate student under this definition. Such students should apply to the Office of the Registrar for admission to the University, and if admitted, will be governed by **GENERAL ACADEMIC REGULATIONS**. Fees will be assessed in accordance with the fee schedule for undergraduate courses as indicated at the Financial and Administrative Services website at www.mun.ca/finance/fees/.

3.4.10 Program

1. A program, whether it comprises courses only, courses and comprehensive examination, or courses, internship, project, thesis research, paper folio is defined for each graduate student in accordance with Departmental and University Regulations. Each program of study is recommended by the appropriate academic unit, and must be approved in writing by the Dean of Graduate Studies before the beginning of the graduate student's second year of study.
2. Responsibility for the administration of the program shall rest with the Dean acting on behalf of the School.

Note: The following general statements concerning admission and Degree requirements should be supplemented by the detailed regulations governing each program.

3.4.11 Collaborative Program Agreements

3.4.11.1 Integrated Pathway Agreements

1. Memorial University of Newfoundland supports the establishment of agreements with partner institutions that may lead to the completion of multiple degree programs through an integrated pathway.
2. Examples of such agreements include but are not exclusive to 3+1+1 and 3+1+2 arrangements whereby an undergraduate degree is awarded by the partner institution and the graduate degree is awarded by Memorial University of Newfoundland.
3. In the 3+1+1 arrangement, a student would complete 3 years of the undergraduate studies at the partner institution, finish the 4th year at Memorial University of Newfoundland, and earn the bachelor's degree at the partner institution. The student would then enroll in and complete a 1-year master's program and earn a master's degree at Memorial University of Newfoundland.
4. In the 3+1+2 arrangement, a student would complete 3 years of undergraduate studies at the partner institution, finish the 4th year at Memorial University of Newfoundland, and earn the bachelor's degree at the partner institution. The student would then enroll in and complete a 2-year master's program and earn a master's degree at Memorial University of Newfoundland.
5. All such agreements must comply with the general regulations governing undergraduate and graduate programs at Memorial University of Newfoundland.

6. Memorial University of Newfoundland's Guidelines for Integrated Pathway Agreements provides details on the method of establishing such an agreement. The Guidelines are available from the School of Graduate Studies.

3.4.11.2 Cotutelle Agreements

1. Memorial University of Newfoundland offers graduate students the opportunity to carry out a joint research project through a cotutelle agreement between Memorial University of Newfoundland and another recognized institution. The student would be expected to participate in research and fulfill degree requirements at both institutions. Students who successfully complete all program requirements would earn doctoral degrees from both institutions. Memorial University of Newfoundland's Guidelines for Cotutelle Agreements, approved by the Academic Council of the School of Graduate Studies, provides information on the details on the method of establishing such an agreement and program. The Guidelines are available from the School of Graduate Studies.
2. Upon successful completion of the program, Memorial University of Newfoundland and the cooperating institution will each issue its own doctoral degree certificate. On the certificate and subsequently on the university transcript, the following notation will be added: "This Ph.D. was awarded within a cotutelle agreement. The student was jointly enrolled at University XYZ and Memorial University of Newfoundland and successfully completed the degree requirements of both institutions."
3. Graduate students interested in this type of program should contact the School of Graduate Studies for further information.

4 General Regulations

4.1 Qualifications for Admission

4.1.1 Graduate Diploma Programs

To be considered for admission to a Graduate Diploma program the minimum requirements will normally be a second-class degree in an appropriate area of study from a university of recognized standing.

A student admitted to a Graduate Diploma program, who has demonstrated to the satisfaction of the appropriate Faculty/School/Department an ability to pursue research at the master's level, may be permitted subsequently to transfer candidature to that of a master's in the affiliated program area and will thereafter be awarded only the master's at the end of the candidature.

4.1.2 Master's Programs

To be considered for admission to a Master's program, the minimum requirements will normally be a second-class degree in an appropriate area of study from a university of recognized standing.

In exceptional cases, and upon the recommendation of the appropriate academic unit, students who apply for admission and do not meet the minimum admission requirements to a Master's program described above may be considered for a qualifying year. Academic units will make recommendations for the qualifying year, including the appropriate courses to take during this period, to the School of Graduate Studies at the time of admission assessment.

4.1.3 Ph.D. and Psy.D. Programs

1. To be considered for admission to a Ph.D. program, the minimum requirements will normally be a Master's degree from a university of recognized standing, in an appropriate area of study. Other students may be considered for admission to a Ph.D. program provided that:
 - a. they have been registered in a Master's program for a minimum of 12 months, and have demonstrated to the satisfaction of the Faculty/School/Department concerned their ability to pursue research at the Doctoral level. Such transfer should take place no later than the 5th semester of the student's Master's program as indicated as indicated at the Financial and Administrative Services website at www.mun.ca/finance/fees/; or
 - b. they hold a Bachelor's Degree with Honours, or equivalent, from a university of recognized standing, and that the Faculty/School/Department is satisfied of the students' ability to pursue research at the Doctoral level.
2. To be considered for admission to the Psy.D. program, the minimum requirements will normally be an undergraduate honours degree in Psychology that includes senior courses as indicated under the **Regulations Governing the Degree of Doctor of Psychology**.

4.1.4 Applicants Not Meeting Qualifications

Only in exceptional circumstances, and only upon the recommendation of the Faculty/School/Department concerned, will the Dean consider applicants who do not meet the requirements outlined in **Qualifications for Admission, Master's Programs, or Ph.D. and Psy.D. Programs**.

4.1.5 English Proficiency Requirements

Since English is the primary language of instruction at this University, all applicants seeking admission to the School of Graduate Studies must possess an adequate knowledge of written and spoken English as a prerequisite to admission. Regardless of country of origin or of citizenship status, applicants will be required to demonstrate proficiency in the English language. This demonstration may take one of the following forms:

1. Successful completion of the equivalent of three years of full-time instruction in an English language secondary institution as recognized by Memorial University of Newfoundland including successful completion of at least two courses in English at the Grade XII (or equivalent) level. Please note that these courses must be other than English as a Second Language (E.S.L.) courses.
2. Successful completion of a baccalaureate degree from a recognized University where English is the language of instruction and from which transfer of credit may be allowed by Memorial University of Newfoundland.
3. Successful completion of a post-graduate degree program at a recognized University where English is the language of instruction and from which transfer of credit may be allowed by Memorial University of Newfoundland.
4. Submission of official results of the Test of English as a Foreign Language (TOEFL) with a paper-based score of 550 (or higher)/computer-based score of 213 (or higher) or Internet-based with a score of 80 (or higher) and the Test of Written English (TWE) with a score of 4 (or higher).
5. Submission of the official results of the Michigan English Test (MET) with a score of 59% (or higher).
6. Submission of the official results of the English Language Testing Service (ELTS) Test with an average band score of 6.5 or higher.

7. Submission of official results of the Canadian Academic English Language (CAEL) Assessment with a minimum score of between 50 and 60 in each of four bands, with at least 2 band scores of 60.
8. Submission of official results of the Canadian Test of English for Scholars and Trainees (CanTEST) with a Band Level 4.5 in the listening comprehension and reading comprehension sub-tests and a score of 4 in writing.
9. Submission of official results of the Pearson Test of English Academic (PTE Academic) with minimum scores of 58 in each of reading, writing, listening, and speaking.
10. Submission of official results of the Memorial University Test of English Language (MUNTEL) with minimum scores of 60 in reading and listening, writing, and speaking.
11. Only in exceptional circumstances and only upon the recommendation of the Department/Faculty/School concerned, will the Dean consider applicants who do not meet one of the requirements listed in 1.-10. above.

4.1.6 Additional Requirements

Particular Departments/Faculties/Schools may require greater strength in English communicative skills than is indicated by the achievement of minimum scores outlined in 4., 5., 6., 7., 8., and 9. above. Any such additional requirements are detailed in the appropriate section of the Calendar.

4.1.7 English Language Requirements Subsequent to Admission

Upon consultation with the appropriate academic unit, students may be required to complete successfully a course of language study designed to bring their English skills, in any or all of listening, speaking, reading, and writing, to a level required for graduate studies. Academic units may recommend additional language study to the Dean at any point in the program. Additionally, admitted graduate students will be able to self-select for and request additional language study by contacting their academic unit.

The course of language study available to graduate students will draw from select courses in Memorial University of Newfoundland's Intensive Bridge Program, including critical analysis and discussion, reading and critical response, and writing for university courses. The timing of courses taken by graduate students requiring further language study will be based on availability of spaces at any given semester.

4.1.8 Foreign Degree Transcripts

Students who have completed undergraduate programs at universities which issue documents in languages other than English or French shall submit notarized English translations of all supporting documentation, including, but not limited to, transcripts, degrees, and diplomas.

4.2 Procedure for Admission

1. Application for admission to graduate studies must be made online to the School of Graduate Studies. The application must be supported by an official transcript of the applicant's university record. If the applicant is a graduate of another university or college, a copy of the Calendar of that institution must be included upon request.
Most graduate programs have September start dates; however, some programs accept students for January and/or May admission. Deadlines for submission of applications can be as early as November for the following September; therefore, applicants should inquire about program start dates and application deadlines of the academic program of interest. Applicants are advised to view www.mun.ca/become/graduate for further information. Non-Canadian applicants should allow four to six months for processing of official documents with Immigration authorities.
2. Admission to graduate studies shall be upon acceptance by the Dean after assessment of the qualifications of the applicant but no applicant will be admitted unless the academic unit of specialization recommends acceptance along with a proposed program of study and a proposed Supervisor or advisor or, where appropriate, a tutor. Successful applicants will be notified by the Dean of Graduate Studies.
3. The applicant may be required to appear for an interview before a final offer of admission is made.
4. It is recommended that the applicant refer to the appropriate section of this Calendar to ascertain if additional testing information or documentation is required when making initial application.
5. The University reserves the right to refuse admission to any applicant.

4.3 Registration

4.3.1 Program Registration

1. All graduate students must be registered in each semester for the graduate program registration appropriate to their discipline (see note) until all academic requirements for the degree have been met, except during periods for which leaves of absence have been granted (see **Leaves of Absence**).
Note: e.g., *Linguistics 9000*, *Chemistry 9000* or, in the case of *Medicine*, *Medicine 9900*.
2. A student registered in a graduate diploma, Master's, Ph.D., or Psy.D. program may not concurrently pursue studies leading to any other degree without the prior approval of the Dean.

4.3.2 Program Withdrawal

Students intending to withdraw from their program must inform the Dean of Graduate Studies in writing. The period of withdrawal from a program without incurring liability for that semester's fees is three weeks after the first day of lectures in the semester in question, as stated in the **University Diary**. Requests received after the end of the regular registration period, and approved, will be charged an administration fee as indicated at the Financial and Administrative Services website at www.mun.ca/finance/fees/.

4.3.3 Course Registration

Note: For interdisciplinary programs, the Head of the academic unit is the Dean or Director of the Faculty/School administering the program.

1. Students will register for courses at the times indicated in the **University Diary**.
2. Students not admitted to a graduate program may enroll in graduate courses with the permission of the Head of the appropriate academic unit.

4.3.4 Changes in Course Registrations

Note: For interdisciplinary programs, the Head of the academic unit is the Dean or Director of the Faculty/School administering the program.

1. Within two weeks following the first day of lectures in any semester, as stated in the **University Diary**, a graduate student may, upon the approval of the appropriate Head of academic unit, add a course or courses to the student's registration for that semester.
2. Within eight weeks after the first day of lectures in any semester, as stated in the **University Diary**, a graduate student may, upon the approval of the appropriate Head of academic unit, drop a course or courses from the student's registration for that semester without prejudice.
3. After the period described in 2. above has expired, and up until the last day of lectures, any student who is prevented from completing a course by illness, bereavement or other acceptable cause, duly authenticated in writing may, upon the recommendation of the Head of the appropriate academic unit, drop that course without academic prejudice.

Note: A course cannot be dropped after the last day of lectures without the approval of the Dean of Graduate Studies.

4.3.5 Period of Study

1. Each student in graduate studies shall spend such time in the program as decided by the academic unit of specialization and approved by the Dean, and be subject to the following minimum residency.
 - a. Except where provided for elsewhere in this calendar, each student for a Master's Degree shall normally spend at least two semesters in residence as a graduate student at this University.
 - b. Except where provided for elsewhere in this calendar, each student for a Ph.D. or Psy.D. shall normally spend at least three semesters in residence as a graduate student at this University.
 - c. To be resident as a graduate student of this university a student must be registered as a graduate student at Memorial University of Newfoundland and participate in a community of learners and instructors (formally or informally) who are joined together by the practices and standards of a profession or an academic discipline. For most students this will involve taking courses or engaging in research while resident on campus. These attributes may, however, be found elsewhere and it is possible therefore that the residency requirement may be satisfied in an off campus location. In such cases the Dean of Graduate Studies must be satisfied that the attributes are met.
 - d. Except where provided for elsewhere in this Calendar, each student for a graduate diploma shall normally spend at least one semester in residence as a graduate student at this University.
2. The maximum period of a graduate program shall be seven years beyond first registration.

4.3.6 Leaves of Absence

4.3.6.1 General

1. A leave of absence is a period of time during which a student is not required to register; no fees are assessed; and the time granted is not counted in the maximum time period permitted for a graduate program (see **Period of Study**).
2. In the event that circumstances prevent a student from pursuing the program, the student may apply to the Dean of Graduate Studies for a leave of absence.
3. A student may normally apply for only one leave of absence during the student's program. The maximum leave of absence shall normally not exceed 12 months.
4. An application for leave will normally be made before the end of the registration period in the first semester for which leave is requested. Requests received after the end of the regular registration period, and approved, will be charged an administration fee as indicated at the Financial and Administrative Services website at www.mun.ca/finance/fees/.

4.3.6.2 Parental

A student may apply for a leave of absence in the case of pregnancy/birth/adoption of a child. (Such leave will be considered separately from 3. above.)

4.4 Program Requirements

Note: Every student shall complete a program of study as recommended by the Head of the academic unit, in consultation with the Supervisory Committee and approved by the Dean of Graduate Studies. See **Procedure For Admission, Clause 2**.

4.4.1 Graduate Diploma and Master's Programs

1. Students should consult the appropriate Department/Faculty/School regulations for information concerning the specific program requirements. Students wishing to take individual courses outside of their program of study must seek approval from the Head of their academic unit prior to registration.
2. Graduate diploma programs shall not normally comprise more than 50% of the master's in the same area.

4.4.2 Ph.D. and Psy.D. Programs

1. Each student is required to pass a comprehensive examination (see **Comprehensive Examinations, Ph.D. and Psy.D. Comprehensive Examination**).
2. Each student shall present a thesis embodying the results of original research.
3. Students should consult the appropriate Department/Faculty/School regulations for information concerning the specific program requirements. Students wishing to take individual courses outside of their program of study must seek approval from the Head of their academic unit prior to registration.
4. Students may pursue a specified part of their research elsewhere provided that prior permission has been obtained from the Dean on the recommendation of the Head of the academic unit in consultation with the Supervisory Committee.

4.4.3 English Writing Requirement

Given the analytical and scholarly demands of study at the graduate level, graduate students are expected to demonstrate an advanced facility with written English in meeting the demands of their course work and, where applicable, in the writing of any end-of-program research report, folio, comprehensive examination, or thesis.

4.4.4 Changes in Programs

Any changes in the student's program of studies must be approved by the Dean of Graduate Studies on the recommendation of the appropriate academic unit.

4.4.5 Research Involving Animals

Animal user training for any graduate student working with live vertebrate animals is mandated by the Canadian Council on Animal Care as a requirement for institutional accreditation. Supervisors are required to add the names of graduate students requiring such training to the relevant Animal Care Committee-approved research protocol by submitting an amendment form. Where a dedicated protocol will be developed for the student's project, a new protocol form must be submitted. Animal Care Committee approval is required in advance of students commencing animal work. Further information may be obtained by contacting acs@mun.ca or by telephone to (709) 777-6620.

4.4.6 Graduate Student Conduct

All graduate students shall adhere to Memorial University's policies and guidelines relating to academic scholarship, integrity, and ethical conduct informing the design, conduct, and reporting of responsible research.

4.4.7 Year of Degree and Departmental Regulations

1. A student completing a graduate degree program in the School of Graduate Studies will follow the degree and Faculty/School/Department regulations in effect in the year in which the student first registers for the current program. However, students may elect to follow regulations introduced subsequent to their initial registration.

Note: *The foregoing notwithstanding, in the case of students who have submitted a thesis/report/folio, or students in a non-thesis program who have taken a comprehensive examination, the option of changing regulations is no longer available.*

2. When there is doubt as to which degree or Departmental regulations may be followed, the Academic Council of the School of Graduate Studies will decide which are the appropriate regulations.
3. Notwithstanding these guidelines, the University may place limits on the time permitted to complete a program under any given set of regulations. In addition, detailed scheduling of courses and/or work periods may be changed as the University deems appropriate or necessary.

4.4.8 Transfer of Course Credits

All such transfers require the approval of the Dean of Graduate Studies, on the recommendation of the Head of the appropriate academic unit.

1. A student who has successfully completed graduate courses at Memorial University of Newfoundland prior to admission to a graduate program may apply to transfer appropriate courses to that program, provided such courses have not been used to satisfy other Degree requirements.
2. A student who has successfully completed graduate courses as part of one graduate program at Memorial University of Newfoundland, and who is subsequently admitted to another program, may apply to transfer appropriate courses to the current program, provided such courses have not been used to satisfy other Degree requirements.
3. A student who has successfully completed graduate courses at another institution recognized by Senate may, on admission to a graduate program at Memorial University of Newfoundland, apply to transfer appropriate courses to the current program, provided such courses have not been used to satisfy other Degree requirements.
4. Students who successfully complete a graduate diploma program may transfer the course credits earned in that program towards a master's degree if these credits meet the requirements of the master's in the affiliated area in which the graduate diploma was granted.
5. In programs requiring a minimum of 12 credit hours or more, transfer of credit hours in graduate courses referred to in 1., 2., and 3. above shall not exceed 30% of the total number of credit hours required. In programs requiring fewer than 12 credit hours, a maximum of 3 credit hours in graduate courses referred to in 1., 2., and 3. above shall be considered eligible for transfer.
6. Graduate courses referred to in 1., 2., 3., and 4. above shall not be considered eligible for transfer if they have been completed more than seven years prior to the date of admission into the current program.

4.5 Provision for Waiver of Regulations

Academic regulations notwithstanding, the University reserves the right in special circumstances, to modify, alter or waive any regulation in its application to individual students where, in the judgement of the appropriate University Officer or Committee, there is sufficient justification for doing so.

1. Waivers of course prerequisites/co-requisites may be granted by the Head of an academic unit.
2. Waivers of Departmental regulations may be granted by the Dean of Graduate Studies on the recommendation of the Head of an academic unit.
3. Requests for waiver of a degree or general regulation must be submitted to the Academic Council of the School of Graduate Studies.

4.6 Appeal of Decisions

4.6.1 General Information

1. Every graduate student has the right to appeal decisions resulting from the application of University regulations.
2. Appeals will be considered in the case of health issues, bereavement, and/or other acceptable cause, duly authenticated.
3. For assistance in the appeals process, a student is advised to consult with the School of Graduate Studies.
4. In preparing an appeal a student may consult advisors or facilitators. Such advisors or facilitators may include an international student advisor, a faculty advisor, a counsellor, a representative from the Memorial University of Newfoundland Graduate Students' Union (GSU), or a faculty member who is familiar with the appeals process and who is willing to undertake the role of student advisor or facilitator.
5. Appeals are made before specific committees that exist at the University to provide an objective review of cases. The appeals process is designed to assist students at critical points in their graduate program and to provide an accessible and transparent

process for students. Refer also to **Routes of Appeal of Academic Regulations** for information concerning where appeals should be directed.

6. The principles of natural justice shall be applied to the appeals processes and decisions. These principles include, but are not limited to, such practices as all parties to the appeal receiving timely and adequate notice, all parties to the appeal having the opportunity to submit arguments and supporting documentation, and all parties to the appeal being made aware of the evidence considered by the committee. No person will sit in judgment on an appeal if that person has been previously involved in a decision-making process related to the matter under appeal or if that person has any conflict of interest, bias, or reasonable apprehension of bias.
7. While the University makes provision for students to appeal decisions made under University regulations, the academic, financial, or other consequences of the appeal process rests with the student.
8. When an appeal is denied, the student will be advised in writing of the reasons for the decision and if there are further steps that can be taken in the appeals process.
9. A student whose appeal is denied by the Appeals Committee of the School of Graduate Studies may appeal to the Senate Committee on Academic Appeals. Academic units whose decisions are overturned by the Appeals Committee of the School of Graduate Studies may appeal to the Senate Committee on Academic Appeals. Decisions of the Senate Committee on Academic Appeals are final and within the University there is no further appeal.
10. Unless the student bringing the appeal requests otherwise, student appeals are heard anonymously by all committees except the Senate Committee on Academic Appeals.

4.6.2 Routes of Appeal of Academic Regulations

1. Normally, the responsibility for making an appeal before the appropriate committee of the University rests with the student.
2. A student who is ineligible to officially register for courses but who wishes to attend classes, laboratories, or other educational activities while an appeal is in progress can do so only with the written permission of the Head of the academic unit concerned. Such permission will not unnecessarily be withheld.
3. A student whose request for waiver of regulations has been denied may direct the appeal as described below.
 - Appeals against decisions of the Head of an academic unit will be made directly to the Dean of Graduate Studies.
 - Appeals against decisions of the Dean may be made to the Appeals Committee, School of Graduate Studies. Letters of appeal should be directed to the Chair of the Appeals Committee, c/o School of Graduate Studies.
 - Appeals against decisions of the Executive Committee of the Academic Council may be made to the Appeals Committee, School of Graduate Studies. Letters of appeal should be directed to the Chair of the Appeals Committee, c/o School of Graduate Studies.
 - Appeals against decisions of the Appeals Committee, School of Graduate Studies, may be made to the Senate Committee on Academic Appeals, c/o Office of the Registrar.

4.6.3 Route for Questioning Grades of Courses and Examinations

1. Appeals cannot be made on the basis of the grades awarded in individual courses, Comprehensive Examinations, or examinations of theses and reports.
2. Notwithstanding the above, and recognizing that the awarding of grades is an academic matter within the purview of experts in a discipline or subject area, a student who wishes to question the award of grades in individual courses is encouraged to consult with the following in the order given:
 - the course instructor
 - the Head of the appropriate academic unit
 - the Dean of the appropriate Faculty/School, Associate Vice-President (Academic) of the Grenfell Campus or Vice-President of the Marine Institute.
3. A student who wishes to question the grade of a Comprehensive Examination, or the examination of a thesis or report, is encouraged to consult with the Dean of Graduate Studies.

4.6.4 Appeals to the School of Graduate Studies

1. All appeals must be made in writing, clearly stating the basis for the appeal, and must be directed to the Dean or the Chair of the Appeals Committee of the School of Graduate Studies in accordance with **Routes of Appeal of Academic Regulations**.
2. In the Letter of Appeal, the student must clearly and fully provide:
 - name,
 - current address and telephone number,
 - Memorial University of Newfoundland e-mail address,
 - student ID number,
 - the decision being appealed,
 - the grounds for the appeal, and
 - the resolution being sought.
3. When providing grounds for the appeal, including health issues, bereavement and/or other acceptable cause, a student must present independent evidence to corroborate statements made in the Letter of Appeal. Preferably, this evidence will come from a professional, such as a health professional, a counsellor, or a professor. However letters from other knowledgeable parties may be acceptable.
4. A student shall include with the letter of appeal any submissions the student wishes to make in support of the appeal.
5. In cases where an appeal is made on health issues, the student must provide an original certificate from a health professional. This should normally be in the form of the Student Health Certificate, available at www.mun.ca/regoff/forms.php. A student should refer to the policy respecting **Information Required for Certificates from Health Professionals** for more complete information.
6. A student claiming bereavement as grounds must provide an obituary notice or death certificate, together with evidence of a close personal relationship between the student and the deceased.
7. Privacy and Confidentiality: The committees to which appeals are made do require substantial information about the reasons for the appeal in order to make their decisions. However, the committees also recognize each student's right to privacy and their

obligations, under the Access to Information and Protection of Privacy Act, to safeguard students' personal information.

4.6.5 Appeals to the Senate Committee on Academic Appeals

1. Appeals shall be initiated by submitting a written Notice of Appeal, c/o Office of the Registrar, containing the following:

When the Notice of Appeal is from a student:

- name,
- current address and telephone number,
- Memorial University of Newfoundland e-mail address,
- student ID number,
- a copy of the decision giving rise to the appeal,
- supporting documentation,
- a description of the matter under appeal,
- the grounds of appeal, and
- the resolution being sought.

When the Notice of Appeal is from an academic unit:

- name of representative of the academic unit,
- Memorial University of Newfoundland e-mail address,
- a copy of the decision giving rise to the appeal,
- supporting documentation,
- a description of the matter under appeal,
- the grounds of appeal, and
- the resolution being sought.

2. The Notice of Appeal should include, in writing, relevant information in support of the appeal.
3. Except with the approval of the Executive Committee of Senate, notices of appeal shall be submitted no later than the last day of classes in the semester following the semester in which the decision under appeal was sent to the student.
4. In accordance with the principles of natural justice, students and academic units are entitled to make an oral presentation.
5. Appeals shall be heard either through written submissions only or through an oral hearing, as requested. No inferences will be drawn from the choice.
6. When appeal is heard by an oral presentation, a student may be accompanied by an advisor (see **Appeal of Decisions, General Information, 4.**). A student may participate in person, by way of teleconference, or by such other means approved in advance by the Committee; however, expenses incurred by the student are the responsibility of the student.
7. When providing the grounds for the appeal, including health issues, bereavement, and/or other acceptable cause, a student must present independent evidence to corroborate statements made in the Notice of Appeal. Preferably, this evidence will come from a professional, such as a health professional, a counsellor, or a professor. However letters from other knowledgeable parties may be acceptable.
8. A student may include with the Notice of Appeal any submissions the student wishes to make in support of the appeal.
9. In cases where an appeal is made on health issues, the student must provide an original certificate from a health professional. This should normally be in the form of the Student Health Certificate, available at www.mun.ca/regoff/forms.php. A student should refer to the policy respecting **Information Required for Certificates from Health Professionals** for more complete information.
10. A student claiming bereavement as grounds must provide an obituary notice or death certificate, together with evidence of a close personal relationship between the student and the deceased.
11. Privacy and Confidentiality: The committees to which appeals are made do require substantial information about the reasons for the appeal in order to make their decisions. However, the committees also recognize each student's right to privacy and their obligations, under the Access to Information and Protection of Privacy Act, to safeguard a student's personal information.
12. Decisions of the Senate Committee on Academic Appeals are final and within the University there is no further appeal.

4.6.6 Information Required for Certificates from Health Professionals

1. A student who requests permission to drop courses, to withdraw from University studies, to have examinations deferred, or to obtain other waivers of University, departmental, or course regulations based on health issues is required by the University to provide, in support of the request, a certificate from a health professional in the form of a note or letter. While not compulsory, this should normally be in the form of the Student Health Certificate, available at www.mun.ca/regoff/forms.php. If a note or letter is provided other than in the form of the Student Health Certificate, the submission must be on letterhead. Such certificates must be sufficiently specific to allow a proper consideration of a student's case. The University requires that all such certificates must be signed by the health professional, must confirm the specific dates on which the student visited the health professional, and should include details on the following:
 - the degree to which the health issue (or treatment, in the case of medication, for example) is likely to have affected the student's ability to study, attend classes, sit examinations, or continue with research;
 - the length of time over which the student's abilities were likely hampered by the condition (e.g., recurring and severe back pain over a two-month period would likely have a more adverse effect on studies than a single episode of back pain requiring bed rest for a week); and
 - the fitness of the student to resume studies (it is in the student's best interest not to return to studies prematurely).
2. The University respects the privacy of students and will keep confidential all such certificates. A student should request that the health professional retain a copy of such a certificate in case the certificate needs to be verified or reissued at a later date.

4.7 Evaluation

Note: For interdisciplinary programs, the Head of the academic unit is the Dean or Director of the Faculty/School administering the program.

4.7.1 Evaluation Methods and Grading

- Students shall write their examinations in graduate courses at a time to be determined by the Head of the academic unit on the recommendation of the Faculty member(s) concerned.
- A written copy of the course outline, including method of evaluation in the course, shall be provided to each student in the course as early as possible, and in any case not later than two weeks after the start of the course.
- The final evaluation submitted to the Registrar shall consist of one of the following letter grades with the appropriate numerical equivalent:

Letter Grades	Numeric Grades	Points Per Credit Hour
A	80-100%	4
B	65-79%	3
C	55-64%	2
D	50-54%	1
F	below 50%	0
PWD (pass with distinction) - indicates excellent performance	no numeric grade	not applicable
PAS (pass) - indicates performance meets expectations	no numeric grade	not applicable
FAL (fail) - indicates failing performance	no numeric grade	not applicable
DR (drop) - drop without academic prejudice	no numeric grade	not applicable
DRF (drop fail) - drop with academic prejudice	0%	0
ABS (absent) - absent for acceptable cause	no numeric grade	not applicable
INC (incomplete) - incomplete pending final grade	no numeric grade	not applicable
REX (re-examination)	no numeric grade	not applicable

- Supplementary examinations are not permitted.

4.7.2 Evaluation of Graduate Students

- Failure to attain a final passing grade of 'A' or 'B' in a program course shall lead to termination of a student's program unless:
 - the regulations for a particular degree allow the student to repeat the course. Only one such repeat will be permitted in a student's program. Failure to obtain a grade of 'A' or 'B' in the repeated course shall lead to termination of the student's program.
 - the Dean of Graduate Studies approves a repeat of the course, upon the recommendation of the Supervisor and the Supervisory Committee supported by the Head of the academic unit, where 1.a. above does not apply. Such recommendations must provide sufficient grounds for a repeat. Only one such repeat will be permitted in a student's program. Failure to obtain a grade of 'A' or 'B' in the repeated course shall lead to termination of the student's program.

Note: In exceptional circumstances, the Dean of Graduate Studies may approve a substitute course in place of the repeat upon the recommendation of the Supervisory Committee and Supervisor supported by the Head of the academic unit. Failure to obtain a grade of 'A' or 'B' in the substituted course shall lead to termination of the student's program.

- Failure in a non-program course will not normally result in termination of a student's program.
- The Supervisor and the Supervisory Committee may recommend that a student be required to withdraw from the program, if after consultation with the student, the student's non-course work is deemed to have fallen below a satisfactory level.
- When Departmental requirements for a degree requires an examination of a student's reading knowledge of a language(s) other than English, the examination shall be set and marked by the appropriate language Department, or by an authority as determined by the Head of the academic unit and Dean. The results of the examination will be transmitted to the student by the Dean.

4.7.3 Deferral of Examinations

- Graduate students who are prevented by illness, bereavement or other acceptable cause, duly authenticated, from writing final examinations may apply, with supporting documents within one week of the original examination date to the appropriate Head of the academic unit to have their examinations deferred.
- The Department's decision, including information on the appeals route open to the student in the case of a negative decision, must be communicated in writing to the student and to the Dean of Graduate Studies within one week of the receipt of the student's complete application.
- In those cases where the Department accepts the extenuating circumstances the student may be permitted to write a deferred examination or, with the consent of both the Department and the student, the grade submitted may be based on term work alone.
- An interim grade of 'ABS' will be assigned by the academic unit in the case of a student granted a deferred examination. This grade will be replaced by the final grade which must be received by the Office of the Registrar within one week following the commencement of classes in the next academic semester or session.
- Students who are prevented by illness or bereavement or other acceptable cause, duly authenticated, from writing a deferred examination, may apply, in writing, with supporting documents within one week of the scheduled date of the deferred examination to the appropriate Department Head to have the examination postponed to a time not later than the last date for examinations in the semester following that in which the student was enrolled in the course.
- The Department's decision, including information on the appeals route open to the student in the case of a negative decision, must be communicated to the Registrar, to the student and to the Dean of Graduate Studies within one week of the receipt of the student's complete application.

4.7.4 Incomplete Grades/Change of Grade

1. For good cause a grade of 'Incomplete' may, with the approval of the appropriate Department or academic unit, be submitted. This 'Incomplete' grade shall, however, be valid only for one week following the commencement of classes in the next academic session as stated in the **University Diary**. In the event that a mark has not been received by the Registrar within the prescribed deadline, the 'Incomplete' grade shall be changed to '0 F'.
2. Clause 1. notwithstanding, for acceptable cause an extension of time not exceeding the end of the semester following that in which the 'Incomplete' was given may be permitted by the Head of the academic unit. "Acceptable cause" in these cases must be duly authenticated and will be illness, bereavement, serious problems of a personal nature or the like.
3. Changes in grades for graduate courses must be submitted on the appropriate form, which must be signed by the course instructor and approved by the Head of the appropriate academic unit who will submit such changes to the Registrar.

Note: *A grade of less than 65% cannot be changed without the approval of the Dean of Graduate Studies.*

4.7.5 Re-Reading of Examination Papers

1. Students may apply to have a final examination paper re-read whether or not they have obtained a passing grade in that course.
2. Students who wish to have a final examination paper re-read must make written application to the Registrar enclosing the appropriate fee per paper within one month of the release by the University of the grade reports. If the mark is raised after re-reading, the fee is refunded. If the mark is unchanged or lowered, the fee is forfeited.

4.8 Comprehensive Examinations

4.8.1 Master's Comprehensive Examination

1. The composition of the Comprehensive Examination Committee is specified in the Degree and Departmental regulations, and the Committee is appointed by the Dean. The Dean of Graduate Studies or delegate may exercise the right to attend in a non-voting capacity. The total number of voting members must be an odd number.
2. In this examination the student must demonstrate an advanced knowledge of the academic discipline as defined by the academic unit in which they are students. Therefore, in order to be eligible to sit the examination, all course requirements must normally be completed.
3. In cases where there are multiple parts to a comprehensive exam, including written and oral parts, a student must satisfy all parts of the examination to obtain a pass. The requirements to advance to a later part of the examination are specified in the Degree and Departmental regulations or by the appropriate academic unit.
4. Members of the Comprehensive Examination Committee shall decide the results of the comprehensive examination as indicated in a.-d. below:
 - a. The category of 'pass' will be awarded to students who demonstrate an acceptable knowledge of their area(s) and requires a simple majority vote.
 - b. The category of 're-examination' selects those students with an understanding of their research area that lacks sufficient depth and scope as indicated by a simple majority of the Comprehensive Examination Committee. Only one such re-examination is possible. If a re-examination is to be held, it must be conducted not less than one month and not more than six months after the first examination. The decision of the voting members of the Committee following this re-examination can only be 'pass' or 'fail' decided by simple majority. Failure will lead to immediate termination of the student's program. There is no option for further re-examination.
 - c. Students awarded a 'fail' are deemed, by unanimous vote of the Comprehensive Examination Committee, to be unable to demonstrate an adequate understanding of their area(s). The student's program is terminated. A simple majority vote will default to the award of 're-examination'.
5. The Chairperson of the Comprehensive Examination Committee shall report to the Head of the academic unit who shall report to the Dean. The result of the comprehensive examination(s) shall be reported to the student by the Dean.

4.8.2 Ph.D. and Psy.D. Comprehensive Examination

1. The student shall submit to a comprehensive examination, which may be written or oral or both as determined by the academic unit. Students shall normally take the examination no later than the end of the seventh semester in the doctoral program. Unless an extension is approved by the Dean of Graduate Studies, failure to take the examination at this time will result in the termination of the student's program.
2. This examination, whether written or oral, shall be conducted by a Committee appointed by the Dean of Graduate Studies on the recommendation of the academic unit. It shall consist of the Head of the academic unit (or delegate) who shall be the Chairperson, the student's Supervisor [or, where a Supervisor has not yet been appointed, the Graduate Officer or Chair of the Graduate Studies (or equivalent) Committee], and at least three other members, the total number of voting members to be an odd number. A non-voting attendee shall be the Dean of Graduate Studies or delegate.
3. In this examination, the student must demonstrate a mastery of those subjects appropriate to the student's area(s), as defined by the academic unit in which the candidate is a student. Therefore, in order to be eligible to sit the examination, all course requirements must normally be completed. The area(s) upon which the student will be examined should be made known to the student no later than three months prior to the examination. The student must further be able to relate the specialization of their research to the larger context of these areas.
4. In cases where there are multiple parts to a comprehensive exam, including written and oral parts, a student must satisfy all parts of the examination to obtain a pass. The requirements to advance to a later part of the examination are specified in the Degree and Departmental regulations or by the appropriate academic unit.
5. Members of the Comprehensive Examination Committee shall decide the results of the comprehensive examination as indicated in a.-d. below:
 - a. The category of 'pass' will be awarded to students who demonstrate an acceptable knowledge of their area(s) and requires a simple majority vote.
 - b. The category of 're-examination' selects those students with an understanding of their research area(s) that lacks sufficient depth and scope as indicated by a simple majority of the Comprehensive Examination Committee. Only one such re-examination is possible. If a re-examination is to be held, it must be conducted not less than one month and not more than six months after the first examination. The decision of the voting members of the Committee following this re-examination can only be 'pass' or 'fail'

decided by simple majority. Failure will lead to immediate termination of the student's program. There is no option for further re-examination.

- c. Students awarded a 'fail' are deemed, by unanimous vote of the Comprehensive Examination Committee, to be unable to demonstrate an adequate understanding of their research area(s). The student's program is terminated. A simple majority vote will default to the award of 're-examination'.
6. The Chairperson of the Comprehensive Examination Committee shall report to the Head of the academic unit who shall report to the Dean. The result of the comprehensive examination(s) shall be reported to the student by the Dean.

4.9 Supervision

4.9.1 Master's Candidates

Each Master's candidate shall be assigned a Supervisor by the Dean, on the recommendation of the Head of the academic unit, or the Dean of the faculty concerned.

4.9.2 Ph.D. and Psy.D. Candidates

1. Each candidate shall be assigned a Supervisor by the Dean, on the recommendation of the Head of the academic unit or the Dean of the faculty concerned.
2. A Supervisory Committee shall be appointed for each candidate by the Dean. The Supervisory Committee shall consist of the Supervisor (co-supervisors) who shall act as Chair, and normally at least two other members. In no circumstances may the Committee membership be fewer than two members. The membership of the Committee shall be nominated by the Head of the Department or the Dean of the faculty concerned, after consultation with the Supervisor and the candidate.
3. The Supervisory Committee shall forward its reports and recommendations to the Dean via the Head of the Department or the Dean of the faculty concerned.
4. The functions of the Supervisory Committee shall be, *inter alia*,
 - a. to decide, in consultation with candidates, the program of study, the subject of research, and the title of the thesis, and to recommend these for approval to the Dean;
 - b. to monitor the candidate's progress in their course programs and their research;
 - c. to report at least annually to the Dean on the candidates' progress and, at the same time, to advise on their continuation in the program; and to make such other reports and recommendations about the candidates to the Dean as it may deem necessary;
 - d. to recommend to the Dean, after consultation with the candidates, necessary changes in the program of study, the subject of research, or the title of the thesis;
 - e. to recommend to the Head of the academic unit or Dean of the faculty the timing of the comprehensive examination;
 - f. to report to the Dean that the thesis is ready for examination by completing a Supervisor Approval Form, which is to accompany the thesis upon its submission to the School of Graduate Studies; and
 - g. to recommend to the Dean suitable persons to act as members of the Thesis Examining Board.

4.9.3 Supervisory Reports

1. At least annually, the Supervisor, Supervisory Committee or the Department shall make evaluations of a student's progress in a program. Recommendations concerning continuation, amendment, or termination (see **Termination of a Graduate Program**) of a candidate's program, are sent to the Dean, who shall take appropriate action. Students shall be advised of the contents of this evaluation and the subsequent recommendation(s).
2. The Supervisor, Supervisory Committee, or the Department shall forward its reports and recommendations to the Dean via the Head of the academic unit or the Dean of the faculty concerned.

4.10 Theses and Reports

4.10.1 Thesis/Report Guide Supplement

The Guidelines for Theses and Reports, available at (www.mun.ca/sgs/go/guid_policies/theses.php), approved by the Academic Council of the School of Graduate Studies, provides the details for the examination process, general form and style of the thesis/report, required forms, number of copies, etc., required under this regulation.

4.10.2 Submission

1. Students must submit the thesis/report at least four months before the University Convocation at which the award of the Degree is expected (see www.mun.ca/convocation for exact date). The School of Graduate Studies does not accept any responsibility for completing the prescribed procedure in time for the nearest Convocation unless theses or reports are submitted by the prescribed dates in any current academic year.
2. A thesis/report may not be submitted until the student has fulfilled:
 - a. All course requirements, if any
 - b. All language requirements, if any
 - c. The comprehensive examination, if required, and
 - d. All other academic requirements of the academic unit concerned.

4.10.3 Evaluation of Master's Theses and Reports

1. Final examiners for the thesis/report will be appointed by the Dean on the recommendation of the academic unit. There will be two examiners for a Master's thesis. Examiners shall normally be those who have completed a graduate degree at the doctoral level, including a thesis, in the discipline or cognate area. Those serving as examiners shall not have been involved in the preparation of the thesis/report.
2. Examination of the thesis/report will result in one of the following recommendations by each examiner. The thesis/report is:
 - a. acceptable without modifications; or

- b. acceptable, modifications are required but the thesis does not have to be re-examined*; or
- c. unacceptable, the thesis/report requires modification and re-examination**; or
- d. totally unacceptable, the thesis/report is failed.***

*Modifications may include corrections of typographical errors and errors in nomenclature, improvement in phrasing, or rewriting of sections of the thesis/report. Modifications may be indicated in the text or listed separately;

**Modifications might include (but are not limited to) the rectification of one or more of the following deficiencies: (1) misinterpretation and/or misuse of the matter covered, omission of relevant materials, unfounded conclusions, illogicality of argument, improper analysis of data and the like, (2) bad writing, (3) unacceptable physical presentation. A detailed list of problems should be included with the report;

***A detailed list of the reason(s) for failure must be included in the report.

- 3. If all examiners recommend that the thesis/report is totally unacceptable, then the thesis will be failed, and shall not be re-examined.
- 4. If an examiner recommends that the thesis/report is unacceptable, and this recommendation is accepted by the Dean, then the student may apply to the Dean for permission to resubmit the thesis for re-examination in one of the following ways:
 - a. to submit a modified thesis/report to the original examiners.
 - b. to submit a modified thesis/report to new examiners.
 - c. to submit the original thesis/report to an Examination Board to be appointed by the Dean.
- 5. If a thesis/report is re-examined, the student will not be awarded a pass unless all examiners find the thesis acceptable.
- 6. Under no circumstances may a thesis/report be re-examined more than once.

4.10.4 Evaluation of Ph.D. and Psy.D. Theses

Students for the Degree of Doctor of Philosophy and the Degree of Doctor of Psychology must submit a written dissertation deemed acceptable by the University, and demonstrate their ability to defend their work in a public oral examination. For this reason, the final decision on whether a student will be recommended for the award of the degree is made only at the conclusion of the oral examination (see **The Examination Process**).

1. Responsibilities of the Thesis Examining Board

The work of each student will be assessed by a Thesis Examining Board. Its first responsibility is to determine whether the thesis successfully demonstrates the student's competence to undertake independent research work. The Board must be satisfied that the work contributes significantly to knowledge in the field of study; that the contribution is of high scholarly merit; that the student is aware of the pertinent published literature; that it is written in a satisfactory style; and that it is free from typographical and other mechanical errors. The second responsibility of the Board is to conduct a final oral examination of the student and to then recommend to the Dean of Graduate Studies whether the student should be awarded the Degree.

2. Composition of the Thesis Examining Board

The members of the Thesis Examining Board will be appointed by the Dean on the recommendation of the Head of the academic unit who will have consulted with the supervisory committee. The Board shall consist of four members. Normally these will be the student's Supervisor (who serves on the Board in a non-voting capacity), two examiners from within the University, and one from outside the University. However, when circumstances warrant, a second external examiner may be substituted for one of the internal examiners with permission of the Dean. Examiners shall normally be those who have completed a graduate degree at the doctoral level, including a thesis, in the discipline or cognate area. Members of the supervisory committee other than the Supervisor are ineligible for appointment to the Board. Those serving as examiners shall not have been involved in the preparation of the thesis/report.

3. The Examination Process

- a. The voting members of the Board shall submit written reports on the thesis containing an assessment of the quality of the written work and a recommendation as to whether the student should be permitted to proceed to an oral examination and defence of the work. An examiner may recommend:
 - i. that the student be allowed to proceed to the oral defence of the thesis*; or
 - ii. that the student not be allowed to proceed to the oral defence at this time**; or
 - iii. that the student should be failed.

*Any suggested corrections or revisions should be outlined in the examiner's report. It is understood that it will be the responsibility of the Supervisory Committee to discuss the suggested changes with the student, to determine which should be incorporated in the thesis before its final submission.

**This recommendation reflects the examiner's opinion that further research, re-analysis of data, or thorough rewriting of the material is required. The thesis may, however, be re-submitted for examination.

- b. If all examiners recommend that the student should be failed, then the thesis shall not be re-examined.
- c. If an examiner recommends that the student not be allowed to proceed to the oral defence, and this recommendation is accepted by the Dean, then the student may apply to the Dean for permission to resubmit the thesis for re-examination in one of the following ways:
 - i. to submit a modified thesis to the original examiners.
 - ii. to submit a modified thesis to new examiners.
 - iii. to submit the original thesis to an Examination Board to be appointed by the Dean.
- d. No student will be permitted to re-submit a thesis more than once. In case of a re-submitted thesis an examiner may recommend only:
 - i. that the student be allowed to proceed to the oral defence of the thesis; or
 - ii. that the student should be failed.
- e. After receiving the reports from all three voting members of the Board the Dean will consider the recommendations and determine whether an oral defence of the thesis will be scheduled.
- f. The Final Oral Examination and Defence of Thesis will take place at a time and place to be determined by the Dean of Graduate Studies and will be chaired by the Dean or delegate. The presence of all members of the Examining Board is normally required.
- g. Following the defence, the Board will meet *in camera* to render a final assessment of the thesis and the student's ability to defend their work. The Board may recommend one of the following outcomes:
 - i. Passed*

- ii. Passed Subject to Conditions**
- iii. Re-examination required***
- iv. Failed****

*This recommendation may have attached to it the requirement that the student complete certain specified revisions to the satisfaction of the Supervisory Committee, the Head of the academic unit and the Dean. These revisions must have been specified in the written appraisal submitted prior to the Oral Examination.

** This recommendation is made only if there are significant flaws in the student's work that come to light during the oral defence. Such flaws must be separate from, or in addition to, anything noted or specified in the written appraisals submitted prior to the oral defence. The flaws must also be of such importance that the main conclusions of the thesis are deemed invalid as a result of their existence. This recommendation must have the details attached and cannot include the option of re-examination.

***The members of the Thesis Examination Board may attach to this recommendation a list of any requirements which they feel are appropriate.

****Re-examination not permitted.

- h. If the members of the Board are unanimous in their recommendation, the Chair of the Examination may accept this recommendation and inform the student of the decision. In any other case, however, the delivering of any final decision shall be deferred pending further consultation within the School of Graduate Studies.
- i. No student shall be permitted more than two Oral Examinations.

4.10.5 Time Limit for Revision

The final version of Master's, Ph.D., and Psy.D. theses/reports found acceptable with or without corrections shall be submitted to the School of Graduate Studies within 6 months of the date on which the thesis/report and the student's examiners' reports are returned to the student's academic unit. If a corrected thesis/report is not submitted within 6 months the student is considered to have withdrawn from the program. After this time, the student must apply to be readmitted.

Master's, Ph.D., and Psy.D. theses/reports requiring re-examination shall be resubmitted to the School of Graduate Studies within 12 months of the date on which the thesis/report and the examiner's reports are returned to the student. Students requiring resubmission and re-examination of theses/reports must maintain their registration during this period. Failure to resubmit the revised thesis/report within 12 months will result in termination of the student's program.

Note: Please refer to **Registration** for regulations governing program registration.

4.10.6 Prepublication

Publication of material before submission of the thesis/report for examination is permitted. The School of Graduate Studies and Supervisor should be informed of such publication.

4.11 Graduation Procedure

Memorial University of Newfoundland confers undergraduate and graduate degrees, diplomas, and certificates three times per year. Regular Convocation ceremonies are held each Spring and Fall to confer degrees upon eligible graduates who completed their programs by the end of the preceding Winter and Spring semesters, respectively. An in-absentia Convocation occurs each Winter to confer degrees, diplomas, and certificates upon eligible graduates who completed their programs by the end of the preceding Fall semester.

Students who are fulfilling, or have fulfilled, all academic requirements (including final submission of a graduate thesis, where applicable) for their programs are strongly encouraged to apply to graduate on the prescribed "Application for Graduation" form. This form may be obtained on-line at the Memorial Self Service at www.mun.ca/regoff/stuweb.htm. The deadlines for application submission are July 15 for Fall (October) convocation, January 3 for Winter (February In-Absentia) convocation, and January 15 for Spring (May) convocation. Applications received after these dates will be processed as time and resources permit. Additional information is available from the Office of the Registrar at www.mun.ca/regoff/graduation. Information regarding Convocation, including the dates of the ceremony, is available at www.mun.ca/convocation.

4.12 Academic Misconduct

4.12.1 Principles

In the course of a graduate degree program a student is expected to adhere to those principles which constitute proper academic conduct. Within the University community there is a collective responsibility to maintain a high level of scholarly integrity. Dishonesty has no place in the academic community. Academic misconduct cannot be condoned or even appear to be condoned. A student has the responsibility to ascertain those actions which could be construed as dishonest or improper. Certain flagrant violations are listed below under **Academic Offences**. A student is reminded that for guidance on proper scholarly behaviour the student should seek assistance from the student's instructors and supervisors. The Graduate Students' Union will provide a student with information on legal rights and the information that advice about acceptable writing standards is available through the Writing Centre.

4.12.2 General Information

1. These procedures shall apply to all academic offences relating to graduate studies involving, but not limited to, those students who either have been or who are enrolled at Memorial University of Newfoundland. Notification of an allegation of academic misconduct will be forwarded to the last known mailing address of the student as noted on the files at the Office of the Registrar, and to the official University email address of the student. The University reserves the right to implement action under these procedures where an allegation has been made against a student but where reasonable efforts to contact the student are unsuccessful.
2. Meetings and interviews stipulated in this regulation will be held in person, or at a distance using telephone or other interactive technologies.
3. A student who wishes to pursue research, or to attend classes, laboratories or other educational activities while an investigation under these procedures is being carried out, can normally do so with the understanding that if the allegation of academic misconduct is proven and the penalty involves either suspension or expulsion, credit will not be granted for work completed prior to a finding of guilt. This provision excludes a student charged with an offence under the *Code of Student Conduct*. For information regarding the *Code of Student Conduct* visit the website at www.mun.ca/student.
4. Although a student can continue in a program of studies, if eligible, while an investigation under these procedures is being carried

out, the University does not accept liability for any consequences to the student's progress. However, the University may take these consequences into account, as appropriate and to the extent feasible, in cases where charges are dropped or the student is not found guilty. The consequences arising from an investigation and any negative decision rendered may include retroactive effects on grades, examination results, or promotion within a program.

5. A student accused of academic misconduct may consult advisors or facilitators. Such advisors may include a representative from the Graduate Students' Union, an international student advisor, a faculty advisor, a University counselor, or a faculty member who is familiar with these Regulations and who is willing to undertake the role of advisor whether resolution is sought through **Procedures for Resolution of Alleged Academic Offences at the Unit Level** or **Procedures for Resolution of Alleged Academic Offences by the School of Graduate Studies**.

4.12.3 General Procedure

1. When a member of the University community (faculty, staff, student) has grounds for belief that an academic offence has been committed there should be an attempt between the parties concerned to resolve allegations of minor offences. If the alleged offence is not deemed to be minor by the accuser, or resolution proves impossible, or one party is dissatisfied with the resolution, the matter shall be reported, without delay, to the Head (or other appropriate officer) of the academic or administrative unit. If resolution is achieved and it is agreed that an academic offence has been committed, then the offence, together with the penalty applied, shall be reported to the Head of the academic or administrative unit.
2. Where resolution is not achieved, and if in the judgment of the Head of the academic or administrative unit, the alleged offence warrants resolution at the unit level, the individuals involved will be advised to attempt to resolve the matter through **Procedures for Resolution of Alleged Academic Offences at the Unit Level**. In the event that no resolution is possible through these procedures between the individual parties, the Head of the academic or administrative unit will institute proceedings through the School of Graduate Studies.
3. If, in the judgment of the Head of the academic or administrative unit, the alleged offence against University regulations is such as to warrant resolution through the School of Graduate Studies, the Head of the academic or administrative unit will refer the matter to the Dean, and **Procedures for Resolution of Alleged Academic Offences by the School of Graduate Studies** will be implemented.
4. Cases involving alleged offences on comprehensive examinations, examination of theses, allegations of impersonation, or allegations of submission of forged documents will be governed by the **Procedures for Resolution of Alleged Academic Offences by the School of Graduate Studies**. Such cases may be initiated by the Head of the academic or administrative unit, or by the School of Graduate Studies.
5. In all cases, it is the responsibility of the academic or administrative unit to ensure that fairness and impartiality are achieved in the treatment of students.
6. Where an allegation of academic misconduct relates to research and the Tri-Agency Framework: Responsible Conduct of Research, as amended from time to time, (the Framework) applies, these procedures shall be applied in a manner consistent with the minimal requirements of the Framework.
7. Where an allegation of academic misconduct relates to research involving United States Public Health Service (USPHS) funds, these procedures shall be applied in a manner consistent with the minimal requirements of the U.S. Office of Research Integrity or other appropriate offices of the U.S. Department of Health and Human Services, including U.S. Federal Regulation 42 CFR Parts 50 and 93, as amended from time to time, and the 'Statement on Dealing with Allegations of Research Misconduct Under USPHS Research-related Activities for Foreign Institutions.'

4.12.4 Academic Offences

In the following section the plural shall be deemed to include the singular. Academic offences shall be deemed to include, but shall not be limited to, the following:

1. **Cheating:** This includes copying from another student's work or allowing another student to copy from one's own work; consulting with any unauthorized person during an examination or test, or using unauthorized aids; or knowingly recording or reporting false empirical or statistical data. The work referred to includes presentations, examinations, theses, assignments, work term reports, projects, laboratory assignments, laboratory reports, internship reports, or any other tests or evaluations which are to be used in judging the student's performance in a course or program of study; or any special tests which the University may offer; or in any presentations or publications related to academic work.
2. **Impersonation:** Impersonating another student or allowing oneself to be impersonated. By impersonation is meant the imitation of a student or entrance into an arrangement with another person to be impersonated for purposes of taking examinations or tests or carrying out laboratory or other assignments.
3. **Plagiarism:** Plagiarism is the act of presenting the ideas or works of another as one's own. This applies to all material such as theses, essays, laboratory assignments, laboratory reports, work term reports, design projects, seminar presentations, statistical data, computer programs, and research results. The properly acknowledged use of sources is an accepted and important part of scholarship. Use of such material without acknowledgment, however, is contrary to accepted norms of academic behaviour. Information regarding acceptable writing practices is available through the Writing Centre at www.mun.ca/writingcentre.
4. **Theft of examination papers or other material:** By theft is meant obtaining by improper means examination papers, tests, or any other such material.
5. **Use and/or distribution of stolen material:** The use of material which the student knows to have been improperly obtained and/or the distribution of such material is considered to be an academic offence.
6. **Submitting false information:** This offence includes falsifying, submitting or causing to submit false academic transcripts, forms or records, credentials, medical or other certificates, or making a false or incomplete declaration to the University.
7. **Submitting work for one course, project or publication which has been or is being submitted to another course, project or publication without express permission to do so:** This includes the presentation of an essay, report, or assignment to satisfy some or all of the requirements of a course when that essay, report, or assignment has been previously submitted or is concurrently being submitted for another course without the express permission of the professor(s) involved.
8. **Ethical Practice:** Failure to follow relevant University/Faculty/School guidelines on ethics, including but not limited to, ethical practice in research.
9. Failure to follow the **Memorial University of Newfoundland Code**.

4.12.5 Procedures for Resolution of Alleged Academic Offences at the Unit Level

4.12.5.1 General Information

These procedures will not be applied to cases involving alleged offences on comprehensive examinations, examination of theses, allegations of impersonation or allegations of submission of forged documents. Such alleged offences are governed by the **Procedures for Resolution of Alleged Academic Offences by the School of Graduate Studies**.

The principle that a resolution should be mutually satisfactory to both the accuser and the accused should be upheld throughout the attempt for resolution at the unit level.

4.12.5.2 Explanation of Procedures

If, upon receiving a report of an alleged academic offence, the Head of the academic or administrative unit decides that an attempt should be made to resolve that matter at the unit level the following procedures shall apply:

1. Normally within one week of notification, the Head of the academic or administrative unit shall request a meeting with the accuser and the accused and at the meeting the Head of the academic or administrative unit shall state the allegation, review the **Procedures for Resolution of Alleged Academic Offences at the Unit Level** including the range of applicable penalties, and arrange a second meeting between the accuser and the accused only.
2. At the second meeting the accuser and accused shall endeavour to obtain a mutually satisfactory resolution of the matter.
3. The accuser and accused shall report jointly to the Head of the academic or administrative unit on the result of their second meeting.
4. If the report is of a resolution which the Head of the academic or administrative unit considers to be fair and equitable the matter shall be considered closed. If the Head of the academic or administrative unit considers the reported resolution to be unfair and/or inequitable the Head will endeavour to obtain an alternative satisfactory resolution directly with the parties.
5. Should all reasonable efforts to obtain a mutually satisfactory resolution at the unit level fail, the Head of the academic or administrative unit will refer the case to the Dean of Graduate Studies and shall inform the accuser and the accused accordingly. From this stage onward by the **Procedures for Resolution of Alleged Academic Offences by the School of Graduate Studies** will apply.
6. At any stage of the **Procedures for Resolution of Alleged Academic Offences at the Unit Level**, the student or the accuser may ask that the case be referred to the Dean, and thereafter the **Procedures for Resolution of Alleged Academic Offences by the School of Graduate Studies** will apply.
7. Should the accused be found guilty, a brief description of the offence and the penalty(ies) applied shall be forwarded by the Head of the academic or administrative unit to the School of Graduate Studies.

4.12.5.3 Failure to Appear or Respond

1. If at any stage of the **Procedures for Resolution of Alleged Academic Offences at the Unit Level**, the accused fails to respond to a charge, without reasonable cause, within two weeks of notification of an allegation, action may be taken on the charge in the absence of the accused.
2. If at any stage of the **Procedures for Resolution of Alleged Academic Offences at the Unit Level**, the accuser fails to appear at a scheduled meeting to defend an allegation, without reasonable cause, the action will be dismissed.

4.12.5.4 Penalties in the Case of Resolution at the Unit Level

A student who has been found guilty of an academic offence will be subject to a penalty or penalties commensurate with the offence. Some cases may warrant more than one penalty for the same offence, and previous academic misconduct will be taken into account in determining the severity of penalties. The range of penalties and their determination is:

1. **Resubmission** of work with appropriate reduction in grade: will allow a student to complete and submit the work a second time.
2. **Reprimand**: This shall be in the nature of a warning in writing by the Head of the academic or administrative unit to the student that the student's conduct has been unacceptable to the University.
3. **Reduction of grade**: A reduction of grade will apply to an examination, test, or assignment to which an offence is relevant, or to the entire course, and will be decided by the Head of the academic or administrative unit. Since graduate students must obtain a grade of 'B' or PASS in required courses, a reduction of grade could lead to termination of program.

4.12.6 Procedures for Resolution of Alleged Academic Offences by the School of Graduate Studies

4.12.6.1 General Procedure

If the matter cannot be resolved following the **Procedures for Resolution of Alleged Academic Offences at the Unit Level**, or if, in the opinion of the Head of the academic or administrative unit, the allegation involves a major breach of University regulations, or in cases involving alleged offences on comprehensive examinations, thesis examinations, allegations of impersonation, or allegations of submission of forged or falsified documents, the following **Procedures for Resolution of Alleged Academic Offences by the School of Graduate Studies** shall apply.

4.12.6.2 Explanation of Procedures

1. If the Head of the academic or administrative unit (in consultation with the Dean of the student's faculty or school) is satisfied that the student has a serious case to answer, that person shall inform the student in writing of the nature of the case against the student. In addition, the Head of the academic or administrative unit shall report to the Dean of Graduate Studies who will, normally within one week, appoint as an investigator a member of the Academic Misconduct Investigations Board of the School of Graduate Studies (Investigations Board). The investigator will interview separately the accuser and accused and relevant witnesses. At these interviews, the investigator, the accuser, the accused, and relevant witnesses all have the right to be accompanied by a registered student or a member of the faculty or staff of the University.
2. Upon completion of these interviews, the investigator shall submit a written report of all findings to the Dean of Graduate Studies. The Dean of Graduate Studies shall present this report to both the accuser and accused for perusal and comment. Once in receipt of this report, the accuser and accused shall have two weeks in which to submit to the Dean of Graduate Studies any additional comments on the report that the person wishes to be considered. The investigator will be given the opportunity to correct any errors of fact should they arise from the comments of the accused and accuser prior to consideration of the allegation by the Investigations Board.

3. Upon receipt of all information from the investigator as well as comments from the accuser and accused, the Dean of Graduate Studies shall present the documents to the Chair of the Investigations Board.
4. The report shall be reviewed by a panel of three members of the Investigations Board for a decision.
5. Once a vote is taken, should the accused be found guilty, the Investigations Board shall take appropriate action in accordance with **Penalties in the Case of Resolution by the School of Graduate Studies**.

4.12.6.3 Failure to Appear or Respond

1. If at any stage of the **Procedures for Resolution of Alleged Academic Offences by the School of Graduate Studies**, the accused fails to respond to a charge, without reasonable cause, within two weeks of notification of an allegation, action may be taken on the charge in the absence of the accused.
2. If at any stage of the **Procedures for Resolution of Alleged Academic Offences by the School of Graduate Studies**, the accuser fails to appear at a scheduled interview to defend an allegation, without reasonable cause, the action will normally be dismissed; however, the investigation may proceed at the discretion of the Dean in consultation with the Investigations Board if the allegation or evidence warrants such action.

4.12.6.4 Penalties in the Case of Resolution by the School of Graduate Studies

A student who has been found guilty of an academic offence will be subject to a penalty or penalties commensurate with the offence. Enforcement of penalties resulting from **Procedures for Resolution of Alleged Academic Offences by the School of Graduate Studies** will be overseen by the Registrar. Some cases may warrant more than one penalty for the same offence, and previous academic misconduct will be taken into account in determining penalties. Penalties shall be imposed on the basis of the student's status at the time of the offence. The range of penalties and their determination is:

1. **Reprimand:** This shall be in the nature of a warning in writing by the Investigations Board to the student that the student's conduct has been unacceptable to the University.
2. **Reduction of Grade:** A reduction of grade will apply to an examination, test, or assignment to which an offence is relevant, or to the entire course, and will be decided by the Investigations Board. Since a passing grade for graduate students is at least a grade of 'B' or Pass, a reduction of grade could lead to termination of program.
3. **Change in Outcome of an Examination:** This will apply to Comprehensive Examinations and the examination of **Theses and Reports** and could lead to termination of program.
4. **Probation:** This is a trial period the length of which will be determined by the Investigations Board. The Investigations Board will inform the student that the finding of any further academic offence during the period of probation may lead to suspension or expulsion.
5. **Suspension:** Suspension will apply to a course, department, faculty, school, or the University. The period of suspension will be determined by the Investigations Board and shall not exceed three consecutive semesters, and shall be part of the allowable time for a graduate program.
6. **Expulsion:** The recommendation for expulsion from the University will be made by the Investigations Board to the President for final decision. Prior to the President's decision, the Investigations Board will notify the accused, in writing, of the recommendation for expulsion from the University. The accused will be allowed a period of two weeks following the date of release of such notification to lodge an appeal before the President's final decision concerning expulsion from the University. Any such appeal should be made in writing or email to the Senate Committee on Academic Appeals, c/o the Office of the Registrar.
7. **Rescinding of Degree:** The recommendation for rescinding of a degree previously awarded by the University will be made by the Investigations Board of the School of Graduate Studies to Senate for a final decision. Prior to Senate's decision, the Investigations Board of the School of Graduate Studies will notify the accused, in writing, of the recommendation for rescinding of the degree. The accused will be allowed a period of two weeks following the date of release of such notification to lodge an appeal before the Senate's final decision concerning the rescinding of the degree. Any such appeal should be made in writing to the Senate Committee on Academic Appeals, c/o Office of the Registrar.

4.12.7 Transcript Entries Related to Penalties

Transcript entries shall relate to the penalty(ies) imposed as follows:

Penalty	Transcript Entry
Reprimand	No transcript entry
Reduction of Grade	Entry of final grade for course
Change in Outcome of an Examination	Entry of final outcome for the examination
Probation	"On probation at the University for academic misconduct until Day, Month, Year"*
Suspension	"Suspended from the School of Graduate Studies for academic misconduct until Day, Month, Year"*
Expulsion	"Expelled from the University for academic misconduct"
Rescinding of Degree	"Degree rescinded for academic misconduct"
* The transcript entries for 'probation' or 'suspension' will be removed entirely upon the expiration of the penalty.	

4.12.8 Disposition of Documentation

The disposition of documents relating to allegations under these procedures shall be as follows:

1. The cases where the allegation was either found "not proven" or "unfounded" no documentation shall be retained in the student files.
2. In the case of a resolution effected through **Academic Misconduct - General Procedure or Procedures for Resolution of Alleged Academic Offences at the Unit Level**, a brief description of the offence and the penalty(ies) applied shall be forwarded by the Head of the academic or administrative unit to and retained by the School of Graduate Studies, separate from the student files.
3. In the case of a resolution effected through the **Procedures for Resolution of Alleged Academic Offences by the School of Graduate Studies**, all documentation shall be retained in the School of Graduate Studies, separate from the student files.

4.12.9 Right of Appeal

Appeals against decisions of the Investigations Board of the School of Graduate Studies made under **Procedures for Resolution of Alleged Academic Offences by the School of Graduate Studies** shall be directed to the Senate Committee on Academic Appeals, c/o Office of the Registrar.

4.13 Termination of a Graduate Program

Grounds for termination of a graduate program are as follows:

1. a. Failure to comply with the conditions of admission into a program, unless the conditions of admission have been changed with approval of the academic unit and the School of Graduate Studies;
- b. Failure to register in any semester by the final date for adding courses (see **Registration, Program Registration 1.**);
- c. Failure to obtain the required grades in courses as stated in the appropriate degree regulations (see **Evaluation**);
- d. Failure in comprehensive examinations (see **Comprehensive Examinations**);
- e. Demonstrated lack of progress in a program supported by written documentation;
- f. Recommendation of the Supervisory Committee (see **Supervision**);
- g. Failure of Thesis, Project, or Internship (see **Theses and Reports**);
- h. Academic misconduct as outlined under **General Regulations, Academic Behaviour** governing the School of Graduate Studies.
2. The foregoing notwithstanding the University reserves the right to require students to discontinue their program or to deny them admission where, in the opinion of the Academic Council of the School of Graduate Studies, following appropriate professional consultation, there is a reasonable likelihood that a student's health or conduct could result in endangering the lives, health, or safety of other persons on campus or in settings related to the student's university studies.
3. The foregoing notwithstanding, the School of Graduate Studies reserves the right to require students to discontinue their studies, or to deny them re-admission, where a student has been determined to have engaged in unprofessional conduct. The code of ethics of each profession will serve as the guideline as to what constitutes unprofessional conduct. However, should there not be any statements of what constitutes unprofessional conduct, the following standard will apply:

Unprofessional Conduct: That conduct which involves a breach of the duties required by professional ethics.

- Notes: 1. *If the University or a School or Faculty requires a student to discontinue studies under any of the above clauses, that student must be advised in writing of the nature of the case against the student and must be advised of the right to appeal before the penalty imposed takes effect.*
2. *Appeals against actions taken under Clause 2. should be directed to the Senate of the University. Any such appeal should be made in writing clearly stating the basis for the appeal and should be directed to the Secretary of Senate, c/o Office of the Registrar.*
3. *Appeals against actions taken under Clause 3. should be directed to the Appeals Committee, School of Graduate Studies.*

4.14 Provision for Reapplication

1. A student whose program of studies has been terminated for any of the reasons outlined under **Termination of a Graduate Program** may apply for admission to a new program of studies leading to the same degree.
2. Notwithstanding the above, a student whose program of studies has been terminated under **Termination of a Graduate Program, 1.b.**, shall be readmitted to the existing program only under the following conditions:
 - a. on the recommendation of the appropriate academic unit;
 - b. on the payment to the University of those registration fees which would have been payable had the student remained in continuous registration during the period since the termination of the program;
 - c. on the understanding that the time period during which the student was not registered shall be considered as part of the maximum time permitted for the completion of the degree.

5 Regulations Governing the Degree of Master of Applied Ocean Technology and the Graduate Diploma in Applied Ocean Technology (Ocean Mapping)

www.mun.ca/sgs/contacts/sgscontacts.php

www.mi.mun.ca

www.mun.ca/become/graduate/apply/app_deadlines.php

The degree of Master of Applied Ocean Technology (M.A.O.T.) is offered in Ocean Mapping (OM). There is also a Graduate Diploma in Applied Ocean Technology in the field of Ocean Mapping.

The programs will be administered by an Academic Director appointed by the Associate Vice-President Academic (Marine Institute), together with an Academic Advisory Committee.

The Academic Advisory Committee will be appointed by the Dean of Graduate Studies on recommendation of the Associate Vice-President Academic (Marine Institute). This Committee will consist of the Academic Director as Chair and five members of the academic community of the University. Normally, all appointments will be for a period of three years.

A Technical Advisory Committee consisting of a cross-section of members with professional expertise related to ocean technologies, will provide regular feedback on program content, instruction, and future direction of the programs. Members of the Technical Advisory Committee will be appointed by the Dean of Graduate Studies on recommendation of the Associate Vice-President Academic (Marine Institute). The Academic Director will be an ex-officio member and Chair of the Technical Advisory Committee. Normally all appointments will be for a period of three years.

5.1 Graduate Diploma in Applied Ocean Technology (Ocean Mapping)

The Graduate Diploma in Applied Ocean Technology (Ocean Mapping) is an applied and technical program offered by the School of Ocean Technology, at the Fisheries and Marine Institute. This program is for students who aim to pursue a career in ocean mapping, and includes specialized skills training that will empower students to conduct industry-ready tasks and applied research in any aspect of ocean mapping.

These regulations must be read in conjunction with the **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland.

5.1.1 Admission Requirements

To be considered for admission to the Graduate Diploma in Applied Ocean Technology (Ocean Mapping), an applicant must be eligible to register in the Master of Applied Ocean Technology program (see **Master of Applied Ocean Technology, Admission Requirements** below).

5.1.2 Program of Study

The program is offered primarily on-campus and includes a field course component during which attendance at the Marine Institute Campus is required. Students will normally register on a full-time basis. The program can be completed on a part-time basis.

Students in the program are normally required to complete 15 credit hours of course work, specifically:

1. Four in-class courses: OTEC 6000, 6001, 6002, and 6003 from **Core Courses**; and
2. One field course: OTEC 6004 from **Core Courses**.

Students may be required to take additional courses.

Courses required for the Graduate Diploma in Applied Ocean Technology (Ocean Mapping) are listed in the **Courses** section under the Master of Applied Ocean Technology program.

5.1.3 Evaluation

1. Students in the Graduate Diploma in Applied Ocean Technology (Ocean Mapping) must obtain a grade of 'B' or better in all program courses.
2. Students who receive a grade of less than 'B' in any course will be permitted to remain in the program provided the course is repeated and passed with a grade of B or better. Alternatively, the student may, on the recommendation of the Academic Director, and with the approval of the Dean of Graduate Studies, substitute another graduate course. Only one course repetition or substitution will be permitted during the student's program after which the student shall be required to withdraw from the program.

5.2 Master of Applied Ocean Technology

The Degree of Master of Applied Ocean Technology (Ocean Mapping) is an applied and technical program offered by the School of Ocean Technology, at the Fisheries and Marine Institute. The Master of Applied Ocean Technology is offered, at present, in Ocean Mapping. This program is for students who aim to pursue a career in ocean mapping, and includes specialized skills training that will empower students to conduct industry-ready tasks and applied research in any aspect of ocean mapping.

These regulations must be read in conjunction with the **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland.

5.2.1 Admission Requirements

Admission to the program is on a limited and competitive basis.

1. To be considered for admission to the program an applicant will normally possess a relevant second class or better undergraduate degree in the areas of science, technology, engineering or equivalent, both in achievement and depth of study, from an institution recognized by the Senate.
2. Any other applicant may be considered for admission provided that:
 - a. The applicant has completed a second-class or equivalent undergraduate degree from an institution recognized by the Senate;
 - b. The applicant demonstrates a satisfactory level of knowledge of math and science through undergraduate or graduate course work; and
 - c. The applicant demonstrates in a statement of interest, a commitment and passion for ocean mapping and related technology through combined efforts of prior technical training in a relevant ocean technology field and employment or experience in field schools, research programs, the ocean technology industry, regulatory agencies or government departments, non-governmental organizations, consulting activities, or other relevant activities.

Completion of additional course work in math, science, and/or related technology may be required for applicants applying under this clause.

3. Applicants who did not complete a baccalaureate or post-graduate degree at a recognized university where English is the primary language of instruction must normally complete either the:
 - a. Test of English as a Foreign Language (TOEFL) and achieve a paper-based score of 580 (or higher), computer-based score of 237 (or higher), or Internet based score of 92-93 (or higher); or
 - b. International English Language Testing System (IELTS) and achieve a score of 7 (or higher).

Information regarding the TOEFL is available from the Educational Testing Service at www.ets.org. IELTS information is available at www.ielts.org. It is noted that other equivalent tests acceptable to the School of Graduate Studies will also be considered.

5.2.2 Program of Study

Students in the Master of Applied Ocean Technology program are required to complete 30 credit hours of course work through either the **Project Route** or the **Course Route**.

The program is offered primarily on-campus and includes a field course component during which attendance at the Marine Institute Campus is required. Students will normally register on a full-time basis. The program can be completed on a part-time basis.

5.2.2.1 Project Route

The Project Route is comprised of 30 credit hours (24 credit hours of course work and a comprehensive project course (6 credit hours)) as follows:

1. Seven in-class courses, 21 credit hours: OTEC 6000, 6001, 6002, 6003, 6005, 6008 and 6010;
2. One field course, 3 credit hours: OTEC 6004; and
3. Project Course, 6 credit hours OTEC 6100.

OTEC 6100 is normally completed after all other program requirements have been met. In addition, the Academic Director/Program Chair will approve the student's Project Supervisor. Students will choose a topic/project in consultation with the Academic Director and Project Supervisor. The project report will be evaluated by two examiners.

Students may be required to take additional courses.

Courses required for the Master of Applied Ocean Technology (Ocean Mapping) are listed in the **Courses** section.

5.2.2.2 Course Route

The Course Route is comprised of 30 credit hours as follows:

1. Seven courses, 21 credit hours in-class courses: OTEC 6000, 6001, 6002, 6003, 6005, 6008 and 6010;
2. One field course: OTEC 6004; and
3. Two **Electives** (6 credit hours).

Students may be required to take additional courses.

Courses required for the Master of Applied Ocean Technology (Ocean mapping) are listed in the **Courses** section.

5.2.3 Transfer Credits

Up to three relevant elective courses (9 credit hours) may be transferred into the Master of Applied Ocean Technology program from other graduate programs within the School of Graduate Studies or from other post-secondary institutions recognized by Senate, subject to the approval of the Dean of Graduate Studies on the recommendation of the Academic Director.

5.2.4 Evaluation

1. Students in the Master of Applied Ocean Technology program must obtain a grade of 'B' or better in all program courses.
2. Students who receive a grade of less than 'B' in any course will be permitted to remain in the program provided the course is repeated and passed with a grade of 'B' or better. Alternatively, the student may, on the recommendation of the Academic Director, and with the approval of the Dean of Graduate Studies, substitute another graduate course. Only one course repetition or substitution will be permitted during the student's program after which the student shall be required to withdraw from the program.

5.2.5 Courses

5.2.5.1 Core Courses

OTEC 6000 Ocean Mapping Essentials I
 OTEC 6001 Ocean Mapping Essentials II
 OTEC 6002 Applied Geodesy and Positioning
 OTEC 6003 Applied Hydrography
 OTEC 6004 Field Course in Ocean Mapping (*prerequisites OTEC 6000, 6001, 6002, 6003*)
 OTEC 6005 Applied Underwater Acoustics
 OTEC 6008 Applied Geostatistical Analysis and Seabed Characterization
 OTEC 6010 Marine Geology and Geophysics

5.2.5.2 Electives

GEOG 6821 Advanced Computer Mapping
 MSTM 6001 Fisheries Ecology
 MSTM 6011 Introduction to Integrated Coastal and Ocean Management / Marine Spatial Planning
 MSTM 6015 Marine Protected Areas
 MSTM 6027 Coastal and Ocean Environmental Policies
 MSTM 6039 Sustainability and Environmental Responsibility
 OCSC 7100 Biological Oceanography
 OTEC 6007 Autonomous Vehicles for Ocean Mapping
 OTEC 6013 MetOcean Instrumentation and Observation
 OTEC 6014 Introduction to Marine Renewable Energy (MRE) (*credit restricted with MSTM 4055*)

5.2.5.3 Project Course

OTEC 6100 Applied Ocean Technology Project in Ocean Mapping (6 credit hours)

6 Regulations Governing the Degree of Master of Applied Psychological Science (Co-operative)

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/science

www.mun.ca/psychology

www.mun.ca/become/graduate/apply/app_deadlines.php

This program is designed to meet the needs of both students and employers. Students will gain the skills and knowledge necessary to ask appropriate questions and conduct research in a variety of applied settings (e.g., business, government, health care, etc.). Students completing the program will be qualified for either immediate employment or further education. Students' and employers' needs will be met by a program that combines training in basic scientific methods and social psychological theory with practical experience in a variety of work settings. The training in methods and theory will be provided by the academic component of the program and the practical experience will be provided by the cooperative, work term component.

6.1 Qualifications for Admission

1. Admission to the program is competitive and selective. To be considered for admission to the Master of Applied Psychological Science (Co-operative) an applicant shall normally hold at least a high second class Honours degree or its equivalent, both in achievement and depth of study, from an institution recognized by the Senate.
2. Applications
 - a. All applicants are required to submit results from the General section of the Graduate Record Examinations.
 - b. Applicants are required to submit with their applications an example of their academic writing. This could include, but is not limited to, papers submitted in class, honour's thesis, etc.

- c. At least one letter of reference should come from someone who is familiar with the applicant's research capability.
3. Election will be based on an applicant's overall academic performance, scores on the Graduate Record Examination and letters of reference.
4. Admission to the program shall be upon acceptance by the Dean of Graduate Studies after recommendation by the Head of the Department of Psychology which will include a proposed program of study and a proposed Supervisor.

6.2 Program of Study

1. Students should note that it is possible to enter Academic Term 1 only in the Fall semester commencing in September of each year.
2. Every student shall complete four Academic Terms in the Cooperative Program and shall normally be required to complete two Work Terms.
3. Academic and Work Terms normally alternate as follows:
Academic Term 1, Academic Term 2, Work Term 1
Academic Term 3, Work Term 2, Academic Term 4
4. Students shall normally complete 18 credit hours, including: Advanced Statistics in Psychology (6000), Research Design (6001), Theory and Methods in Social Psychology (6400), Program Evaluation and Applied Research (6403), Project in Applied Social Psychology (6404) and either Group Processes (6402) or Social Cognition (6401). Students will also register for the Colloquium Series in Psychology (6010) for Academic Term 1, Academic Term 2, and Academic Term 3 of their program for a maximum of three registrations.

6.3 Evaluation and Advancement

1. In order to continue in good standing in the program and in order to qualify for the Master's Degree, a student shall obtain a grade of 'A' or 'B' for program courses, and complete two Work Terms.
2. The dates for starting and finishing each Work Term are shown at www.mun.ca/coop. Successful completion of the Work Term requirements is a prerequisite to graduation.
3. A competition for Work Term employment is organized by Co-operative Education. Students may also obtain their own Work Term jobs outside the competition. Such jobs must be confirmed by letter from the employer and approved by the Head of Psychology and Co-operative Education on or before the first day of the Work Term.

Work Term jobs may be outside St. John's and possibly outside Newfoundland and Labrador. Students who do not wish to accept a Work Term job arranged by Co-operative Education shall be responsible for finding an alternative acceptable to the Head of Psychology and Co-operative Education.

By entering the competition, students give permission for Co-operative Education to supply their University transcripts to potential employers.

4. The overall evaluation of the Work Term is the responsibility of Co-operative Education. The Work Term evaluation shall consist of two components:
 - a. **On-the-job Student Performance:**
Job performance shall be assessed by Co-operative Education using information gathered during the Work Term and input from the employer towards the end of the Work Term. Formal written documentation from the employer shall be sought.
 - b. **The Work Report:**
 - i. Work term reports shall be evaluated by a member of the faculty in the Department of Psychology. If an employer designates a report to be of a confidential nature, both employer and faculty member must agree as to the methods to protect the confidentiality of such a report before the report may be accepted for evaluation.
 - ii. Reports must be prepared according to American Psychological Association specifications and contain original work related to the Work Term placement. The topic must relate to the work experience and will be chosen by the student in consultation with the employer. For promotion from the Work Term, a student must obtain at least 65% in each component.
5. If a student fails to achieve the Work Term standards specified above the student will be required to withdraw from the program. Such a student may reapply to the program after lapse of two semesters, at which time the student will be required to complete a further Work Term with satisfactory performance before being admitted to any further academic term in the Faculty. A Work Term may be repeated once.
6. Students are not permitted to drop Work Terms without prior approval of the Graduate Studies Committee of the Department of Psychology, upon the recommendation of Co-operative Education. The Graduate Studies Committee will make a recommendation to the Head of Department who will make the final decision. Students who drop a Work Term without permission, or who fail to honour an agreement to work with an employer, or who conduct themselves in such a manner as to cause their discharge from the job, will normally be awarded a failed grade for the Work Term. Permission to drop a Work Term does not constitute a waiver of degree requirements, and students who have obtained such permission must complete an approved Work Term in lieu of the one dropped.

6.4 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow. Other courses may be offered on the recommendation of the Head of the Department of Psychology.

6000 Advanced Statistics in Psychology
 6001 Research Design
 6010 Colloquium Series in Psychology (repeatable, non-credit)
 601W Work Term 1
 602W Work Term 2
 6400 Theory and Methods in Social Psychology
 6401 Social Cognition
 6402 Group Processes
 6403 Program Evaluation and Applied Research
 6404 Project in Applied Psychological Science

7 Regulations Governing the Degree of Master of Applied Science

www.mun.ca/sgs/contacts/sgscontacts.php
 www.engr.mun.ca
 www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Applied Science is offered in four areas: Computer Engineering, Environmental Systems Engineering and Management, Oil and Gas Engineering, and Energy Systems Engineering. For information on the research-focused Master of Engineering program, refer to the regulations governing the Degree of Master of Engineering.

7.1 Industrial Internship Option

The Faculty permits graduate students to undertake internships of work in industry. These internships will allow students to either (a) enhance the application of their knowledge and skills within industry, or (b) complete a research project defined by the industry. Encouragement to undertake an internship will be given only where it is clear that one of these expectations can be met.

Students registered in the M.A.Sc. program may, with the permission of their Board of Studies, the Dean of the Faculty of Engineering and Applied Science, and the Dean of Graduate Studies, select the Industrial Internship Option. Students pursuing this option must satisfy the degree regulations for an M.A.Sc. program. In addition, students in the Industrial Internship Option:

- shall normally complete at least 18 credit hours of the courses required for their program with an average of 75% or higher prior to the internship; the remaining required courses may be taken on campus or by distance
- shall normally spend at least two continuous semesters on campus on a full-time basis as a graduate student at this University
- shall normally spend 4 to 8 months of their program at an internship in industry
- shall submit monthly reports to a university supervisor appointed by their Board of Studies, and shall submit a concise progress report to their Board of Studies no later than the end of each semester while on an internship
- shall normally not opt out once the internship starts.

7.2 Computer Engineering

7.2.1 Program of Study

The Faculty of Engineering and Applied Science offers a course-based program leading to the Degree of Master of Applied Science (M.A.Sc.) in Computer Engineering.

7.2.2 Qualifications for Admission

- Admission to the program is limited and competitive.
- To be eligible for consideration for admission, applicants should have at least a second class degree in computer engineering, computer science, electrical engineering, or a related discipline; they should have background in many of the following areas: object-oriented programming, data structures, digital hardware, computer organization, discrete mathematics, probability and statistics and engineering design.
- To be eligible for consideration for admission, applicants must meet the **English Proficiency Requirements** described under the **General Regulations** of the School of Graduate Studies.

7.2.3 Degree Requirements

- The degree program requires the completion of 33 credit hours.
 - Students are required to complete six core courses, including a project course, for a total of 18 credit hours. The core courses are ENGI 9818, ENGI 9819, ENGI 9867, ENGI 9874, ENGI 9865, and ENGI 981A/B.
 - Five elective courses for a total of 15 credit hours must be completed. Each semester the Head of the Department of Electrical and Computer Engineering will provide a selection of eligible courses, which may include the courses listed under **Elective Courses**, as well as other suitable courses identified by the Head.
- Normally students will take courses as shown in **Table 1**. Students are required to complete both ENGI 9818 and ENGI 9819, obtaining a mark of 65% or higher in each, before undertaking any other courses in their program. Exceptions to this must be approved by the Head of the Department of Electrical and Computer Engineering.

Table 1 M.A.Sc. in Computer Engineering Program

Year, Semester	Core
Year 1 Fall	ENGI 9818, ENGI 9819
Year 1 Winter	2 core + 1 elective
Year 1 Spring	1 core + 2 electives + ENGI 981A
Year 2 Fall	ENGI 981B + 2 electives

- ENGI 981A/B is a two-semester, 3 credit hour, linked course, where a grade of PAS is required in the first semester in order to proceed to ENGI 981B. Students are required to successfully complete at least 4 core courses before undertaking ENGI 981A.

7.2.4 Evaluation

Students must obtain a grade of at least 65% in all program courses to receive credit for the course towards their program requirements. Any student who fails to receive 65% or more in a course must repeat the course in the case of core courses, or must either repeat or replace the course with another program course in the case of elective courses. Only two such repetitions/replacements shall be permitted in the student's program. Should a grade of less than 65% be obtained in a repeated or replacement course, the student shall be required to withdraw from the program.

7.2.5 Courses

7.2.5.1 Core Courses

ENGI 9818 Computer Software Foundations
 ENGI 9819 Computer Hardware Foundations
 ENGI 9867 Advanced Computing Concepts for Engineering
 ENGI 9874 Software Design and Specification
 ENGI 9865 Advanced Digital Systems
 ENGI 981A/B Computer Engineering Project

7.2.5.2 Elective Courses

ENGI 9804 Industrial Machine Vision
 ENGI 9823 Computer Security
 ENGI 9861 High-Performance Computer Architecture
 ENGI 9868 ASIC Design
 ENGI 9869 Advanced Concurrent Programming
 ENGI 9871 Information Theory and Coding
 ENGI 9872 Digital Communications
 ENGI 9875 Embedded and Real-Time Systems Design
 ENGI 9876 Advanced Data Networks
 ENGI 9877 Cryptography
 ENGI 9878 Wireless and Mobile Communications
 Other courses approved by the ECE Department Head

7.3 Environmental Systems Engineering and Management

7.3.1 Program of Study

1. The Faculty of Engineering and Applied Science offers a program in Environmental Systems Engineering and Management (ESEM) leading to the Degree of Master of Applied Science. The program is available on a full-time or part-time basis.
2. The program is offered by the Faculty of Engineering and Applied Science and will be administered by a Board of Studies appointed by the Dean of Engineering and Applied Science.

7.3.2 Qualifications for Admission

1. Admission is limited and competitive.
2. To be considered for admission, applicants shall normally hold a minimum second class Bachelor's Degree in engineering preferably in civil, environment, chemical, processing, or petroleum engineering, or in a related discipline from a university of recognized standing.
3. To be eligible for consideration for admission, applicants will meet the English Proficiency Requirements described under **General Regulations, English Proficiency Requirements**.

7.3.3 Degree Requirements

1. The Degree program requires the completion of 30 credit hours.
 - a. 6 credit hours comprising a project course 960A/B.
 - b. 15 credit hours comprised of 9601, 9609, 9626, 9627, and 9628.
 - c. 9 credit hours (three courses) to be selected from 9603, 9605, 9610-9615, 9621, 9622, 9624, 9625, 9629, 9630, Environmental Science 6001, Environmental Science 6002, Environmental Science 6003, and Geography 6250.

7.3.4 Evaluation

Students must obtain a grade of at least 65% in all program courses to receive credit for the course towards their program requirements. Any student who fails to receive 65% or more in a course, must repeat the course in the case of core courses, or must either repeat or replace the course with another program course in the case of elective courses. Any student who receives a grade of less than 65% in two courses or in a repeated course will be required to withdraw from the program.

7.3.5 Courses

960A Environmental Engineering Project (0 credit hours)
 960B Environmental Engineering Project (6 credit hours)
 9601 Environmental Pollution and Mitigation (*cross-listed as Environmental Science 6004*)
 9603 Environmental Sampling and Pollutant Analysis (*cross-listed as Environmental Science 6005*)
 9605 Water and Wastewater Treatment
 9609 Environmental Risk Assessment (*cross-listed as Environmental Science 6007*)
 9610-9615 Special Topics in Environmental Science and Engineering
 9621 Soil Remediation Engineering
 9622 Environmental Statistics
 9624 Air Pollution (*cross-listed as Environmental Science 6008*)
 9625 Environmental Impacts of Offshore Oil and Gas Operations
 9626 Environmental Management System
 9627 Environmental Systems Engineering
 9628 Environmental Laboratory
 9629 Environmental Policy and Regulations
 9630 Pollution Prevention
 Environmental Science 6001 Earth and Ocean Systems
 Environmental Science 6002 Environmental Chemistry and Toxicology
 Environmental Science 6003 Applied Ecology
 Geography 6250 Conservation of Natural Resources

7.4 Oil and Gas Engineering

7.4.1 Program of Study

1. The Faculty of Engineering and Applied Science offers a program in Oil and Gas Engineering leading to the degree of Master of Applied Science in Oil and Gas Engineering (M.A.Sc.(OGE)). The program is available on a full-time basis.
2. The program is offered by the Faculty of Engineering and Applied Science and will be administered by a Board of Studies appointed by the Dean of Engineering and Applied Science.

7.4.2 Qualifications for Admission

1. Admission is limited and competitive.
2. To be considered for admission, applicants shall normally hold a minimum second class Bachelor's Degree in engineering preferably in mechanical, chemical/process, civil, environmental, mining/mineral, or petroleum engineering, or in a related discipline from a university of recognized standing.
3. To be eligible for consideration for admission applicants will meet the English Proficiency Requirements described under **General Regulations, English Proficiency Requirements**.

7.4.3 Degree Requirements

1. The degree program requires the completion of 30 credit hours.
 - a. 6 credit hours comprising a project course Engineering 910A/910B.
 - b. 15 credit hours by completing Engineering 9110, 9113, 9114, 9118 and 9121.
 - c. 9 credit hours (three courses) to be selected from Engineering 9002, 9015, 9111, 9112, 9116, 9117, 9119, 9120, 9420, 9609, 9624, 9625, 9901, 9902, 9989. Engineering 9117 is a recommended elective course for students without adequate background in petroleum engineering.

7.4.4 Evaluation

Students must obtain a grade of at least 65% in all program courses to receive credit for the course towards their program requirements. Any student who fails to receive 65% or more in a course must repeat the course in the case of core courses, or must either repeat or replace the course with another program course in the case of elective courses. Any student who receives a grade of less than 65% in two courses or in a repeated course will be required to withdraw from the program.

7.4.5 Courses

9002 Ocean Engineering Structures
 9015 Ocean Engineering Hydrodynamics
 910A OGE Project Course (0 credit hours)
 910B OGE Project Course (6 credit hours)
 9110 Advanced Petroleum Production Engineering
 9111 Well Testing
 9112 Multiphase Flow
 9113 Phase Behaviour of Petroleum Reservoir Fluids
 9114 Advanced Reservoir Engineering
 9116 Reliability Engineering
 9117 Offshore Petroleum Geology and Technology
 9118 Advanced Drilling Engineering
 9119 Compact Process Equipment Design
 9120 Advanced Natural Gas Engineering
 9121 Advanced Safety, Risk and Reliability Modeling
 9420 Engineering Analysis
 9609 Environmental Risk Assessment
 9624 Air Pollution
 9625 Environmental Impacts of Offshore Oil and Gas Operations
 9901 Fundamentals of Fluid Dynamics
 9902 Advanced Transport Phenomena
 9989 Special Topics Course - Corrosion Principles, Prevention and Control

7.5 Energy Systems Engineering

7.5.1 Program of Study

The Faculty of Engineering and Applied Science offers a program in Energy Systems Engineering leading to the degree of Master of Applied Science in Energy Systems Engineering (MESE). The program is available on a full-time basis. There are two options: Option 1 focuses on energy generation and utilization and Option 2 focuses heavily on electrical aspects of energy engineering. Option 1 is designed for students with an engineering degree in mechanical, chemical, industrial or in a related discipline. Option 2 is designed for students with a degree in electrical engineering or in a related discipline.

7.5.2 Qualifications for Admission

1. Admission is limited and competitive.
2. To be considered for admission, applicants shall normally hold a minimum second class Bachelor's Degree in engineering in mechanical, electrical, chemical, industrial, or in a related discipline from a university of recognized standing.
3. To be eligible for consideration for admission, applicants will meet the **English Proficiency Requirements** described under **General Regulations** of the School of Graduate Studies.

7.5.3 Degree Requirements

1. The degree program requires the completion of 30 credit hours for both Options 1 and 2.

- a. 6 credit hours comprising a project course ENGI 990A/990B.
- b. 15 credit hours (five courses) - core courses

Option 1:

9 credit hours by completing:
 ENGI 9853 Energy Economics and Policy
 ENGI 9854 Fundamentals of Energy Systems
 ENGI 9855 Energy and the Environment
 6 credit hours by completing
 ENGI 9856 Electrical Power Systems
 ENGI 9909 Advanced Thermodynamics

Option 2:

9 credit hours by completing:
 ENGI 9853 Energy Economics and Policy
 ENGI 9854 Fundamentals of Energy Systems
 ENGI 9855 Energy and the Environment
 6 credit hours by completing
 ENGI 9857 Instrumentation and Control of Energy Systems
 ENGI 9858 Advanced Power Systems

- c. 9 credit hours (three courses) - elective courses

Option 1:

ENGI 9841 Thermal Power Plants
 ENGI 9845 Energy Storage
 ENGI 9843 Solar Engineering
 ENGI 9420 Engineering Analysis
 ENGI 9985 Advanced Heat Transfer
 ENGI 9901 Fundamentals of Fluid Dynamics
 ENGI 9977 Computational Fluid Dynamics

Option 2:

ENGI 9845 Energy Storage
 ENGI 9841 Thermal Power Plants
 ENGI 9843 Solar Engineering
 ENGI 9420 Engineering Analysis
 ENGI 9896 Renewable Energy Systems
 ENGI 9862 Power System Protection
 ENGI 9863 Grid Integration of Energy Systems

7.5.4 Evaluation

Students must obtain a grade of at least 65% in all program courses to receive credit for the course towards their program requirements. Any student who fails to receive 65% or more in a course, must repeat the course in the case of core courses, or must either repeat or replace the course with another program course in the case of elective courses. Any student who receives a grade of less than 65% in two courses or in a repeated course will be required to withdraw from the program.

7.5.5 Courses

ENGI 9420 Engineering Analysis
 ENGI 9841 Thermal Power Plants
 ENGI 9843 Solar Engineering
 ENGI 9845 Energy Storage
 ENGI 9853 Energy Economics and Policy
 ENGI 9854 Fundamentals of Energy Systems
 ENGI 9855 Energy and the Environment
 ENGI 9856 Electrical Power Systems
 ENGI 9857 Instrumentation and Control of Energy Systems
 ENGI 9858 Advanced Power Systems
 ENGI 9862 Power System Protection
 ENGI 9863 Grid Integration of Energy Systems
 ENGI 9896 Renewable Energy Systems
 ENGI 990A MESE Project Course
 ENGI 990B Continuation of MESE Project Course
 ENGI 9901 Fundamentals of Fluid Dynamics
 ENGI 9909 Advanced Thermodynamics
 ENGI 9977 Computational Fluid Dynamics
 ENGI 9985 Advanced Heat Transfer

7.6 Safety and Risk Engineering

7.6.1 Program of Study

1. The Faculty of Engineering and Applied Science offers a program in Safety and Risk Engineering leading to the degree of Master of Applied Science in Safety and Risk Engineering (M.A.Sc.(SRE)). The program is available on a full-time or part-time basis.
2. The program is offered by the Faculty of Engineering and Applied Science and will be administered by a Board of Studies appointed by the Dean of Engineering and Applied Science.

7.6.2 Qualifications for Admission

1. Admission is limited and competitive.
2. To be considered for admission, applicants shall normally hold a minimum second class Bachelor's Degree in engineering preferably in mechanical, chemical/process, civil, safety and inspection, environmental, mining/mineral, petroleum engineering, or

computational science or in a related discipline from a university of recognized standing.

3. To be eligible for consideration for admission applicants will meet the English Proficiency Requirements described under **General Regulations, English Proficiency Requirements**.

7.6.3 Degree Requirements

The degree program requires the completion of 30 credit hours as follows:

1. 6 credit hours comprising two project courses Engineering 915A/915B.
2. 15 credit hours by completing Engineering 9115, 9116, 9121, 9330 and 9411.
3. 9 credit hours (three courses) to be selected from Engineering 7623, 9340, 9516, 9609, 9622, 9625, 9977, and 9989.

7.6.4 Evaluation

Students must obtain a grade of at least 65% in all program courses to receive credit for the course towards their program requirements. Any student who fails to receive 65% or more in a course must repeat the course in the case of core courses, or must either repeat or replace the course with another program course in the case of elective courses. Any student who receives a grade of less than 65% in two courses or in a repeated course will be required to withdraw from the program.

7.6.5 Courses

7623 Process Simulation
 915A SRE Project Course (0 credit hours)
 915B SRE Project Course (6 credit hours)
 9115 Safety and Risk Engineering
 9116 Reliability Engineering
 9121 Advanced Safety and Risk Engineering
 9330 Abnormal Situation Management, Fault Detection and Analysis
 9340 Material Degradation and Asset Management
 9411 Probabilistic Methods in Engineering
 9516 Similitude, Modelling and Experimental Data Analysis
 9609 Environmental Risk Assessment
 9622 Environmental Statistics
 9925 Environmental impacts of offshore oil and gas operations
 9899 Special Topics Course – Corrosion Principles, Prevention and Control
 9977 Computer and Communication Security

8 Regulations Governing the Degree of Master of Applied Statistics

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/math
www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Applied Statistics (M.A.S.) is a highly structured program incorporating 18 credit hours in program courses and a practicum in applied statistics. The Degree is offered in the Department of Mathematics and Statistics by full-time or part-time study.

8.1 Qualifications for Admission

1. Admission is limited and competitive. To be considered for admission to the Master of Applied Statistics program, an applicant shall normally hold at least a high second class Honours Degree or its equivalent, in statistics or cognate discipline from an institution recognized by the Senate.
2. In addition, an applicant shall normally have completed undergraduate courses in statistics which cover the material of Statistics 3411, 3520, 3521, 3585, 4530. If necessary, an applicant may be required to demonstrate a satisfactory knowledge of the above courses in an examination administered by the Department of Mathematics and Statistics.
3. Admission to the program shall be upon acceptance by the Dean of Graduate Studies after recommendation by the Head of the Department of Mathematics and Statistics along with a proposed program of study and a proposed Supervisor.

8.2 Program of Study

The minimum requirements for the Degree of Master of Applied Statistics are completion of the following:

1. The graduate courses STAT 6509, STAT 6519 and STAT 6545, plus three additional 3 credit hour courses from the list of **Applied Statistics Elective Courses**.
2. STAT 6590, which consists of a minimum of 20 hours of training in statistical consultancy to be arranged through the Department's statistics consulting centre.
3. STAT 698A/B and a final applied statistics project report. The report must demonstrate a satisfactory general mastery of applied statistical knowledge.

8.3 Evaluation

1. In order to continue in graduate studies and in order to qualify for a Master's Degree, a student shall obtain an A or B for all regular program courses. In order to qualify for a graduation the student shall pass STAT 6590 and STAT 698A/B and complete successfully the final project requirement.
2. STAT 698A/B progress after each semester will be evaluated by the student's supervisor while the final applied statistics project report will be evaluated by a faculty member other than the supervisor appointed by the Head of the Department.

8.4 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

8.4.1 Applied Statistics Required Courses

6509 Statistical Inference
 6519 Regression Models
 6545 Computational Statistics
 6590 Statistical Consultancy (1 credit hour)
 698A/B Applied Statistics Project (2 credit hours)

8.4.2 Applied Statistics Elective Courses

6505 Survival Analysis
 6530 Longitudinal Data Analysis
 6559 Statistical Exploration of Data
 6561 Categorical Data Analysis
 6563 Sampling Theory
 6564 Experimental Designs
 6571 Financial and Environmental Time Series
 6573 Statistical Genetics

9 Regulations Governing the Degree of Master of Arts

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Arts (M.A.) is offered in Anthropology, Archaeology, Classics, Economics, English, Environmental Policy, Ethnomusicology, Folklore, French Studies, Geography, German Language and Literature, History, Linguistics, Philosophy, Political Science, Religious Studies, and Sociology.

Applicants are advised to consult, in addition to the regulations governing the Degree of Master of Arts, both the **General Regulations** and the particular regulations of the appropriate Departments.

9.1 Qualifications for Admission

- Admission is limited and competitive. To be considered for admission an applicant shall hold a Bachelor's Degree or its equivalent from an institution recognized by the Senate and shall have a knowledge of the proposed field of specialization satisfactory to the Department concerned (or Departments, when interdisciplinary study is intended) and to the Dean.
- Preference will normally be given to applicants who hold an appropriate Honours Degree, either from Memorial University of Newfoundland, or from another university whose Honours Degree is of comparable standing. Any other applicant who holds a Bachelor's Degree or its equivalent will be considered for admission provided that:
 - the applicant's undergraduate record after the first year shows an average of at least grade 'B' in courses in the proposed field of specialization;
 - the applicant's overall undergraduate record after the first year shows an average of at least grade 'B' in all courses taken; and
 - the Department concerned satisfies the Dean that the applicant's work exhibits evidence of academic excellence.

Only in exceptional circumstances, and only on the recommendation of the Department concerned, will the Dean consider applicants who do not meet the requirements in a. and b. Such applicants, however, must meet the requirements in c.
- An applicant may be required to demonstrate a satisfactory knowledge of the proposed field of study in an examination administered by the Department or Departments.
- In most cases instruction is in English, and examinations and theses are to be written in English. (Language Departments, however, give instruction in the pertinent language and often require examinations and theses to be written in the language. In addition, other Departments may permit or even require examinations and/or theses to be written in a language other than English.)

9.2 Program of Study and Research

- The program of study for the Master of Arts Degree shall consist of the successful completion of a program of courses and, in accordance with Departmental regulations, either of a thesis embodying systematic research or of a Comprehensive Examination.
 For programs requiring 24 credit hours or more, the academic unit may choose not to require a thesis or comprehensive examination.
- Every student shall read at least 12 credit hours in program courses at the graduate level in one subject or in closely related subjects. Departmental regulations may require more courses than the minimum and this higher number is listed where applicable in the regulations of the Department.
- Students may, with the approval of the Dean, augment their program with a limited number of other courses of their choice. Passing grades are not required in these non-program courses in order to continue in graduate studies or obtain a Master's Degree.
 However, the final grades in these courses will be recorded on the student's transcripts. The grading system in non-program courses shall be that appropriate to the particular course.
- Students submitting a thesis on an approved topic shall conduct systematic research under the direction of a Supervisor recommended by the appropriate Department or Departments and approved by the Dean. The student may be required to take an oral examination.
- Changes in either the program of courses or the topic of the thesis require the approval of the Dean.
- On the recommendation of the Head of the Department, the Dean may waive, in part, the course requirements for a Master's Degree.
- Application for transfer from the Master of Arts to the Master of Philosophy is to be made to the Dean before the end of the second semester in the case of full-time students, and in the case of part-time students before 18 graduate credit hours have been completed.

8. The Dean may approve an application to transfer from the M.A. to the M.Phil. only when a new integrated program, acceptable to the Dean, is submitted.

9.3 Evaluation

1. In order to continue in the School of Graduate Studies and in order to qualify for a Master's Degree, a student shall obtain an 'A' or 'B' grade in each regulation course. Some students may be required to read a specified number of additional graduate or undergraduate courses for which a passing grade must be achieved.
2. Students registered for credit shall write their examinations in their graduate courses at a time to be determined by the Dean on the recommendation of the Department.
3. Students registered in undergraduate courses shall satisfy examination requirements in these courses.
4. When, on a basis of consultation with the student, the instructors in graduate courses, and the thesis Supervisor, the Head of a Department has determined that the student's work has fallen below a satisfactory level, the Head may recommend to the Dean that the student be required to withdraw from the program.

9.4 Thesis or Report

See **General Regulation, Theses and Reports.**

9.5 Anthropology

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/hss

www.mun.ca/anthro

www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Arts (M.A.) is offered in Anthropology by either full-time or part-time study.

1. Students will specialize in social and cultural anthropology.
2. When students are accepted into the program, they will be assigned one or more Supervisors. Students' programs shall be the responsibility of their Supervisor(s), the graduate co-ordinator(s), and the Head of the Department.
3. If students' records suggest a deficiency in some areas(s), the Department reserves the right to require that they complete additional undergraduate courses before beginning program courses.
4. Students may choose between a thesis and a non-thesis option.

9.5.1 M.A. With Thesis

1. Normally, the M.A. program should take two academic years to complete, of which the first year will be spent in completing course work, writing and orally defending a thesis proposal before members of the faculty, and beginning to carry out research. The second academic year will be spent in completing research, presenting an oral research report to the Department, and completing a thesis.
2. Students for the Degree of a Master of Arts with thesis in Anthropology will be required to complete not fewer than 12 credit hours, nor more than 18 credit hours of courses at the graduate level. Six of these credit hours will normally be from 6300 and 6412, while the remainder of credit hours are to be selected from the graduate courses offered by the Department.
3. Most Department graduate courses are taught in either a seminar or tutorial framework; all courses require intensive reading, regular oral communication of ideas to faculty and other students, and preparation of written research papers and other assignments.
4. Normally, during the second semester of the first year of study in the program, a written thesis proposal which has been approved by the student's Supervisor(s) will be circulated to all members of the Department. The written thesis proposal should be made available to faculty members at least two weeks prior to the scheduled date of a student's oral presentation and defence of the proposal.
5. Shortly following the completion of their research, students will be required to present an oral research report on their findings to the Department.
6. A final draft of the thesis will be evaluated in accordance with the requirements of the School of Graduate Studies.

9.5.2 M.A. Without Thesis

Normally, the M.A. program without thesis should take one academic year to complete. Students who choose to do the M.A. without thesis must normally complete 24 credit hours in graduate program courses; 15 of which will normally be from ANTH 6300, ANTH 6412, and ANTH 6440. Nine additional credit hours are to be selected from the graduate courses offered by the Department.

Note: ANTH 6440 will be worth 9 credit hours. This course will normally be based on secondary literature and will be supervised by a faculty member.

9.5.3 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

6010 Environmental Anthropology

6071 Health and Illness: Cultural Contexts and Constructions

6072 Marx and Social Inquiry

6081 Anthropology of Gender

6089 Anthropology of Underclass Life

6100 Social Organization

6110 Culture and Personality

6140 The Community

6210 Language and Culture

6240 Atlantic Regional Studies

6260 Anthropology of Development

6280 Newfoundland Ethnography

6281 Labrador Ethnography

6282 Ethnography of a Single Region

6300 Fieldwork and Interpretation of Culture

6400 Current Themes in Cultural Anthropology

6410 History of Anthropology
6412 Anthropological Theory
6413 Applied Anthropology
6430 Audiovisual Anthropology
6440 Master's Research Paper (9 credit hours)
6580 Selected Themes in Political Anthropology
6580-6599 Special Areas in Anthropology (excluding 6580, 6583)
6583 Economics and Societies
6600 Contemporary Debates in Anthropology
6890 Graduate Seminar

9.6 Archaeology

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/archaeology
www.mun.ca/become/graduate/apply/app_deadlines.php

9.6.1 Program of Study

The Degree of Master of Arts is offered in Archaeology by either full-time or part-time study.

1. Students may specialize in either archaeology or bioarchaeology.
2. The choice of specialty will govern the selection of Supervisor(s), courses, and thesis or research paper topics. When students are accepted into the program, they will be assigned one or more Supervisors. Students' programs shall be the responsibility of their Supervisor(s), the graduate co-ordinator, and the Head of the Department.
3. If students' records suggest a deficiency in some areas(s), the Department reserves the right to require that they complete additional undergraduate courses before beginning program courses.
4. Normally, the M.A. program should take six academic semesters to complete, of which the first three semesters will be spent in completing course work, writing and orally defending a thesis proposal before members of the faculty, and beginning to carry out research. The following semesters will be spent in completing research, presenting an oral research report to the Department, and completing a thesis.
5. Students for the Degree of a Master of Arts in Archaeology will be required to complete not fewer than 12 credit hours, nor more than 18 credit hours of courses at the graduate level.
6. Most Department graduate courses are taught in either a seminar or tutorial framework; all courses require intensive reading, regular oral communication of ideas to faculty and other students, and preparation of written research papers and other assignments.
7. Normally, during the second semester of the first year of study in the program, a written thesis proposal which has been approved by the student's Supervisor(s) will be circulated to all members of the Department. The written thesis proposal should be made available to faculty members at least two weeks prior to the scheduled date of a student's oral presentation and defence of the proposal.
8. Shortly following the completion of their research, students will be required to present an oral research report on their findings to the Department.
9. A final draft of the thesis will be evaluated in accordance with the requirements of the School of Graduate Studies.

9.6.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

6000 Theory and Method in the Study of Archaeology and Prehistory (*same as the former 6411*)
6001 Interpretative Methods in Archaeology (*same as the former 6700*)
6095 Advanced Studies in Ethnohistory (*same as History 6095*)
6191 Approaches to Early Modern Material Culture
6409 History of Archaeology
6680 Space, Place and Landscape
6681-6699 (excluding 6682, 6685, 6686, 6687) Special Topics in Archaeology
6682 Advances in Environmental Archaeology
6685 When World's Meet: Nature/Culture and Ontological Conflicts
6686 Archaeology of the Body
6687 Applied Archaeological Sciences

9.7 Classics

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/classics
www.mun.ca/become/graduate/apply/app_deadlines.php

The degree of Master of Arts is offered in Classics. The program is designed so that it may be completed in two academic years of full-time study.

9.7.1 Qualifications for Admission

Admission requirements are set forth in the **Regulations Governing the Degree of Master of Arts, Qualifications for Admission**. In addition to these requirements, an applicant should have completed at least 30 undergraduate credit hours in Greek and Latin language courses including a minimum of 12 credit hours in each language and at least 6 credit hours from senior level courses.

9.7.2 Program of Study

1. A student will complete a minimum of 24 credit hours in Classics courses at the 6000 level including Classics 699A and 699B; 6 of these 24 credit hours must be in Greek and/or Latin courses. Further courses beyond the minimum number may be required, depending on the background of the student.

2. A student is required to demonstrate competence in a modern European language, normally French, German, or Italian, as early as possible in their program of study, but no later than the end of the first semester of the second year. (See **General Regulations, Evaluation, Evaluation of Graduate Students.**)

9.7.3 Courses

6001 Seminar in Greek History and Society
 6002 Seminar in Greek Literature and Culture
 6003 Seminar in Roman History and Society
 6004 Seminar in Roman Literature and Culture
 6200 Latin Literature: Oratory
 6210 Latin Literature: Epic, drama, didactic
 6220 Latin Literature: Lyric, satire, elegy, epigram
 6230 Roman Historians
 6250-6260 Special Topics in Latin Readings
 6300 Greek Literature: Oratory
 6310 Greek Literature: Epic, drama, didactic
 6320 Greek Literature: Lyric, iambic, elegy, epigram
 6330 Greek Historians
 6340 Ancient Philosophical Authors
 6350-6360 Special Topics in Greek Readings
 699A Master's Research Paper (0 credit hours)
 699B Master's Research Paper (6 credit hours)

9.8 Economics

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/econ
www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Arts is offered in Economics. The focus of the program is applied economics. The non-thesis option is designed so that suitably qualified full-time students can complete it in one year. The thesis option normally takes more than one year.

9.8.1 Qualifications for Admission

To be considered for admission, an applicant must normally have completed an undergraduate Degree in Economics at a Canadian university with at least second-class Honours standing, or its equivalent. Satisfaction of this criterion does not guarantee admission and, if admitted, students may be required to complete specified undergraduate courses as deemed necessary by the Department.

9.8.2 Programs of Study

1. Non-Thesis Option

- a. The program of study requires, in addition to any specified undergraduate courses, completion of 26 credit hours in graduate Economics courses, including a master's essay course. The maximum time normally permitted for students to satisfy these requirements is three years.
- b. The 26 credit hours in graduate courses consist of the following:
 - i. 11 credit hours in core courses, which shall normally be completed in the first term of the program: Economics 6000, 6001, 6002, and 6009;
 - ii. 12 credit hours in other courses selected from those offered by the Department;
 - iii. Masters Essay course: Economics 6999. Normally, all other required graduate courses must be completed before the essay.
- c. The master's essay, Economics 6999, must be in the area relating to the courses taken by the student. Students will be assigned a Supervisor, who will approve the topic; the essay will be graded by the Supervisor and one other member of the Department. The essay must be completed during the semester in which the student is registered in Economics 6999. During that time, students may be required to give a Departmental seminar on their essays.

2. Thesis Option

- a. The thesis option consists of 20 credit hours and a thesis. The thesis will consist of a comprehensive study in the area of the student's field courses. The thesis must embody systematic research and demonstrate a mastery of economic principles and their application. Thesis work will be completed under a Supervisor from the Department.
- b. The thesis must normally be completed within the two years following completion of 20 required credit hours, which must include Economics 6000, 6001, 6002, and 6009.
- c. The thesis will normally be evaluated internally and in accordance with the requirements of the School of Graduate Studies.

9.8.3 Courses

The following courses will be offered to meet the requirements of students, as far as resources of the Department will allow.

9.8.3.1 Core Courses

6000 Advanced Micro-economic Theory
 6001 Advanced Macro-economic Theory
 6002 Econometrics
 6009 Graduate Seminar (2 credit hours)

Economics 6000, 6001, 6002 and 6009 are prerequisites for all graduate courses that follow, unless waived in writing by Head of the Department.

9.8.3.2 Elective Courses

6010 Taxation
 6011 Expenditure
 6012 Cost-benefit Analysis

6013 Fiscal Federalism
 6014 Topics in Public Sector Economics
 6020 Economics of Nonrenewable Natural Resources
 6021 Economics of Renewable Natural Resources
 6022 Environmental Economics
 6023 Advanced Fisheries Economics
 6024 Topics in Resource Economics
 6025 Labour Economics
 6040 Industrial Economics
 6050-55 Special Topics in Economics
 6100 Microeconomic Theory and Applications
 6140 Health Economics in the Canadian Context
 6150 Advanced Applied Regression Analysis
 6151 Applied Microeconometrics
 6190 Advanced Topics in Mineral and Petroleum Economics

9.8.3.3 Master's Essay Course

6999 Master's Essay

9.9 English

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/english
www.mun.ca/become/graduate/apply/app_deadlines.php

The degrees of Master of Arts and Doctor of Philosophy are offered in English.

Students for the M.A. in English may complete the program as either part-time or full-time students. Students for the Ph.D. in English must be in attendance as full-time students for at least three semesters of the program.

9.9.1 Admission

1. Admission to the M.A. in English is limited and competitive. Applicants should have an Honours B.A. in English (or the equivalent, 60 credit hours in English with an appropriate range of courses) and a strong academic record.
2. Strong students who have come close to achieving Honours equivalency may be admitted on the condition that they complete such undergraduate courses as the Department may deem necessary, in addition to the required graduate courses.
3. Students who have not completed English 4900 or an equivalent course will be required to complete English 5900 which will not count as one of the required courses for the M.A. The course will be graded 'pass' or 'fail'. As in other graduate courses a grade of 65 or above is considered a pass.

9.9.2 Program of Study

1. Thesis Option

- a. Students completing the M.A. with thesis will complete a minimum of 15 credit hours in graduate courses, which will normally include English 7003 and a thesis. The thesis may be a creative work.
- b. Students must submit a thesis proposal which includes a statement of topic, a working title, a plan of research, and a preliminary bibliography. The proposal should be approved by the Supervisor or Supervisors and submitted to the Departmental Graduate Studies Committee for its approval by the end of the student's third semester. The Departmental Graduate Studies Committee shall return the thesis proposal to the student no later than one month after receiving it.
- c. Full-time students who choose the thesis option will usually complete their degree in two years.

2. Non-Thesis Option

- a. Students completing the M.A. without thesis will complete a minimum of 24 credit hours in graduate courses, which will normally include English 7003.
- b. Full-time students who choose the non-thesis option will usually complete their degree in one year.

9.9.3 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

- Notes:
1. *Since it is impossible to list in detail the many topics that may from time to time be offered, the titles below refer only to the major periods and general subject areas in which specific courses may be available. The content and approach in specific courses will vary according to the research interests of students and faculty involved in the course. Students should consult the Department's annual Graduate Student Guide (or the Graduate Co-ordinator) for detailed descriptions of specific course offerings. Normally, no fewer than ten graduate courses are offered in any given academic year.*
 2. *English 5900 cannot be counted as one of the required graduate courses in any program.*
 3. *All students will normally take English 7003 - Trends in Contemporary Literary Theory, usually in their first semester.*
 4. *Students who took graduate courses in English at Memorial University of Newfoundland before 1997 should consult with the Department before selecting further courses.*

602F Foundation English for Graduate Students
 6999 Master's Essay (for non-thesis students)
 7003 Trends in Contemporary Critical Theory
 7099 Masters Internship
 7100-7149 Author Studies
 7150-7199 Book Histories
 7200-7249 Creative Writings
 7250-7299 Critical Theories
 7300-7349 Cultural Studies
 7350-7399 Genre Studies
 7400-7449 Global Literatures
 7450-7499 Indigenous Voices

7500-7549 Literary Movements
 7550-7599 National Literatures
 7600-7649 Period Studies
 7650-7699 Regional Literatures
 7700-7749 Special Topics
 7750-7799 Visual Narratives"

9.10 Environmental Policy

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/sgs
www.mun.ca/become/graduate/apply/app_deadlines.php

The M.A. in Environmental Policy is a rigorous, interdisciplinary study of environmental policy in terms of its theory, application, methodology, and approaches with reference to central contemporary debates. It is also an applied program that equips students with practical skills in the field making links to the labour market through a required internship program.

The M.A. in Environmental Policy is offered by full-time study or part-time study and by completion of either a thesis or research paper. The **Thesis Option** involves completion of 15 credit hours of course work, an internship, and a thesis, and is normally completed in two academic years of full-time study and in three academic years of part-time study. The **Research Paper Option** involves completion of 18 credit hours of course work, an internship, and a research paper, and is normally completed in one academic year of full-time study and up to three academic years of part-time study.

The following regulations must be read in conjunction with the **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland.

9.10.1 Administration

1. The program shall be administered by a Graduate Officer, who reports to the Dean of Graduate Studies. The Graduate Officer shall be appointed by the Dean of Graduate Studies on the recommendation of the Head of Social Science, Grenfell Campus and the Vice-President, Grenfell Campus. In making this recommendation, the Head of Social Science, Grenfell Campus and the Vice-President, Grenfell Campus may consult with the environmental policy community both within and outside the University.
2. An Executive Committee consisting of the Graduate Officer and the Head of Social Science, Grenfell Campus and the Vice-President, Grenfell Campus will be established to review administrative, resource, and strategic planning issues related to the program. This committee shall be chaired by the Dean of Graduate Studies.
3. The Graduate Officer shall consult with the Graduate Committee in Environmental Policy (GCEP) for the purposes of administering the academic elements of the program. The GCEP shall normally consist of seven members appointed by the Dean of Graduate Studies on the recommendation of the Graduate Officer. The GCEP will include the Graduate Officer, who shall chair the committee, approximately four faculty members from the School of Arts and Social Science, Grenfell Campus who teach core courses, the Head of Social Science, Grenfell Campus and one student representative, Grenfell Campus.
4. An Advisory Board in Environmental Policy (ABEP) shall be established for the purposes of consulting with and obtaining feedback from the environmental policy community. The ABEP will consist of a broad cross-section of members from the environmental policy community both within and outside the University who shall be appointed by the Dean of Graduate Studies on the recommendation of the Graduate Officer.

9.10.2 Qualifications for Admission

1. Admission is limited and competitive.
2. To be considered for admission, applicants shall have an undergraduate degree, with a minimum B standing, from an institution recognized by Senate.
3. In exceptional cases, applicants who have not completed an undergraduate degree may be considered for admission. Preference will be given to those who have a minimum of 10 years of full-time professional experience, including demonstrated success in environmental policy, and who have successfully completed substantial university course work including several courses at an advanced undergraduate level from an institution recognized by Senate. Applicants without an undergraduate degree must have completed one or more undergraduate courses in public policy, public administration or political science and one or more undergraduate courses in geography, biology or chemistry from an institution recognized by Senate, with a minimum B standing in each course. Applicants may also be required to successfully complete the Graduate Management Admission Test (GMAT) or the Graduate Record Examination (GRE) with an acceptable score and/or additional undergraduate courses before being considered for admission.
4. To be eligible for consideration for admission, applicants shall meet the English Proficiency Requirements described under **General Regulation - Qualifications for Admission, English Proficiency Requirements**.
5. Applicants will be assessed for admission to the M.A. in Environmental Policy based on their interests, their potential to produce meaningful research in the field of environmental policy, and the availability of supervisors in the area of the applicant's interest.
6. Interdisciplinary study in the program is encouraged by the University. Applicants with an interdisciplinary background or whose background combines two or more fields of study (e.g., political science, public policy, environmental studies, geography, resource management, environmental science, public administration) would be an excellent fit for this program.

9.10.3 Deadlines for Applications

1. Applicants seeking full-time enrollment will normally only be admitted to the program in the Fall (September) semester.
2. Applications must be postmarked no later than February 15 for applicants wishing to enter full-time or part-time studies in the Fall (September) semester.
3. Applications must be postmarked no later than August 15 for applicants wishing to enter part-time studies in the Winter (January) semester.
4. Individuals submitting applications later than the above dates are not assured of consideration for admission to the program in the semester desired; their applications will be processed only if time and resources permit.

9.10.4 Procedure for Admission

1. Applications for admission to the M.A. in Environmental Policy program must be made on the appropriate form and submitted to the School of Graduate Studies.

2. The following documents must be submitted in support of the official application form:
 - a. Letter of appraisal from two referees, at least one of whom is capable of appraising the applicant's academic potential as a graduate student, and at least one of whom is capable of appraising the applicant's professional experience and/or actual or likely success in a career in environmental policy.
 - b. Official transcripts from each university or other post-secondary institution previously attended, to be sent directly by its Registrar (or equivalent officer) to the School of Graduate Studies. If not recorded on the transcript, official evidence of completion of undergraduate degree must also be submitted.
 - c. All applicants must submit a one page statement outlining their research interests and are strongly encouraged to identify a supervisor.
 - d. Application files are normally evaluated after the deadline dates for application noted above and only when all required documentation has been received.
 - e. Admission shall be by the Dean of Graduate Studies on the recommendation of the GCEP. Upon notification from the Dean of the School of Graduate Studies of acceptance into the M.A. in Environmental Policy program, applicants must give written notice to the School of Graduate Studies of their intention to register.

9.10.5 Program of Study

1. **Thesis Option:** Students in the thesis-based program must complete 15 credit hours in graduate program as specified in **Table 1**, an internship (ENVP 6030) and a thesis. There are four required courses (representing 12 credit hours) as specified in **Table 2**. One elective, representing 3 credit hours, related to the student's research specialty is to be completed and may be chosen from **Table 3** in consultation with the student's thesis supervisor.
2. **Research Paper Option:** Students in the research paper-based program must successfully complete 18 credit hours in graduate program courses as specified in **Table 1**, an internship (ENVP 6030) and a Research Paper (ENVP 6999). There are four required courses (representing 12 credit hours) as specified in **Table 2**. Two electives, representing 6 credit hours, are to be completed, of which at least one is to be from **Table 2**. The second elective, related to the student's research specialty, may be chosen from **Table 2 or Table 3** in consultation with the student's research paper supervisor.
3. Further courses beyond the minimum number may be required, depending on the background and needs of the student.
4. Students are responsible for fulfilling all prerequisites.
5. All students are required to attend two Workshops:
 - a. **Policy and Science Orientation Workshop**
This workshop is held the first week of September each year. Its intent is to provide students with a limited policy or biophysical background with conceptual tools to frame each discipline in order to orient students to the program. The workshop is team-taught and is three full days in length.
 - b. **Pre-Internship Workshop**
This two-day workshop reviews the internship requirements, aids students in writing resumes and cover letters, discusses interviewing practices and examines student/employer relationships. It is held during the first week after classes end in December of each year.
6. **Internship Requirements**
 - a. All students are required to complete an environmental policy internship (ENVP 6030) with a relevant government office, non-governmental organization, community group, or business. Internships are normally selected from a list of approved organizations that is maintained by the Internship Officer and Graduate Officer. Internship placements may be outside the Corner Brook area and possibly outside Newfoundland and Labrador. Final decisions for internship placements rest with the Graduate Officer in consultation with the Internship Officer.
 - b. Internships are usually completed in the Spring semester of each year.
 - c. Internships are for full-time employment hours for the duration of the semester (12 weeks). Part-time internships over longer periods may be considered and will require approval from the Internship Officer and the Graduate Officer.
 - d. A competition for internships is organized by the Internship Officer. By entering the competition, students give permission for the Internship Officer to supply their university transcripts to potential employers. Students who do not wish to accept an internship arranged by the Internship Officer shall be responsible for finding an alternative acceptable to the Internship Officer in consultation with the Graduate Officer.
 - e. Students must attend scheduled pre-internship orientation workshop, professional development, and exit meeting.
 - f. Each internship placement is supervised and evaluated by the Internship Officer, the on-site Supervisor assigned by the employer and the Graduate Program Coordinator. The internship shall consist of two components:
 - i. On-Site Student Performance as evaluated by the Internship Officer in consultation with the on-site Supervisor assigned by the employer.
 - ii. An Internship Report graded by the Internship Officer or the Graduate Officer in consultation with the on-site Supervisor assigned by the employer.
 - g. Evaluation of the Internship shall result in one of the following final grades: Pass, or Fail.
A student must obtain a Pass in both the On-Site Student Performance and the Internship Report to obtain a final grade of Pass. If a student fails to achieve the internship standards specified above, the student may be required to withdraw from the program. Such a student may reapply to the program after a lapse of two semesters, at which time the student will be required to complete a further internship with satisfactory performance before being admitted to any further academic term in the Faculty. An internship may only be repeated once.
 - h. Students who voluntarily withdraw from the internship without prior approval from the Internship Officer and the Graduate Officer, or who conduct themselves in such a manner as to cause the host organization and the Internship Officer to terminate the placement, will normally be awarded a grade of Fail in the internship.
 - i. Students are not permitted to drop internships without prior approval of the Internship Officer in consultation with the Graduate Officer. The Internship Officer will make a recommendation to the Graduate Officer who will make the final decision. Students who drop an internship without permission, who fail to honour an agreement to work with a host organization, or who conduct themselves in such a manner as to cause their discharge from the internship position will normally be awarded a failed grade for the internship. Permission to drop an internship does not constitute a waiver of degree requirements, and students who have obtained such permission must complete an approved internship in lieu of the one dropped.

7. Students in the M.A. in Environmental Policy shall meet the minimum residency of at least two semesters required under **General Regulation, Registration - Period of Study** of the University Calendar. Students are encouraged to meet this residency requirement in the first two semesters of their program.
8. All students will be required to present a seminar on their thesis or research paper in the final semester of their program as part of their thesis or research paper requirements. For applicable students, the thesis will be examined in accordance with the **General Regulations - Theses and Reports** of the School of Graduate Studies.

9.10.6 Evaluation

1. Students for the Master of Arts in Environmental Policy degree must obtain a grade of 'B' or better in all program courses.
2. Students who receive a grade of less than 'B' in a program course will be permitted to remain in the program, provided the course is repeated and passed with a grade of 'B' or better. Alternatively, the student may, on the recommendation of the GCEP, and with the approval of the Dean of Graduate Studies, substitute another graduate course. Only one course repetition or substitution will be permitted during the student's program after which the student shall be required to withdraw from the program.

9.10.7 Courses

The schedule of courses for the Master of Arts in Environmental Policy is as follows:

Table 1 Master of Arts in Environmental Policy Schedule of Courses

Term	Thesis Option	Research Paper Option
Fall Semester 1	Policy and Science Internship Workshop Two required courses from Table 2 One elective from Table 2 or Table 3 Pre-Internship Workshop	Policy and Science Internship Workshop Two core courses from Table 2 One elective from Table 2 or Table 3 (one elective, either in the Fall or Winter Semester, shall be from Table 2) Pre-Internship Workshop
Winter Semester 2	Two required courses from Table 2	Two core courses from Table 2 One elective from Table 2 or Table 3 (one elective, either in the Fall or Winter Semester, shall be from Table 2)
Spring Semester 3	Environmental Policy 6030 Internship	Environmental Policy 6030 Internship

Table 2 Master of Arts in Environmental Policy Courses - Grenfell Campus

Required Courses	Elective Courses
6000 Foundations of Environmental Policy and Administration 6001 Applied Environmental Problem Solving: A Case Based Approach 6002 Research Design and Methods 6003 Environmental Political Thought	6052 Political Economy, Political Ecology and Policy 6053 Ecological Economics 6054 Labour and Environmental Policy 6055 Environmental Impact Assessment (cross-listed as EVST 4000) 6056 Risk Assessment and Analysis 6057 Energy Policy 6058 Management and Regulation of Water Resources 6059 Natural Resources Policy and Administration 6520-30 Special Topics Courses

Table 3 Master of Arts in Environmental Policy - Policy Relevant Courses - St. John's Campus

<p>Biology 7551 Fisheries Resource Management</p> <p>Business 8210 Labour Relations 9329 Labour Law</p> <p>Economics 6014 Topics in Public Sector Economics 6020 Economics of Nonrenewable Natural Resources 6021 Economics of Renewable Natural Resources 6022 Environmental Economics 6023 Advanced Fisheries Economics 6024 Topics in Resource Economics</p> <p>Engineering 9601 Environmental Pollution and Mitigation (cross-listed as Environmental Science 6004) 9622 Environmental Statistics 9624 Air Pollution (cross-listed as Environmental Science 6008) 9625 Environmental Impacts of Offshore Oil and Gas Operations 9629 Environmental Policy and Regulations 9630 Pollution Prevention</p> <p>Environmental Science 6000 Environmental Science and Technology 6001 Earth and Ocean Systems 6002 Environmental Chemistry and Toxicology 6003 Applied Ecology</p>	<p>Fisheries Resource Management 6003 Fisheries Economics 6004 Fisheries Policy 6005 Fisheries Planning and Development 6006 Business Management for Fisheries</p> <p>Geography 6204 Sustainable Community and Regional Development 6250 Conservation and Sustainability of Natural Resources 6251 Survey Design, Questionnaire Development and Techniques of Data Collection 6300 Problems in Fisheries Geography 6500 Cultural Geography 6700 Political Geography</p> <p>Medicine 6288 Policy and Decision Making 6722 Environmental Health</p> <p>Political Science 6710 Intergovernmental Relations 6740 Public Administration 6790 Public Policy Process</p> <p>Sociology 6140 The Community 6350 Environmental Sociology</p>
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9.11 Ethnomusicology

www.mun.ca/sgs/contacts/sgscontacts.php
 www.mun.ca/music
 www.mun.ca/hss
 www.mun.ca/folklore
 www.mun.ca/become/graduate/apply/app_deadlines.php

The Master of Arts program in Ethnomusicology is administered by the School of Music in consultation with the Department of Folklore, and generally in response to recommendations from an Interdisciplinary Advisory Committee with representation from both academic units, chaired by the Program Co-ordinator.

The Degree of Master of Arts in Ethnomusicology is offered by part-time and full-time study. While it is normally a course work degree, a thesis option is available upon application. Fieldwork is often a requirement both for independent research and course work. The resources of the Memorial University of Newfoundland Folklore and Language Archive are available to graduate students in Ethnomusicology.

9.11.1 Qualifications for Admission

Applicants may be admitted to the program if they have at least a B+ average with a B.Mus. Degree or other Degree in the Humanities or Social Sciences with evidence of specialization in music. Applicants whose professional music training took place outside the university system are also encouraged to apply, provided they have the academic equivalent of the qualifications described above. Applicants from a discipline other than Music will be expected to demonstrate the following skills:

- Competent performance in any musical tradition, as judged by a musician knowledgeable about that tradition.
- Knowledge of culturally appropriate language for discussion of performance techniques in that tradition.
- Ability to discuss musical details on the basis of aural and/or written sources, as appropriate to that tradition.

Applicants for admission may, at the discretion of the Interdisciplinary Advisory Committee, be required to write diagnostic examinations measuring skills and knowledge in music literacy, theory, or aural perception. Applicants with deficiencies in any of these areas may be required to take remedial course work prior or in addition to the required program.

9.11.2 Program of Study

The M.A. program will normally be completed within five consecutive semesters of full-time study. The degree is normally taken by completing course work and a major research paper. In special circumstances, a student may apply to complete the degree by completing course work and a thesis. Demonstration of competence in a language other than English may be required if warranted by the research proposed by the student.

1. Course Work M.A.

- a. Students must normally complete a minimum of 24 credit hours plus a major research paper (Music 7002). Further courses beyond the minimum number may be required, depending on the background of the student. The required courses are:
 - i. Music 7001; Folklore 6030.
 - ii. Folklore 6100.
 - iii. One area or genre studies course (3 credit hours) relevant to the research of the student.
 - iv. Twelve credit hours to be selected from the Music and Folklore courses listed below (with the approval of the Interdisciplinary Advisory Committee); one elective (3 credit hours) may be a relevant course offered in another discipline (with the approval of the Interdisciplinary Advisory Committee).
- b. Research paper (Music 7002) on a topic chosen by the student with the student's supervisor's approval. Proposals for topics and supervisors will be vetted by the Interdisciplinary Advisory Committee no later than the beginning of the third term of study. The paper will normally demonstrate the student's ability to apply methodologies and theoretical constructs, learned in the courses taken, to a specific repertory, or performance context.

2. Thesis M.A. (available by special application to the Interdisciplinary Advisory Committee)

- a. Students must normally complete a minimum of 21 credit hours plus a thesis. The required courses are:
 - i. Music 7001; Folklore 6030.
 - ii. Folklore 6100.
 - iii. One area or genre studies course (3 credit hours) relevant to the research of the student.
 - iv. Nine credit hours to be selected from the Music and Folklore courses listed below (with the approval of the Interdisciplinary Advisory Committee); one elective (3 credit hours) may be a relevant course offered in another discipline (with the approval of the Interdisciplinary Advisory Committee).
- b. Thesis submitted in accordance with General Regulation **Theses and Reports** of the School of Graduate Studies. A thesis proposal, consisting of a statement of topic, working title, plan of research, and preliminary bibliography, with the name of the preferred Supervisor, shall be submitted by the student to the Interdisciplinary Advisory Committee no later than the beginning of the third term of study.

9.11.3 Courses

Theories and Methods:

Music 6001 Research Methods
 Music 6002 Graduate Seminar
 Music 6807 Video Documentary Production (*credit may be received for only one of Music 6807, Music 7003 or Music 7803*)
 Music 7001 Research Problems and Methods in Ethnomusicology
 Music 7002 Research Paper
 Music 7003 The Politics of Ethnographic Video Methods in Ethnomusicology
 Music 7803 Radio Documentary Production (*credit may be received for only one of Music 6807, Music 7003 or Music 7803*)
 Folklore 6010 Survey of Folklore Genres and Processes
 Folklore 6020 Field and Research Methods
 Folklore 6030 Folklore Theories
 Folklore 6040 Feminist Theories: Perspectives and Issues
 Folklore 6080 Vernacular Theories
 Folklore 6090 Ethnology

Folklore 7100 Advanced Folkloristics II: Research and Ethnography

Form and Performance:

Music 7005 Performance Option
 Folklore 6100 Song and Music
 Folklore 6120 Ballad
 Folklore 6130 Folk Music Canons and Documentary Sound Recordings
 Folklore 6200 Folktale
 Folklore 6210 Legend
 Folklore 6220 Personal Experience Narrative
 Folklore 6250 Language and Play
 Folklore 6260 Ethnography of Communications
 Folklore 6300 Ethnography of Belief
 Folklore 6310 Health Systems
 Folklore 6350 Custom
 Folklore 6360 Traditional Drama
 Folklore 6400 Material Culture
 Folklore 6410 Vernacular Architecture
 Folklore 6420 Art and the Artifact
 Folklore 6430 Food and Culture
 Folklore 6720 Folklore and Literature

Area and Genre Studies:

Music 7010 World Music: Music of Asia and Oceania
 Music 7011 World Music: Music of Africa and the Americas
 Music 7012 Canadian Musical Traditions
 Music 7013 Music and Culture
 Music 7017 Folksong
 Music 7018 Jazz and Blues: The Roots of Popular Music
 Folklore 6120 Ballad
 Folklore 6600 Folklore of Newfoundland
 Folklore 6610 Folklore of Canada
 Folklore 6620 Folklore of the United States
 Folklore 6630 Folklore of the British Isles
 Folklore 6770 The Global and the Local

Social Identities:

Music 7006 Urban Ethnomusicology
 Music 7007 Music in the Study of Gender, Race and Class
 Music 7009 Music and Place
 Music 7802 Music and Intercultural Processes
 Folklore 6510 Occupational Folklore
 Folklore 6551 Indigenous Expressive Cultures in Cross-cultural Encounter
 Folklore 6730 Folklore and Gender
 Folklore 6780 Ethnicities

Public and Applied Ethnomusicology and Folklore:

Music 6700 Career Skills for Musicians
 Music 6750 Music Industries Internship (2 credit hours)
 Folklore 6740 Public Sector Folklore
 Folklore 6760 Archiving
 Folklore 6790 Museums: Perspectives and Practices
 Folklore 6800 Applied Folklore

Interdisciplinary Perspectives:

Music 7008 Media Studies
 Folklore 6700 Folklore and Culture
 Folklore 6710 Oral Tradition and Oral History
 Folklore 6750 Popular Culture: Theory and Debate

Independent Study:

Music 7026-29 Directed Reading in Ethnomusicology
 Folklore 6570-79 Reading Courses in Folklore

Special Topics:

Music 6800-09 Special Topics in Music (excluding Music 6807)
 Music 7800-09 Special Topics in Music (excluding Music 7802 and 7803)
 Folklore 6511-29 Special Topics in Folklore
 Folklore 6570-79 Reading Course in Folklore

9.12 Folklore

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/folklore
www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Arts in Folklore is offered by part-time and full-time study. The program normally requires extensive fieldwork research in Newfoundland.

Integral to the teaching of the Department of Folklore is work of the Memorial University of Newfoundland Folklore and Language Archive.

9.12.1 Program of Study

1. Applicants may be admitted to the graduate program if they have an average of at least grade 'B' in no fewer than 36 credit hours in Folklore or in any other discipline in the Humanities or Social Sciences.

2. The M.A. program will normally be completed within six consecutive semesters (i.e., a two-year period). The Degree of Master of Arts in Folklore may be taken by course work and comprehensive examination, course work and thesis, or course work and co-operative education work terms. All options are available to full-time and part-time students. However, the work term component of option C cannot be completed on a part-time basis.

a. **M.A. With Thesis:**

- i. Students choosing to do the M.A. with thesis must normally complete a minimum of 24 credit hours plus a thesis. Normally, the required courses are:
 - 6010, 6020, and 6030, normally taken as an integrated foundation in the Fall semester.
 - At least one of the following: 6060, 6100, 6120, 6130, 6200, 6210, 6220, 6250, 6260, 6360, 6720.
 - At least one of the following: 6070, 6300, 6310, 6350, 6370, 6400, 6410, 6420, 6430.
 - Nine additional credit hours to be selected from courses in the groups listed above or from the other courses offered by the Department.
- ii. A brief thesis pre-proposal, including a statement of topic, working title, plan of research, ethics statement, preliminary bibliography, and the name of a preferred Supervisor, shall be submitted no later than the end of the student's second semester. A full proposal shall normally be submitted to the Department of Folklore and orally presented before members of the faculty by the end of the student's fourth semester. The written thesis proposal should be made available to faculty members at least two weeks prior to the scheduled date of a student's oral presentation of the proposal. Following approval of the thesis proposal and consultation with the student, the Supervisor and thesis topic will be recommended to the Dean.

b. **M.A. With Comprehensive Examination:**

- i. Students choosing to do the M.A. with comprehensive examination must normally complete a minimum of 30 credit hours plus comprehensive examination. Normally, the required courses are:
 - 6010, 6020, and 6030, normally taken as an integrated foundation in the Fall semester.
 - At least one of the following: 6060, 6100, 6120, 6130, 6200, 6210, 6220, 6250, 6260, 6360, 6720.
 - At least one of the following: 6070, 6300, 6310, 6350, 6370, 6400, 6410, 6420, 6430.
 - Fifteen additional credit hours to be selected from courses in the groups listed above or from the other courses offered by the Department.
- ii. Each student selecting the M.A. with comprehensive examination option shall normally submit, by the end of the student's second semester, written notification of intention to take comprehensives.
- iii. Each student selecting this option shall normally write the comprehensive examination at the end of the student's fifth semester in the program. The comprehensive examination will be graded by a comprehensive examination committee appointed by the Dean of Graduate Studies on the recommendation of the Head of the Department, in accordance with **General Regulations** governing the School of Graduate Studies.

c. **M.A. With Public and Applied Folklore Co-operative Education Work Terms:**

- i. Students choosing to do the M.A. with Public and Applied Folklore Co-operative Education option must normally complete a minimum of 24 credit hours plus two co-operative education work terms. Normally the required courses are:
 - 6010, 6020, and 6030, normally taken as an integrated foundation in the Fall semester.
 - 6740 or 6800 and at least one additional course selected from the following: 6551, 6740, 6760, 6790, 6800.
 - At least one of the following: 6060, 6100, 6120, 6130, 6200, 6210, 6220, 6250, 6260, 6360, 6720.
 - At least one of the following: 6070, 6300, 6310, 6350, 6370, 6400, 6410, 6420, 6430.
 - Three additional credit hours to be selected from courses in the groups listed above or from the other courses offered by the Department.
 - 601W and 602W.
- ii. The dates for starting and finishing each work term are shown at www.mun.ca/coop.
- iii. The Co-op component of the program is managed by the Academic Staff Members in Co-operative Education for the Faculty of Humanities and Social Sciences (ASMs-CE). It is the student's responsibility to seek and obtain a work term. Work terms cannot be guaranteed by the University although every effort will be made to assist students in their job searches. Work term jobs may be outside St. John's and possibly outside Newfoundland and Labrador. Work term jobs identified by students must be confirmed in writing by the employer and approved by the ASM-CE on or before the first day of the work term.
- iv. A student who is unable to secure a work term may apply for a change to the thesis or comprehensive examination program option.
- v. By entering the program, students give permission for ASM-CEs to supply their resumes and transcripts to potential employers.
- vi. Work terms are co-evaluated by a faculty member in the department of Folklore and by the ASM-CE.
- vii. The work term evaluation shall consist of two components:
 - On-the-job Student Performance as evaluated by ASM-CE with feedback from the student's on-site supervisor.
 - One or more reports graded by the student's program supervisor in consultation with the ASM-CE.
- viii. Evaluation of the work term will result in the assignment of one of the following final grades:
 - *Pass with Distinction*: Indicates OUTSTANDING PERFORMANCE in both the work report(s) and work performance.
 - *Pass*: Indicates that PERFORMANCE MEETS EXPECTATIONS in both the work report(s) and work performance.
 - *Fail*: Indicates FAILING PERFORMANCE in the work report(s) and/or the work performance.

If a student fails to achieve a final grade of *Pass* or *Pass with Distinction*, and provided the student has not failed to achieve a grade of 'B' or better in any program course, the student may apply for a change of route to the thesis or comprehensive examination program option.

- ix. A student is not permitted to drop a work term without prior approval of the Department and the ASMs-CE. A student who drops a work term without permission, or who fails to honour an agreement to work with an employer, will be assigned a grade of FAL (fail) for that work term.
A student who conducts oneself in such a manner as to cause termination from the job, will normally be assigned a grade of FAL (fail) for that work term.

9.12.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, normally after consultation with the Head of the Department or the Graduate Studies Administrator, and as far as the resources of the Department will allow. Courses are structured according to the categories of: Theories and Methods, Issues, Form and Performance, Special Topics, Regional, National and International Heritage, Social Identities, Public and Applied Folklore, Interdisciplinary Perspectives, and Required (Ph.D.):

Co-operative Education Work Terms

601W Work Term I

602W Work Term II

Theories and Methods

6010 Survey of Folklore Genres and Processes

6020 Field and Research Methods (may be offered in accelerated format)

6030 Folklore Theories

6040 Feminist Theories: Perspectives and Issues

6080 Vernacular Theories

6090 Ethnology

Issues

6050 Issues in Folkloristics

6060 Issues in Oral Tradition and Performance

6070 Issues in Folklife

Form and Performance

6100 Song and Music

6120 Ballad

6130 Folk Music Canons and Documentary Sound Recordings

6200 Folktale

6210 Legend

6220 Personal Experience Narrative

6250 Language and Play

6260 Ethnography of Communications

6300 Ethnography of Belief

6310 Health Systems

6350 Custom

6360 Traditional Drama

6370 Ritual, Festival and Public Display

6400 Material Culture

6410 Vernacular Architecture

6420 Art and the Artifact

6430 Food and Culture

6720 Folklore and Literature

Special Topics

6511-29 Special Topics in Folklore

6550 Special Research in Folklore

6551 Indigenous Expressive Cultures in Cross-cultural Encounter

6552-69 Special Research in Folklore

6570-79 Reading Course in Folklore

Regional, National and International Heritage

6600 Folklore of Newfoundland

6610 Folklore of Canada

6620 Folklore of the United States

6630 Folklore of the British Isles

6640 Traditional Culture of Scotland

6650 Culture and Traditions of Ireland

6660 Folklore of the Francophone Regions

6690 International Folklore

Social Identities

6510 Occupational Folklife

6730 Folklore and Gender

6770 The Global and the Local

6780 Ethnicities

Public and Applied Folklore

6380 Perspectives on Cultural Tourism

6740 Public Sector Folklore

6760 Archiving

6790 Museums: Perspectives and Practices

6800 Applied Folklore

Interdisciplinary Perspectives

6700 Folklore and Culture

6710 Oral Tradition and Oral History

6750 Popular Culture: Theory and Debate

Required (Ph.D.)

7000 Advanced Folkloristics I

7100 Advanced Folkloristics II Research and Ethnography

Note: Credit may not be obtained for both 6010 and the former 6110; 6020 and the former 6111; 6030 and the former 6112; 6100 and the former 6430; 6120 and the former 6445; 6300 and the former 6230; 6350 and the former 6230; 6400 and the former 6501; 6720 and the former 6460.

9.13 French

www.mun.ca/sgs/contacts/sgscontacts.php
 www.mun.ca/hss
 www.mun.ca/languages
 www.mun.ca/become/graduate/apply/app_deadlines.php

9.13.1 Program of Study

1. The Degree of Master of Arts in French Studies may be completed by full-time or part-time study. "French Studies" may take the form of the study of the French language or of francophone literature, including the study of literary history, criticism, or theory. It may also include the study of French-language cinema or of other aspects of francophone civilization.
2. Students who are practicing teachers of French and wish to pursue French studies in conjunction with studies of the teaching of French may opt to pursue the Master of Arts and Education (Education and Francophone Literatures and Cultures) degree jointly offered by the Faculty of Humanities and Social Sciences, Department of Modern Languages, Literatures and Cultures, and the Faculty of Education.
3. Applicants for the M.A. program in French Studies are normally expected to have completed the Honours Degree with a second-class standing or better. An applicant who does not hold an Honours Degree or its equivalent may be required to complete such additional undergraduate courses as the Department considers necessary, prior to admission or as part of the program.
4. The M.A. program in French Studies will consist of 15 credit hours in graduate courses (normally requiring 2 or 3 semesters of full-time study), plus research activities and a thesis of approximately 80 pages. The 15 credit hours shall include 6008 and 6009, normally completed in consecutive semesters. The remaining 9 credit hours shall be obtained by completion of three courses chosen from those in three of the five groups listed in the **Courses** section below. The language of the thesis will be French. The thesis proposal, after being approved by the Supervisor, will be submitted by the student, normally before the end of the third semester of studies, to the Departmental Graduate Studies Committee, who will decide whether or not to grant its approval.
5. Each student's program of study must be approved by the Departmental Graduate Studies Committee.
6. A paper drawn from the thesis will be presented at a Departmental seminar or in another forum approved by the Departmental Graduate Studies Committee. Normally, this presentation will take place at some time between submission of the final draft thesis to the Supervisor and the submission of the thesis to the School of Graduate Studies.
7. The approval of the Departmental Graduate Studies Committee must be obtained before the thesis is forwarded to the School of Graduate Studies for examination.
8. In the final version of the M.A. thesis and other written assignments for M.A. courses, the quality of written French must be of a standard acceptable to the Department as represented by the Graduate Studies Committee. Normally, this will mean that the final version of such assignments will be free of spelling, lexical, and grammatical errors, and of improper use of stylistic conventions. In the case of the M.A. thesis, this requirement applies to the version submitted for examination.

9.13.2 Courses

A selection of the following graduate courses will be offered to meet students' requirements, as far as the resources of the Department will allow. Individual courses, excluding French 6900, may be offered in accelerated format outside of the regular semester of session time frame when being delivered as part of the Summer Institute for French Teachers (SIFT):

6008* Literary Methodology and Theory I
 6009* Literary Methodology and Theory II

Historiographical, Genetic, Thematic, Hermeneutical or other historical or critical approaches to French Studies

6032 Genetic Criticism and Exegesis
 6102 History of the French Language

Psychoanalytical, Ethnological or Anthropological approaches to French Studies

6020 Literature and Psychoanalysis
 6021 Mythocriticism
 6130-39 Personal/Intimate Literature

Sociological or Socio-historical approaches to French Studies

6022 History, Society, Ideology and Texts
 6101 The Female Voice: Women's Writing and its Contribution to the Development of French and Francophone Texts
 6110-19 Paraliterature and Traditional Culture

Linguistic, Semiotic, Poetic, Rhetorical or Pragmatic approaches to French Studies

6011 General Theory of the French Language
 6030 Grammar of the Text
 6031 Narratology
 6140-49 Genres and Discursive Forms

Other approaches to French Studies

6120-29 Texts/Images/Sounds
 6150-59 Special Topics

French and Spanish Courses for Students in Other Disciplines

French 6900 Reading in French
 Spanish 6900 Reading in Spanish

Note: *Credit may not be obtained for both French 6008 and the former French 6006; or for both French 6009 and the former French 6006.

Français

www.mun.ca/sgs/contacts/sgscontacts.php
 www.mun.ca/hss
 www.mun.ca/languages

1. Le diplôme de Maîtrise ès Arts en Études françaises sanctionne des études à temps plein ou à temps partiel. Les études françaises comprennent l'étude de la langue et de la littérature et l'étude de l'histoire, de la critique ou de théorie littéraire, ainsi que l'étude du cinéma ou d'autres aspects des civilisations francophones.
2. Les enseignants et enseignantes de français qui veulent poursuivre leurs études en français et en didactique du français peuvent choisir le programme de Maîtrise ès Arts et Éducation (Enseignement des littératures et cultures francophones) offerte par la Faculté

des Humanités et des Sciences Sociales, Département de langues, littératures et cultures modernes et la Faculté d'Éducation et la Faculté d'Éducation.

3. Pour être admis au programme de Maîtrise ès Arts en Études françaises, l'étudiant doit normalement détenir un diplôme de baccalauréat avec une spécialisation en Études françaises et une note moyenne d'au moins B. Le département pourra obliger toute personne ne détenant pas ce diplôme ou son équivalent à suivre certains cours du premier cycle avant d'être admis au programme de deuxième cycle ou pendant ses études de maîtrise.
4. L'option en Études littéraires comprend quinze crédits de cours, ce qui exigera normalement 2 ou 3 trimestres d'études à temps plein et un mémoire d'environ 80 pages rédigé en français. Tous les candidats compléteront le Fr.6008 et le Fr.6009.
Normalement, ces deux cours devront être complétés en deux trimestres consécutifs. En plus, il faudra compléter 3 cours choisis parmi ceux qui font partie de 3 des 5 groupes identifiés dans la section **COURS**. Le projet de mémoire, qui est approuvé par son directeur, doit être officiellement présenté par le candidat au Comité des Études de deuxième cycle, avant la fin du troisième trimestre, pour son approbation.
5. Le programme d'études du candidat doit être approuvé par le Comité des Études de deuxième cycle.
6. Une communication tirée du mémoire sera présentée dans le cadre des séminaires départementaux ou dans une autre réunion approuvée par le Comité des Études de deuxième cycle. Normalement, cette présentation se fera entre la soumission à son directeur et sa soumission définitive à l'École des Études supérieures.
7. Avant d'être soumis à l'École des Études supérieures, le mémoire doit être proposé au Comité des Études de deuxième cycle, qui doit en autoriser le dépôt.
8. Dans la version finale du mémoire et des autres travaux préparés pour les cours de maîtrise, la qualité du français écrit doit être d'un niveau acceptable au département, qui est représenté par le Comité des Études de deuxième cycle. Ainsi, la version finale de ces travaux ne contiendra-t-elle pas, normalement, d'erreurs orthographiques, lexicales, grammaticales, stylistiques et protocolaires. Pour ce qui est du mémoire, cette exigence s'applique à la version remise aux examinateurs.

Cours

Un choix des cours de deuxième cycle suivants sera offert afin de répondre aux besoins des étudiants inscrits au programme de maîtrise selon les ressources disponibles au département. Certains cours, excepté le Français 6900, peuvent être enseignés sous format accéléré en dehors du calendrier habituel d'un semestre ou d'une session quand ils sont offerts dans le cadre de l'Institut d'Été pour les Enseignants de Français (SIFT, Summer Institute for French Teachers):

6008* Méthodologie et théorie de la littérature I

6009* Méthodologie et théorie de la littérature II

Approche historiographique, génétique, thématique, herméneutique ou autrement historique ou critique:

6032 Génétique et critique

6102 Histoire de la langue française

Approche psychanalytique, ethnologique ou anthropologique:

6020 Psychanalyse et littérature

6021 Mythocritique

6130-39 Littérature personnelle/intime

Approche sociologique ou socio-historique:

6022 Histoire, société, idéologie et textes

6101 La voix féminine et le féminisme

6110-19 Paralittérature et cultures traditionnelles

Approche linguistique, sémiotique, poétique, rhétorique ou pragmatique:

6011 Théorie générale de la langue française

6030 Grammaire du texte

6031 Narratologie

6140-49 Discours et genres

Autres approches aux Études françaises:

6120-29 Textes/Images/Sons

6150-59 Sujets spéciaux

Cours de français et d'espagnol pour étudiants d'autres disciplines

Français 6900 Lecture en français

Espagnol 6900 Lecture en espagnol

* Nota / Note: *Les étudiants ne peuvent obtenir de crédit pour le Français 6008 et le Français 6006 (désormais supprimé) ni pour le Français 6009 et le Français 6006.*

9.14 Geography

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/hss

www.mun.ca/geog

www.mun.ca/become/graduate/apply/app_deadlines.php

9.14.1 Program of Study

1. The degrees of Master of Arts and Master of Science are offered in Geography by full-time or part-time study.
2. Admission requirements are set forth in the **General Regulations** of the School of Graduate Studies and Degree Regulations for **Master of Arts** and **Master of Science**.
3. The deadline for submission of applications for admission is January 15. Students will normally commence their programs in the Fall semester.
4. An applicant will be admitted to a graduate program only if a faculty member agrees to act as Supervisor. A supervisory committee will be established after admission, normally consisting of the Supervisor and two other individuals, one of whom will normally be a member of the Department.
5. Major research areas for graduate study at the master's level are cultural, political, historical, economic, urban, resource management, community and regional development, geomorphology, Quaternary environments, climatology, and geographic information sciences.

6. Students will register for the M.A. program if their fields of interest lie in an area of Human Geography or for the M.Sc. if their fields of interest are in Physical Geography or Geographic Information Sciences.
7. It is expected that the program of study and research for the M.A. or M.Sc. will normally be completed in a maximum of two years of full-time work, or three years of part-time work.
8. Students must successfully complete a minimum of 12 credit hours of graduate program courses with a minimum grade of 'B' in each. Geography 6000 and 6001 will be required courses for all students who have not already completed equivalent courses at the Honours or post-graduate level.
9. Students whose undergraduate degree is not in geography will normally be required to complete some additional undergraduate program courses during their first year of study, in addition to the required graduate program courses. Normally four such undergraduate courses will be required, and a minimum grade of 70% must be obtained in each.
10. Each student will be required to present a seminar on the student's research to the Department.
11. Each student must submit a thesis based on the student's own original research. This thesis will be examined in accordance with the **General Regulations** of the School of Graduate Studies.

9.14.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students as far as the resources of the Department will allow.

6000 Development of Geographical Thought and Practice I
 6001 Development of Geographical Thought and Practice II
 6002 Directed Readings in Geography
 6100 Research Techniques in A Selected Field of Geography I
 6101 Research Techniques in A Selected Field of Geography II
 6120 Geospatial Modelling and Analysis
 6150 Environmental Remote Sensing and Image Analysis
 6200 Economic Geography I
 6201 Economic Geography II
 6204 Sustainable Community and Regional Development
 6250 Conservation and Sustainability of Natural Resources
 6251 Survey Design, Questionnaire Development and Techniques of Data Collection
 6300 Problems in Fisheries Geography
 6400 Fluvial Geomorphology
 6401 Glacial Geomorphology
 6402 Coastal Geomorphology
 6410 Climatology
 6420 Quaternary Geography
 6430 Biogeography
 6500 Cultural Geography
 6505 Political Ecology
 6600 Historical Geography
 6700 Political Geography
 6800 Urban Geography
 6821 Advanced Computer Mapping
 6900 Graduate Seminar in Regional Geography
 6990-95 Special Topics in Geography

9.15 German

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/languages
www.mun.ca/become/graduate/apply/app_deadlines.php

9.15.1 Program of Study

The degree of Master of Arts (M.A.) is offered in German Language and Literature and may be taken by full-time or part-time study.

1. Students for the M.A. degree in German are normally expected to have completed an Honours degree with a minimum of second-class standing. An applicant who does not hold an Honours Degree or its equivalent may be required to complete such additional undergraduate courses as the Department considers necessary, prior to admission or as part of the program.
2. Applicants will be required to demonstrate superior German language skills as determined by the Department prior to admission to the program. As part of the admission process, prospective students must therefore submit a writing sample in German. An interview may also be part of the admission process.
3. As part of the admissions process, prospective students must submit a non-binding outline of the area in which they would like to write their thesis.
4. Normally, the M.A. program should take two academic years to complete, of which the first three semesters will be spent in completing course work, writing and orally defending a thesis proposal, and beginning to carry out research. The following three semesters will be spent in completing research and a thesis.
5. Students will be required to complete at least 15 credit hours in course work. Of these 15 credit hours,
 - a. all students will be required to complete 3 credit hours in LING 7000;
 - b. all students will be required to complete 9 credit hours in designated GERM graduate courses;
 - c. all students will be required to complete 3 credit hours in a graduate level course from either GERM or another program within the Faculty of Humanities and Social Sciences, to be approved by the graduate committee.

9.15.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

6000 Topics in Modern Technology, Literature and Culture
 6001 The Other in German-language Literature and Culture
 6100 Topics in the History of the German Language
 6103 Bibliography and Research Methods
 6200 Issues in Early German Literature and Culture I
 6201 Topics in Early German Literature and Culture II
 6300 Topics in Early Modern German Literature and Culture I
 6301 Topics in Early Modern German Literature and Culture II
 6800 Topics in Modern German Literature and Culture I
 6801 Topics in Modern German Literature and Culture II
 6900 Topics in Contemporary German Literature and Culture I
 6901 Topics in Contemporary German Literature and Culture II
 6903 Propaganda and Censorship
 7000 Special Subject or Author I
 7001 Special Subject or Author II
 7002-7020 Special Topics in German Studies

9.16 History

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/history
www.mun.ca/become/graduate/apply/app_deadlines.php

The degrees of Doctor of Philosophy and Master of Arts are offered in History by full-time or part-time study.

9.16.1 Program of Study

1. The Department of History offers M.A. programs in a broad range of geographical and thematic areas. Students in the M.A. program will choose a thesis or non-thesis option.
2. M.A. students who choose the non-thesis option shall complete a minimum of 24 credit hours, 18 of which shall normally be 6190, 6200, and 6999.
3. M.A. students who choose the thesis option shall complete 9 credit hours, 6 of which shall normally be 6190 and 6200, plus a thesis.
4. Students will be required to successfully complete HIST 6190 prior to taking HIST 6200.
5. Students will be required to successfully complete HIST 6200 before writing the Major Research Paper or thesis.
6. Where a student's major research project requires the student to read a language other than English, the student must demonstrate a reading knowledge of this language through an exam or other method subject to the approval of the Graduate Committee.

9.16.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students as far as the resources of the Department will allow.

6000 Advanced Studies in Newfoundland History
 6010 Advanced Studies in Canadian History
 6020 Advanced Studies in the History of the United States
 6030 Advanced Studies in French History
 6040 Advanced Studies in British History
 6050 Advanced Studies in German History
 6060 Advanced Studies in North Atlantic History
 6070 Advanced Studies in Social History
 6075 Advanced Studies in Labour and Working-Class History
 6080 Advanced Studies in Intellectual History
 6090 Advanced Studies in Women's History
 6095 Advanced Studies in Ethnohistory
 6100 Advanced Studies in Military History
 6105 Advanced Studies in Diplomatic History
 6110 Advanced Studies in Maritime History
 6120 Advanced Studies in Economic and Business History
 6125 Medical Science and Social Responsibility in Health Care: Aspects of Medical History (*cross-listed as Medicine 6420*)
 6130 Quantification and Measurement in History
 6140-59 Research in Special Topics
 6160-79 Reading Courses (Special Topics)
 6190 Theory and Method
 6200 Masters Seminar I
 6999 Masters Research Paper (12 credit hours)

9.17 Linguistics

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/hss

www.mun.ca/linguistics

www.mun.ca/become/graduate/apply/app_deadlines.php

The degrees of Master of Arts and Doctor of Philosophy are offered in Linguistics.

9.17.1 Program of Study

1. The Department of Linguistics offers the M.A. program with both a thesis and a non-thesis option. The M.A. with thesis option is intended for those who have completed an undergraduate major in Linguistics with satisfactory standing (a B+ average in Linguistics courses). Students interested in the thesis option who have an excellent undergraduate record and a well-defined research plan, yet who do not possess the equivalent of an undergraduate major, will be required to take additional undergraduate and/or graduate courses in Linguistics. Other students are encouraged to apply for the M.A. without thesis option.
2. The M.A. with thesis option is normally a two-year program consisting of at least 15 credit hours of graduate courses (including Linguistics 7000 and 7001), plus a thesis.
3. The M.A. without thesis option is normally a two-year program consisting of at least 21 credit hours of graduate courses (including Linguistics 7000 and 7001), plus a research project (Linguistics 6999), which consists of a major research paper in an approved area followed by an oral examination.
4. The M.A. in Linguistics requires proficiency in a language other than the student's first language, as demonstrated by a minimum 'B' grade in a second-year undergraduate language course, or performance satisfactory to the Department in an arranged reading proficiency test. A working or structural knowledge of other languages may also be required for particular programs (e.g., Latin, Greek or Sanskrit for historical Indo-European linguistics, or courses in the series Linguistics 6050-59 or the former 6010-6041).
5. All M.A. students are advised to consult the Department's Graduate Program web page for details on program requirements and for general information relating to the graduate program.

9.17.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow. Full information is to be found in the Department's Graduate Program web page.

6050-54 Structure of a North American Indigenous Language (*credit restriction: Except where an exemption is supplied by the Head of the Department, a student may not obtain credit for more than one course in the 6050-54 series. Students may not obtain credit for any of the previously offered 6010, 6011, 6020, 6021, 6030, 6031, 6040, 6041 in addition to a course in the 6050-54 series.*)

6055-59 Structure of an Uncommonly-Taught Language (*credit restriction: Except where an exemption is supplied by the Head of the Department, a student may not obtain credit for more than one course in the 6055-59 series.*)

6100 Issues in Morphosyntax (*credit may not be obtained for both Linguistics 6100 and the former 6001*)

6110 Selected Topics in Transformational Grammar

6115 Topics in the Syntax of a Selected Language (*prerequisite: 6001 or 6110*)

6150 Principles of Language Acquisition

6151 Selected Topics in Language Acquisition (*prerequisite: Permission of the instructor*)

6203 Phonological Theory (*credit may not be obtained for both 6203 and the former 6200*)

6204 Selected Topics in Phonology (*prerequisite: 6203; credit may not be obtained for both 6204 and the former 6201*)

6210 Sociolinguistics (*credit restriction: a student may not obtain credit for both 6210 or the former 6211*)

6212 Selected Topics in Language and Gender

6220 Areal and Temporal Variations in Language

6300-6309 Special Subjects

6400 Comparative and Historical Linguistics

6420 English Dialectology I

6421 English Dialectology II

6430 Selected Topics in Linguistic Variation (*prerequisite: 6220 or the former 6211*)

6500 Field Methods

6601 Modern Linguistic Theories

6700 Experimental Phonetics

6701 Selected Topics in Experimental Phonetics (*prerequisites: 6203, 6700*)

6800 Selected Topics in Morphology

6880 Selected Topics in Semantics

6999 M.A. Research Project

7000 Seminar in Research Methods

7001 Analytical Issues in Linguistics

7100 Topics in North American Native Languages (*prerequisites: a course from series 6050-6054 or the former 6011, 6031, 6041*)

7200 Advanced Topics in Syntax (*prerequisites: 6110, plus either 6001 or 6115*)

7400 Seminar in Comparative and Historical Linguistics (*prerequisite: 6400 or 6410*)

7430 Seminar in Linguistic Variation (*prerequisite: 6430*)

7800 Seminar in Morpho-semantics (*prerequisite: 6800*)

7900-03 Special Topics in Linguistics

Note: *Appropriate equivalent credits may be given for courses taken at the Summer Institute of the Linguistic Society of America, or a similar institute. Students are encouraged to attend these institutes. They should, however, consult the Head of the Department as to what courses may be appropriate for credit.*

9.18 Philosophy

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/philosophy
www.mun.ca/become/graduate/apply/app_deadlines.php

9.18.1 Program of Study

The degree of Master of Arts is offered in Philosophy by full-time or part-time study. The program is designed so that it may be completed in one academic year (three semesters) of full-time study.

1. In addition to meeting the requirements listed under the **General Regulations** of the School of Graduate Studies, to complete a M.A. in Philosophy, students must complete a minimum of 18 credit hours in graduate Philosophy courses as follows:
 - 3 credit hours in Philosophy 6000; and
 - 15 credit hours in graduate Philosophy courses selected from the **Courses** listed below. Courses will be selected by the student in consultation with the student's Supervisory Committee.
2. Normally, a full-time student will complete all the 18 credit hours and submit a thesis proposal by the end of the second semester of study. A minimum of one additional semester will be spent in completing the balance of the program.
3. The student must also complete a thesis in accordance with the **General Regulations, Theses and Reports** during the third semester of the program.

9.18.2 Courses

A selection of the following graduating courses will be offered to meet the requirements of students. as far as the resources of the Department will allow.

6000 Graduate Research Seminar
 6011 Seminar in Ancient and Medieval Philosophy
 6012 Seminar in Modern Philosophy
 6013 Seminar in Contemporary Philosophy
 6014 Seminar in Metaphysics
 6015 Seminar in Epistemology
 6016 Seminar in Social and Political Philosophy
 6040-6099 Seminar in Special Topics
 6101 Seminar in Selected Philosophical Texts
 6102 Seminar in Current Issues in Philosophy

9.19 Political Science

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/posc
www.mun.ca/become/graduate/apply/app_deadlines.php

9.19.1 Program of Study

The degree of Master of Arts is offered in Political Science by full-time and part-time study.

The degree of Master of Arts (M.A.) in Political Science may be taken by course work and thesis, course work and co-operative internship, or course work only. The thesis, co-operative internship, and course route options are available to full-time and part-time students. The M.A. with thesis is a two-year program. The co-operative internship and course route options are one year programs.

1. **M.A. with Thesis:**
 - a. Students choosing the M.A. with thesis must complete a minimum of 18 credit hours in political science graduate program courses of which 3 credit hours must be attained from either POSC 6000 or 6010, and 3 credit hours must be attained from POSC 602A/B. Further courses beyond the minimum number may be required, depending on the background and needs of the student.
 - b. Each student choosing the thesis option will submit a thesis on a subject that has been approved by the supervisory committee of the Department.
 - c. Students applying for the thesis option must submit a brief (one page maximum) statement of their research interest with their application.
2. **M.A. with Co-operative Internship:**
 - a. Students choosing the M.A. with co-operative internship must complete a minimum of 24 credit hours in political science graduate program courses of which 12 credit hours must be attained from POSC 6030 (6 credit hours), 602A/B and 6790. Further courses beyond the minimum number may be required, depending on the background and needs of the student.
 - b. Each student choosing this option will complete a full-time co-operative internship 6030 of at least 12 weeks duration, normally in the Spring semester, to be approved by the Department.
3. **M.A. by course work:**

Students choosing the M.A. by course work must complete a minimum of 24 credit hours in political science graduate program courses of which 3 credit hours must be obtained from POSC 602A/B. Further courses beyond the minimum number may be required, depending on the background and needs of the student.
4. POSC 602A/B - Research Design and Professional Development. Students register for the 'A' portion of the course in the Fall semester of their program of study and the corresponding 'B' portion of the course in the following Winter semester. A grade of NC (No Grade Expected) will be assigned to the 'A' portion of this course.

9.19.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

6000 Political Science Approaches
6010 Empirical Methods in Political Science
602A/B Research Design and Professional Development
6030 Co-operative Internship (6 credit hours)
6100 Political Philosophy
6200 International Politics
6300 Comparative Politics
6301 European Politics and Public Policy
6350 Political Economy
6400 Contentious Politics
6430 Latin American Politics
6500 Political Behaviour
6600 Newfoundland Politics
6700 Canadian Politics
6710 Intergovernmental Relations
6720 Local Politics
6740 Public Administration
6770 Canadian Provincial Politics
6780 Politics of the Atlantic Provinces
6790 Public Policy Process
6900-10 Special Topics
6999 Master's Essay (9 credit hours)

9.20 Religious Studies

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/relstudies
www.mun.ca/become/graduate/apply/app_deadlines.php

9.20.1 Program of Study

1. Thesis Option

- a. Normally, the Master of Arts program with thesis option should take two years to complete, the first of which is to be spent primarily on course work and preparation of a thesis proposal. A student accepted on a part-time basis would normally be expected to take three to five years to complete the program.
- b. Students in the M.A. program with thesis option shall normally complete a thesis and a minimum of 12 credit hours in course work.
- c. Students are encouraged to visit the Department of Religious Studies website at www.mun.ca/relstudies/programs/graduate/ for a list of possible research areas.
- d. Before a student begins writing a thesis, the student should submit a research proposal to the Graduate Studies Committee of the Department for approval.
- e. Students in the M.A. with thesis option must complete four required courses: RS 6100 Methods and Theories in Religious Studies; RS 6110 Thesis Writing; RS 6120 Studies in Religious Texts; and RS 6130 Religious Contexts.

2. Course-based M.A. with a Project Option

- a. Normally, the Master of Arts program with a project option should take one year (three semesters) to complete, the first two semesters spent on course work and the third semester on completing the project.
- b. Before a student begins writing a project, the student should submit a research proposal to the Graduate Studies Committee of the Department for approval.
- c. Students in the M.A. with a project option must complete five required courses and at least one other course. This may be from a cognate discipline (upon approval of the supervisor). The five required courses are: RS 6100 Methods and Theories in Religious Studies; RS 6110 Thesis Writing; RS 6120 Studies in Religious Texts; RS 6130 Religious Contexts; and RS 699A/B Advanced Research in Religious Studies.

9.20.2 Courses

6100 Methods and Theories in Religious Studies (*credit may not be obtained for both Religious Studies 6100 and the former Religious Studies 6000*)
6110 Thesis Writing
6120 Studies in Religious Texts
6130 Religious Contexts
6220 Selected Topics in New Testament
6230 Selected Topics in Hebrew Bible/Old Testament
6330 Selected Topics in Judaism
6340 Selected Topics in East Asian Religious Traditions
6350 Selected Topics in South Asian Religious Traditions
6720 Selected Topics in the History of Christianity
6730 Selected Topics in the Religious History of Canada
6740 Selected Topics in the Religious History of Newfoundland and Labrador
6750 Selected Topics in Medieval Religious Thought
6820 Selected Topics in Christian Ethics
6830 Selected Topics in Religion and Culture
6840 Selected Topics in the Philosophy of Religion
6850 Selected Topics in New Age Religious Movements
6900-6910 Special Topics in the Study of Religion

699A/B Advanced Research in Religious Studies (9 credit hours)

9.21 Sociology

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/hss

www.mun.ca/soc

www.mun.ca/become/graduate/apply/app_deadlines.php

The Degrees of Master of Arts and Doctor of Philosophy can be earned through full-time or part-time study. Area of department specialization include: Social Theory; Sociology of Culture; Criminology; Environmental Sociology; Social Inequality; Sociology of Gender; Sexuality; Health, including Occupational Health; Development; Work; Political Sociology; and Maritime Sociology. Graduate courses are taught as tutorials or small seminars.

9.21.1 Program of Study

1. Minimum admission requirements are a B average in undergraduate studies with a good undergraduate background in Sociology.
2. The M.A. Degree with thesis requires the completion of 15 credit hours in graduate courses, normally including the Sociology Graduate Seminar (6880), Advanced Quantitative Methods (6040), Advanced Qualitative Methods (6041), Social Theory (6150), one elective, and a thesis. In the case of full-time students, the M.A. with thesis is normally completed in two years. The first year is devoted to the completion of the required courses and the definition of the thesis research topic. The second year is devoted to the completion of the thesis and presentation of the thesis at a Department seminar.
3. The M.A. Degree by Master's Research Paper requires the completion of 24 credit hours, normally including the Graduate Seminar (6880), Advanced Quantitative Methods (6040), Advanced Qualitative Methods (6041), Social Theory (6150), two electives, and the Master's Research Paper (6900). The coursework should be taken during the first two semesters of full-time study. The Master's Research Paper (Sociology 6900) should be written in the third semester of full-time study. The Master's Research Paper will be supervised by a faculty member and must be presented at a Departmental seminar. The Supervisor and one other member of the Department will grade the Master's Research Paper.

9.21.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

6040 Advanced Quantitative Methods
 6041 Advanced Qualitative Methods
 6042-49 Special Topics in Advanced Sociology
 6090-94 Special Area in Sociology
 6120 Social Organization
 6130 Social Inequality
 6140 The Community
 6150 Social Theory
 6160 Theory Construction and Explanation in Sociology
 6240 Sociology in Medicine
 6280 Social and Economic Development
 6300 Maritime Sociology
 6310 Political Sociology
 6320 Gender and Society
 6330 Science and Technology
 6340 Comparative North Atlantic Societies
 6350 Environmental Sociology
 6360 Sociology of Work
 6370 Feminist Theory and Methods
 6380 Women, Nature, Science and Technology
 6390 Sociology of Culture
 6610 Socialization
 6620 Current Topics in Social Behaviour
 6880 Sociology Graduate Seminar
 6900 Master's Research Paper (6 credit hours)

9.22 Humanities and Social Sciences Diplomas

The Faculty of Humanities and Social Sciences offers two types of graduate diplomas: disciplinary and interdisciplinary. Disciplinary graduate diplomas provide an opportunity to acquire additional academic credentials at the graduate level within a humanities or social science discipline. Interdisciplinary graduate diplomas provide opportunities to acquire additional academic credentials at the graduate level in emerging interdisciplinary research areas in the humanities and social sciences.

1. A graduate diploma may be offered in the disciplines of Anthropology, Classics, Economics, English, Folklore, French, Gender Studies, German, History, Linguistics, Philosophy, Political Science, Religious Studies, or Sociology.
2. Interdisciplinary graduate diplomas may also be offered, depending on time, resources, and opportunity.

9.22.1 Qualifications for Admission

To be considered for admission to the graduate diploma program, an applicant shall meet the minimum requirements set out in the **General Regulations** of the School of Graduate Studies governing **Graduate Diploma Programs**, the **Regulations Governing the Degree of Master of Arts** or **Regulations Governing the Degree of Master of Gender Studies**; and, where applicable, the particular regulations of the appropriate departments or disciplines. Applicants for admission to a graduate diploma in Anthropology, Classics, Economics, English, Folklore, French, Gender Studies, German, History, Linguistics, Philosophy, Political Science, Religious Studies, or Sociology must apply through the corresponding department or discipline, working with the department's or discipline's Graduate Officer.

9.22.2 Program Requirements

Graduate diplomas in the Faculty of Humanities and Social Sciences conform to the School of Graduate Studies **General Regulations, Program Requirements, Graduate Diploma and Master's Programs** and require successful completion of 9-12 eligible credit hours in

graduate courses.

1. Every student for a graduate diploma in the disciplines of Anthropology, Classics, Economics, English, Folklore, French, Gender Studies, German, History, Linguistics, Philosophy, Political Science, Religious Studies, or Sociology is required to complete the majority of all graduate courses in the relevant department or discipline. The number of credit hours (9-12) for the graduate diploma are at the discretion of the relevant department or discipline.
2. A student admitted to a graduate diploma in the disciplines of Anthropology, Classics, Economics, English, Folklore, French, Gender Studies, German, History, Linguistics, Philosophy, Political Science, Religious Studies, or Sociology, who has demonstrated to the satisfaction of the appropriate department or discipline an ability to pursue research at the master's level, may, at the discretion of the department or discipline, be permitted subsequently to transfer a student's candidature to that of a master's in the affiliated program area. For credits to transfer between a graduate diploma and a master's degree, the two degrees have to share the same credentials. In this event, students will be awarded only one of a master's or graduate diploma in the same department or discipline.

9.22.3 Graduate Courses

Most courses offered for a master's program are eligible for a graduate diploma program in the same discipline. However, courses designed for a master's essay or major project cannot be used towards a graduate diploma.

The graduate courses counting towards a graduate diploma in Anthropology, Classics, Economics, English, Folklore, French, Gender Studies, German, History, Linguistics, Philosophy, Political Science, Religious Studies, or Sociology are at the discretion of the relevant department or discipline. Courses for these graduate diplomas are normally a subset of the courses required for the relevant department's or discipline's master's program, with one of the courses normally being a foundational course in the discipline. Prospective students should contact a Graduate Officer for specific details.

Courses in interdisciplinary graduate diploma programs are drawn from appropriate, thematically-related Faculty of Humanities and Social Sciences departments or disciplines.

10 Regulations Governing the Degree of Master of Arts and Education (Education and Francophone Literatures and Cultures)

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/hss

www.mun.ca/educ/programs/graduate

www.mun.ca/become/graduate/apply/app_deadlines.php

The degree of Master of Arts and Education (Education and Francophone Literatures and Cultures) is jointly offered by the Faculty of Humanities and Social Sciences and the Faculty of Education, and is offered by full-time or part-time study.

These regulations should be read in conjunction with the **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland.

The Administrative Committee is responsible for the program. The Committee shall be comprised of the Associate Dean, Graduate Programs in the Faculty of Education (or delegate), the Head of the Department of Modern Languages, Literatures and Cultures (or delegate) and one appointed faculty member. The faculty member shall come from either the Faculty of Education or the Department of Modern Languages, Literatures and Cultures in alternating years. The Administrative Committee is responsible for admissions and advising students on course selection when appropriate.

10.1 Qualifications for Admission

To be considered for admission to the Master of Arts and Education (Education and Francophone Literatures and Cultures), an applicant shall normally hold a Bachelor of Education degree, with a concentration in French, from an institution recognized by Senate. Applicants should have a minimum 'B' standing or an average of 70% in the last 30 courses attempted and two years of experience teaching French. An appropriate level of proficiency in French is required, and the applicant's level of competence will be evaluated by the Administrative Committee.

10.2 Program of Study

1. Students for the Master of Arts and Education (Education and Francophone Literatures and Cultures) may choose one of two program options:
 - Option I. Project Route
 - Option II. Comprehensive Course Route
2. All students shall be required to complete:
 - French 6800 Littératures francophones: Théorie et pratique/Francophone literatures: Theory and practice
 - French 6810 Cultures francophones: Théorie et pratique/Francophone Cultures: Theory and practice
 - Education 6100 Research Designs and Methods in Education
 - Six credit hours from Memorial University of Newfoundland, Department of Modern Languages, Literatures and Cultures graduate course offerings as deemed appropriate by the Administrative Committee.
 - Nine credit hours selected from:
 - Education 6668 Current Issues in Second Language Education
 - Education 6669 Graduate Seminar in Second Language Teaching and Learning
 - Education 6673 Second Language Teaching, Learning and Curriculum
 - Education 6674 Research in Second Language
 - Three credit hours from other Memorial University of Newfoundland, Faculty of Education graduate course offerings as deemed appropriate by the Administrative Committee.
3. Students choosing Option I must also complete:
 - Education 6392 Project in Curriculum, Teaching and Learning Studies
4. Students choosing Option II must also complete:
 - Three credit hours from Memorial University of Newfoundland, Department of Modern Languages, Literatures and Cultures graduate course offerings as deemed appropriate for each student's program by the Administrative Committee.

- Education 6390 Research and Development Seminar in Curriculum, Teaching and Learning Studies

10.3 Evaluation

1. In order to continue as a student for the degree of Master of Arts and Education (Education and Francophone Literatures and Cultures), a student shall obtain an 'A' or 'B' grade in each required course. A student who receives a grade of 'C' in any required course must repeat that course and obtain a minimum grade of 'B'. In the case of an elective course, a suitable replacement course acceptable to the Administrative Committee may be substituted for the failed course. Only one such repetition/replacement shall be permitted on the student's graduate program. Should a grade of less than 'B' be obtained in the repeated/replacement course, or any other program course, the student shall be required to withdraw from the program.
2. When the Administrative Committee has determined, through consultation with the student, graduate course instructors, and the project supervisor, if applicable, that the student's work has fallen below satisfactory level, they may request the Dean of the Faculty of Education and the Head of the Department of Modern Languages, Literatures and Cultures recommend to the Dean of Graduate Studies that the student's program be terminated.

10.4 Courses

Course descriptions are available at www.mun.ca/educ/programs/graduate/master/Course_Descriptions.pdf.

French 6800 Littératures francophones: Théorie et pratique/Francophone literatures: Theory and practice

French 6810 Cultures francophones: Théorie et pratique/Francophone Cultures: Theory and practice

French 6820 Littérature de jeunesse: Théorie et pratique/Children's and Young Adult Literature: Theory and Practice

Education 6100 Research Designs and Methods in Education

Education 6390 Research and Development Seminar in Curriculum, Teaching and Learning Studies

Education 6392 Project in Curriculum, Teaching and Learning Studies (6 credit hours)

Education 6668 Current Issues in Second Language Education

Education 6669 Graduate Seminar in Second Language Teaching and Learning

Education 6673 Second Language Teaching, Learning and Curriculum (*credit may not be obtained for both Education 6673 and the former 6665 or 6667*)

Education 6674 Research in Second Language

Other courses offered for the Master of Education program and the Master of Arts in French Studies program as deemed appropriate by the Administrative Committee.

Règlements de la Maîtrise ès Arts et Éducation (Enseignement des littératures et cultures francophones)

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/hss

www.mun.ca/educ/programs/graduate/

La Maîtrise ès Arts et Éducation (Enseignement des littératures et cultures francophones) est offerte conjointement par la Faculté des Arts et la Faculté d'Éducation et cautionne des études à temps partiel ou à temps plein.

Il est recommandé de lire ces règlements en conjonction avec les Règlements généraux de l'École des Études supérieures.

Le Comité administratif est responsable du programme. Le Comité sera composé du Doyen adjoint aux programmes supérieurs de la Faculté d'Éducation (ou son représentant), le Directeur du Département d'études françaises et hispaniques (ou son représentant), et un autre membre. Ce dernier viendra alternativement (une année sur deux) d'une des deux unités. Le Comité administratif décidera de l'admission et conseillera à l'occasion les étudiants sur leur choix de cours.

Admission

Pour être admis au programme de Maîtrise ès Arts et Éducation (Enseignement des littératures et cultures francophones), il faut normalement détenir un Baccalauréat en Éducation, avec concentration en français, provenant d'une institution reconnue par le Sénat. Il faut une note moyenne minimale de 'B' ou une moyenne de 70% dans les trente derniers cours et deux ans d'expérience dans l'enseignement du français. Un niveau adéquat de français est nécessaire et la compétence des candidats (le masculin est utilisé à titre épiphane) sera évaluée par le comité d'admission.

Programme d'études

1. Les candidats à la Maîtrise ès Arts et Éducation (Enseignement des littératures et cultures francophones) choisira l'une ou l'autre des deux options suivantes:
 - 1^{re} option Programme menant au projet terminal
 - 2^e option Programme entièrement composé de cours
2. Tous les candidats devront compléter:
 - French 6800 Littératures francophones: Théorie et pratique
 - French 6810 Cultures francophones: Théorie et pratique
 - Education 6100 Research Designs and Methods in Education
 - Six heures crédits de cours de deuxième cycle du Département d'études françaises et hispaniques jugés appropriés par le Comité administratif.
 - Neuf heures crédits parmi:
 - Education 6668 Current Issues in Second Language Education
 - Education 6669 Graduate Seminar in Second Language Teaching and Learning
 - Education 6673 Second Language Teaching, Learning and Curriculum
 - Education 6674 Research in Second Language
 - Trois heures crédits de cours de la Faculté d'Éducation jugés appropriés par le Comité administratif.
3. L'étudiant ayant choisi la 1^{re} option devra compléter:
 - Education 6392: Project in Curriculum, Teaching and Learning Studies
4. L'étudiant ayant choisi la 2^e option devra compléter:
 - Trois heures crédits de cours de deuxième cycle du Département d'études françaises et hispaniques jugés appropriés pour le programme de l'étudiant.
 - Education 6390 Research and Development in Teaching and Learning Studies

Évaluation

1. Afin de continuer son inscription au programme de Maîtrise ès Arts et Éducation (Enseignement des littératures et cultures francophones), le candidat doit obtenir un note de A ou B dans chaque cours obligatoire. Le candidat qui reçoit une note de C dans un cours obligatoire doit répéter ce cours et obtenir au moins B. Dans le cas d'un cours facultatif, un cours jugé approprié par le Comité administratif peut être substitué à un cours qui n'a pas été réussi. Une telle répétition ou un tel remplacement ne sera permis qu'une seule fois dans le programme de l'étudiant. Si une note moindre que B est obtenue dans un cours répété ou dans un cours de remplacement, le candidat devra se retirer du programme.
2. Lorsque le Comité administratif aura établi, après avoir consulté le candidat, ses enseignants et son directeur de projet, le cas échéant, que le travail du candidat n'atteint toujours pas un niveau satisfaisant, il pourra demander au Doyen de la Faculté des Arts et au Doyen de Faculté d'Éducation qu'ils recommandent la disqualification du candidat au Doyen des Études supérieures.

Cours

French 6800 Littératures francophones: Théorie et pratique
 French 6810 Cultures francophones: Théorie et pratique
 French 6820 Littérature de jeunesse: Théorie et pratique
 Education 6100 Research Designs and Methods in Education
 Education 6390 Research and Development Seminar in Teaching and Learning Studies
 Education 6392 Project in Curriculum, Teaching and Learning Studiés (6 crédits heures)
 Education 6668 Current Issues in Second Language Education
 Education 6669 Graduate Seminar in Second Language Education
 Education 6673 Second Language Teaching, Learning and Curriculum (*les étudiants ne peuvent recevoir de crédit et pour Education 6673 et pour Education 6665 ou 6667*)
 Education 6674 Research in Second Language
 Autres cours de cycle supérieur offerts par la Faculté d'Éducation et le Département d'études françaises et hispaniques jugés appropriés par le Comité administrative.

11 Regulations Governing the Degree of Master of Business Administration

www.mun.ca/sgs/contacts/sgscontacts.php
www.business.mun.ca
www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Business Administration (M.B.A.) is offered by full-time or part-time study. These regulations must be read in conjunction with the **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland.

11.1 Qualifications for Admission

1. Admission is limited and competitive. To be eligible for consideration for admission to the MBA program, an applicant shall:
 - a. normally hold at least a Bachelor's Degree, with a minimum 'B' standing, from an institution recognized by Senate;
 - b. normally have two years of full-time work experience, or equivalent, deemed acceptable to the Faculty of Business Administration; and
 - c. achieve a satisfactory total score on the Graduate Management Admission Test (GMAT), as well as an appropriate balance of verbal and quantitative GMAT score components. Specific information regarding test centres, dates, registration procedure and deadlines can be obtained by contacting the Graduate Management Admission Council at the GMAT exam website.
2. An applicant who did not complete a Bachelor's degree at a recognized university where English is the primary language of instruction must normally complete either the:
 - a. Test of English as a Foreign Language (TOEFL) and achieve a paper-based score of 580 (or higher), computer-based score of 237 (or higher), or Internet based score of 92-93 (or higher); or
 - b. International English Language Testing System (IELTS) and achieve a score of 7 (or higher).

Information regarding the TOEFL is available from the Educational Testing Service at www.ets.org. IELTS information is available at www.ielts.org.

3. In exceptional cases, an applicant who has not completed a Bachelor's degree, but who meets all other requirements, may be considered for admission. Preference will be given to those who present a high GMAT score, have a minimum of 10 years of full-time managerial and executive experience, and have completed several years of university studies. The Faculty may also take into account relevant professional credentials. An applicant who does not meet normal admission requirements may be required to complete, with a high level of achievement, certain undergraduate courses before being considered for admission.
4. Graduates of the Graduate Diploma in Business Administration applying to the M.B.A. program must meet all MBA admission requirements outlined above.
5. Notwithstanding the above, in exceptional cases, and only on the strong recommendation of the Faculty of Business Administration, consideration may be given to an applicant who does not qualify for admission consideration in accordance with the entrance requirements outlined above. It is noted that the GMAT requirement is never waived.

11.2 Deadlines for Applications

Applications and all supporting documents must be received not later than May 1 from Canadian applicants wishing to enter full-time or part-time studies in the Fall semester. Full-time and international applicants are normally considered for entry in the Fall semester. International applicants must submit complete documentation by February 1. Part-time applicants planning to enter in the Winter (January) or Spring (May) semester must apply prior to October 15 and January 15 respectively. Individuals submitting applications later than the above dates are not assured of consideration for admission to the program in the semester desired; their applications will be processed only if time and resources permit.

11.3 Procedure for Admission

1. Applications for admission to the M.B.A. program must be made on the appropriate form to the School of Graduate Studies.
2. The following documents must be submitted in support of the official application form:
 - a. letters of appraisal from two referees, at least one of whom has had close professional contact with the applicant within the last two years, and at least one of whom is capable of appraising the applicant's academic potential as a graduate student;
 - b. official transcript from each university or other post-secondary institution previously attended (other than Memorial University of Newfoundland), to be sent directly by its Registrar (or equivalent officer) to the School of Graduate Studies. If not recorded on the transcript, official evidence of completion of undergraduate degree must also be submitted;
 - c. the official GMAT score report, to be sent directly by the Graduate Management Admission Council. The code number for Memorial University of Newfoundland is LTT-6W-51;
 - d. the Master of Business Administration Employment Experience Form; and
 - e. where applicable, an official TOEFL or IELTS score report (or another equivalent test acceptable to the School of Graduate Studies), to be forwarded directly by the educational testing service.
3. Admission shall be by the Dean of the School of Graduate Studies on the recommendation of the Faculty of Business Administration. Upon notification from the Dean of the School of Graduate Studies of acceptance into the M.B.A. program, an applicant must give written notice to the School of Graduate Studies of an intention to register. Such notice must be received by the Office of the Dean within 30 days of notification of acceptance, or three weeks prior to semester registration.

11.4 Programs of Study

The program is a 60 credit hour all-course program. This program requires: 36 credit hours as specified in **Table 1**; plus 24 credit hours selected from **Table 2** including a minimum of 3 credit hours in the area of international business chosen from 9005, 9020, 9030, 9033, 9306, 9326 or another approved international course.

Course exemptions may be considered in accordance with Clause 3. below. In the event that course exemptions are granted, the 60 credit hour program requirement will be adjusted accordingly.

1. The Faculty of Business Administration may consider exemptions for up to 10 (30 credit hours) introductory M.B.A. courses for those applicants who have completed relevant undergraduate courses in Business, Economics, and Statistics. Undergraduate courses will normally only be considered for exemption purposes if they were completed within seven years of the year in which admission to the M.B.A. program is sought and provided the student achieved a grade of 75% or higher in the undergraduate course(s) required for exemption of the relevant M.B.A. course. Only the following introductory M.B.A. courses will be considered for exemption: 8103, 8104, 8106, 8108, 8109, 8204, 8205, 8206, 8207, and 8208.
2. An applicant who has completed a Graduate Diploma in Business Administration from the Faculty of Business Administration will have all courses completed as part of the Graduate Diploma in Business Administration count towards the 60-credit hour M.B.A. program.
3. Taking into consideration all of the above information the minimum program requirement for the M.B.A. program is completion of 30 credit hours (10 courses).
4. An applicant who has completed relevant undergraduate courses at institutions external to Memorial University of Newfoundland must submit the following information to the M.B.A. Program Office, Faculty of Business Administration, for evaluation:
 - a detailed course outline for each course to be considered in the application for advanced standing;
 - a description of the method of evaluation used in each such course, the grades received, and the completion dates.
5. The Faculty of Business Administration reserves the right to restrict a student from taking particular M.B.A. elective courses if it is deemed that those courses do not add sufficient value beyond courses that the student has completed at the undergraduate level.
6. A student is required to observe approved co- or prerequisites in scheduling courses. These are indicated in **Table 3**.
7. A student shall successfully complete the requirements of Business 8103 as part of the first 36 credit hours of the program.

11.5 Evaluation

1. Credit towards the M.B.A. Degree will be granted only for those courses which have been approved as constituting part of the student's program of study and in which the student has obtained a mark of 65% or higher.
2. A student is required to withdraw from the M.B.A. program if a final grade of 'F' is obtained in any course.
3. To remain in the program, a student who obtains a final grade of 'C' or 'D' in any course must repeat that course when next offered, and obtain a minimum grade of 'B'. In the case of an elective course, a replacement course approved by the Faculty of Business Administration may be substituted for the course. Only two such repetitions/replacements shall be permitted in the student's graduate program. Should a grade of less than 'B' be obtained in a repeated or replacement course, the student shall be required to withdraw from the program.

11.6 Courses

Table 1 Master of Business Administration Schedule of Required Courses

8103 Statistical Applications in Management	8204 Human Resource Management
8104 Organizations: Behaviour and Structure	8205 Information Systems
8106 Marketing	8206 Managerial Finance
8107 Managing Ethics and Responsibility	8207 Operations Management
8108 Economics for Business	8208 Strategic Management
8109 Accounting for Management	8209 Leadership and Interpersonal Skills for Managers

Table 2 Master of Business Administration Schedule of M.B.A. Electives

8001 Consumer Behaviour	9308 New Venture Creation
8002-8005 Special Topics	9309 Marketing Management
8202 Advanced Managerial Accounting	9310 Management Science Applications
8203 Management Science	9311 Seminar in Human Resource Management
8210 Labour Relations	9312 Financial Management
9001-9019 Special Topics (excluding 9005, 9013)	9314 Business Law
9005 International Marketing	9315 Advanced Financial Accounting
9013 Collective Agreement Administration and Arbitration	9316 Information Systems Management
9020 International Human Resource Management	9317 Current Topics in Management
9021 Data Management	9318 Marketing Communications Management
9022 Information Systems Analysis and Design	9320 Investments and Portfolio Management
9023-9050 Special Topics (excluding 9030, 9032, 9033, 9034, 9040)	9322 Strategic Management of Technology and Innovation
9030 International and Comparative Industrial Relations	9323 Financial Forward, Futures, and Options Markets
9032 Digital and Social Media Marketing	9324 Gender, Work and Organizations
9033 The International Business Environment	9326 International Finance
9034 Strategic Risk Management	9328 Change Management
9040 Business Sustainability	9329 Labour Law
9103 Research in Management	Up to 6 credit hours in courses from other non-business graduate programs within the School of Graduate Studies, as approved by the Dean of Graduate Studies on the recommendation of the Faculty of Business Administration
9301-9303 Research Project	
9306 Global Strategy	

A selection of electives will be offered to meet the requirements of students as far as the resources of the Faculty of Business Administration will allow.

Table 3 Master of Business Administration Course Prerequisite/Co-requisite

Course	Prerequisite/Co-requisite*	Course	Prerequisite/Co-requisite*
8001	8106	9034	Nine required courses
8103	Nil	9040	Nine required courses including 8107
8104	Nil	9103	Nine required courses completed including 8103
8106	Nil	9301	Nine required courses completed
8107	Nil	9302	Nine required courses completed plus 9301*
8108	Nil	9303	Nine required courses completed plus 9301* and 9302*
8109	Nil	9306	Nine required courses completed
8202	8109	9308	8106, 8109
8203	Nil	9309	Nine required courses completed including 8106
8204	Nil	9310	8203
8205	Nil	9311	Nine required courses completed including 8104, 8204 or admission to the MER program
8206	8103*, 8108*, 8109	9312	Nine required courses completed including 8103, 8108, 8109, 8206
8207	8103, 8108*	9314	Nine required courses completed including 8103, 8108, 8109, 8206 or admission to the MER program
8208	8103, 8104, 8106, 8108, 8109, 8205*, 8206*, 8207*	9315	8109
8209	8104	9316	Nine required courses completed including 8205
8210	Nil	9317	Nine required courses completed
9005	Nine required courses including 8106	9318	Nine required courses completed including 8106
9013	Nine required courses completed including 8210 or 8210 plus admission to the MER program	9320	Nine required courses completed including 8103, 8108, 8109, 8206
9020	Nine required courses completed including 8104 or 8204 or 8204	9322	8104, 8106, 8108, 8109, 8206
9021	Nine required courses completed including 8205	9323	Nine required courses completed including 8103, 8108, 8109, 8206, 9320
9022	Nine required courses completed including 8205	9324	Nine required courses completed including 8104 or admission to the MER program
9030	Nine required courses completed including 8210 or 8210	9326	Nine required courses completed including 8103, 8108, 8109, 8206
9032	8106	9328	Nine required courses completed including 8104 or admission to the MER program
9033	Nine required courses	9329	Nine required courses completed including 8210 or 8210 plus admission to the MER program

Note: Unless specified in **Table 3** all 9000-level courses require the prior completion of nine required courses, including any specific prerequisites or co-requisites unless otherwise specified.

11.7 Graduate Diploma in Business Administration

The Faculty of Business Administration offers a course-based Graduate Diploma in Business Administration.

11.7.1 Qualifications, Deadlines, and Procedures for Admission

- Admission is limited and competitive. To be eligible for consideration for admission to the Graduate Diplomas in Business Administration an applicant shall:
 - normally hold at least a Bachelor's Degree, with a minimum GPA of 3.0, from an institution recognized by Senate; and
 - normally have five years of full-time work experience, or equivalent, deemed acceptable to the Faculty of Business Administration;
- An applicant who did not complete a Bachelor's degree at a recognized university where English is the primary language of instruction must normally complete either the:
 - Test of English as a Foreign Language (TOEFL) and achieve a paper-based score of 580 (or higher), computer-based score of 237 (or higher), or Internet based score of 92-93 (or higher); or
 - international English Language Testing System (IELTS) and achieve a score of 7 (or higher).
- The following documents must be submitted in support of the official application form:
 - letters of appraisal from two referees, at least one of whom has had close professional contact with the applicant within the last two years, and at least one of whom is capable of appraising the applicant's academic potential as a graduate student;
 - official transcript from each university or other post-secondary institution previously attended (other than Memorial University of

Newfoundland), to be sent directly by its Registrar (or equivalent officer) to the School of Graduate Studies. If not recorded on the transcript, official evidence of completion of undergraduate degree must also be submitted;

- c. the Graduate Diploma in Business Administration Employment Experience Form; and
 - d. where applicable, an official TOEFL or IELTS score report to be forwarded directly by the educational testing service.
4. Applications and all supporting documents must be received not later than May 1 for the Fall semester, October 15 for the Winter semester, and January 15 for the Spring semester.

11.7.2 Program of Study

1. The Graduate Diploma in Business Administration program requires the completion of 15 credit hours consisting of 9 credit hours in core courses and 6 credit hours in elective courses.
2. Core courses must include:
 - BUSI 8104 Organizations: Behaviour and Structure
 - BUSI 8106 Marketing
 - BUSI 8109 Accounting for Management
3. Elective courses can include:
 - BUSI 8103 Statistical Applications in Management
 - BUSI 8108 Economics for Business
 - BUSI 8204 Human Resource Management
 - BUSI 8205 Information Systems
 - BUSI 8210 Labour Relations
 Other electives may be approved by the Faculty of Business Administration

11.7.3 Evaluation

1. Credit towards the Graduate Diploma in Business Administration will be granted only for those courses which have been approved as constituting part of the student's program of study and in which the student has obtained a mark of 65% or higher.
2. A student is required to withdraw from the Graduate Diploma in Business Administration if a final of 'F' is obtained in any course.
3. To remain in the program, a student who obtains a final of 'C' or 'D' in any course must repeat that course when next offered, and obtain a minimum of 'B'. In the case of an elective course, a replacement course approved by the Faculty of Business Administration may be substituted for the course. Only one such repetition/replacement shall be permitted in the student's program. Should a of less than 'B' be obtained in a repeated or replacement course, the student shall be required to withdraw from the Graduate Diploma in Business Administration program.

12 Regulations Governing the Degree of Master of Business Administration in Social Enterprise and Entrepreneurship

www.mun.ca/sgs/contacts/sgscontacts.php

www.business.mun.ca

www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Business Administration in Social Enterprise and Entrepreneurship (MBA-SEE) is offered by full-time study only. These regulations must be read in conjunction with the **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland.

12.1 Qualifications for Admission

1. Admission is limited and competitive. To be eligible for consideration for admission to the Master of Business Administration program, an applicant shall:
 - a. normally hold at least a Bachelor's Degree, with a minimum 'B' standing, from an institution recognized by Senate;
 - b. normally have two years of full-time work experience, or equivalent, deemed acceptable to the Faculty of Business Administration; and
 - c. achieve a satisfactory total score on the Graduate Management Admission Test (GMAT), as well as an appropriate balance of verbal and quantitative GMAT score components or a satisfactory total score on the Graduate Record Examinations (GRE) General Test, as well as an appropriate balance of verbal and quantitative GRE score components. Specific information regarding GMAT test centres, dates, registration procedure and deadlines can be obtained by contacting the Graduate Management Admission Council at the GMAT exam website. Specific information regarding GRE test centres, dates, registration procedure and deadlines can be obtained at www.ets.org.
2. An applicant who did not complete a Bachelor's degree at a recognized university where English is the primary language of instruction must normally complete either the:
 - a. Test of English as a Foreign Language (TOEFL) and achieve a paper-based score of 580 (or higher), computer-based score of 237 (or higher), or Internet based score of 92-93 (or higher); or
 - b. International English Language Testing System (IELTS) and achieve a score of 7 (or higher).
 Information regarding the TOEFL is available from the Educational Testing Service at www.ets.org. IELTS information is available at www.ielts.org.
3. In exceptional cases, an applicant who has not completed a Bachelor's degree, but who meets all other requirements, may be considered for admission. Preference will be given to those who present a high GMAT score, have a minimum of 10 years of full-time managerial and executive experience, and have completed several years of university studies. The Faculty may also take into account relevant professional credentials. An applicant who does not meet normal admission requirements may be required to complete, with a high level of achievement, certain undergraduate courses before being considered for admission.

4. Notwithstanding the above, in exceptional cases, and only on the strong recommendation of the Faculty of Business Administration, consideration may be given to an applicant who does not qualify for admission consideration in accordance with the entrance requirements outlined above. It is noted that the GMAT requirement is never waived.

12.2 Deadlines for Applications

Applications and all supporting documents must be received no later than February 1 from applicants wishing to enter full-time studies in the Fall semester.

12.3 Procedure for Admission

1. Applications for admission to the MBA-SEE program must be made on the appropriate form to the School of Graduate Studies.
2. The following documents must be submitted in support of the official application form:
 - a. letters of appraisal from two referees, at least one of whom has had close professional contact with the applicant within the last two years, and at least one of whom is capable of appraising the applicant's academic potential as a graduate student;
 - b. official transcript from each university or other post-secondary institution previously attended (other than Memorial University of Newfoundland), to be sent directly by its Registrar (or equivalent officer) to the School of Graduate Studies. If not recorded on the transcript, official evidence of completion of undergraduate degree must also be submitted;
 - c. the official GMAT score report, to be sent directly by the Graduate Management Admission Council. The code number for Memorial University of Newfoundland is LTT-6W-51;
 - d. the Faculty of Business Administration's Employment/Volunteer Experience Form;
 - e. the Faculty of Business Administration's Social Enterprise Questionnaire; and
 - f. where applicable, an official TOEFL or IELTS score report to be forwarded directly by the educational testing service.
3. Admission shall be by the Dean of the School of Graduate Studies on the recommendation of the Faculty of Business Administration. Upon notification from the Dean of the School of Graduate Studies of acceptance into the MBA-SEE program, an applicant must give written notice to the School of Graduate Studies of the intention to register. Such notice must be received by the Office of the Dean within 30 days of notification of acceptance, or three weeks prior to semester registration.

12.4 Programs of Study

This program requires 36 credit-hours as specified below:

12.4.1 Fall Semester (15 credit-hours)

- Business 8500 Introductions to Social Innovation, Social Enterprise and Social Entrepreneurship (3 credit-hours)
- Business 8501 The Rise of Sustainable Capitalism (3 credit-hours)
- Business 8502 Organizational Behaviour in Social Enterprise (2 credit-hours)
- Business 8503 Managing Social Enterprise: Marketing (2 credit-hours)
- Business 8504 Managing Social Enterprise: Accounting (2 credit-hours)
- Business 8505 Managing Social Enterprise: Human Resources (2 credit-hours)
- Business 8506 Managing Social Enterprise: Information Systems (2 credit-hours)

12.4.2 Winter Semester (15 credit-hours)

- Business 8507 Managing Social Enterprise: Finance (2 credit-hours)
- Business 8508 Managing Social Enterprise: Operations Management (2 credit-hours)
- Business 8509 Leadership within Social Enterprises (2 credit-hours)
- Business 8510 Economics and Public Policy (2 credit-hours)
- Business 8511 Strategic Business Planning for a Social Venture (2 credit-hours)
- Business 8512 Funding Social Ventures (2 credit-hours)
- Business 8513 Project Management (1 credit-hour)
- Business 8514 Legal and Regulatory Issues (1 credit-hour)
- Business 8515 Governing Social Enterprises (1 credit-hour)
- Business 8516 Social Impact Measurement (1 credit-hour)

12.4.3 Spring/Summer (6 credit-hours)

- Business 8517 Internship (3 credit-hours)
- Business 8518 Reflections (1 credit-hour)

12.5 Evaluation

1. Credit towards the MBA-SEE Degree will be granted only for those courses which have been approved as constituting part of the student's program of study and in which the student has obtained a mark of 65% or higher.
2. A student is required to withdraw from the MBA-SEE program if a final of 'C' is obtained in any course.

13 Regulations Governing the Degree of Master of Education

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/educ

www.mun.ca/become/graduate/apply/app_deadlines.php

The Master of Education (M.Ed.) is offered in the following areas: Counselling Psychology, Curriculum, Teaching and Learning Studies, Educational Leadership Studies, Educational Technology, Post-Secondary Studies, and Reading Development and Instruction.

In addition, a Master of Arts and Education (Education and Francophone Literatures and Cultures), jointly offered by the Faculty of Education and the Faculty of Humanities and Social Sciences, Department of Modern Languages, Literatures and Cultures, is available for students who wish to specialize in the study and teaching of French.

In the case of the following general program regulations and the specific program regulations, which govern all Master of Education Degree programs, Dean refers to the Dean of Graduate Studies, Dean of Education refers to the Office of the Dean, Faculty of Education, and Faculty refers to the Faculty of Education, through its various operating committees.

Students taking any of the Master of Education Degree programs are advised that a Bachelor of Education Degree is required for employment in the K - 12 system.

13.1 Qualifications for Admission

1. Admission to the Master of Education is limited and competitive. To be considered for admission to a graduate program in Education, an applicant shall:
 - a. have from a recognized institution, either (1) an undergraduate degree with at least second class standing, or (2) an undergraduate degree and an average of at least 70% in the last 90 attempted undergraduate credit hours.
 - b. meet the requirements set forth in the specific program regulations.
2. Only in exceptional circumstances, and only on the recommendation of the Dean of Education, shall the Dean consider applicants who do not meet the requirements in 1.
3. Please refer to **Specific Programs** regulations for additional admission requirements.

13.2 Program of Study

- a. Students for the Master of Education (Educational Leadership Studies, Curriculum, Teaching and Learning Studies) shall be required to complete a minimum of:
 - a. 18 credit hours plus a thesis; or
 - b. 24 credit hours plus an internship report, a project report or a paper folio; or
 - c. 30 credit hours on the comprehensive-course route.

Students for the Master of Education (Post-Secondary Studies) shall be required to complete a minimum of:

- a. 18 credit hours plus a thesis; or
- b. 24 credit hours plus an internship; or
- c. 30 credit hours on the comprehensive-course route.

Students for the Master of Education (Counselling Psychology) shall be required to complete a minimum of:

- a. 30 credit hours (which include an internship) plus a thesis; or
- b. 36 credit hours (which include an internship) on the comprehensive-course route.

Students for the Master of Education (Information Technology) shall be required to complete a minimum of:

- a. 18 credit hours plus a thesis; or
- b. 30 credit hours on the comprehensive-course route.

Students for the Graduate Diploma in Post-Secondary Studies (Health Professional Education) must complete:

- a. 12 credit hours

Students for the Graduate Diploma in Educational Leadership Studies must complete:

- a. 12 credit hours

Students for the Master of Education (Reading Development and Instruction) shall be required to complete a minimum of:

- a. 24 credit hours plus a project report; or
- b. 18 credit hours plus a thesis

Students for the Graduate Diploma in Reading Development and Instruction must complete:

- a. 12 credit hours

- b. Students may apply for transfer of course credits. All course transfers require the approval of the Dean, on the recommendation of the Dean of Education, and are subject to General Regulation, **Program Requirements, Transfer of Course Credits** of the School of Graduate Studies.
- c.
 - a. All graduate courses completed must be in accordance with the student's program of study.
 - b. Graduate courses not within a program of study must be approved by the Associate Dean, Graduate Programs and Research, Faculty of Education, prior to registration.
- d.
 - a. A student with full-time status may register for a maximum of 12 credit hours in any regular semester and a maximum of 6 credit hours in intersession or summer session.
 - b. A student with part-time status may register for a maximum of 3 credit hours in any semester or session, excluding summer session, when 6 credit hours are permitted.
 - c. Students may register for additional courses in a semester or session with the permission of the Office of the Associate Dean of Graduate Programs in Education.
- e. Before submission of the proposal for thesis, project, internship, or paper folio, a Supervisory Committee shall be recommended by the Dean of Education, in consultation with the student, and approved by the Dean. The Supervisory Committee shall consist of the Supervisor and at least one other member.

The function of the Supervisory Committee shall be to approve the proposal for the thesis, project, internship, or paper folio, and to

exercise supervision in the conduct of the study on behalf of the Faculty, subject to the final approval of the Dean.

13.3 Period of Study

The period of the study for a graduate program shall not normally exceed six years beyond first registration. Completion of some program components may require full-time study on the University campus.

13.4 Evaluation

1. In order to continue as a student for the Master of Education Degree, a student who receives a final of 'C' in any program course must repeat that course and obtain a minimum of 'B'. In the case of an elective course a suitable replacement course, acceptable to the Faculty, may be substituted for the failed course. Only one such repetition/replacement shall be permitted on the student's graduate program. Should a of less than 'B' be obtained in the repeated course, replacement course, or any other program course, the student shall be required to withdraw from the program.
2. When the Faculty has determined, through consultation with the student, the instructors of graduate courses, and the program advisor or thesis Supervisor that the student's work has fallen below satisfactory level, it may request that the Dean of Education recommend to the Dean that the student's program be terminated.

13.5 Thesis

See School of Graduate Studies General Regulation, **Theses and Reports**.

13.6 Program Regulations

Every student in graduate studies shall comply with the School of Graduate Studies **General Regulations**, the Degree Regulations **Program of Study**, and the specific program regulations as outlined in **Specific Programs**.

13.7 Appeals and Waivers Procedures

Students are advised that appeals and waivers of any regulations governing the Degree of Master of Education are governed by School of Graduate Studies General Regulations **Provision For Waiver of Regulations** and **Appeal Procedures**.

13.8 Specific Programs

13.8.1 Counselling Psychology

The mission of the program in Counselling Psychology is to prepare highly knowledgeable, skilled, dedicated, and ethical professional practitioners, who will endeavour to enhance human potential throughout the life span and who can effectively practice within a variety of settings.

The Counselling Psychology faculty promotes counselling as an effective, viable means of assisting individuals throughout the life span. The counselling practitioner, regardless of the practitioner's theoretical stance or work setting, functions as a change agent who is sensitive to and knowledgeable about the range of human development reflected in individual differences and cultural and linguistic diversity. Effective and positive change is brought about by assisting clients to: examine and modify their behaviour for more effective living; cope with, adjust to, or otherwise negotiate the environments affecting their psychosocial well-being; and effect change in the larger society.

The practice of Counselling Psychology is based on theory and research, an understanding of ethical practices, and a set of professional and interpersonal skills. It is essential that graduate students study a variety of conceptual frameworks and research findings as preparation for collaborative work with other helping professionals, paraprofessionals, and a variety of self-help groups.

The Counselling Psychology faculty, while representing a range of views, agree that the uniqueness of the individual and the individual's personal strengths must be acknowledged and respected. To fully explore professional issues and personal values, a trusting and open atmosphere must be present.

Individuals from a wide variety of personal, social, and educational backgrounds are encouraged to apply to the Counselling Psychology program. The program provides a broad-based sequence of studies and supervised experiences that will prepare graduate students to be knowledgeable and skilled practitioners who can function in a variety of settings. By the time they have completed this program, students will have acquired knowledge and competencies in the following general areas: individual and group counselling theory and techniques, legal and ethical aspects of counselling, human development and learning, social, cultural, and linguistic diversity, career education and counselling, program development and implementation, measurement and appraisal, research and program evaluation, and application of current technology service delivery in rural areas.

13.8.1.1 Admission Requirements

In addition to meeting the requirements in the School of Graduate Studies **General Regulations**, students:

1. must have completed Education 3210, Introduction to Counselling.
2. must have completed at least one undergraduate course on each of the following topics: Statistics (Education 2900), Assessment (Education 3280, 3951, 3952 or 4950), Introduction to Career Education (Education 3211), Introduction to Exceptionality (Education 4240 or 4242). Please note that many of these courses are prerequisites to specific graduate courses and must be completed before taking those courses.
3. must have at least one year of teaching (or related work) experience.
4. must submit a resume that contains a concise rationale for the application (500 words or less) and three letters of recommendation (preferably one from each of the following: previous university instructors, supervisors, or employers).
5. should note admission is selective and controlled by an admission committee of faculty members involved in the program. An interview may be required if deemed necessary.
6. should note the Graduate Record Examination may be required.
7. A criminal record check or other screening procedures are not required as a condition of admission to the Counselling Psychology program. A student should, however, be aware that such record checks or other screening procedures are required by school districts, schools, community agencies, or other agencies that host counselling psychology students. Such agencies will not accept a student without a clean criminal record and vulnerable sector check or other screening procedures, which would prevent the student from completing a required component of the program. As a result, such a student may not be eligible for promotion or graduation.

It is the responsibility of the student to have such procedures completed as required and at the student's own expense. The Faculty of Education's Counselling Psychology program expects a student to provide evidence of a clean criminal record and vulnerable sector check before participating in any course or experience where direct contact with clients will occur.

The screening procedures of any given agency may change from time to time and are beyond the control of the University.

13.8.1.2 Program Requirements

1. all students in the Master of Education (Counselling Psychology) program shall be required to complete:
 - 6100 Research Designs and Methods in Education (prerequisite: Education 2900)
 - 6702 Counselling: Theory and Practice (prerequisite: Education 3210)
 - 6706 Career Education and Career Counselling (prerequisite: Education 3211)
 - 6708 Group Counselling: Theory and Practice (prerequisite: Education 6702)
 - 6700 Ethical and Legal Issues in Counselling
 - 6720 Internship in Counselling Psychology (prerequisite: Normally completion of all courses) (9 credit hours)
2. Students on the thesis route must complete the core courses listed above (24 credit hours) as well as a minimum of 6 credit hours from the closed electives indicated below for a total of 30 credit hours.
3. Students on the comprehensive-course route must complete the core courses listed above (24 credit hours) as well as a minimum of 6 credit hours from the closed electives and 6 credit hours from any university graduate offering provided that those chosen are appropriate to the student's program for a total of 36 credit hours.
4. All students in the Counselling Psychology program must complete 6720. The Internship may be fulfilled full-time or part-time and must comprise 600 clock hours with 240 hours of direct service with clients. It cannot be completed as part of your regular employment. It is strongly recommended that students take no other course during the full-time internship.
5. Closed electives are those listed below:
 - 6705 Nature and Development of School Counselling Services
 - 6707 Assessment for Counsellors
 - 6709 Assessment of Intelligence and Learning Skills (prerequisite: 3600 or its graduate equivalent 6707. Normally, students in Counselling Psychology will not enroll in this course until the latter part of their program). Students intending to pursue a career in the K-12 school system in Newfoundland and Labrador are urged to take this course and the prerequisite.
 - 6710 Issues in Development and Implementation of Special Education Policy and Practices
 - 6712 The Nature and Assessment of Behaviour Disorders in Children and Adolescents
 - 6713 Educational Applications of Contemporary Cognitive Psychology
 - 6714 Principles and Practices in Exceptionality
 - 6716 Working with Families and Parents
 - 6717 Counselling Adolescents
 - 6718 Elementary School Counselling
 - 6719 Cultural Issues in Counselling
 - 6802 Adult Learning and Development
 - 6938 Advanced Individual Counselling: Theory and Practice (prerequisite 6702 and 6708)

Notes: 1. *Student membership in the Canadian Counselling Association (CCA) or other appropriate professional organizations is strongly recommended for all students in the program.*

2. *Students who plan to work in the school system should be aware of the Department of Education regulations to be eligible to work as a school counsellor.*

3. *Students who plan to become registered psychologists in Newfoundland and Labrador should review the requirements of the Newfoundland Board of Examiners in Psychology.*

13.8.2 Curriculum, Teaching and Learning Studies

The Master of Education in Curriculum, Teaching and Learning Studies provides opportunities for students to investigate pertinent issues in these interrelated areas from a variety of perspectives: philosophical, historical, social, cultural, cognitive, and technological. The conceptual bases of curriculum, teaching, and learning are explored and analysed along with related examples of historical and current policies and practices. The program encourages the development of broad-based insights into issues related to these areas through an emphasis on critical inquiry and reflective practice. It supports students in the development and enhancement of research capabilities and professional expertise and practice.

Students may choose between two program options in Curriculum, Teaching and Learning Studies:

Option One

Students may choose to specialize in one of a number of areas of study: Indigenous and Place-based Education, Language and Literacy Studies, Mathematics Education, Music Education, Science Education, Second Language Education, Social Justice Education, Social Studies Education, Special Education, and Teacher-Librarianship.

Option Two

In consultation with a faculty advisor, students may choose to design a program speciality which addresses their research interests. Specialty foci within Curriculum, Teaching, and Learning Studies are numerous and may include technology and web-based education, arts education, rural and multi-age education. Students may alternatively select appropriate courses from other Master of Education program offerings to develop a program to meet their learning goals. Students interested in this option are strongly encouraged to explore and to focus their research and study interests and to discuss these interests with a faculty advisor.

13.8.2.1 Admission Requirements

In addition to meeting the requirements in the School of Graduate Studies **General Regulations**,

1. students must have completed a range and number of courses in Education deemed appropriate by the Faculty and Dean of Education.
2. a minimum of two years of teaching or related experience is recommended.
3. for a specialization in special education, a completed Bachelor of Special Education Degree or equivalent is required and enrolment will be limited to applicants articulating a research focus for which appropriate thesis supervision is available.

13.8.2.2 Program Requirements

1. all students in the Master of Education Program (Curriculum, Teaching and Learning Studies) shall be required to complete:
 - 6100 Research Designs and Methods in Education

- 6300 Teaching and Learning
 - 6602 Curriculum Studies
2. students on the thesis route must complete at least one of the research courses listed below (6100 is prerequisite):
 - 6466 Qualitative Research Methods
 - 6467 Quantitative Research Methods
 - 6468 Critical Approaches to Educational Research
 - 6469 Theoretical and Methodological Foundations of Action Research
 - 6909 Narrative Approaches to Teaching, Learning and Research
 - and at least 2 courses from any university graduate offering provided that those chosen are appropriate to the student's program
 3. students choosing Option One on the internship, paper folio, project route, and comprehensive-course route must complete at least 2 courses within one particular speciality area from the list in **Core speciality courses in the study of curriculum, teaching and learning areas** below.
 4. students choosing Option Two must choose courses that have been designated through consultation with faculty advisor during the first semester of studies in this program.
 5. students choosing the Mathematics Education specialization within Curriculum, Teaching and Learning Studies must complete 6630 Critical Issues in Mathematics Education prior to completing other Mathematics Education speciality courses.
 6. students choosing the Special Education specialization within Curriculum, Teaching and Learning Studies must complete a thesis and at least two of the required Special Education speciality courses.
 7. students on the comprehensive-course route must complete one of the following courses: E6390 Research and Development Seminar in Curriculum, Teaching and Learning Studies or E6394 Biographical Explorations of Teaching and Learning or E6913 Putting Action Research Methodologies into Practice (prereq. E6469). Normally students would be permitted to register for one of these courses only after all other course requirements have been met, or during the student's last semester of studies.
 8. to meet total credit hour requirements students may choose electives from any university graduate offering provided that those chosen are appropriate to the student's program:
 - students on the thesis route must complete a total of at least 18 credit hours
 - students on the internship, paper folio, or project route must complete a total of at least 24 credit hours and the appropriate course option 6391 Internship in Curriculum, Teaching and Learning Studies (6 credit hours), 6392 Project in Curriculum, Teaching and Learning Studies (6 credit hours), or 6393 Paper Folio in Curriculum, Teaching and Learning Studies (6 credit hours)
 - students on the comprehensive-course route must complete a total of at least 30 credit hours

9. **Core speciality courses in the study of curriculum, teaching and learning areas:**

Indigenous and Place-based Education

6394 Biographical Explorations of Teaching and Learning
 6462 Cultural, Landscapes, Knowledge and Pedagogy
 6603 Place, Ecology, and Education
 6923 Perspectives in Indigenous Education
 6924 Decolonizing Pedagogies

Language and Literacy Studies

6106 Popular Culture and Literacy Education
 6108 Literacy and Language Education: Sociocultural Perspectives
 6641 Writing in the Primary, Elementary and Secondary Schools
 6642 Developmental Reading (K-8)
 6643 Contemporary Issues in Intermediate and Secondary English
 6645 Literature for Children and Adolescents
 6647 Diagnosis and Remediation of Reading and Writing Difficulties
 6649 Exploring Multiple Literacies
 6693 Literacy for the Young Child in Home and School

Mathematics Education

6630 Critical Issues in Mathematics Education
 6634 Teaching and Learning to Solve Mathematics Problems (*prerequisite E6630*)
 6639 Technology and the Teaching and Learning of Mathematics (*prerequisite E6630*)

Music Education

6502 Contexts of Music Education
 6503 Teaching Music from the Podium
 6504 Musicianship, Pedagogy, and Learning

Science Education

6653 Contemporary Issues in Science Education I
 6655 The Nature of Science and Science Education
 6658 Teaching and Learning Scientific Concepts, Laws, and Theories

Second Language Education

6668 Current Issues in Second Language Education
 6669 Graduate Seminar in Second Language Teaching and Learning
 6673 Second Language Teaching, Learning and Curriculum
 6674 Research in Second Language Writing Education
 6676 Research and Practice in TESL/TEFL (Teaching English as a Second/Foreign Language)

Social Justice Education

6105 Social and Cultural Difference and Education
 6106 Popular Culture and Literacy Education
 6108 Literacy and Language Education: Sociocultural Perspectives
 6440 Family School Relations: Leadership and Policy Implications
 6463 Relationships First: Rethinking Educational Engagement (*credit may be obtained for only one of 6463 or 6936*)
 6465 School Violence: Leadership and Policy Implications

6468 Critical Approaches to Educational Research

6909 Narrative Approaches to Teaching, Learning and Research

6913 Putting Action Research Methodologies into Practice (*prerequisite: 6469 Theoretical and Methodological Foundations of Action Research*)

Social Studies Education

6670 Teaching and Learning Social Studies

6671 Research in Social Studies Education

6672 Issues and Trends in Social Studies

Special Education

6710 Issues in Development and Implementation of Special Education Policy and Practices

6712 The Nature and Assessment of Behaviour Disorders in Children and Adolescents

6714 Principles and Practices in Exceptionality

6755 Nature and Assessment of Learning Disabilities

Teacher-Librarianship

6662 Seminar in Teacher-Librarianship

6664 Seminar on School Improvement

Additional courses in the speciality areas are available.

13.8.3 Educational Leadership Studies

The Educational Leadership Studies program provides students with an opportunity to explore a broad range of issues in educational leadership, policy, and administration. It prepares students to assume leadership roles in a variety of settings, including school and district leadership, post-secondary institutions and policy analysis. The Faculty offers a Master of Education degree and a Graduate Diploma in Educational Leadership Studies.

13.8.3.1 Admission Requirements

In addition to meeting the requirements in the School of Graduate Studies **General Regulations**,

1. students must have completed a range and number of courses in Education deemed appropriate by the Faculty and Dean of Education.
2. a minimum of two years of teaching/leadership experience is recommended.

13.8.3.2 Program Requirements

1. all students in the Master of Education Program (Educational Leadership Studies) program must complete
 - 6100 Research Designs and Methods in Education
 - 6203 Leadership: Theory and Practice
 - 6204 Educational Administration: Theory and Practice
 - 6205 Educational Policy: Theory and Practice and one of the following:
 - 3 credit hours (thesis route) within closed electives as listed in 5. below or
 - 6 credit hours (internship, paper folio, project, comprehensive course route) within closed electives as listed in Closed electives below
2. students on the thesis route must complete at least one of the research courses listed below (6100 is prerequisite)
 - 6466 Qualitative Research Methods
 - 6467 Quantitative Research Methods
 - 6468 Critical Approaches to Educational Research
 - 6469 Theoretical and Methodological Foundations of Action Research
3. students on the comprehensive-course route must complete 6290 Research and Development Seminar in Educational Leadership Studies. Normally students would be permitted to register for this course only after all other course requirements have been met, or during the student's last semester of studies.
4. to meet total credit hour requirements students may choose electives from any university graduate offering provided that those chosen are appropriate to the student's program:
 - students on the thesis route must complete a total of at least 18 credit hours
 - students on the internship, paper folio, or project route must complete a total of at least 24 credit hours and the appropriate course option including 6291 Internship in Educational Leadership Studies (6 credit hours), 6292 Project in Educational Leadership Studies (6 credit hours), or 6293 Paper Folio in Educational Leadership Studies (6 credit hours)
 - students on the comprehensive-course route must complete a total of at least 30 credit hours
5. Closed electives are those listed below:
 - 6202 Social Context of Educational Leadership
 - 6321 Supervisory Processes in Education
 - 6330 Educational Finance
 - 6335 Legal Foundations of Educational Administration
 - 6410 Seminar on Philosophical Issues in Educational Policy and Leadership
 - 6420 Ethical Issues and Perspectives in Educational Practice and Policy
 - 6425 Comparative Perspectives in Public Education, Reform, and Leadership
 - 6426 Computer Applications in Educational Administration
 - 6427 School Community Partnerships
 - 6440 Family-School Relations: Leadership and Policy Implications
 - 6465 School Violence: Leadership and Policy Implications
 - 6664 Seminar in School Improvement
 - 6710 Issues in Development and Implementation of Special Education Policy and Practices

Courses must be appropriate to the program and chosen in consultation with the advisor.

13.8.4 Graduate Diploma in Education (Educational Leadership Studies)

The Graduate Diploma in Education (Educational Leadership Studies) provides students with an opportunity to explore a broad range of issues in educational leadership, administration, foundations and policy. The Diploma is suitable for students interested in pursuing assume leadership roles in a variety of settings, including schools, school districts and post-secondary institutions. The program is also designed to enhance leadership competencies in relevant areas such as policy analysis, critical analysis, and community relations.

13.8.4.1 Admission Requirements

Students wishing to be admitted to the Graduate Diploma in Education (Educational Leadership Studies) must meet the criteria for admission specified under **Master of Education (Educational Leadership Studies) degree, Qualifications for Admission**.

13.8.4.2 Program Requirements

Students for the Graduate Diploma must complete a total of 12 credit hours, including 3 credit hours from each of the following areas:

Educational Administration

6204 Educational Administration: Theory and Practice
6330 Educational Finance
6335 Legal Foundations of Educational Administration
6426 Computer Applications in Educational Administration

Educational Foundations

6202 Social Context of Educational Leadership
6410 Seminar on Philosophical Issues in Educational Policy and Leadership
6420 Ethical Issues and Perspectives in Educational Practice and Policy
6664 Comparative Perspectives in Public Education, Reform and Leadership

Educational Leadership

6203 Leadership: Theory and Practice
6321 Supervisory Processes in Education
6427 School Community Partnerships
6664 Seminar in School Improvement

Educational Policy

6205 Educational Policy: Theory and Practice
6440 Family-School Relations: Leadership and Policy Implications
6465 School Violence: Leadership and Policy Implications
6710 Issues in Development and Implementation of Special Education Policy and Practices

Students enrolled in the Graduate Diploma program may request transfer to the Master of Education (Educational Leadership Studies) prior to graduation.

Students holding the Graduate Diploma in Education (Educational Leadership Studies) and accepted to the M.Ed. (Educational Leadership Studies) program will complete up to 12 fewer credit hours dependent upon the chosen program route and the completion date of the Diploma.

All courses completed must satisfy the requirements for the Graduate Diploma (Educational Leadership Studies) and the Master of Education (Educational Leadership Studies) Degree.

13.8.5 Educational Technology

The graduate program in Educational Technology is offered in partnership with Cape Breton University (CBU). It is designed to facilitate the educational use of educational technology in a wide variety of settings. The program will be of interest to educators at all levels including K-12 teachers, school administrators, those in the post-secondary system, business and industry, as well as those in most other adult learning situations.

Educational technology in this Master of Education program encompasses, but is not limited to: computer, communications, networking, and multi-media applications. The overall intent of the program is to:

- provide educators with skill sets and pedagogical expertise that will enable them to address computer and related educational technology in a teaching/learning situation;
- develop potential educational technology leaders for the educational system;
- develop instructional designers, for a variety of educational settings, who are able to combine educational technology with learning theory to enhance curriculum development and delivery;
- provide a basis for the continued professional development of educators in the area of educational technology;
- develop an awareness of the applications of educational technology in a wide variety of educational contexts; and
- develop research expertise and potential in the use and application of educational technology for teaching and learning purposes.

Students for the program will have attained, prior to acceptance, some fundamental knowledge and skills with respect to educational technology through prerequisite experiences, and have attained a recognized undergraduate degree in an appropriate discipline with at least a second class standing (see specific regulations for details). The program components are designed to enable students to build on their prior experience through the development of pedagogical links and educational technology applications. It is intended that the program be offered primarily as a part-time program through distance delivered courses, with other delivery formats to be considered/ utilised where feasible. Access to specific computer hardware, software, and the Internet is required and will be the responsibility of each student.

A steering committee comprised of three members from each of the Faculty of Education at Memorial University of Newfoundland and the Institute for Education at CBU is responsible to the Associate Dean of Graduate Programs and Research, Faculty of Education, for selected aspects of the program. The latter include assessing student applications, recommending approval of instructors who are not regular faculty members at either CBU or Memorial University of Newfoundland, and recommending course or program changes. This committee is to be co-chaired by the Associate Dean of Graduate Programs and Research, Faculty of Education, Memorial University of Newfoundland and the Director of the Institute for Education at CBU, or their designate(s).

CBU courses offered as part of this program are indicated by the prefix "CBU EDU" followed by the specific course number.

13.8.5.1 Admission Requirements

Admission to the program is competitive and selective. Selection into the program is determined by an applicant's profile which would

normally include such criteria as previous academic performance, related work experience, and relevant educational technology experience. More detailed information may be found on the Faculty of Education website.

13.8.5.2 Program Requirements

1. all students for the Master of Education (Educational Technology) shall be required to complete:
 - 6100 Research Designs and Methods in Education
 - 6610 Research on Computers in the Curriculum
 - 6620 Issues and Trends in Educational Technology
 - CBU EDUC5105 Designing Web-Based Learning
 - CBU EDUC5131 Digital Citizenship in a Global Community
2. students on the comprehensive course route must complete:

two courses from the following Memorial University of Newfoundland closed electives:

 - 6426 Computer Applications in Educational Administration
 - 6615 Educational Software Prototyping and Evaluation
 - 6802 Adult Learning and Development
 - 6822 Foundations of Instructional Design in Post Secondary Education
 - 6823 Principles of Programme Design and Development
 - 6927 Digital Games Bases Learning

two courses from the following CBU closed electives:

 - EDUC 5101 Assessment of Software and IT Applications for Education
 - EDUC 5103 Integration of Instructional Design for K-12
 - EDUC 5106 Technology Planning for Educational Environments
 - EDUC5107 Information Management in Education Environments
 - 6590 Research and Development Seminar in Educational Technology in Education
3. students on the project route must complete:

one course from the following Memorial University of Newfoundland closed electives

 - 6426 Computer Applications in Educational Administration
 - 6615 Educational Software Prototyping and Evaluation
 - 6802 Adult Learning and Development
 - 6822 Foundations of Instructional Design in Post Secondary Education
 - 6823 Principles of Programme Design and Development
 - 6927 Digital Games Bases Learning

one course from the following CBU closed electives:

 - 5101 Assessment of Software and IT Applications for Education
 - 5103 Integration of Instructional Design for K-12
 - 5106 Technology Planning for Educational Environments
 - 5107 Information Management in Education Environments
 - 6193 Project in Educational Technology
4. students on the thesis route must complete:

three credit hours from:

 - CBU EDUC5101 Assessment of Software and Information Technology Applications for Education
 - CBU EDUC5103 Integration of Instructional Design for K-12
 - CBU EDUC5106 Technology Planning for Educational Environments
 - CBU EDU5107 Information Management for Educational Environments
5. normally, students will be permitted to register for 6590 only after all other course requirements have been met.
6. students who have successfully completed the CBU graduate diploma in Educational Technology can receive up to 12 advanced standing credit hours appropriate to their Degree option (nine CBU EDU course credit requirements for the thesis route or twelve CBU EDU course credit requirements for the comprehensive course route). Courses which qualify for transfer include CBU EDU 5101, EDU 5103, EDU 5105, EDU 5106, EDU 5107, EDU 5131).
7. thesis-route students will be subject to **Theses and Reports** of the School of Graduate Studies, Memorial University of Newfoundland, supervised by a faculty member at Memorial University of Newfoundland, and where feasible co-supervised by a CBU faculty member.

13.8.6 Post-Secondary Studies

The graduate programs in Post-Secondary Studies are designed to prepare students to function in a variety of roles in informal and formal post-secondary learning environments (including academic, technical, professional, adult and continuing education, health professional education, and student services/development). These programs facilitate a study of the post-secondary educational systems through an examination of their foundations, directions, organization and administration; and through curriculum and instructional development options for occupational preparation and adult education.

13.8.6.1 Admission Requirements

In addition to meeting the requirements in the School of Graduate Studies **General Regulations**,

1. applicants must have two years of successful experience in working with adult learners is recommended; and
2. for the M.Ed. Post-Secondary Studies (Health Professional Education) and the Graduate Diploma in Post-Secondary Studies (Health Professional Education) program, applicants must have appropriate academic qualifications and work experience in a health-related field.

13.8.6.2 Program Requirements

1. Students for the Master of Education (Post-Secondary Studies) are required to complete courses that form the program core.
 - 6100 Research Designs and Methods in Education
 - 6801 Foundations of Post-Secondary Programs
 - 6802 Adult Learning and Development
 - 6803 Research in Post-Secondary Education

and not fewer than 6 credit hours from closed electives in 7. below.

2. Students holding the Graduate Diploma in Post-Secondary Studies (Health Professional Education) and accepted in the Master of Education (Post-Secondary Studies) will complete up to 12 fewer credit hours dependent upon the chosen program route and the completion date of the Graduate Diploma.
3. Students on the comprehensive-course route must complete 6890 Research and Development Seminar in Post-Secondary Studies.
4. Students on the internship route must complete 6891 Internship in Post-Secondary Studies (6 credit hours).
5. Normally, students will be permitted to register for 6890 and 6891 only after all other course requirements have been met.
6. To meet total credit hour requirements students may choose courses from other graduate offerings within the Faculty, the University, or other universities provided the courses chosen are appropriate to the student's program. Students on the thesis route must complete a total of at least 18 credit hours; and those on the internship or comprehensive-course route a total of at least 30 credit hours.
7. Closed electives are those listed below:
 - 6804 Leadership and Human Resource Development in Post-Secondary Education
 - 6805 Advanced Human Resource Communications
 - 6806 Interprofessional Education in the Health Professions
 - 6807 Economics and Finance of Post-Secondary Education
 - 6808 Supporting International and Immigrant Students
 - 6809 Internationalization of Higher Education
 - 6822 Foundations of Instructional Design in Post-Secondary Education
 - 6823 Principles of Program Design and Development
 - 6831 Organization and Administration of Student Services
 - 6832 Issues and Trends in the Administration of Post-Secondary Education
 - 6841 Student Development Theory, Services and Programs in Post-Secondary Education
 - 6940 Administration of Student Services in Post-Secondary Education

13.8.6.3 Program Requirements for Graduate Diploma in Post-Secondary Studies (Health Professional Education)

The Graduate Diploma in post-secondary studies, specialization in health professional education, which was created in collaboration with the Centre for Collaborative Health Professional Education, is designed to enhance health professionals' abilities as educators and leaders in educational program design, development, evaluation, and administration. The Graduate Diploma is intended for educators and educational leaders of formal and informal post-secondary health professional education programs.

Participants will engage in an in-depth study of the structure and organization of the post-secondary education system, theories and philosophies of adult learning and development; and through elective courses pursue studies of program development models, instructional design frameworks, evaluation and assessment techniques, teaching methods, and research design principles in post-secondary teaching and learning. Opportunities will exist for the guided study of these topics as they relate to health professional education.

1. Students for the Graduate Diploma in Post-Secondary Studies (Health Professional Education) are required to complete courses that form the program core.
 - 6801 Foundations of Post-Secondary Programs
 - 6802 Adult Learning and Development
 - 6806 Interprofessional Education in the Health Professions
 and not fewer than 3 credit hours from closed electives in **Program Requirements (M.Ed.)**, 7. above or from:
 - 6100 Research Designs and Methods in Education
 - 6803 Research in Post-Secondary Education
2. Students are encouraged to relate their assignments in these courses to health professional education.
3. Students enrolled in the Graduate Diploma program may request transfer to the Master of Education (Post-Secondary Studies). Courses for both the Graduate Diploma and the Degree must be appropriate to the program and chosen in consultation with the student's advisor.

13.8.7 Reading Development and Instruction

The Master of Education (Reading Development and Instruction) provides students with an opportunity for in-depth study of the nature of reading development, assessment and instruction for all students including diverse learners. This degree is suitable for students interested in pursuing roles requiring specialized knowledge about reading for guiding instructional planning and literacy leadership in educational settings.

13.8.7.1 Admission Requirements

Students applying for admission to the Master of Education (Reading Development and Instruction) must meet the criteria for acceptance to a graduate program in the Faculty of Education. Students must have from a recognized institution, either an undergraduate degree with at least second-class standing, or an undergraduate degree and an average of at least 70% in the last 90 attempted undergraduate credit hours. Preference will be given to applicants with completed courses related to assessment and the remedial instruction of struggling readers.

13.8.7.2 Program Requirements

1. Students for the degree are required to complete the following five Education courses:
 - 6100 Research Designs and Methods in Education
 - 6470 Word and Sentence-level Reading Development and Instruction
 - 6471 Text-level Reading Development and Instruction (*prerequisite: E6470*)
 - 6472 Issues and Interventions in Reading Development and Instruction for Diverse Learners (*prerequisites: E6470, E6471*)
 - 6473 Praxis for Reading Teachers (*prerequisites: E6470, E6471, E6472*)
2. Students on the **Project Route** will also complete the following courses:
 - Nine credit hours to be taken from graduate course offerings in the area of language and Literacy Studies, Faculty of Education (excluding E6642) or other courses approved by the graduate office.
 - Education 6192 Project in Reading Development and Instruction normally taken at the completion of the course work and is

intended to facilitate the conceptualization and writing of a project under the direction of a supervisor. A project is a theoretically based product intended for possible use in educational settings. For this program, this project shall be reading-focused and developed in consultation with the project supervisor (6 credit hours).

Students must complete at least 24 credit hours prior to registering for this project.

All courses completed must satisfy the requirements for the Master of Education (Reading Development and Instruction).

3. Students on the **Thesis Route** will also complete one of the following Education research courses as appropriate to the thesis methodology, chosen in consultation with the thesis supervisor:

6466 Qualitative Research Methods
 6467 Quantitative Research Methods
 6468 Critical Approaches to Educational Research
 6469 Theoretical and Methodological Foundations of Action Research
 6909 Narrative Approaches to Teaching, Learning and Research

The thesis shall be focused on an area of inquiry related to reading development and instruction and development in consultation with the thesis supervisor.

All courses completed must satisfy the requirements for the Master of Education (Reading Development and Instruction).

13.8.8 Graduate Diploma in Education (Reading Development and Instruction)

The Graduate Diploma (Reading Development and Instruction) provides students with an opportunity for study of the nature of reading development, assessment and instruction for all students including diverse learners. This Diploma is suitable for students interested in pursuing roles requiring specialized knowledge about reading for guiding instructional planning and literacy leadership in educational settings.

13.8.8.1 Admission Requirements

Students applying for admission to the Graduate Diploma (Reading Development and Instruction) must meet the criteria for acceptance to a graduate program in the Faculty of Education. Students must have from a recognized institution, either an undergraduate degree with at least second-class standing, or an undergraduate degree and an average of at least 70% in the last 90 attempted undergraduate credit hours. Preference will be given to applicants with completed courses related to assessment and the remedial instruction of struggling readers.

13.8.8.2 Program Requirements

Students for the Graduate Diploma are required to complete the following four Education courses:

6470 Word and Sentence Level Reading Development and Instruction
 6471 Text-level Reading Development and Instruction (*prerequisite: ED 6470*)
 6472 Issues and Interventions in Reading Development and Instruction for Diverse Learners (*prerequisites: ED 6470, ED 6471*)
 6473 Praxis for Reading Teachers (*prerequisites: ED 6470, ED 6471, ED 6472*)

Students enrolled in the Graduate Diploma program may request transfer to the **Master of Education, Reading Development and Instruction** prior to graduation. Students holding the Graduate Diploma in Education (Reading Development and Instruction) and accepted to the M.Ed. (Reading Development and Instruction) program will complete up to 12 fewer credit hours dependent upon the chosen program route and the completion date of the Diploma.

13.9 Courses

Course descriptions for graduate courses in Education are available at the Faculty of Education graduate website.

A selection of the following graduate courses shall be offered to meet the requirements of students, as far as the resources of the Faculty allow.

6100 Research Designs and Methods in Education
 6105 Social and Cultural Difference and Education
 6106 Popular Culture and Literacy Education
 6107 Arts Education: Creativity in the Classroom
 6108 Literacy and Language Education: Sociocultural Perspectives
 6192 Project in Reading Development and Instruction
 6193 Project in Educational Technology (6 credit hours)
 6202 Social Context of Educational Leadership
 6203 Leadership: Theory and Practice
 6204 Educational Administration: Theory and Practice
 6205 Educational Policy: Theory and Practice
 6290 Research and Development Seminar in Educational Leadership Studies
 6291 Internship in Educational Leadership Studies (6 credit hours)
 6292 Project in Educational Leadership Studies (6 credit hours)
 6293 Paper Folio in Educational Leadership Studies (6 credit hours)
 6300 Teaching and Learning
 6321 Supervisory Processes in Education
 6330 Educational Finance
 6335 Legal Foundations of Educational Administration
 6390 Research and Development Seminar in Curriculum, Teaching and Learning Studies
 6391 Internship in Curriculum, Teaching and Learning Studies (6 credit hours)
 6392 Project in Curriculum, Teaching and Learning Studies (6 credit hours)
 6393 Paper Folio in Curriculum, Teaching and Learning Studies (6 credit hours)
 6394 Biographical Explorations of Teaching and Learning
 6410 Seminar on Philosophical Issues in Educational Policy and Leadership
 6420 Ethical Issues and Perspectives in Educational Practice and Policy
 6425 Comparative Perspectives in Public Education, Reform, and Leadership
 6426 Computer Applications in Educational Administration
 6427 School Community Partnerships
 6440 Family-School Relations: Leadership and Policy Implications
 6461 Graduate Research Writing
 6462 Cultural Landscapes, Knowledge and Pedagogy

6463 Relationships First: Rethinking Educational Engagement (*credit may be obtained for only one of 6463 or 6936*)
6465 School Violence: Leadership and Policy Implications
6466 Qualitative Research Methods
6467 Quantitative Research Methods
6468 Critical Approaches to Educational Research
6469 Theoretical and Methodological Foundations of Action Research
6470 Word and Sentence Level Reading Development and Instruction
6471 Text-level Reading Development and Instruction (*prerequisite: ED 6470*)
6472 Issues and Interventions in Reading Development and Instruction for Diverse Learners (*prerequisites: ED 6470, ED 6471*)
6473 Praxis for Reading Teachers (*prerequisites: ED 6470, ED 6471, ED 6472*)
6502 Contexts of Music Education
6503 Teaching Music from the Podium
6504 Musicianship, Pedagogy, and Learning
6590 Research and Development Seminar in Information Technology in Education
6600 Learning and Motivation
6602 Curriculum Studies
6603 Place, Ecology and Education
6610 Research on Computers in the Curriculum
6615 Educational Software Prototyping and Evaluation
6620 Issues and Trends in Educational Computing
6630 Critical Issues in Mathematics Education
6632 Current Research in Teaching and Learning of Elementary School Mathematics (*prerequisite: 6630*)
6634 Teaching and Learning to Solve Mathematics Problems (*prerequisite: 6630*)
6635 Teaching and Learning Geometry
6636 Teaching and Learning the Concept of Number and Operations
6639 Technology and the Teaching and Learning of Mathematics (*prerequisite: 6630*)
6641 Writing in the Primary, Elementary and Secondary Schools
6642 Developmental Reading (K-8)
6643 Contemporary Issues in Intermediate and Secondary English
6644 Drama in Education
6645 Literature for Children and Adolescents
6646 Literature in the Secondary School
6647 Diagnosis and Remediation of Reading and Writing Difficulties
6649 Exploring Multiple Literacies
6653 Contemporary Issues in Science Education I
6655 The Nature of Science and Science Education
6658 Teaching and Learning Scientific Concepts, Laws, and Theories
6660 Information Technology
6661 Applications of Media in Education
6662 Research Seminar in Teacher-Librarianship
6663 The Organization of Learning Resources
6664 Seminar in School Improvement
6668 Current Issues in Second Language Education
6669 Graduate Seminar in Second Language Teaching and Learning
6670 Teaching and Learning Social Studies
6671 Research in Social Studies Education
6672 Issues and Trends in Social Studies
6673 Second Language Teaching, Learning and Curriculum (*credit may be obtained for only one of Education 6673, the former 6665 or 6667*)
6674 Research in Second Language Writing Education
6675 Current Issues in Rural Education
6676 Research and Practice in TESL/TEFL (Teaching English as a Second/Foreign Language)
6693 Literacy for the Young Child in Home and School
6700 Ethical and Legal Issues in Counselling
6701 Issues and Methodologies in Learning and Developmental Research
6702 Counselling: Theory and Practice
6705 Nature and Development of School Counselling Services
6706 Career Education and Career Counselling
6707 Assessment for Counsellors
6708 Group Counselling: Theory and Practice
6709 Assessment of Intelligence and Learning Skills
6710 Issues in Development and Implementation of Special Education Policy and Practices
6711 Behaviour Modification in the Educational Setting
6712 The Nature and Assessment of Behaviour Disorders in Children and Adolescents
6713 Educational Applications of Contemporary Cognitive Psychology
6714 Principles and Practices in Exceptionality
6715 The Theory and Practice of Peer Helping Programs
6716 Working with Families and Parents
6717 Counselling Adolescents
6718 Elementary School Counselling
6719 Cultural Issues in Counselling
6720 Internship in Counselling Psychology (9 credit hours)
6755 Nature and Assessment of Learning Disabilities
6801 Foundations of Post-Secondary Programs
6802 Adult Learning and Development
6803 Research in Post-Secondary Education
6804 Leadership and Human Resource Development in Post-Secondary Education
6805 Advanced Human Resource Communications
6806 Interprofessional Education in the Health Professions
6807 Economics and Finance of Post-Secondary Education
6808 Supporting international and immigrant students
6809 Internationalization of Higher Education

6810 Assessment and Evaluation in Student Services
 6822 Foundations of Instructional Design in Post-Secondary Education
 6823 Principles of Program Design and Development
 6831 Organization and Administration of Student Services for the Adult Learner
 6832 Issues and Trends in the Administration of Post-Secondary Education
 6841 Student Development Theory, Services and Programs in Post-Secondary Education
 6890 Research and Development Seminar in Post-Secondary Studies
 6891 Internship in Post-Secondary Studies (6 credit hours)
 6900-6910 Special Topics (excluding 6909)
 6909 Narrative Approaches to Teaching, Learning and Research
 6911 Multiage Education: An Introduction
 6912-6950 Special Topics (excluding 6913, 6923, 6924, 6927, 6931, 6932, 6936, 6938, and 6940)
 6913 Putting Action Research Methodologies into Practice (*prerequisite: 6469 Theoretical and Methodological Foundations of Action Research*)
 6923 Perspectives in Indigenous Education
 6924 Decolonizing Pedagogies
 6927 Digital Game-based Learning
 6931 Educational Technology Law
 6932 Intellectual Technology Law in Teaching and Learning
 6938 Advanced Individual Counselling: Theory and Practice (*prerequisite 6702 and 6708*)
 6940 Administration of Student Services in Post-Secondary Education

14 Regulations Governing the Degree of Master of Employment Relations

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/sgs
www.mun.ca/become/graduate/apply/app_deadlines.php

The Master of Employment Relations (M.E.R.) is a multidisciplinary program providing advanced level study of all aspects of the employment relationship.

The M.E.R. program is offered by full-time or part-time study and involves 36 credit hours of course work. Students registered on a full-time basis will normally complete the program in one academic year. The following regulations must be read in conjunction with the **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland.

14.1 Administration

1. The program shall be administered by a Director, who reports to the Dean of Graduate Studies. The Director shall be appointed by the Dean of Graduate Studies on the recommendation of the Deans of Humanities and Social Sciences and Business Administration. In making this recommendation, the Deans of Humanities and Social Sciences and Business Administration shall consult with the employment relations community both within and outside the University.
2. An Executive Committee consisting of the Director and Deans of Humanities and Social Sciences, Business Administration, and Graduate Studies will be established to review administrative, resource, and strategic planning issues related to the program. This committee shall be chaired by the Dean of Graduate Studies.
3. The Director shall consult with the Graduate Committee in Employment Relations (GCER) for the purposes of administering the academic elements of the program. The GCER shall normally consist of 11 members appointed by the Dean of Graduate Studies on the recommendation of the Director. The GCER will include the Director, who shall Chair the committee, approximately six faculty members from the Faculties of Humanities and Social Sciences and Business Administration who teach required courses, the Associate Deans or Directors of Graduate Studies from Humanities and Social Sciences and Business Administration, as well as one full-time and one part-time student representative.
4. An Advisory Board in Employment Relations (ABER) shall be established for the purposes of consulting with obtaining feedback from the employment relations community. The ABER will consist of a broad cross-section of members from the employment relations community both within and outside the University who shall be appointed by the Dean of Graduate Studies on the recommendation of the Director.

14.2 Qualifications for Admission

1. Admission is limited and competitive.
2. To be considered for admission to the M.E.R. program, an applicant shall have an undergraduate degree, normally with a minimum B average from an institution recognized by Senate.
3. Relevant work experience is also beneficial, though not necessary for a successful application.
4. In exceptional cases, applicants who have not completed an undergraduate degree, but who meet all other requirements, may be considered for admission. Preference will be given to those who have a minimum of 10 years of full-time professional experience, including demonstrated success in employment relations, and who have successfully completed substantial university course work including several courses at an advanced undergraduate level from an institution recognized by Senate. Any applicants who do not meet normal admission requirements may also be required to successfully complete the GMAT or the GRE with a satisfactory result and/or additional undergraduate courses before being considered for admission.
5. Applicants who did not complete an undergraduate degree at a recognized university where English is the primary language of instruction must normally complete either the:
 - a. Test of English as a Foreign Language (TOEFL) and achieve a minimum paper-based score of 580, a minimum computer-based score of 237, or a minimum Internet based score of 92-93; or
 - b. International English Language Testing System (IELTS) and achieve a minimum score of 7 (Academic) with at least 6.0 for each component.
 - c. Information regarding the TOEFL is available from the Educational Testing Service at www.ets.org. IELTS information is available at www.ielts.org. It is noted that other equivalent tests acceptable to the School of Graduate Studies will also be considered.

14.3 Deadlines for Applications

1. Applicants seeking full-time enrolment will normally only be admitted to the program in the Fall (September) semester.
2. Applications must be postmarked no later than February 15 for applicants wishing to enter full-time or part-time studies in the Fall (September) semester.
3. Applications must be postmarked not later than August 15 for applicants wishing to enter part-time studies in the Winter (January) semester.
4. Individuals submitting applications later than the above dates are not assured of consideration for admission to the program in the semester desired; their applications will be processed only if time and resources permit.

14.4 Procedure for Admission

1. Applications for admission to the M.E.R. program must be made on the appropriate form and submitted to the School of Graduate Studies.
2. The following documents must be submitted in support of the official application form:
 - a. Letter of appraisal from two referees, one of whom is capable of appraising the applicant's academic potential as a graduate student, and of whom is capable of appraising the applicant's professional experience and/or actual or likely success in a career in employment relations.
 - b. The M.E.R. Employment Experience Information Form.
 - c. Official transcripts from each university or other post-secondary institution previously attended, to be sent directly by its Registrar (or equivalent officer) to the School of Graduate Studies. If not recorded on the transcript, official evidence of completion of undergraduate degree must also be submitted.
3. Application files are normally evaluated after the deadline dates for application noted above and only when all required documentation has been received.
4. Admission shall be granted by the Dean of Graduate Studies on the recommendation of the Director, and in consultation with the Academic Staff Members (ASMs) of the GCER committee when required. Upon notification from the Dean of the School of Graduate Studies of acceptance into the M.E.R. program, applicants must give written notice to the School of Graduate Studies of their intention to register.

14.5 Program of Study

1. The M.E.R. program consists of 36 credit hours of course work. This includes 30 credit hours of required courses and 6 credit hours of elective courses. The required courses are specified in **Table 1** and elective courses are specified in **Table 2**.
2. The required courses introduce students to the three main areas of study in the program: labour-management relations; human resources management; and labour market and social policy analysis.
3. The two electives must be chosen from the list of approved electives specified in **Table 2**. Other courses may be approved and added to **Table 2** by the Dean of Graduate Studies on the recommendation of the Director.
4. Students are responsible for fulfilling all prerequisites and may require special permission from the Department offering an elective to enrol in the course.
5. The Research Seminar in Employment Relations provides students with both quantitative and qualitative research skills and requires the identification of a research problem, the development and execution of a methodology appropriate to addressing the problem, analysis of results, and completion of final report. The Research Seminar involves 3 credit hours of course work in each of the Fall, Winter, and Spring semesters.
6. The prerequisites for EMRE 6030 and EMRE 6040 are EMRE 6010 and EMRE 6020. In addition, students will normally complete six M.E.R. courses before registering for EMRE 6030 or EMRE 6040. There are no prerequisites for EMRE 6010 and EMRE 6020 but students are advised to take these courses late in their programs, just before taking EMRE 6030 or EMRE 6040. For the core courses, the prerequisite for BUS1 9329 is BUS1 8210. For the remaining core courses, there are no prerequisites. For the elective courses, Departmental regulations that specify particular courses as prerequisites will apply but the Departmental requirement to have completed a number of courses will not apply.
7. Exemptions for a maximum of two required courses may be granted by the Dean of Graduate Studies on the recommendation of the Director if students have completed relevant courses taken at this or another recognized university and if students achieve a minimum of 75% in those courses. EMRE courses are not normally eligible for exemption requests.
8. Each student's program of study must be approved by the Director. The Director reserves the right to restrict students from taking particular courses if it is deemed that those courses do not add sufficient value beyond courses that the student has completed at the undergraduate level. In cases such as these the Director will require the student to take substitute courses from **Table 2**. The Director also reserves the right to require students to take additional courses if it is deemed that a student is lacking sufficient background in one of the three areas of study noted in 2. above.

14.6 Evaluation

1. Students for the M.E.R. Degree must obtain a grade of 'B' or better in all program courses.
2. Students who receive a grade of less than 'B' in a program course will be permitted to remain in the program, provided the course is repeated and passed with a grade of 'B' or better. Alternatively, the student may, on the recommendation of the Director and with the approval of the Dean of Graduate Studies, substitute another graduate course. Only one course repetition or substitution will be permitted during the student's program after which the student shall be required to withdraw from the program.

14.7 Courses

Table 1 Master of Employment Relations Required Courses

<p>Business Business 8204 Human Resource Management Business 8210 Labour Relations Business 9329 Labour Law</p> <p>Employment Relations Employment Relations 6010 Quantitative Research Methods Employment Relations 6020 Qualitative Research Methods Employment Relations 6040 Employment Relations Applied Research Project Employment Relations 6050 Interpersonal Skills in Employment Relations</p>	<p>Humanities and Social Sciences Economics 6030 Labour Market Economics History 6075 Advanced Studies in Labour and Working-Class History Sociology 6360 Sociology of Work</p>
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Table 2 Master of Employment Relations Elective Courses

<p>Labour-Management Relations Business 9013 Collective Agreement Administration and Arbitration Business 9030 International and Comparative Industrial Relations Employment Relations 6030: Independent Research Project</p> <p>Human Resource Management Business 9020 International Human Resource Management Business 9043 Team Building and Diversity Business 9317 Current Topics in Management Business 9324 Gender, Work and Organizations Business 9328 Change Management Education 6203 Leadership: Theory and Practice Education 6600 Learning and Motivation Education 6706 Career Education and Career Counselling Education 6802 Adult Learning and Development Education 6805 Advanced Human Resource Communications Employment Relations 6030 Independent Research Project Psychology 6401 Attitudes and Social Cognition Psychology 6402 Group Processes</p>	<p>Labour Market and Social Policy Analysis Business 8108 Economics for Business Economics 6000 Advanced Micro-economic Theory Economics 6001 Advanced Macro-economic Theory Education 6410 Philosophical Issues in Educational Policy and Leadership Employment Relations 6030: Independent Research Project Gender Studies 6000 Feminist Theory History 6000 Advanced Studies in Newfoundland History History 6010 Advanced Studies in Canadian History History 6070 Advanced Studies in Social History History 6090 Advanced Studies in Women's History History 6120 Advanced Studies in Economic and Business History Political Science 6700 Canadian Politics Political Science 6740 Public Administration Political Science 6790 Public Policy Sociology 6320 Gender and Society Or other elective courses approved by the Dean of Graduate studies based on the recommendations of the MER program Director</p>
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Note: Students may require special permission from the instructor and/or relevant graduate program administrator prior to enrolling in an elective course.

15 Regulations Governing the Degree of Master of Engineering

www.mun.ca/sgs/contacts/sgscontacts.php

www.engr.mun.ca

www.mun.ca/become/graduate/apply/app_deadlines.php

The degree of Master of Engineering (M.Eng.) is a research-focused degree and may be obtained either through full-time or part-time studies. The M.Eng. degree can be obtained through programs in Civil Engineering, Computer Engineering, Electrical Engineering, Mechanical Engineering, Ocean and Naval Architectural Engineering, Oil and Gas Engineering, and Process Engineering.

15.1 Qualifications for Admission

To be considered for admission, an applicant shall meet the requirements set out in General Regulation, **Qualification for Admission**, or shall have qualifications and/or engineering experience that is acceptable to the Dean of Graduate Studies and to the Faculty of Engineering and Applied Science.

Admission to the M.Eng. program is limited and competitive. All applicants must meet the minimum qualifications set out in the above paragraph. Decisions on admission, however, will also take into account such things as the applicant's rank in class, referees' assessments, general performance throughout the applicant's undergraduate academic program, and the availability of supervisors in the area of the applicant's interest.

Normally applicants will be considered in January for admission to the following September. In special cases applicants may also be considered in April and August. Applications should be made sufficiently far in advance to permit the University to obtain all relevant documents and review the application.

Students who have successfully completed the requirements for the former Graduate Diploma in Safety and Risk Engineering may receive transfer credits towards the M.Eng. degree in an affiliated area.

15.2 Program of Study and Research

1. Students enrolled in the Master of Engineering program will work in one of the following areas: Civil Engineering; Computer Engineering; Electrical Engineering; Mechanical Engineering; Ocean and Naval Architectural Engineering; and Oil and Gas Engineering.
2. A program shall normally consist of:
 - a. a thesis related to the area of study
 - b. 12 credit hours from graduate courses with at least 6 credit hours taken from the list of **Core Courses** below
 - c. Seminar course 9100

- d. such other courses as may be required in an individual's program.
3. The thesis is to contain the results of a systematic investigation which has been conducted by the student under the direction of the Supervisor.
4. With the approval of the Dean of Graduate Studies and on the recommendation of the Faculty of Engineering and Applied Science, credit towards the course requirements may be considered for graduate courses previously taken by the student in accordance with the **General Regulations** for course credit transfers.

15.3 Supervision

1. Each student shall be assigned to a Supervisor approved by the Dean of Graduate Studies on the recommendation of the Faculty of Engineering and Applied Science.
2. The Supervisor shall propose a tentative program of study and topic of investigation which must be approved by the Dean of Graduate Studies acting on the recommendation of the Faculty of Engineering and Applied Science, before the acceptance of a student in the program.
3. At the end of each semester, the Supervisor shall report on the student's progress to the Dean of Engineering and Applied Science for onward transmission to the Dean of Graduate Studies.
4. A temporary or permanent change of Supervisor for a student already in a program shall be permitted only with the approval of the Dean of Graduate Studies and the Dean of Engineering and Applied Science.
5. The Supervisor shall advise the student in the preparation and presentation of a seminar on the student's topic of investigation as described in **Thesis**, 2. below.

15.4 Industrial Internship Option

The Faculty encourages graduate students to undertake internships of work in industry. Internships in industry will permit students either (a) to focus on the practicalities of research projects which have been well defined before the student enters an internship, or (b) to develop and define a research project from problems experienced during the internship. Encouragement to undertake an internship will be given only where it is clear that one of these expectations can be met.

Students registered in the Master of Engineering Program may, with the permission of their Supervisor, the Dean of the Faculty of Engineering and Applied Science, and the Dean of Graduate Studies select the Industrial Internship Option. Students approved to pursue this option must satisfy the degree regulations for a Master of Engineering Program. In addition, students in the Industrial Internship Option:

1. must take at least 9 credit hours of the courses required for their program on campus; the remaining required courses may be taken on or away from campus; those taken at other universities require pre-approval by the Dean of the School of Graduate Studies on the recommendation of the Faculty of Engineering and Applied Science
2. shall normally spend 8 to 12 months of their program at an internship in industry
3. shall normally spend at least two semesters on campus on a full-time basis as a graduate student at this University
4. shall submit a concise progress report to their supervisors, no later than the end of each semester while on an internship.

15.5 Fast-Track Option

Students registered in academic term 7 of a Memorial University of Newfoundland undergraduate engineering program are eligible to apply for admission to an M.Eng. fast-track option. The purpose of the option is to encourage students interested in pursuing graduate studies to begin their research-related activities while still registered as an undergraduate student. Normally, to be considered for admission to the option, students must have achieved at least a 70% average over academic terms 1 to 6 of their undergraduate engineering program. While enrolled in the option, a student may complete some of the M.Eng. Degree requirements and, hence, potentially be able to graduate earlier from the M.Eng. program.

Students shall enroll in the M.Eng. fast-track option concurrently with their undergraduate program during the Fall semester prior to academic term 8. Prior to entering the fast-track option, students must apply for and receive an exemption from work term 6. While enrolled in the option a student must be registered in full-time graduate studies during the Fall semester prior to academic term 8; during academic term 8, the student must take a leave of absence from the graduate program. A student enrolled in the fast-track option shall undertake research related to their field of study and shall normally complete at least 3 credit hours from the courses listed for their M.Eng. program in the Fall semester prior to academic term 8.

In the Fall semester following academic term 7, fast-track option students will pay only the graduate fees appropriate to graduate students following plan A as indicated at the Financial and Administrative Services website at www.mun.ca/finance/fees/ (i.e., the 6 semester plan). In the succeeding Winter semester, while completing academic term 8 of their undergraduate program, fast-track option students will pay only the appropriate undergraduate fees.

Upon completion of their undergraduate program, students may register in the M.Eng. program on a full-time basis. All courses taken as part of their graduate program while enrolled in the M.Eng. fast-track option are credited towards the M.Eng. Degree course credit hour requirements. Courses taken as credit towards a student's undergraduate degree may not be credited towards a student's graduate degree; courses credited towards a student's graduate degree may not be credited towards a student's undergraduate degree. Students who do not complete their undergraduate degree within one year of entering the fast-track option will normally be required to withdraw from their M.Eng. program.

15.6 Course Evaluation

1. In order to continue in the program, a student shall obtain an 'A' or 'B' grade in each course taken for credit.
2. The student's achievement in the program must be to the satisfaction of the Dean of Graduate Studies and the Faculty of Engineering and Applied Science. When it has been determined on the basis of consultations with the student, the course instructors and the Supervisor, that a student's work has fallen below satisfactory level, the student may be required to withdraw from the program.

15.7 Thesis

1. A student who expects to graduate must inform the Dean of Graduate Studies of this intention at least three months before the University Convocation at which the award of the degree is expected.
2. Before the thesis is submitted, the student shall present an open seminar on the topic of investigation to the Faculty of Engineering and Applied Science. Any serious deficiencies noticed at this stage should be carefully considered, in consultation with the

Supervisor, for rectification.

3. Three copies of the thesis shall be submitted to the School of Graduate Studies through the Faculty of Engineering and Applied Science, in a form and format as specified in the Thesis Guide issued by the School of Graduate Studies and the Presentation of Theses Guide issued by the Faculty of Engineering and Applied Science. A submission which does not meet the specifications will be returned to the student.
4. Examiners shall be appointed by the Dean of Graduate Studies on the recommendation of the Faculty of Engineering and Applied Science soon after the student has expressed an intention to submit the thesis.

15.8 Evaluation of Theses

Theses evaluation shall be carried out in accordance with **Theses and Reports** of the **General Regulations** governing all students in the School of Graduate Studies.

15.9 Recommendation for Awarding Degree

When a student has completed all the requirements for the Master of Engineering (M.Eng.) Degree, the Faculty of Engineering and Applied Science shall forward a recommendation to the Dean of Graduate Studies for the award of the Degree.

15.10 Graduate Diploma in Engineering

The Faculty of Engineering and Applied Science offers a course-based graduate diploma in engineering to provide opportunities for engineers to obtain credentials or upgrade their training in specialized areas of engineering. The program is available on a full-time or part-time basis.

15.10.1 Qualifications for Admission

Admission to the program is limited and competitive. To be eligible for consideration for admission, an applicant shall meet the requirements described under **General Regulations, Qualification for Admission**, or shall have qualifications and/or engineering experience that is acceptable to the Dean of Graduate Studies and to the Faculty of Engineering and Applied Science. To be eligible for consideration for admission, applicants will meet English proficiency requirements described under **General Regulations, English Proficiency Requirements**.

15.10.2 Program of Study

The graduate diploma program requires the completion of 15 credit hours consisting of three core and two elective courses.

15.10.2.1 Communications Engineering

Engineering 9871, 9872, and 9878; and two courses selected from Engineering 9806, 9821, 9825, 9876, 9877

15.11 Master of Applied Science Programs

The Faculty of Engineering and Applied Science offers the following course-based programs:

15.11.1 Computer Engineering

In addition to the research-focused M.Eng. Degree in Computer Engineering, the Faculty of Engineering and Applied Science offers a course-based program in Computer Engineering leading to a Master of Applied Science Degree in Computer Engineering. For details of program requirements for the M.A.Sc. Degree in Computer Engineering, refer to the regulations governing the Degree of **Master of Applied Science**.

15.11.2 Environmental Systems Engineering and Management

The Faculty of Engineering and Applied Science offers a course-based program in Environmental Systems Engineering and Management. For the details of the program requirements for the M.A.Sc. Degree in Environmental Systems Engineering and Management refer to the regulations governing the Degree of **Master of Applied Science in Environmental Systems Engineering and Management**.

15.11.3 Oil and Gas Engineering

The Faculty of Engineering and Applied Science offers a course-based program in Oil and Gas Engineering. For the details of the program requirements for the M.A.Sc. degree in Oil and Gas Engineering refer to the regulations governing the Degree of **Master of Applied Science in Oil and Gas Engineering**.

15.12 Courses

A selection of the following graduate courses will be offered to meet the requirements of the students, as far as the resources of the Faculty will allow.

15.12.1 Required Course

9100 Engineering Graduate Seminar (1 credit hour)

15.12.2 Core Courses

9002 Ocean Engineering Structures
 9015 Ocean Engineering Hydrodynamics
 9110 Advanced Petroleum Production Engineering
 9113 Phase Behaviour of Petroleum Reservoir Fluids
 9114 Advanced Reservoir Engineering
 9115 Safety and Risk Engineering
 9118 Advanced Drilling Engineering
 9121 Advanced Safety, Risk and Reliability Modeling
 9211 Experimental Methods

9310 Advanced Reactor Analysis and Bioreactors
 9320 Advanced Separation Processes
 9330 Abnormal Situation Management and On-line Monitoring
 9340 Material Degradation in Process Facilities
 9411 Probabilistic Methods in Engineering
 9420 Engineering Analysis
 9496 Modeling and Simulation of Dynamic Systems
 9501 Finite Element Analysis with Engineering Applications
 9505 Structural Dynamics and Vibrations
 9516 Similitude, Modelling and Experimental Data Analysis
 9520 Solid and Structural Mechanics
 9550 Fatigue, Fracture and Corrosion
 9609 Environmental Risk Assessment
 9627 Environmental Systems Engineering
 9723 Soil Properties and Behaviour
 9816 Antenna Theory
 9821 Digital Signal Processing
 9826 Advanced Control Systems
 9827 Continuous and Discrete-Event Systems
 9834 Advanced Power Electronics
 9853 Energy Economics and Policy
 9854 Fundamentals of Energy Systems
 9855 Energy and the Environment
 9856 Electrical Power Systems
 9857 Instrumentation and Control of Energy Systems
 9858 Advanced Power Systems
 9861 High-Performance Computer Architecture
 9865 Advanced Digital Systems
 9867 Advanced Computing Concepts for Engineering
 9871 Information Theory and Coding
 9874 Software Design and Specification
 9876 Advanced Data Networks
 990A MESE Project Course
 990B Continuation of MESE Project Course
 9901 Fundamentals of Fluid Dynamics
 9902 Advanced Transport Phenomena
 9909 Advanced Thermodynamics
 9940 Advanced Robotics
 9977 Computational Fluid Dynamics

15.12.3 Other Courses

9022 Marine Geotechnical Engineering
 9052 Ice Properties and Mechanics
 9080/99 Special Topics in Ocean Engineering (excluding 9096)
 9096 Marine and Offshore Ice Engineering
 9111 Well Testing
 9112 Multiphase Flow
 9116 Reliability Engineering
 9117 Offshore Petroleum Geology and Technology
 9119 Compact Process Equipment Design
 9120 Advanced Natural Gas Engineering
 9150-59 Special Topics in Oil and Gas Engineering
 9200 Industrial Internship
 9210 Advanced Engineering Materials
 9390/94 Special Topics in Engineering Management
 9440 Optimization Principles in Engineering
 9495/99 Special Topics in Engineering Analysis (excluding 9496)
 9540/49 Special Topics in Mechanics, Structures and Materials
 9560 Applied Remote Sensing
 9601 Environmental Pollution and Mitigation (cross-listed as Environmental Science 6004)
 9603 Environmental Sampling and Pollutant Analysis (*cross-listed as Environmental Science 6005*)
 9605 Water and Wastewater Treatment
 9610/15 Special Topics in Environmental Engineering and Applied Science
 9621 Soil Remediation Engineering
 9622 Environmental Statistics
 9625 Environmental Impacts of Offshore Oil and Gas Operations
 9626 Environmental Management System
 9628 Environmental Laboratory
 9629 Environmental Policy and Regulations
 9630 Pollution Prevention
 9713 Stochastic Hydrology
 9750 Advanced Topics in Analysis and Design of Reinforced Concrete (*formerly 9701*)
 9755 Advanced Topics in Precast and Prestressed Concrete (*formerly 9702*)
 9760/64 Special Topics in Geotechnical Engineering
 9790 Subsea Pipeline Engineering
 9791/99 Special Topics in Civil Engineering
 9802/05 (excluding 9804) Special Topics in Computer Engineering
 9804 Industrial Machine Vision
 9806/09 Special Topics in Communications Engineering
 9823 Computer Security
 9825 Random Signals (*formerly 9830*)

9835 Advanced Electric Machines
 9841 Thermal Power Plants
 9843 Solar Engineering
 9845 Energy Storage
 9850/53 Special Topics in Power Systems and Controls
 9862 Power System Protection
 9863 Grid Integration of Energy Systems
 9868 ASIC Design
 9869 Advanced Concurrent Programming
 9872 Digital Communications
 9875 Embedded and Real-Time Systems Design
 9877 Cryptography
 9878 Wireless and Mobile Communications
 9880/83 Special Topics in Computer Engineering
 9884/87 Special Topics in Signal Processing
 9888/91 Special Topics in Communications Engineering
 9892/95 Special Topics in Power Systems and Controls
 9896 Renewable Energy Systems
 9897/99 Special Topics in Applied Electromagnetics
 9910 Advanced Manufacturing
 9920 Advanced Concepts in Mechanical Design
 9925 Theory and Design of Mechanical Components and Structures
 9971 Nonlinear and Random Vibrations Analysis
 9975/99 (excluding 9977 and 9979) Special Topics in Mechanical Engineering
 9979 Fluid Structure Interactions
 9985 Advanced Heat Transfer
 9987 Interfacial and Phase Change Phenomena

16 Regulations Governing the Degree of Master of Environmental Science

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/become/graduate/apply/app_deadlines.php
 (see also **Master of Science in Environmental Science**)

16.1 Program of Study

1. The Environmental Science Program is an interdisciplinary graduate program involving the departments of the Faculty of Science, the Faculty of Humanities and Social Sciences, the Faculty of Medicine, and the Faculty of Engineering and Applied Science. There are three Environmental Science Graduate Degree streams: the Master of Science (M.Sc., Environmental Science), Master of Environmental Science (M.Env.Sci.), and the Doctor of Philosophy (Ph.D., Environmental Science). The program is available on a full or part-time basis.
2. The program is administered by a Board of Studies appointed by the Dean of Science. Supervisors of graduate students in the program include faculty from the Faculty of Science, the Faculty of Humanities and Social Sciences, the Faculty of Engineering and Applied Science, the Faculty of Medicine, and the Environmental Science Program at the Grenfell Campus, as well as adjunct appointees to the program (as a co-supervisor).

16.2 Qualifications for Admission

Admission is limited and competitive. To be considered for admission applicants shall normally hold a Bachelor's (Honours) degree in Science, Geography, or Environmental Science with at least second class standing, or equivalent, or a Bachelor's degree in Engineering from an institution recognized by the Senate, or shall have qualifications and/or environmental experience acceptable to the Dean of Graduate Studies and the Board of Studies. The Board of Studies will make recommendations on admission to the Dean of Graduate Studies.

16.3 Degree Requirements

To the extent that resources permit, individual programs will be developed to suit students' interests and needs. However all programs must be approved by the Board of Studies and by the Dean of Graduate Studies. All **General Regulations** of the School of Graduate Studies shall apply to these degrees.

1. The Master of Environmental Science (M.Env.Sci.) is a multidisciplinary course-based degree, focussed on environmental issues. The Degree program provides for both multidisciplinary courses and for courses focussed on the student's specific area of interest.
2. The Degree program requires completion of 24 credit hours of either **Option A** or **Option B** and a project report. The project report will be evaluated according to procedures outlined in **General Regulations, Theses and Reports**.

Option A

Students will be required to take a minimum of 15 credit hours in program courses, 9 credit hours of which must be Environmental Science 6000, Environmental Science 6009, and Environmental Science 6010 and 6 credit hours from Environmental Science 6001, 6002, and 6003. Students will also be required to take a minimum of 9 credit hours in elective courses approved by the Board of Studies, 6 credit hours of which will normally be selected from graduate courses offered by the Faculty of Science and the Faculty of Engineering and Applied Science. Students are advised to consult with instructors and Faculties regarding necessary prerequisites and availability.

Option B

Admission into Option B is limited, competitive and selective. Students may be requested to participate in an interview as part of the selection process. The application deadline for admission to Option B is October 15th.

Students will be required to take a minimum of 15 credit hours in program courses, 9 credit hours of which must be Environmental Science 6000, Environmental Science 6009, and Environmental Science 6010 and 6 credit hours from Environmental Science 6001, 6002, and 6003. Students will also be required to take a minimum of 6 credit hours in elective courses approved by the Board of

Studies, normally selected from graduate courses offered by the Faculty of Science and Faculty of Engineering and Applied Science. In addition, students will be required to complete the 3 credit hours course Environmental Science 601W (work term).

Environmental Science 601W is a work term of one semester duration. The work term is a full-time period of employment, normally paid and normally in the spring semester. Students are ultimately responsible for securing work term placements. Academic Staff Members in Co-operative Education, in consultation with the Program Chair and the student's Supervisor, provide support for the job search and inform students of potential opportunities. Work terms must be approved by the Academic Staff Members in Co-operative Education before the start of the term. Work term evaluations consist of two components:

- a. On-the-job Student Performance: job performance shall be assessed by the Academic Staff Members in Co-operative Education using information gathered during the work term and input from the employer toward the end of the work term. Evaluation of the job performance will result in one of the following classifications: PASS WITH DISTINCTION, PASS, or FAIL.
- b. Assignment(s): students are required to submit one or more assignments to the Academic Staff Members in Co-operative Education as outlined in the course syllabus. Evaluation of the assignment(s) will result in one of the following classifications: PASS WITH DISTINCTION, PASS, or FAIL.

Overall evaluation of the work term will result in one of the following final grades being awarded: PASS WITH DISTINCTION indicates the student received a grade of pass with distinction on both the on-the-job performance and the assignment(s). PASS indicates the student received a grade of PASS on both the on-the-job performance and the assignment(s) or a grade of PASS on one component and PASS WITH DISTINCTION on the other component. FAIL indicates the student receive a grade of FAIL on either one or both of the on-the-job performance and assignment(s).

16.4 Courses

6000 Environmental Science and Technology
 6001 Earth and Ocean Systems
 6002 Environmental Chemistry and Toxicology
 6003 Applied Ecology
 6004 Environmental Pollution and Mitigation (*cross-listed as ENGI 9601*)
 6007 Environmental Risk Assessment (*cross-listed as ENGI 9609*)
 6008 Air Pollution (*same as ENGI 9624*)
 6009 Environmental Science Project
 6010 Environmental Seminar
 6201-6210 Special Topics in Environmental Science
 601W Work Term

17 Regulations Governing the Degree of Master of Fine Arts

www.mun.ca/sgs/contacts/sgscontacts.php
www.grenfell.mun.ca/academics-and-research/Pages/graduate-programs.aspx
www.mun.ca/become/graduate/apply/app_deadlines.php

The Master of Fine Arts is offered in the School of Fine Arts at the Grenfell Campus.

17.1 General Information

The Master of Fine Arts (MFA) is offered as a full-time or part-time, low residency program that can be completed in five semesters and provides the opportunity for advanced studies in visual arts.

This studio-based MFA supports student working in all genres and forms of visual arts practice including (but not limited to) photography, drawing, fibre, painting, print media, ceramics, time-based practices, sculpture, etc., within a framework of critical theory and discourse that offers a broad range of professional experiences. Graduate students will be supported to find the materials, processes, and practices that best suit their artistic research.

Students have access to facilities and faculty across a range of disciplines. Within the areas of specialization offered for the MFA there is considerable flexibility available to further focus the program to meet specific interests and needs.

The blended-learning, low-residency format can accommodate students who wish to complete the program over an extended period of time on a part-time basis.

The mode of delivery is flexible: students complete a total of two, four-week intensives on Grenfell Campus, Memorial University of Newfoundland during the Spring semester and may then complete the remainder of the course work and research at one or more Memorial University of Newfoundland Campuses or from their home community.

The program can be completed in five semesters of full-time study. It consists of six courses plus VART 6999 Final Project (Exhibition and Research Paper/Statement) and Oral Examination. The program is offered beginning in each Spring semester.

17.2 Qualifications for Admission

1. To be considered for admission, applicants shall meet the minimum requirements set out in **General Regulation, Qualification for Admission**. Applicants to the Master of Fine Arts, Visual Arts program, will normally hold a Bachelor of Fine Arts degree with a minimum overall B average or shall have equivalent professional visual arts experience that is acceptable to the Dean of Graduate Studies and to the School of Fine Arts.
2. In addition to meeting the **General Regulations** of the School of Graduate Studies, all applicants will be required to submit:
 - a. a portfolio of 20 images of examples of work or other documentation of visual art research;
 - b. a letter of intent (max. 500 words); and
 - c. two assessment reports or letters of reference.
3. Applicants may also be asked to submit a sample for their academic written work.
4. Applicants must demonstrate a high level of proficiency in studio research and practice within one or more, or a combination of disciplines in visual arts studio, including, but not limited to painting, print media, digital imaging, photography, drawing, sculpture, etc.
5. Applicants must demonstrate that they are suitably advanced, mature, and responsible to undertake and complete graduate studies in a Visual Arts Studio program and to conduct self-directed, independent research. They will be required to demonstrate evidence of strong thinking skills and writing skills.

17.3 Degree Requirements

1. The Degree of Master of Fine Arts is normally completed in five semesters of full-time study. All students must complete two onsite study periods in the Spring semester of both their first year and second year of study.
2. All students for the MFA must successfully complete 18 credit hours of course work plus the VART 6999 Final Project. Further courses may be required depending on the background of the individual student.
3. All students must complete:
 - Visual Art 6500 Seminar Intensive I
 - Visual Art 6510 Studio/Research Intensive
 - Visual Art 6600 Art Theory & Criticism Course
 - Visual Art 670A/670B Independent Studio Research I & II
 - Visual Art 6800 Seminar Intensive II
 - Visual Art 6810 Studio/Production Intensive
 - Visual Art 6999 Final Project (Exhibition and Research Paper/Statement) and Oral Examination

17.4 Evaluation

1. Students must meet all requirements of the **General Regulations** of the School of Graduate Studies.
2. Students must obtain a grade of at least a 'B' in all program courses to receive credit for the course toward their program requirements. Students who fail to receive B or more in a required course must repeat the course. Any student who receives a grade of less than 'B' in two courses or in a repeated course will be required to withdraw from the program.

17.5 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the School will allow. All courses are 3 credit hours unless otherwise indicated.

VART 6500 Seminar Intensive I
 VART 6510 Studio/Research Intensive
 VART 6600 Art Theory & Criticism Course
 VART 670A/670B Independent Studio Research I & II
 VART 6800 Seminar Intensive II
 VART 6810 Studio/Production Intensive
 VART 6999 Final Project (Exhibition and Research Paper/Statement) and Oral Examination

18 Regulations Governing the Degree of Master of Gender Studies

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/genderstudies
www.mun.ca/become/graduate/apply/app_deadlines.php

18.1 General Information

The Master of Gender Studies degree allows students to examine critically - at an advanced level - how gender shapes our identities, our social interactions and our world. Students will incorporate, into their study, frameworks for thinking about power relations and the ways those relations are shaped and challenged by intersecting constructions of gender, race, class, sexuality, age, ability, and nationality.

Faculty members in the Department of Gender Studies bring research expertise and interests in a range of fields, including: citizenship and human rights; corporeal feminism; reproductive rights, auto-biography, and life writing; postcolonial and transnational feminisms; and First Nations studies. This master's program offers a thriving environment that draws on the expertise of scholars from a wide range of academic disciplines.

The program is administered by the Department of Gender Studies and the Graduate Studies Advisory Committee.

The Graduate Co-ordinator, on behalf of the Department of Gender Studies, Graduate Studies Advisory Committee, makes recommendations to the Dean of Graduate Studies concerning admission, and financial support for students, and administers all other matters pertaining to the graduate program.

The Master of Gender Studies Degree offers, by full or part-time study, three degree options: thesis, project, or internship.

18.2 Qualifications for Admission

1. Admission is limited and competitive. To be considered for admission, an applicant will normally hold an Honours Degree or equivalent, and will have a breadth of knowledge in Gender Studies satisfactory to the Graduate Studies Advisory Committee.
2. Applicants who do not have an adequate background in Gender Studies may be required to complete Gender Studies 3005 or Gender Studies 3025 or equivalent normally with a grade of 75% or higher.

18.3 Program of Study

1. Upon admission, each graduate student in the thesis program will be assigned an academic advisor for one year. The supervisory committee, formed prior to the development of the thesis project proposal, will include either one or two supervisors. For students selecting the non-thesis option, one Supervisor will be selected.
2. All students are required to complete Gender Studies 6000, 6100, and 6200.
3. Three to 9 additional elective credit hours approved by the Graduate Studies Advisory Committee and the student's supervisor(s) will be required. These elective credit hours will comprise courses selected from graduate courses in cognate academic units, and/or Gender Studies 6300 and/or from the block of special topics courses in Gender Studies 6400-6420.
4. Each student will be required to give a public seminar on the student's thesis research, project, or internship after the thesis proposal has been approved and before submission of the student's final thesis/project/internship report.

18.4 Thesis

1. Students for the Degree of Master of Gender Studies (thesis option) will be required to complete a minimum of 15 credit hours. Students will also be required to complete a thesis.
2. A thesis proposal, approved by the student's supervisors, will be presented to the Graduate Studies Advisory Committee for its approval. The thesis proposal must normally be approved by the Graduate Studies Advisory Committee no later than the end of the student's third semester in the program.
3. The thesis will be evaluated in accordance with the procedures outlined in General Regulation **Theses and Reports** of the School of Graduate Studies.

18.5 Project

1. Students for the Degree of Master of Gender Studies (project option) will be required to complete a minimum of 18 credit hours. Students will also be required to complete a project.
2. The Master's project must be interdisciplinary in nature and aimed at linking theoretical and practical knowledge by recognizing and articulating a problem relevant to Gender Studies and by developing and justifying theoretical and practical approaches. The project report should consist of the project (e.g., a film or video; a computer project; a website; a manual or guidebook; a kit of learning resources; photographs; audio or videotape, etc.) as well as a literature-based rationale, theoretical basis and justification for its use. The length of the written portion of the project should be 40-60 pages. Regardless of the form that the project takes (e.g., a film or video) a computer project; a website; a manual or guidebook; a kit of learning resources; photographs; audio or videotape, etc.) there must be a written project report.
3. A project proposal, approved by the student's supervisor, will be presented to the Graduate Studies Advisory Committee for its approval. The project proposal must normally be approved by the Graduate Studies Advisory Committee no later than the end of the student's third semester in the program.
4. The project will be evaluated in accordance with procedures outlined in General Regulation **Theses and Reports** of the School of Graduate Studies.

18.6 Internship

1. Students for the Degree of Master of Gender Studies (internship option) will complete a minimum of 18 credit hours. Students will also be required to complete an internship.
2. Internship placement shall be for one semester. Part-time internships of two semesters will require approval from the proposed agency or institution and the Graduate Studies Advisory Committee.
3. Students, in consultation with their supervisor and the Gender Studies Graduate Co-ordinator, will explore internship options and locate an eligible person to provide field instruction during their internship. Although consideration will be given to all factors affecting the location and type of all Gender Studies internships, the final decision regarding internship rests with the Head, Department of Gender Studies and the Dean of Graduate Studies.
4. Factors affecting the type and location of the internship include: the number of immersion hours per week, the extent to which the intern takes up a trainee, supervisory and/or research role, and whether the intern would be working directly or indirectly with clients of the agency or institution.
5. Each internship shall be supervised by a Supervisory Committee of at least three members, including the student's supervisor, the field supervisor, and Gender Studies Graduate Co-ordinator or delegate.
6. The Supervisory Committee will meet with the intern and field supervisor at least once during the internship period to make an assessment of the nature and quality of the intern's progress, and to approve any modifications to the internship.
7. The internship proposal, approved by the student's supervisor, will be presented to the Graduate Studies Advisory Committee for its approval. The proposal must normally be approved by the Graduate Studies Advisory Committee no later than the end of the student's third semester in the program.
8. Regardless of the form that the internship takes, there must be a written internship report (40-60 pages). When the student completes the internship report, the student will present the report to the Supervisory Committee in a formal meeting and discussion, after which the Supervisory Committee will recommend to the Dean of Graduate Studies a grade of pass or fail. A student will be permitted to submit an internship report only after the Supervisory Committee has determined that the internship placement has been fully completed.
9. Should the Head, Department of Gender Studies, on the recommendation of the Supervisory Committee, terminate the internship prior to its completion, it may recommend to the Dean of Graduate Studies one of the following:
 - a. submission of a new internship proposal for a different field setting (once only);
 - b. selection of the thesis or project option;
 - c. termination of the student's program.

18.7 Courses

6000 Feminist Theory
 6100 Feminist Epistemologies and Methodologies
 6200 Graduate Seminar in Gender Studies
 6300 Feminism as Community
 6400-6420 Special Topics in Gender Studies

19 Regulations Governing the Degree of Master of Health Ethics

www.mun.ca/sgs/contacts/sgscontacts.php

www.med.mun.ca

www.mun.ca/become/graduate/apply/app_deadlines.php

The degree of Master of Health Ethics is offered by the Faculty of Medicine, delivering an advanced program of study for students from various academic fields who are interested in a flexible graduate degree designed to prepare them for a career in ethics within health care organizations or, for those students completing the research option, further study in health ethics at the Ph.D. level.

The **General Regulations** of the School of Graduate Studies and the regulations outlined below will apply.

19.1 Qualifications for Admission

Admission to the Master of Health Ethics is limited and competitive. The regulations and procedures for admission are as given under the **General Regulations** of the School of Graduate Studies governing Master's degrees. In addition, to be considered for admission applicants must have successfully completed a minimum of one senior level undergraduate course in Philosophy with substantial ethics content.

19.2 Program of Study

- The Master of Health Ethics degree is offered by full or part-time study. Students may choose one of three program options: (1) Thesis option, (2) Non-thesis, Capstone Project option, (3) Non-thesis, Research Papers option. It is anticipated that full-time students will complete the program in four semesters in accordance with **Table 1 Master of Health Ethics Recommended Course Sequence for Full-Time Students**.
- The program of study is the responsibility of the Supervisory Committee composed of a Supervisor and at least two other faculty members. It is the responsibility of the Supervisory Committee to meet regularly (at least annually) with the student and to provide guidance at all stages of the student's program. An annual report prepared by the Supervisor and signed by the student and all members of the Committee is required to be submitted to the Assistant Dean of Research and Graduate Studies (Medicine).
- All students must complete the following course requirements:
 - MED 6800, MED 6801, and MED 6806
 - 3 elective courses (9 credit hours) chosen in consultation with the Supervisor. Elective courses may be selected from the elective courses listing below (excluding MED 6820, 6821, 6822, and 6825) or from other courses approved by the Supervisor.
- In addition, all students must complete a Health Ethics Practicum (MED 6815). The practicum involves acquiring hands-on experience in three distinct areas of health ethics: clinical ethics, research ethics, and health ethics policy. Students must complete a minimum of 40 practicum hours divided as evenly as possible across the three areas.
- Students must also complete one of the following in accordance with the program option to which they have been admitted:
 - A thesis, submitted in accordance with the **General Regulations, Theses and Reports** of the School of Graduate Studies.
 - Three Health Ethics Research Papers (represented as MED 6820). Research topics will be chosen in consultation with, and approved by, the Supervisor. Students must register for the course MED 6820 in every semester during which they are completing one or more of the Research Papers necessary to satisfy this requirement. A grade of NC (No Credit) will be awarded in all semesters prior to the final semester. A grade of 'B' or better is required in each of the three required Research Papers in order to successfully complete this requirement and receive a grade of 'Pass' in the final semester. Each paper will be evaluated by the supervising faculty member and another faculty member qualified to evaluate the work.
 - A Health Ethics Capstone Project (MED 6825). The Capstone Project is open to students with substantial and relevant experience in health care and/or with the health care system. The student's supervisor must approve whether the student may undertake a capstone project. The capstone project itself will be chosen in consultation with, and approved by, the Supervisor. Students must register for the course MED 6825 in every semester during which they are completing the Capstone Project. A grade of NC (No Credit) will be awarded in all semesters prior to the final semester. The completed Capstone Project will be evaluated by the supervisor in conjunction with two other faculty members who will comprise a supervisory committee for the capstone project.

Table 1 Master of Health Ethics Recommended Course Sequence for Full-Time Students

Semester	Courses
Fall	MED 6806 Introduction to the Canadian Health System MED 6801 Important Cases in Health Ethics Elective Course
Winter	MED 6800 Health Ethics Theory Elective Course Elective Course
Spring and Fall	MED 6815 Health Ethics Practicum, and one of the following: MED 6820 Health Ethics Research Papers MED 6825 Health Ethics Capstone Project Thesis

19.3 Courses

A selection of the following graduate courses shall be offered to meet the requirements of students, as far as the resources of the Faculty allow.

MED 6800 Health Ethics Theory

MED 6801 Important Cases in Health Ethics

MED 6803 Research Ethics

MED 6804 Public Health Ethics

MED 6806 Introduction to the Canadian Health System

MED 6807-6814 Special Topics in Health Ethics

MED 6815 Health Ethics Practicum

MED 6820 Health Ethics Research Paper
MED 6825 Health Ethics Capstone Project

20 Regulations Governing the Degree of Master of Human Kinetics and Recreation

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hkr
www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Human Kinetics and Recreation (MHKR) is offered to qualified full-time and part-time students by the School of Human Kinetics and Recreation. The **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland and the Regulations of the School of Human Kinetics and Recreation outlined below will apply to the Master of Human Kinetics and Recreation program.

20.1 Qualifications for Admission

1. The admission requirements for the Master of Human Kinetics and Recreation are as given under the **General Regulations** of the School of Graduate Studies. Admission is limited and competitive. The deadline for receipt of applications is April 1 for admission into the subsequent Fall semester. Preference for admission may be given to students with undergraduate degrees in relevant disciplines, with a minimum overall B average. Applications submitted through the School of Graduate Studies will be evaluated by the Graduate Studies Committee of the School of Human Kinetics and Recreation. Admission of a student to the program shall be made by the Dean of Graduate Studies.
2. In addition to the above, students applying to the **Coursework Route** will demonstrate a minimum of three years of professional experience deemed appropriate.
3. Only in exceptional circumstances, and only on the recommendation of the Dean of the School of Human Kinetics and Recreation, shall the Dean of Graduate Studies consider applicants who do not meet the requirements above.

20.2 Program and Degree Requirements

1. The Degree of Master of Human Kinetics and Recreation consists of two options:
 - a. **Option 1 - Thesis Route**- The program shall consist of a minimum of 12 credit hours in graduate courses, completion of HKR 6314 each Fall and Winter semester for the first 24 months of the program, plus a thesis. The thesis shall be on an approved subject in which empirical research has been conducted by the student under the direction of the Supervisor.
 - b. **Option 2 - Coursework Route**- The program shall consist of a minimum of 30 credit hours in graduate courses in the student's major area of study.
2. The program of a student for the Master of Human Kinetics and Recreation in **Option 1** shall be the responsibility of the Supervisory Committee, composed of the Supervisor and at least one other faculty member recommended with the concurrence of the Supervisor by the Dean of the School, or delegate.
 - a. Students in this **Option** shall be required to complete a minimum of 12 credit hours plus a thesis. All students shall be required to complete HKR 6500 as well as either HKR 6000 or HKR 6001. In addition, all on-campus students shall be required to complete four semester-length seminars represented by registration and successful completion of HKR 6314 (a non-credit, repeatable course) in each of four semesters during their tenure in the program. Off-campus or part-time students who cannot attend the on-campus seminar series can substitute 40 hours of participation in professional development (over their two-year tenure) which can include participation at national, provincial or regional conferences, workshops, professional development seminars, or equivalent activities. The remaining course requirements will be selected, in agreement with the Supervisory Committee, to reflect the areas of specializations offered with the School.
 - b. It is the responsibility of the student to arrange regular meetings with their supervisory committee. An annual report, prepared by the student and submitted to the Supervisor for approval, and signed by all members of the Supervisory Committee and the student, is submitted to the Dean of the School of Human Kinetics and Recreation (or delegate) as required by the School of Graduate Studies.
 - c. Depending on the background of the student or the student's area of intended specialization, a student's program may be modified. Such modifications may include a reduction in course requirements where a student demonstrates that the student brings graduate level competency to their program in specific areas, or may include additional graduate or undergraduate courses, as specified by the student's Supervisory Committee. A minimum of three courses or 9 credit hours completed in the School of Human Kinetics and Recreation is mandatory.
 - d. A student completing this **Option** will be required to present a thesis proposal for the student's proposed thesis normally by the end of the third semester of study. The thesis proposal shall normally consist of a full written proposal (including literature review) submitted to the Supervisory Committee, a summary to be distributed to graduate students and faculty one week prior to the presentation and a formal presentation scheduled in conjunction with the Supervisory Committee. The student may be questioned on the student's proposal by the Supervisory Committee and audience. Any deficiencies noted during the presentation should be carefully considered by the student and the Supervisory Committee prior to proceeding with the thesis.
3. The program of a student for the Master of Human Kinetics and Recreation in **Option 2** shall be the responsibility of the student and the Dean of the School, or delegate. Students in this **Option** shall be required to complete a minimum of 30 credit hours. HKR 6500 and one of HKR 6000 or 6001 is normally required for all students.
4. In conjunction and collaboration with other Faculties and Schools of Memorial University of Newfoundland, students may pursue their special interests through electives from departments/schools outside the School of Human Kinetics and Recreation. These courses must be approved by the Graduate Studies Committee and the Dean of Graduate Studies in the preceding semester.
5. Students may apply for transfer course credits. All course transfers require the approval of the Dean of Graduate Studies, on the recommendation of the Dean of the School of Human Kinetics and Recreation, and are subject to General Regulations of the School of Graduate Studies, **Program Requirements, Transfer of Course Credits**.

20.3 Evaluation

1. In order to continue as a student for a Master of Human Kinetics and Recreation Degree, a student who receives a final grade of 'C' or less in a program course must repeat that course and obtain a minimum grade of 'B'. In the case of an elective course a suitable replacement course, acceptable to the Graduate Studies Committee of the School of Human Kinetics and Recreation, may be substituted for the failed course. Only one such repetition/replacement shall be permitted in the student's graduate program. Should

a grade of lower than 'B' be obtained in the repeated course/replacement course, or any other program course, the student shall be required to withdraw from the program.

- When the Graduate Studies Committee of the School of Human Kinetics and Recreation has determined, through consultation with the student, the instructors of graduate courses and the program advisor or thesis Supervisor that the student's work has fallen below satisfactory level, it may request that the Dean of the School of Human Kinetics and Recreation recommend to the Dean of Graduate Studies that the student's program be terminated.

20.4 Period of Study

The period of study for a graduate program shall not normally exceed seven years beyond first registration.

- A student in full-time attendance may register for a maximum of 12 credit hours in any regular semester and a maximum of 6 credit hours in intersession or summer session.
- A student in part-time attendance may register for a maximum of 6 credit hours in any semester, including intersession or summer session.

20.5 Theses

The School of Graduate Studies **General Regulation** describes the requirements in **Theses and Reports**.

20.6 Courses

6000 Quantitative Research Methods
 6001 Qualitative Research Methods
 6003 Culture and Society in Human Kinetics & Recreation
 6111 Canadian Delivery Systems in Physical Education, Recreation and Sport
 6120 Curriculum Development in Physical Education
 6121 Leadership in Human Kinetics & Recreation
 6122 Comprehensive Community and School Health
 6123 Coaching and Long-term Athlete Development
 6124 Adapted Physical Activity
 6130 Computer Applications for Physical Activity Measurement and Intervention
 6201 Foundations of Sport Psychology and Mental Training Techniques
 6202 Intervention and Enhancement Techniques in Mental Training Consultation
 6203 Sport Psychology Consulting
 6310 Exercise Physiology I
 6314 Graduate Seminar Series (repeatable, non-credit)
 6320 Exercise Physiology II
 6330 The Application and Implementation of Kinesiology Technologies
 6340 Occupational Biomechanics
 6350 Human Error in Complex Work Systems
 6360 Knowledge Translation: Applications to Ergonomics and Occupational Health and Safety
 6370 Movement and Neural Science
 6410 Sport and Society
 6420 History of Physical Education, Recreation and Sport
 6500 Introduction to Research in Physical Education
 6600 Contemporary Issues and Trends in Human Kinetics & Recreation
 6710-6719: Individual Reading and Research in Special Areas of Exercise and Work Physiology
 6720-6729: Individual Reading and Research in Special Areas of Biomechanics and Ergonomics
 6000 Quantitative Research Methods
 6730-6739: Individual Reading and Research in Special Areas of Human Kinetics & Recreation

21 Regulations Governing the Master of Management

www.mun.ca/sgs/contacts/sgscontacts.php
www.grenfell.mun.ca/academics-and-research/Pages/graduate-programs.aspx
www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Management (M.Mgt.) is offered for online study only and will normally be completed in five consecutive fall and winter semesters of academic study. Applicants are advised to consult, in addition to these regulations, the **General Regulations** of the School of Graduate Studies.

21.1 Qualifications for Admission

- Admission to the Master of Management is limited and competitive. To be considered for admission to the M.Mgt. program, an applicant shall:
 - hold a Bachelor's degree, with a GPA of at least 2.75, from an institution recognized by Senate; and
 - normally have at least two years of relevant full-time work experience, deemed acceptable by the Grenfell Business program's selection committee.
- An applicant who did not complete a Bachelor's degree at a recognized university where English is the primary language of instruction must normally complete either the:
 - Test of English as a Foreign Language (TOEFL) and achieve a paper-based score of 580 (or higher), computer-based score of 237 (or higher), or Internet-based score of 92 (or higher);
 - International English Language Testing System (IELTS) and achieve a score of 7 (or higher); or
 - Other equivalent tests acceptable to the School of Graduate Studies will also be considered.
- In exceptional cases, an applicant who has not completed a Bachelor's degree, but who meets all other requirements, may be considered for admission. Preference will be given to those who demonstrate significant professional experience and who have completed some level of post-secondary studies from an institution recognized by Senate; professional credentials may also be taken into account. An applicant who does not meet normal admission requirements may be required to complete, with a high level of achievement, certain undergraduate courses before being considered for admission
- For ten percent of seats per year, priority will be given to applicants of Indigenous ancestry who meet the minimum criteria for

admission. When the number of eligible applicants wishing to be considered under this clause exceeds the number of seats available, priority will normally be given to bona fide residents of Newfoundland and Labrador. Applicants wishing to be considered under this clause shall declare their Indigenous ancestry at the time of application

21.2 Deadlines for Application

1. Applicants will be admitted to the program in the Fall (September) semester only.
2. Applications and all supporting documents must be postmarked no later than February 15 for applicants wishing to enter studies in the Fall (September) semester.
3. Individuals who submit applications later than the above date are not assured of consideration for admission to the program and applications will be processed only if time and resources permit.

21.3 Procedure for Admission

1. Applications for admission to the M.Mgt. program must be made on the appropriate form and submitted to the School of Graduate Studies.
2. The following documents must be submitted in support of the official application form:
 - a. letters of appraisal from two referees, at least one of whom has had close professional contact with the applicant within the last two years, and at least one of whom is capable of appraising the applicant's academic potential as a graduate student;
 - b. official transcripts from each university or other post-secondary institution previously attended (other than Memorial University of Newfoundland), to be sent directly by its Registrar (or equivalent) to the School of Graduate Studies. If not recorded on the transcript, official evidence of completion of undergraduate degree must also be submitted;
 - c. a current curriculum vitae detailing professional experience; and
 - d. a personal statement, of no more than 1,000 words, expressing why the applicant intends to pursue the M.Mgt. qualification from Grenfell Campus and how the applicant is suitable for success in the program.
3. Admission shall be made by the Dean of the School of Graduate Studies on the recommendation of the Business program in the School of Arts and Social Science, Grenfell Campus. Upon notification from the Dean of the School of Graduate Studies of acceptance into the M.Mgt. program, applicants must give written notice to the School of Graduate Studies of their intention to register.

21.4 Program of Study

1. The M.Mgt. program requires 30 credit-hours as follows:
MGMT 6001, MGMT 6002, MGMT 6003, MGMT 6004, MGMT 6005, MGMT 6006, MGMT 6007, MGMT 6008, MGMT 6009, MGMT 6010.
2. Courses will normally be completed in the order in which they are presented above and as listed under **Courses** below.
3. Prior to the beginning of the study period, all students will attend a mandatory on-campus orientation workshop that will be held in August. The workshop is team-taught and is four days in length. Failure to attend the on-campus orientation workshop will result in the deferral of admission.

21.5 Evaluation

Students in the M.Mgt. degree must obtain a grade of 'B' or better in all program courses.

Students who receive a grade of less than 'B' in a program course may be permitted to remain in the program, provided the course is repeated and passed with a grade of 'B' or better. This will normally require a leave of absence from the program for a period of one year, until the course is offered again. A maximum of two such repetitions shall be permitted in the student's graduate program; after this point, the student shall be required to withdraw from the program.

21.6 Courses

MGMT 6001 Accounting Management
 MGMT 6002 Marketing Management
 MGMT 6003 Financial Management
 MGMT 6004 Acquiring Talent and Managing People
 MGMT 6005 Managing Information and Knowledge
 MGMT 6006 Managing Operations and Processes
 MGMT 6007 Managing Innovation
 MGMT 6008 Organizational Effectiveness and Strategic Thinking (*prerequisites* MGMT 6001, 6002, 6003, 6004, 6005, 6006, 6007)
 MGMT 6009 Management Leadership
 MGMT 6010 Strategy Execution and Change Management (*prerequisite* MGMT 6008, *co-requisite* MGMT 6009)

22 Regulations Governing the Degree of Master of Marine Studies and the Graduate Diploma in Marine Studies (Fisheries Resource Management)

www.mun.ca/sgs/contacts/sgscontacts.php

www.mi.mun.ca

www.mun.ca/become/graduate/apply/app_deadlines.php

The degree of Master of Marine Studies (M.M.S.) is offered in Fisheries Resource Management (FRM) and in Marine Spatial Planning and Management (MSPM). There is also a Graduate Diploma in Marine Studies (Fisheries Resource Management).

Both the Fisheries Resource Management and the Marine Spatial Planning and Management program areas will be administered by Academic Directors appointed by the Vice-President (Marine Institute), together with Academic Advisory Committees.

Academic Advisory Committees for each program area will be appointed by the Dean of Graduate Studies on recommendation of the Vice-President (Marine Institute). Each of these committees will consist of the Academic Director as Chair, three members from the Marine Institute and two members from other academic units of the University. Normally, all appointments will be for a period of three (3) years.

For the Fisheries Resource Management programs, a Technical Advisory Committee consisting of a cross-section of members with professional expertise related to the fishery, will provide regular feedback on program content, instruction, and future direction of the Program.

For the Marine Spatial Planning and Management program, a Technical Advisory Committee, consisting of a cross-section of members with professional expertise related to the ocean/marine sector, will provide regular feedback on program content, instruction, and future direction of the Program.

Members of these Technical Advisory Committees will be appointed by the Dean of Graduate Studies on recommendation of the Vice-President (Marine Institute). The Academic Director will be an ex-officio member and Chair of the Technical Advisory Committee. Normally all appointments will be for a period of three (3) years.

22.1 Graduate Diploma in Marine Studies (Fisheries Resource Management)

The Graduate Diploma in Marine Studies (Fisheries Resource Management) provides an opportunity for fisheries professionals to enhance their perspective on fishery issues from a variety of disciplines.

22.1.1 Admission Requirements

To be considered for admission to the Graduate Diploma in Marine Studies (Fisheries Resource Management), a student must be eligible to register in the Master of Marine Studies program (see **Master of Marine Studies (Fisheries Resource Management), Admission Requirements** below).

22.1.2 Program of Study

The program is offered online and requires successful completion of 18 credit hours of course work:

1. 5 courses (15 credit hours) from **Core Courses**; and
2. 1 elective course (3 credit hours) from either **Category A** or **Category B** Electives.

22.1.3 Evaluation

Students for the Graduate Diploma in Marine Studies (Fisheries Resource Management) must obtain a grade of 'B' or better in all program courses.

22.1.4 Courses

Courses required for the Graduate Diploma in Marine Studies (Fisheries Resource Management) must be selected from the **Courses** section outlined under the Master of Marine Studies (Fisheries Resource Management) program.

22.2 Master of Marine Studies (Fisheries Resource Management)

The Master of Marine Studies (Fisheries Resource Management) is a multi-disciplinary program of study that will provide the student with exposure to all dimensions of modern fisheries resource management in an international context. The program is aimed at professionals working in or intending to enter careers in fisheries management. The program is offered online and requires successful completion of either 24 credit hours of course work and a Major Report, or 30 credit hours of course work. Students who have successfully completed the requirements for the Graduate Diploma in Marine Studies (Fisheries Resource Management) may elect to continue their program of study in order to earn the Degree.

22.2.1 Admission Requirements

1. Admission to the program is on a competitive basis. To be considered for admission to the program an applicant must normally have an undergraduate degree with a minimum of a high second class standing from an institution recognized by the Senate.
2. In addition, applicants will normally have a demonstrated commitment to fisheries through employment or experience in a sector of the fishery, in a regulatory agency or government department connected to fisheries, in a non-governmental agency, or through self-employment or consulting activities related to fisheries.
3. In exceptional cases, applicants who have not completed an undergraduate degree may be considered for admission. Preference will be given to those who have at least 10 years of relevant professional experience, and have successfully completed several years of post-secondary studies. Applicants who do not meet normal admission requirements shall be required to complete, with a high level of achievement, certain undergraduate courses before being considered for admission.
4. Applicants who did not complete a baccalaureate or post-graduate degree at a recognized university where English is the primary language of instruction must normally complete either the:
 - a. Test of English as a Foreign Language (TOEFL) and achieve a paper-based score of 580 (or higher), computer-based score of 237 (or higher), or Internet based score of 92-93 (or higher); or
 - b. International English Language Testing System (IELTS) and achieve a score of 7 (or higher).

Information regarding the TOEFL is available from the Educational Testing Service at www.ets.org. IELTS information is available at www.ielts.org. It is noted that other equivalent tests acceptable to the School of Graduate Studies will also be considered.

5. The deadlines for submission of applications for students wishing to enter the program are as follows:

Fall (September) semester: June 15
 Winter (January) semester: October 15
 Spring (May): semester: February 15

Applications received after listed deadlines will be considered as time and resources permit.

22.2.2 Program of Study

1. Students for the Master of Marine Studies (Fisheries Resource Management) shall be required to complete a minimum of either:
 - a. 24 credit hours of course work plus a Major Report on the **Course Work Plus a Major Report Route** completed in accordance with **General Regulation, Theses and Reports** of the School of Graduate Studies. Course work must include the following course selections from the **Courses** section below:
 - 5 core courses (15 credit hours)
 - 1 elective course (3 credit hours) from **Category A** Electives

- 1 elective course (3 credit hours) from **Category B** Electives
 - 1 elective course (3 credit hours) from either **Category A** or **Category B**
- b. 30 credit hours on the **Comprehensive Course Route** which must include the following course selections from the **Courses** section below:
- 5 core courses (15 credit hours)
 - 2 elective courses (6 credit hours) from **Category A** Electives
 - 1 elective course (3 credit hours) from **Category B** Electives
 - 2 elective courses (6 credit hours) from either **Category A** or **Category B**
2. Dependent upon the applicant's academic background, other courses may be required by the Academic Advisory Committee.
3. Transfer of credit for graduate courses completed in other programs at the University or at other institutions recognized by Senate will be considered in accordance with School of Graduate Studies **General Regulations, Transfer of Course Credits**.

22.2.2.1 Course Work Plus a Major Report Route

24 credit hours of course work plus a Major Report completed in accordance with **General Regulations, Theses and Reports** of the School of Graduate Studies. Course work must include the following course selections from the **Courses** section below:

1. 5 core courses (15 credit hours)
2. 1 elective course (3 credit hours) from **Category A** Electives
3. 1 elective course (3 credit hours) from **Category B** Electives
4. 1 elective course (3 credit hours) from either **Category A** or **Category B**

22.2.2.2 Comprehensive Course Route

30 credit hours on the Comprehensive Course Route which must include the following course selections from the **Courses** section below:

1. 5 core courses (15 credit hours)
2. 2 elective courses (6 credit hours) from **Category A** Electives
3. 1 elective course (3 credit hours) from **Category B** Electives
4. 2 elective courses (6 credit hours) from either **Category A** or **Category B**

22.2.3 Evaluation

1. Students for the Master's Degree must obtain a grade of 'B' or better in all program courses.
2. Students who have received a grade less than a 'B' in a program course will be permitted to remain in the program, provided the course is retaken and passed with a grade of 'B' or better. Alternatively the student may, on the recommendation of the Academic Advisory Committee, substitute another graduate course. Only one such repeat or substitution will be permitted in the program.
3. The Major Report will normally be undertaken towards the end of the program. The topic of the report and a faculty Supervisor will be chosen by the student in consultation with the Academic Advisory Committee. The report provides an opportunity to synthesize an original perspective on a selected fisheries issue through the examination of appropriate literature and other sources of information. Normally the report will be multi-disciplinary in nature and will result in a document equivalent to a publishable periodical journal article or a consultant's report on a particular issue. It will be assessed in accordance with **General Regulations, Theses and Reports** of the School of Graduate Studies.

22.2.4 Courses

22.2.4.1 Core Courses

MSTM 6001 Fisheries Ecology (*credit may be obtained for only one of MSTM 6001 and the former FRM 6001*)
 MSTM 6002 Fisheries Resource Assessment Strategies (*credit may be obtained for only one of MSTM 6002 and the former FRM 6002*)
 MSTM 6003 Fisheries Economics (*credit may be obtained for only one of MSTM 6003 and the former FRM 6003*)
 MSTM 6004 Fisheries Policy and Planning (*credit may be obtained for only one of MSTM 6004, the former FRM 6004, and the former FRM 6005*)
 MSTM 6005 Overview of World Fisheries (*credit may be obtained for only one of MSTM 6005 and the former FRM 6009*)

22.2.4.2 Category A Electives

MSTM 6006 Business Management for Fisheries (*credit may be obtained for only one of MSTM 6006 and the former FRM 6006*)
 MSTM 6007 Fisheries Technology
 MSTM 6008 Social and Philosophical Issues of Fisheries Management
 MSTM 6009 Current Issues for Sustainable Fisheries
 MSTM 6010 Legal Aspects of Fisheries Resource Management

22.2.4.3 Category B Electives

MSTM 6044 Marine Environment Law and Pollution Control
 MSTM 6056 Management for International Development
 MSTM 6071 Management of Aquaculture Technology
 TECH 6022 Communication and Conflict Resolution in a Technical Environment (*credit restricted with the former MSTM 6022*)
 TECH 6023 Strategic Planning, Policy, Participation and Management in Technical Operations (*credit restricted with the former MSTM 6023*)
 TECH 6033 Quality Systems (*credit restricted with the former MSTM 6033*)
 TECH 6034 Project Management in the Offshore, Health, Fisheries and Engineering Technology Environments (*credit restricted with the former MSTM 6034*)
 TECH 6039 Sustainability and Environmental Responsibility (*credit restricted with the former MSTM 6039*)

22.3 Master of Marine Studies (Marine Spatial Planning and Management)

The Master of Marine Studies (Marine Spatial Planning and Management) is a multi-disciplinary academic program that provides students with both conceptual/theoretical background and practical applied skills in integrated coastal and ocean management (ICOM) and marine spatial planning (MSP). The program provides a broad level understanding of planning processes and the governance, policy/legislative, ecological, social, cultural and economic elements of coastal and ocean areas complemented by practical and applied skills for stakeholder engagement, project management and utilization of geospatial technology to support planning and management efforts.

Successful completion of the program includes 30 credit hours of course work and an Internship or a Research Project.

The program commences in the Fall semester of each year.

22.3.1 Admission Requirements

Admission to the program is on a limited and competitive basis.

1. To be considered for admission to the program an applicant will normally possess a relevant second class or better undergraduate degree from a university of recognized standing.
2. Students intending to undertake electives in Decision Support / Geospatial Analysis (Category C) are required to have a background in mathematics, statistics and geographic information systems.
3. In exceptional cases, applicants who have not completed an undergraduate degree may be considered for admission. Preference will be given to those who have at least 10 years of relevant professional experience, and have successfully completed several years of post-secondary studies. Applicants who do not meet normal admission requirements shall be required to complete, with a high level of achievement, certain undergraduate courses before being considered for admission.
4. Applicants who did not complete a baccalaureate or post-graduate degree at a recognized university where English is the primary language of instruction must normally complete either the:
 - a. Test of English as a Foreign Language (TOEFL) and achieve a paper-based score of 580 (or higher), computer-based score of 237 (or higher), or Internet based score of 92-93 (or higher); or
 - b. International English Language Testing System (IELTS) and achieve a score of 7 (or higher).

Information regarding the TOEFL is available from the Educational Testing Service at www.ets.org. IELTS information is available at www.ielts.org. It is noted that other equivalent tests acceptable to the School of Graduate Studies will also be considered.

The deadline for submission of applications is March 15.

22.3.2 Program of Study

Students in the Master of Marine Studies (Marine Spatial Planning and Management) are required to complete 30 credit hours of course work and an Internship or Research Project. Course work includes 7 core courses: 6 courses (18 credit hours) completed online, 1 intensive hands-on course (3 credit hours) offered in a face-to-face environment, as well as 3 elective courses (9 credit hours) offered either online or on campus.

22.3.2.1 Core Courses

All students must complete the following compulsory core courses:

MSTM 6011 Introduction to Integrated Coastal and Ocean Management / Marine Spatial Planning

MSTM 6012 Fundamentals of Geospatial Analysis

MSTM 6013 Resource/Natural Environment and Ocean Use Characterization

MSTM 6014 Geospatial Analysis for Marine Spatial Planning (*prerequisites: MSTM 6011, 6012, and 6013*) (*may be offered in accelerated format*)

MSTM 6027 Coastal and Ocean Environmental Policies

TECH 6022 Communication and Conflict Resolution in a Technical Environment (*credit restricted with the former MSTM 6022*)

TECH 6034 Project Management in the Offshore, Health, Fisheries and Engineering Technology Environments (*credit restricted with the former MSTM 6034*)

22.3.2.2 Electives

Students will choose one of three options for elective course selection:

two Category A Electives plus one Category B Elective or
two Category B Electives plus one Category A Elective or
two Category C Electives plus one Category A or B Elective

Category A Electives: Natural Environment

ENVE/ENVS 6001 Earth and Ocean Systems

MSTM 6001 Fisheries Ecology

MSTM 6015 Marine Protected Areas

MSTM 6016 Coastal Geomorphology / Oceanography

Category B Electives: Human Environment

MSTM 6008 Social and Philosophical Issues in Sustainable Fisheries

MSTM 6017 Social and Cultural Aspects of Coastal Communities

MSTM 6018 Coastal and Ocean Economics

Category C Electives: Decision Support / Geospatial Analysis

GEOG 6120 Geospatial Modelling and Analysis

GEOG 6821 Advanced Computer Modelling/Habitat Mapping

22.3.2.3 Internship (MSTM 6019) or Research Project

All students must complete an Internship or Research Project. Normally students would be permitted to register for the Internship or Research Project only after all other course requirements have been met, or during the student's last semester of studies. Evaluation of the Research Project shall be carried out in accordance with **General Regulations, Theses and Reports** in the School of Graduate Studies.

1. Internship Requirements

- Internships are normally proposed by the student and approved by the Academic Director in consultation with the Placement

Officer. Internship placements may be local, national or international. Students seeking international internships must consult with the Academic Director early in the first year of their program.

- Internships are for full-time employment hours for the duration of the semester (12 weeks).
- Students must attend a scheduled pre-internship orientation workshop. See **Pre-Internship Workshop** below.
- Each internship placement is supervised and evaluated by the on-site Supervisor assigned by the employer and the Academic Director. The internship shall consist of two components:
 - On-Site Student Performance as evaluated by the on-site Supervisor assigned by the employer, in consultation with the Academic Director and Placement Officer.
 - An Internship Report graded by the Academic Director in consultation with the on-site Supervisor assigned by the employer.
- Evaluation of the Internship shall result in one of the following final grades: Pass or Fail.
- A student must obtain a Pass in both the On-Site Student Performance and the Internship Report to obtain a final grade of Pass. If a student fails to achieve the internship standards specified above, the student may be required to repeat the internship. An internship may only be repeated once.
- Students who voluntarily withdraw from the internship without prior approval from the Academic Director, or who conduct themselves in such a manner as to cause the host organization and the Placement Officer to terminate the placement, will normally be awarded a grade of Fail in the internship.
- Students are not permitted to withdraw from the internship without prior approval of the Academic Director, in consultation with the Placement Officer. The Placement Officer will make a recommendation to the Academic Director who will make the final decision. Permission to withdraw from the internship does not constitute a waiver of degree requirements, and students who have obtained such permission must complete an approved internship or research project in lieu of the internship dropped.

2. Research Project Requirements

- Research projects are normally proposed by the student and approved by the Academic Director.
- Students must attend a scheduled pre-research project orientation workshop. See **Pre-Research Project Workshop** below.
- Evaluation of the Research Project shall be carried out in accordance with **General Regulations, Theses and Reports** in the School of Graduate Studies.
- Students are not permitted to withdraw from the research project without prior approval of the Academic Director. Permission to withdraw from the research project does not constitute a waiver of degree requirements, and students who have obtained such permission must complete an approved research project or internship in lieu of the research project dropped.

3. Workshops

Students are required to complete one of the following workshops:

- **Pre-Internship Workshop**

This online workshop reviews the Internship requirements. It aids students in writing resumes and cover letters, discusses interviewing practices and examines student/employer relationships. International internship opportunities and processes for application will be discussed. This workshop is held during the week following the end of the Winter semester.

- **Pre-Research Project Workshop**

This online workshop reviews the Research Project requirements, aids students in preparing a project concept, proposal and establishing the research project timelines, and provides access to information and resources necessary for approval and completion of the Research Project. This workshop is held during the week following the end of the Winter semester.

22.3.3 Advanced Standing

Students who have successfully completed the Marine Institute Advanced Diploma in Integrated Coastal and Ocean Management will be given advanced standing credit for MSTM 6012, 6016, and 6022.

22.3.4 Transfer Credits

Up to three relevant elective courses (9 credit hours) may be transferred from other graduate programs within the School of Graduate Studies or from other post-secondary institutions recognized by Senate, subject to the approval of the Dean of Graduate Studies on the recommendation of the Academic Director.

22.3.5 Evaluation

1. Students in the Master of Marine Studies (Marine Spatial Planning and Management) program must obtain a grade of 'B' or better in all program courses.
2. Students who receive a grade of less than 'B' in any course will be permitted to remain in the program provided the course is repeated and passed with a grade of 'B' or better. Alternatively, the student may, on the recommendation of the Academic Director, and with the approval of the Dean of Graduate Studies, substitute another graduate course. Only one course repetition or substitution will be permitted during the student's program after which the student shall be required to withdraw from the program.

22.3.6 Courses

22.3.6.1 Core Courses

MSTM 6011 Introduction to Integrated Coastal and Ocean Management / Marine Spatial Planning

MSTM 6012 Fundamentals of Geospatial Analysis

MSTM 6013 Resource/Natural Environment and Ocean Use Characterization

MSTM 6014 Geospatial Analysis for Marine Spatial Planning (*prerequisites: MSTM 6011, 6012, and 6013*)

MSTM 6027 Coastal and Ocean Environmental Policies

TECH 6022 Communication and Conflict Resolution in a Technical Environment (*credit restricted with the former MSTM 6022*)

TECH 6034 Project Management in the Offshore, Health, Fisheries and Engineering Technology Environments (*credit restricted with the former MSTM 6034*)

22.3.6.2 Category A Electives: Natural Environment

ENVE/ENVS 6001 Earth and Ocean Systems

MSTM 6001 Fisheries Ecology

MSTM 6015 Marine Protected Areas
MSTM 6016 Coastal Geomorphology / Oceanography

22.3.6.3 Category B Electives: Human Environment

MSTM 6008 Social and Philosophical Issues in Sustainable Fisheries
MSTM 6017 Social and Cultural Aspects of Coastal Communities
MSTM 6018 Coastal and Ocean Economics

22.3.6.4 Category C Electives: Decision Support / Geospatial Analysis

GEOG 6120 Geospatial Modelling and Analysis
GEOG 6821 Advanced Computer Modelling/Habitat Mapping

23 Regulations Governing the Degree of Master of Maritime Management

www.mun.ca/sgs/contacts/sgscontacts.php
www.mi.mun.ca
www.mun.ca/become/graduate/apply/app_deadlines.php

23.1 Administration

The Master of Maritime Management (M.M.M.) program will be administered by an Academic Director appointed by the Associate Vice-President (Marine Institute), Academic & Student Affairs, together with an Academic Advisory Committee.

An Academic Advisory Committee will be appointed by the Dean of Graduate Studies on recommendation of the Associate Vice-President (Marine Institute), Academic & Student Affairs. This committee will consist of the Academic Director as Chair, three members from the Marine Institute, one member from the Faculty of Business Administration and one member from another unit of the University. Normally, all appointments will be for a period of three years.

A Technical Advisory Committee, consisting of a cross-section of members with professional expertise related to the maritime sector, will provide regular feedback on program content, instruction, and future direction of the Program. Members of this Committee will be appointed by the Dean of Graduate Studies on recommendation of the Associate Vice-President (Marine Institute), Academic & Student Affairs. The Academic Director will be an ex officio member and Chair of the Technical Advisory Committee. Normally all appointments will be for a period of three years.

23.2 Program

The Master of Maritime Management (M.M.M.) is a comprehensive academic program that provides a broad understanding of the structure and operation of organizations and the factors that influence business decisions in the context of maritime-based organizations. It provides a maritime management focus through the development of knowledge and understanding of the nature of technical operations and the factors that have an impact on their success, as well as the ability to apply these concepts within their organizations.

The program is offered online and requires successful completion of either 24 credit hours of course work and a comprehensive project and report (6 credit hours), or 30 credit hours of course work. Students will typically register on a part-time basis.

23.2.1 Admission Requirements

1. Admission to the program is on a competitive basis. To be considered for admission to the program an applicant will normally possess a second class or better undergraduate degree from a university of recognized standing and will normally have:
 - a. appropriate maritime sector and business management course work; and
 - b. appropriate technical knowledge and relevant marine sector employment experience.
2. In exceptional cases, applicants who have not completed an undergraduate degree, but who meet all other requirements, may be considered for admission. Preference will be given to those who have at least 10 years of relevant professional and managerial experience, and have successfully completed several years of post-secondary studies. Applicants who do not meet normal admission requirements shall be required to complete, with a high level of achievement, certain undergraduate courses before being considered for admission.
3. Applicants who did not complete a baccalaureate or post-graduate degree at a recognized university where English is the primary language of instruction must normally complete either the:
 - a. Test of English as a Foreign Language (TOEFL) and achieve a paper-based score of 580 (or higher), computer-based score of 237 (or higher), or Internet based score of 92-93 (or higher); or
 - b. International English Language Testing System (IELTS) and achieve a score of 7 (or higher).

Information regarding the TOEFL is available from the Educational Testing Service at www.ets.org. IELTS information is available at www.ielts.org. It is noted that other equivalent tests acceptable to the School of Graduate Studies will also be considered.

23.2.2 Program of Study

1. Students in the Master of Maritime Management shall be required to complete a minimum of either:
 - a. Twenty-four credit hours of course work and a major project and report (6 credit hours). Course work includes two compulsory core courses, and six elective courses, a minimum of 9 credit hours from Maritime Management Electives and 3 credit hours from Technology Management Electives. Students on the project route will complete MARI 6101 Project in Maritime Management (6 credit hours). MARI 6101 requires students to choose a topic in consultation with the Academic Director and work independently to carry out an in-depth study of a problem or application within the area of maritime management and fully document and present their findings. Preferably the problem will be directly related to a workplace situation.
 - b. Thirty credit hours on a course-based route. Course work includes two compulsory core courses and eight elective courses, a minimum of four courses from Maritime Management Electives and two courses from Technology Management Electives.
2. Up to three relevant elective courses may be transferred from other graduate programs within the School of Graduate Studies or from other post-secondary institutions recognized by Senate, subject to the approval of the Dean of Graduate Studies on the recommendation of the Academic Director.

3. a. Students with full-time status may register for a maximum of 9 credit hours in any regular semester and a maximum of 6 credit hours in intersession or summer session.
- b. Students with part-time status may register for a maximum of 6 credit hours in any regular semester and a maximum of 3 credit hours in intersession or summer session.
- c. Students may register for additional courses in a semester or session with the permission of the Academic Director of the Program.

23.2.3 Evaluation

1. Students completing the Master of Maritime Management degree must obtain a grade of 'B' or better in all program courses.
2. Students who receive a grade of less than 'B' in any course will be permitted to remain in the program provided the course is repeated and passed with a grade of 'B' or better. Alternatively, the student may, on the recommendation of the Academic Director, and with the approval of the Dean of Graduate Studies, substitute another graduate course. Only one course repetition or substitution will be permitted during the student's program after which the student shall be required to withdraw from the program.

23.2.4 Courses

23.2.4.1 Core Courses

MARI 6041 Marine Policy (*credit restricted with the former MSTM 6041*)

MARI 6042 Business of Shipping/Transportation of Goods (*credit restricted with the former MSTM 6042*)

23.2.4.2 Elective Courses

Maritime Management Electives

MARI 6027 Coastal and Ocean Environmental Policies (*credit restricted with the former MSTM 6027*)

MARI 6043 Marine Law (*credit restricted with the former MSTM 6043*)

MARI 6044 Marine Environment Law and Pollution Control (*credit restricted with the former MSTM 6044*)

MARI 6045 Port Operations and Management (*credit restricted with the former MSTM 6045*)

MARI 6046 Information Systems in the Marine Environment (*credit restricted with the former MSTM 6046*)

MARI 6047 Maritime Security and Event Investigation (*credit restricted with the former MSTM 6047*)

MARI 6048 Emerging Issues in International Marine Transportation (*credit restricted with the former MSTM 6048*)

MARI 6049 Maritime Risk Analysis and Management (*credit restricted with the former MSTM 6049*)

MARI 6050 Maritime Health, Safety, Environment and Quality (*credit restricted with the former MSTM 6050*)

MARI 6051 International Maritime Compliance & Business Continuity Planning (*credit restricted with the former MSTM 6051*)

Technology Management Electives

TECH 6022 Communication and Conflict Resolution in a Technical Environment (*credit restricted with the former MSTM 6022*)

TECH 6023 Strategic Planning, Policy, Participation and Management in Technical Operations (*credit restricted with the former MSTM 6023*)

TECH 6030 Principles of Management for Engineering Technology Enterprises (*credit restricted with the former MSTM 6030*)

TECH 6034 Project Management in the Offshore, Health, Fisheries and Engineering Technology Environments (*credit restricted with the former MSTM 6034*)

TECH 6039 Sustainability and Environmental Responsibility (*credit restricted with the former MSTM 6039*)

TECH 6052 Management of Intellectual Property (*credit restricted with the former MSTM 6052*)

TECH 6054 Technology Assessment (*credit restricted with the former MSTM 6054*)

Project in Maritime Management

MARI 6101 Project in Maritime Management (6 credit hours)

24 Regulations Governing the Degree of Master of Music

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/music

www.mun.ca/become/graduate/apply/app_deadlines.php

The Master of Music (M.Mus.) program provides the environment for accelerated advances in comprehension, skills, and abilities as a performing musician, music pedagogue, or conductor while offering experience in the metier of the contemporary musician. To that end, the School of Music has forged active partnerships with many of the professional music organizations and institutions within the arts community in the greater St. John's region which afford an exceptional range of professional experiences to its graduate students. Included among these partners are the Newfoundland Symphony Orchestra, the Canadian Broadcasting Company, Heritage Canada, the Newfoundland and Labrador Arts Council, and many others. Within the areas of specialization offered for the M.Mus., there is considerable flexibility available to further focus the program to meet specific interests and needs.

24.1 Program of Study

The Degree of Master of Music (M.Mus.) is offered by full-time study, normally commencing in the Fall semester. Three areas of specialization are offered:

1. Conducting. Students may focus in choral conducting, instrumental conducting, or a combination of choral and instrumental conducting.
2. Performance. For a complete list of applied areas of study, see the School of Music website at www.mun.ca/music.
3. Performance/Pedagogy. For a complete list of applied areas of study, see the School of Music website at www.mun.ca/music.

The specialization of Ethnomusicology is available through the degrees Master of Arts and Doctor of Philosophy. For further information see the section **Regulations Governing the Degree of Master of Arts, Ethnomusicology** and the section **Regulations Governing the Degree of Doctor of Philosophy, Ethnomusicology**, respectively.

24.2 Qualifications for Admission

1. Admission to the program is limited and competitive. The application deadline is December 15 for admission to the following Fall semester. Under special circumstances, applicants may be considered for admission to the Winter semester. For further information, contact the School of Music.
2. To be eligible for consideration for admission, applicants shall meet the requirements set out in **General Regulations for**

Admission, Master's Program. Applicants to the M.Mus. will normally hold a Bachelor of Music or equivalent from a recognized university or conservatory. Preference will be given to applicants who hold first class standing in their undergraduate program.

3. In addition to the requirements above, admission is further determined by audition.
 - a. Auditions for September entry are normally held in late February or early March of each year. Check the School of Music website at www.mun.ca/music for dates and locations.
 - b. Applicants to the M.Mus. in Performance or Performance/Pedagogy may submit the audition as a professional quality video recording if they are unable to attend the live auditions. The recording must be unedited; live performances are preferred. The audition program should display a range of performance styles and repertoire. Applicants should consult the School of Music website at www.mun.ca/music for details on length of audition and appropriate repertoire.
 - c. Applicants to the M.Mus. in Conducting should submit professional quality video recordings of their work with a minimum of two different types of ensembles. These video recordings should include both rehearsals and performances.
4. Once they have been admitted, students will be required to complete diagnostic exams in music theory, aural skills. Voice and choral conducting students will also have their knowledge of lyric diction assessed. If weaknesses are identified, students may be required to complete remedial undergraduate course work.

24.3 Degree Requirements

1. The Degree of Master of Music is normally completed in two years of full-time study. Comprehensive examinations are not administered. The normal residency period may, in some instances, be reduced through Summer and Intersession study.
2. All students for the M.Mus. must complete at least 31 credit hours. Further courses may be required depending on the background of the individual student.
3. All students must complete:
 - a. Music Research Methods: Music 6000 (1 credit hour)
 - b. Music Seminar: Music 6002
 - c. Career Skills for Musicians: Music 6700
 - d. Further courses may be required depending on the background of the individual student.
4. Students in Conducting must complete an additional 24 credit hours according to their area of focus:
 - a. Choral Conducting
 - i. Choral Conducting: Music 6310, 6311, 7310
 - ii. Instrumental Conducting: Music 6210
 - iii. Score Study and Analysis: Music 6100
 - iv. Choral Repertoire: Music 6007
 - v. Electives: Six credit hours. With the approval of the School of Music. 3 credit hours may be from related disciplines.
 - b. Instrumental Conducting
 - i. Instrumental Conducting: Music 6210, 6211, 7210
 - ii. Choral Conducting: Music 6310
 - iii. Score Study and Analysis: Music 6100
 - iv. Orchestral or Instrumental Ensemble Repertoire: Music 6006 or 6008
 - v. Electives: Six credit hours. With the approval of the School of Music. 3 credit hours may be from related disciplines.
 - c. Combined Choral/Instrumental Conducting
 - i. Instrumental Conducting: Music 6210, 6211
 - ii. Choral Conducting: Music 6310, 6311
 - iii. Score Study and Analysis: Music 6100
 - iv. Ensemble Repertoire: One of Music 6006, 6007, or 6008
 - v. Electives: Six credit hours. With the approval of the School of Music. 3 credit hours may be from related disciplines.
5. Students in Performance must complete an additional 24 credit hours as follows:
 - a. Principal Applied Study: Music 645A/B, 745A/B
 - b. Other Applied Study: 3 credit hours from Music 6500-6506, 646A/B
 - c. Music Pedagogy: Music 6400 or Music 6600
 - d. Electives: Six credit hours. With the approval of the School of Music. 3 credit hours may be from related disciplines.
6. Students in Performance/Pedagogy must complete an additional 24 credit hours as follows:
 - a. Principal Applied Study: Music 647A/B, 747A/B
 - b. Music Pedagogy: Music 6400 and 6600
 - c. Pedagogy Internship: Music 6610
 - d. Electives: 3 credit hours

Master of Music Curriculum Summary Table

Master of Music	Conducting			Performance	Performance/ Pedagogy
Research	6000, 6002			6000, 6002	6000, 6002
Career Skills	6700			6700	6700
Applied	Choral 6210 6310 6311 7310	Instrumental 6210 6211 6310 7210	Combined 6210 6211 6310 6311	645A/B 745A/B 3 credit hours chosen from 646A/B, 6500- 6506	647A/B 747A/B
Complementary	6007 6100	6006 or 6008 6100	one of 6006, 6007, 6008 6100	6400 or 6600	6400, 6600, 6610
Electives	6 credit hours, of which 3 may be from related disciplines			6 credit hours, of which 3 may be from related disciplines	3 credit hours

24.4 Evaluation

1. Students must meet all requirements of the **General Regulations** of the School of Graduate Studies.
2. Students must obtain a grade of at least 65% in all program courses to receive credit for the course toward their program requirements. Students who fail to receive 65% or more in a required course must repeat the course. Students who fail to receive 65% or more in an elective course must either repeat the course or replace it with another program course. Any student who receives a grade of less than 65% in two courses or in a repeated course will be required to withdraw from the program.
3. In addition, failure to receive a grade of 75% or higher in any of Music 645A/B, Music 745A/B, Music 647A/B, Music 747A/B, Music 6210, Music 6211, Music 6310, Music 6311, Music 7210, or Music 7310 will lead to termination of the student's program.

24.5 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the School will allow. All courses are 3 credit hours unless otherwise indicated.

6000 Music Research Methods (1 credit hour)
6002 Graduate Seminar (*prerequisite: Music 6000*)
6005 Performance Practice
6006 Instrumental Ensemble Repertoire
6007 Choral Repertoire
6008 Orchestral Repertoire
6009 Music Literature
6100 Score Study and Analysis
6210 Instrumental Conducting I
6211 Instrumental Conducting II (*prerequisite: Music 6210*)
6212 Instrumental Conducting Internship I (1 to 3 credit hours)
6213 Instrumental Conducting Internship II (1 to 3 credit hours)
6310 Choral Conducting I
6311 Choral Conducting II (*prerequisite: Music 6310*)
6312 Choral Conducting Internship I (1 to 3 credit hours)
6313 Choral Conducting Internship II (1 to 3 credit hours)
6400 Music Pedagogy
645A/B Principal Applied Study I (6 credit hours)
646A/B Secondary Principal Applied Study (4 credit hours)
647A/B Principal Applied Study I (6 credit hours)
6500 Chamber Music (2 credit hours per semester. Maximum: 8 credit hours)
6501 Chamber Music (3 credit hours per semester. Maximum: 12 credit hours)
6502 Opera Performance (2 credit hours)
6503 Opera Performance (3 credit hours)
6504 Chamber Music (1 credit hour per semester. Maximum: 4 credit hours)
6505 Conducted Instrumental Ensemble (1 credit hour per semester. Maximum: 4 credit hours)
6507 Jazz Combo (1 credit hour per semester. Maximum: 4 credit hours)
6508 Jazz Combo (2 credit hours per semester. Maximum: 8 credit hours)
6509 Jazz Combo (3 credit hours per semester. Maximum: 12 credit hours)
6510 Seminar in Performance Issues
6600 Pedagogy Seminar
6610 Pedagogy Internship I
6611 Pedagogy Internship II
6700 Career Skills for Musicians
6701 Music in the Community (1 credit hour) (*prerequisite: Music 6700*)
6702 Music in the Community (2 credit hours) (*prerequisite: Music 6700*)
6703 Music in the Community (3 credit hours) (*prerequisite: Music 6700*)
6750 Music Industries Internship (2 credit hours)
6751 Music Industries Internship
7002 Research Paper
7003 Ethnographic Video Methodologies
7007 Music in the Study of Gender, Race and Class
7010 World Music: Music of Asia and Oceania
7011 World Music: Music of Africa and the Americas
7012 Canadian Musical Traditions

7013 Music and Culture
 7017 Folksong
 7018 Jazz and Blues: The Roots of Popular Music
 7020 Advanced Form
 7021 Advanced Post-Tonal Techniques
 7210 Instrumental Conducting III (*prerequisite: Music 6211*)
 7310 Choral Conducting III (*prerequisite: Music 6311*)
 745A/B Principal Applied Study II (6 credit hours) (*prerequisite: Music 645B*)
 747A/B Principal Applied Study II (6 credit hours) (*prerequisite: Music 647B*)

Special Topics Courses

6800-6809
 6900-6909
 7800-7809

25 Regulations Governing the Degree of Master of Occupational Health and Safety

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/become/graduate/apply/app_deadlines.php

The Master of Occupational Health and Safety is an interdisciplinary program providing advanced-level study of multiple aspects of occupational health and safety (OHS). The course offerings will cover a wide range of OHS issues seen from a broadly interdisciplinary perspective, with a focus on the history and social science of OHS, workplace organization, epidemiology, treatment and prevention of occupational injuries and diseases, ergonomics, and occupational hygiene.

The following regulations must be read in conjunction with the **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland.

25.1 Administration

1. The program shall be administered by a Director, who reports to the Dean of Graduate Studies. The Director shall be appointed by the Dean of Graduate Studies after consultation with the deans of appropriate academic units and with the community of occupational health and safety researchers and stakeholders both within and outside the University.
2. An Administrative Committee shall be appointed by The Dean of Graduate Studies consisting of the Director, faculty members with an interest in Occupational Health and Safety from at least four of the following academic units - Business Administration, Engineering and Applied Science, Human Kinetics and Recreation, Humanities and Social Sciences, Medicine, and Nursing. It will be chaired by the Director and will review academic, administrative, resource, and strategic planning issues related to the program.
3. A Community Advisory Board in Occupational Health and Safety shall be established for the purpose of obtaining feedback on the program. The Board will consist of a broad cross-section of members from the occupational health and safety community both within and outside the University who shall be appointed by the Dean of Graduate Studies on the recommendation of the Director. The Advisory Board will be chaired by the Dean of Graduate Studies or delegate.

25.2 Qualifications for Admission

1. Admission is limited and competitive.
2. To be considered for admission to the program, an applicant shall meet the requirements set out in the School of Graduate Studies **General Regulation, Qualification for Admission**.
3. In exceptional cases, applicants who have not completed an undergraduate degree, but who meet all other requirements, may be considered for admission. Preference will be given to those who have a minimum of 10 years of full-time professional experience in the field of occupational health and safety and who have successfully completed substantial university coursework including at least two courses at an advanced undergraduate level from an institution recognized by Senate.
4. Applicants who did not complete their Bachelor's degree at a recognized university where English is the primary language of instruction must normally complete either the Test of English as a Foreign Language (TOEFL) and achieve a paper-based score of 580 (or higher), computer-based score of 237 (or higher), or Internet based score of 92-93 (or higher); or the International English Language Testing System (IELTS) and achieve a score of 7 (or higher). Admission will be limited to the best applicants based on prior academic performance, work experience, and letters of recommendation.

25.3 Program of Study

The Master of Occupational Health and Safety is offered through either full-time or part-time study. The program requires that:

1. a student must complete 24 credit hours of coursework, including the completion of a capstone research paper in OHS 6001. Students must complete 9 credit hours from the list of **Required Courses**, 9 credit hours from the list of **Elective A Courses**, and 6 credit hours from the list of **Elective B Courses**. **Elective A Courses** may be substituted for any **Elective B Courses**. Other elective courses may be approved and added from time to time by the Dean; and
2. each student's program of study must be approved by the Administrative Committee and the Dean of Graduate Studies. Students registered on a full-time basis will normally complete the program in three academic semesters. Students registered on a part-time basis will normally complete the program in no more than nine academic semesters.

Required Courses (9 credit hours)

OHS 600A/B Research Seminar in OHS
 OHS 6001 Supervised Capstone Research Paper

One of the following graduate-level research methods courses:

Education 6467 Quantitative Research Methods
 Employment Relations 6010 Quantitative Methods
 Employment Relations 6020 Qualitative Methods
 Medicine 6280 Community Health Research Methods
 Psychology 6400 Theory and Methods in Social Psychology
 Sociology 6040 Advanced Quantitative Methods
 Sociology 6041 Advanced Qualitative Methods

With the approval of the Dean, and upon recommendation of the Administrative Committee, another research methods course may be deemed acceptable, including an advanced methods course (such as Medicine 6294) for which the student has already taken the prerequisite basic graduate course (such as Medicine 6280).

Elective A Courses (9 credit hours)

Human Kinetics and Recreation 6340 Occupational Biomechanics
 Human Kinetics and Recreation 6350 Human Error in Complex Work Systems
 OHS 6002 Occupational Diseases and Injuries
 OHS 6003 Regulatory Approaches and Compensation Systems
 Sociology 6090 Social Science of Occupational Health and Safety
 Sociology 6360 Sociology of Work

Elective B Courses (6 credit hours)

Anthropology 6071 Health and Illness - Cultural Contexts and Constructions
 Business 8104 Organizations Behaviour and Structure
 Business 8204 Human Resource Management
 Business 8210 Labour Relations
 Engineering 9115 Safety and Risk Engineering
 History 6075 Advanced Studies in Labour and Working-Class History
 Human Kinetics and Recreation 6360 Knowledge Translation in Ergonomics and OHS
 Medicine 6220 Introduction to Community Health
 Medicine 6270 Epidemiology I
 Medicine 6282 Canadian Health Care System
 Medicine 6722 Environmental Health
 Nursing 6221 Population-Based Nursing

With the approval of the Dean upon recommendation of the Administrative Committee, Elective B courses may be substituted for Elective A courses.

25.4 Advanced Standing

Graduates of the College of the North Atlantic's Safety Engineering Program, or of a similar approved program elsewhere, may receive advanced standing for the equivalent of 6 credit hours of elective B courses to be apportioned at the discretion of the Dean upon the recommendation of the Administrative Committee.

25.5 Courses

A selection of the following graduate courses will be offered to meet the requirements of students as far as the resources of the program will allow:

OHS 6000 Research Seminar in OHS
 OHS 6001 Supervised Capstone Research Paper
 OHS 6002 Occupational Diseases and Injuries
 OHS 6003 Regulatory Approaches and Compensation Systems

26 Regulations Governing the Degree of Master of Philosophy

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/become/graduate/apply/app_deadlines.php

Programs leading to the Degree of Master of Philosophy (M.Phil.) are offered at present in German Language and Literature, and in the Humanities. The degree of M.Phil. in the Humanities is administered by the Director of Studies and is in all respects separate from the M.Phil. in German Language and Literature.

26.1 Qualifications for Admission

1. Admission is limited and competitive. To be considered for admission an applicant shall hold a Bachelor's Degree or its equivalent from an institution recognized by the Senate and shall have a knowledge of the applicant's proposed field of specialization satisfactory to the relevant Department (and to the Director of Studies in the case of the program in Humanities), and to the Dean.
2. Preference will normally be given to applicants who hold an appropriate Honours Degree either from Memorial University of Newfoundland, or from another university whose Honours Degree is of comparable standing. Any other applicant who holds a Bachelor's Degree or its equivalent will be considered for admission provided that:
 - a. the applicant's undergraduate record after the first year shows an average of at least grade 'B' in courses in the proposed field of specialization;
 - b. the applicant's overall undergraduate record after the first year shows an average of at least grade 'B' in all courses taken; and
 - c. the Department (and Director of Studies in the case of the program in Humanities) satisfies the Dean that the applicant's work exhibits evidence of academic excellence.

Only in exceptional circumstances, and only on the recommendation of the relevant Department (and Director of Studies in the case of the program in Humanities) or the Board of Studies, will the Dean consider applicants who do not meet the requirements a. and b. Such applicants, however, must meet the requirement c.
3. An applicant may be required to demonstrate a satisfactory knowledge of the proposed field of study in an examination administered by the relevant Department (and Director of Studies in the case of the program in Humanities).
4. Applicants whose mother tongue is not English are reminded that a high degree of literacy in English is required of students at the University. In most cases instruction is in English, and examinations are to be written in English. (Language departments, however, give instruction in the pertinent language and often require examinations to be written in that language. In addition, other departments may permit and even require examinations to be written in a language other than English).
5. An applicant may be required to pass a qualifying examination.

Note: *Some Departments have particular regulations in addition to these, and applicants are advised to turn to the relevant parts of this Calendar and acquaint themselves with both the **General Regulations** and the regulations of the program in which they are interested.*

26.2 Program of Study

1. Every student shall complete program courses in one subject or in a combination of closely related subjects as recommended by the relevant Department (and Director of Studies in the case of the program in Humanities), and approved by the Dean. Students must consult their specific program of study for more detailed requirements.
2. A student may be required also to take additional credit hours in program courses, which must be recommended by the relevant Department (and Director of Studies in the case of the program in Humanities), and approved by the Dean.
3. Students registered in the program in Humanities will be required to maintain and submit for evaluation a program Journal (see **Program of Study, 3. of the Regulations for the Degree of Master of Philosophy in Humanities**).
4. No student while classified as a part-time student may take more than 6 credit hours in any one semester.
5. No student may take more than 9 credit hours in graduate courses in a single semester, nor any credit hours in undergraduate courses at the same time as 9 credit hours in graduate courses; in no case may graduate and undergraduate credit hours combined exceed 12 in any one semester.
6. The course program will culminate in a general comprehensive examination (see **Evaluation - General Comprehensive Examination** below).
7. Every student shall be assigned to a tutor recommended by the relevant Department (and Director of Studies in the case of the program in Humanities), and approved by the Dean.
8. The Dean may approve an application to transfer from the M.Phil. to the M.A. or M.G.S. only when a new integrated program, acceptable to the Dean, is submitted.

26.3 Period of Study

The period of study for the Master of Philosophy Degree shall not normally exceed three years, during which time the student shall spend at least two semesters in full-time attendance as a graduate student at this University.

26.4 Evaluation

See also **Evaluation under General Regulations**.

1. Students registered in undergraduate courses shall satisfy examination requirements in these courses.
2. The academic requirements for the Degree of Master of Philosophy shall be met when the student has successfully completed all course requirements of the program and has passed a general examination which consists of both written and oral parts. The Dean, on the recommendation of the relevant Department (and Director of Studies in the case of the program in Humanities), shall determine the times and places for general examinations; and, on the recommendation of the relevant Department (and Director of Studies in the case of the program in Humanities), shall appoint examiners, one of whom shall be from outside the Department(s) concerned. In the M.Phil. in Humanities, a program Journal is also required.

26.5 Evaluation - General Comprehensive Examination

1. Each student must pass a general comprehensive examination.
2. The examination committee shall be appointed by the Dean on the recommendation of the relevant Department (and Director of Studies in the case of the program in Humanities). The committee shall consist of either three or five members, at least one of whom must come from outside the Department(s) concerned. The student shall be informed of the names of the committee well before the examination.
3. The student and the tutor will normally agree when the student may sit the general comprehensive examination. However, the relevant Department (and Director of Studies in the case of the program in Humanities) must accede to the student's request to sit a comprehensive examination, except that in no circumstances may a student attempt the general comprehensive examination before the student's course program is completed.
4. The schedule for the examination shall be agreed by the student, the tutor, and the examining committee, and shall be communicated by the Dean.
5. The examination shall consist of a written part and an oral part. The time between the written and the oral parts shall normally be from one to four weeks.
6. The oral examination shall be from one to three hours in length, and shall be conducted by the examining committee, and shall be open only to the examination committee and to members of the relevant Department (and Director of Studies in the case of the program in Humanities).
7. A student must satisfy the examining committee in both parts of the examination to obtain a pass.
8. The successful completion of the comprehensive examination is the final academic requirement for the Master of Philosophy Degree.

26.6 Departmental Regulations

Every student in a graduate program shall comply with any additional program requirements and with the **General Regulations**.

26.7 German

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/languages

26.7.1 Program of Study

The degrees of Master of Arts and Master of Philosophy are offered in German Language and Literature and may be taken by full-time or part-time study.

1. In addition to the general requirements, students will be expected to have acquired a superior knowledge of the spoken and written language and may, depending on their academic background and field of specialization, be asked to take advanced undergraduate courses.
2. All students will complete at least 15 credit hours and a thesis for the M.A. and at least 30 credit hours for the M.Phil., and the entire program of study and research will normally be of two-years' duration.

26.7.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

6000 Topics in Modern Technology, Literature and Culture
 6001 The Other in German-language Literature and Culture
 6100 Topics in the History of the German Language
 6103 Bibliography and Research Methods
 6200 Issues in Early German Literature and Culture I
 6201 Topics in Early German Literature and Culture II
 6300 Topics in Early Modern German Literature and Culture I
 6301 Topics in Early Modern German Literature and Culture II
 6800 Topics in Modern German Literature and Culture I
 6801 Topics in Modern German Literature and Culture II
 6900 Topics in Contemporary German Literature and Culture I
 6901 Topics in Contemporary German Literature and Culture II
 6903 Propaganda and Censorship
 7000 Special Subject or Author I
 7001 Special Subject or Author II
 7002-7020 Special Topics in German Studies

26.8 Humanities

www.mun.ca/sgs/contacts/sgscontacts.php

The Master of Philosophy in Humanities has been designed for students from any discipline. It is directed to students who hold an Honours bachelor's Degree or its equivalent. The object of the M.Phil. in Humanities program is to provide students with an opportunity to see the historical and logical context of their own disciplinary points of view. The program is based on the interaction of a group of students of varying backgrounds and interests studying a common core of texts in a shared set of courses.

The program draws scholarly participation from faculty members in a range of academic disciplines within the School of Graduate Studies. The program is administered by a Director of Studies located within the Department of Gender Studies.

Master of Philosophy

In addition to meeting these regulations students must also meet the **General Regulations Governing the Degree of Master of Philosophy**.

This program is administered by a Director of Studies on behalf of the Faculty of Humanities and Social Sciences, and will draw scholarly participation chosen from those appropriately qualified faculty members wishing to participate, regardless of Department or Faculty affiliation.

26.8.1 Qualifications for Admission

1. Admission is limited and competitive. The number of students admitted to the program will be strictly limited to ensure small classes and maximum student-faculty contact. To be considered for admission an applicant will normally hold an Honours Bachelor's Degree (or equivalent) from an institution recognized by the Senate, and will have a breadth of knowledge in one or more of the Humanities disciplines satisfactory to the Director of Studies, and to the Dean.
2. Applicants who do not hold an Honours Degree (or equivalent) will be required to complete, prior to admission, a number of undergraduate courses, the nature and number of which will be determined on the basis of the applicants' undergraduate record by the Director of Studies. Students will be required to complete such designated pre-admission courses with a minimum overall average of 70%.

26.8.2 Administration

1. The program will be administered by the Director of Studies.
2. There will be a Director of Studies who will make recommendations to the Dean concerning admission, financial support for students, and all other matters pertaining to the program.
3. Responsibility for the allocation of teaching and the support of related research will be managed by agreement between the Deans of the appropriate Faculties, the Heads of Departments of participating faculty members, and the Director of Studies, in consultation with the Dean of Graduate Studies.

26.8.3 Program of Study

1. Every student shall normally read 18 credit hours in the 6 regulation courses listed below.
2. With permission of the Director of Studies, a student may elect to substitute up to two of these courses with courses from other graduate programs in this University. Attendance in other programs requires the permission of the departments involved. (See also School of Graduate Studies General Regulation **Program Requirements, Transfer of Course Credits** which allows for further transfer of credits already taken but not yet applied to a graduate degree.)
3. Every student shall be required to maintain and submit a program Journal which will be monitored and evaluated by the Director of Studies. The Journal will comprise the student's critical reflections arising out of analyses of designated key themes common to the several disciplines which constitute the program.

26.8.4 Comprehensive Examination

1. Each student must pass a general comprehensive examination.
2. The Examination Committee shall be appointed by the Dean of Graduate Studies on the recommendation of the Director of Studies. The Committee shall normally consist of three members. One member of the Committee is normally the tutor. The student shall be informed of the names of the committee well before the examination.
3. The student and the tutor will normally agree when the student may sit the general comprehensive examination. However, the Director of Studies must accede to the student's request to sit a comprehensive examination, except that in no circumstances may a student attempt the general comprehensive examination before the student's course program is completed.
4. The schedule for the examination shall be agreed by the student, the tutor, and the Examining Committee, and shall be

communicated by the Dean.

5. The examination shall consist of a written part and an oral part. The time between the written and the oral parts shall normally be from one to four weeks.
6. The program journal is an extended paper or series of linked papers which analyses and reflects critically on issues encountered by the student during the course of the program. Papers and/or projects completed during courses may be incorporated into the program journal, but shall not, of themselves, constitute the entire journal.
7. The oral examination shall be from one to three hours in length, shall be conducted by the Examining Committee, and shall be open only to the Examination Committee, and members of the Departments concerned. The oral examination shall be chaired by the Director of Studies.
8. A student must satisfy the Examining Committee in both parts of the examination to obtain a pass.
9. The successful completion of the comprehensive examination is the final academic requirement for the Master of Philosophy Degree.

26.8.5 Courses

6000 Speaking and Writing I
 6010 Readings in History I
 6015 Historical Contexts and Modern Users/Viewers (Harlow, England)
 6020 Readings in Western Literature I
 6030 Readings in Philosophy I
 6040 Readings in Science and Technology
 6041 Seminar in Humanities

27 Regulations Governing the Degree of Master of Public Health

www.mun.ca/sgs/contacts/sgscontacts.php
www.med.mun.ca
www.mun.ca/become/graduate/apply/app_deadlines.php

The degree of Master of Public Health (M.P.H.) is offered by the Faculty of Medicine, with specializations in **Population and Public Health** and **Nutrition and Dietetics**.

The Population and Public Health specialization delivers an advanced program of study for students from various academic fields who are interested in a professional degree that will prepare them for practical work in a variety of public health practice settings. The program is available for full-time and part-time study noting that full-time attendance is required during the Public Health Practicum (or Public Health Capstone Research Project) portion of the program. It is anticipated that full-time students will complete the program in 12 months in accordance with **Table 1 Master of Public Health Recommended Course Sequence for Full-Time Students in the Population and Public Health Specialization**.

The Nutrition and Dietetics specialization provides a research enriched program of study for full-time students who wish to pursue a career in dietetics or community nutrition. This specialization offers an opportunity for advanced academic study in the field of public health. Upon completion of the program, which includes a dietetics internship, students will be eligible to write the qualifying exam of Dietitians of Canada. It is anticipated that full-time students will complete the program in 24 months in accordance with **Table 2 Master of Public Health Recommended Course Sequence for Full-Time Students in the Nutrition and Dietetics Specialization**.

Graduate students of the Division of Community Health and Humanities may be required to participate in education experiences which occur outside of the St. John's metropolitan area. Students may be responsible for their own associated transportation and accommodation.

The **General Regulations** of the School of Graduate Studies and the Degree Regulations outlined below will apply.

27.1 Qualifications for Admission

Admission to the Master of Public Health is limited and competitive. The regulations and procedures for admission are as given under the **General Regulations** of the School of Graduate Studies governing Master's degrees. Students are expected to have successfully completed at least one introductory university-level statistics course. In addition, to be considered for admission to the Nutrition and Dietetics specialization applicants must have successfully completed an undergraduate dietetics program equivalent to one which has been accredited through the Canadian national process overseen by the Partnership for Dietetic Education and Practice.

27.2 Program of Study

27.2.1 Population and Public Health

1. Minimum requirements for the M.P.H. degree in Population and Public Health will include the successful completion of 42 credit hours as follows:
 - a. Eight core courses: Biostatistics I (MED 6200), Epidemiology I (MED 6270), Policy and Decision Making (MED 6288), Disease and Injury Prevention (MED 6721), Environmental Health (MED 6722), Health Promotion (MED 6723), Public Health Leadership and Management (MED 6725), and MED 6726 Program Development In Public Health.
 - b. Six additional credit hours in elective courses chosen from the **Courses** listing below, or other courses as approved by the M.P.H. program coordinator.
 - c. The Public Health Seminar Series courses (MED 6700 - 6701).
 - d. Either, the Public Health Practicum (MED 6710) or the Public Health Capstone Research Project (MED 6711) as determined by the Graduate Program Committee depending on the professional background and experience of the student.

The Public Health Practicum is a full-time practice experience conducted in a work setting and following the guidelines set forth by the Public Health Agency of Canada (PHAC) at www.phac-aspc.gc.ca/index-eng.php.

All course work must be completed prior to the initiation of either the Public Health Practicum or the Public Health Capstone Research Project.

Table 1 Master of Public Health Recommended Course Sequence for Full-Time Students in the Population and Public Health Specialization

Semester	Courses
Fall	MED 6270 Epidemiology I MED 6288 Policy and Decision Making MED 6700 Public Health Seminar Series I MED 6725 Public Health Leadership and Management MED 6726 Program Development In Public Health. MED Elective Course
Winter	MED 6200 Biostatistics I MED 6701 Public Health Seminar Series II MED 6721 Disease and Injury Prevention MED 6722 Environmental Health MED 6723 Health Promotion MED Elective Course
Spring	MED 6710 Public Health Practicum, or MED 6711 Public Health Capstone Project

27.2.2 Nutrition and Dietetics

1. Minimum requirements for the M.P.H. degree in Nutrition and Dietetics will include the successful completion of the following:
 - a. Six core courses: Policy and Decision Making (MED 6288), Epidemiology I (MED 6270), Community Health Research Methods (MED 6280), Biostatistics I (MED 6200), Community Nutrition (MED 6731), Professional Practice (MED 6730)
 - b. The Public Health Seminar Series courses (MED 6700, 6701)
 - c. The Dietetics Research Project (MED 671A/B)
 - d. The Dietetics Internship (MED 6733 - 6736). The Dietetics Internship is a practice experience conducted in a work setting and following the guidelines set forth by the Dietitians of Canada.

Dietetics Internship I & II (MED 6733 and 6734) are non-credit, mandatory, part-time internship components completed during the first and second academic semesters of the program in accordance with **Table 2 Master of Public Health Recommended Course Sequence for Full-Time Students in the Nutrition and Dietetics Specialization**. A grade of NC (No credit) will be awarded for these two internship components.

Building on the components of Dietetics Internship I & II, Dietetics Internship III & IV (MED 6735 & 6736) are full-time internship blocks each of which will normally extend beyond the regular semester timeframe. Evaluation of the internship blocks will be on a PASS/FAIL basis.

All core courses and seminars must be completed prior to the initiation of the Dietetics Internship III (MED 6735) and/or the Dietetics Research Project (MED 671A/B).

Table 2 Master of Public Health Recommended Course Sequence for Full-Time Students in the Nutrition and Dietetics Specialization

Semester	Courses
Fall	6270 Epidemiology I 6280 Community Health Research Methods 6288 Policy and Decision Making 6700 Public Health Seminar Series I 6733 Dietetics Internship I
Winter	6200 Biostatistics I 6731 Community Nutrition 6730 Professional Practice 6701 Public Health Seminar Series II 6734 Dietetics Internship II
Spring	671A Dietetics Research Project
Fall	671B Dietetics Research Project
Winter	6735 Dietetics Internship III
Spring	6736 Dietetics Internship IV

27.3 Courses

A selection of the following graduate courses shall be offered to meet the requirements of students, as far as the resources of the Faculty allow.

6102 Critical Theory in Health and Society
6200 Biostatistics I
6220 Introduction to Community Health
6247 Chronic Disease Epidemiology
6250 Basic Clinical Epidemiology
6270 Epidemiology I
6275 Epidemiology II
6280 Community Health Research Methods
6282 Canadian Health Care System
6288 Policy and Decision Making
6290 Determinants of Health: Healthy Public Policy

6293 Knowledge Transfer and Research Uptake
 6294 Advanced Qualitative Methods
 6390 Human Population Genetics
 6700 Public Health Seminar Series I (1 credit hour)
 6701 Public Health Seminar Series II (1 credit hour)
 671A/B Dietetics Research Project (6 credit hours)
 6710 Public Health Practicum (10 credit hours)
 6711 Public Health Capstone Project (10 credit hours)
 6720 Public Health Surveillance
 6721 Disease and Injury Prevention
 6722 Environmental Health
 6723 Health Promotion
 6724 Communicable Disease Prevention and Control
 6725 Public Health Leadership and Management
 6726 Program Development in Public Health
 6730 Professional Practice
 6731 Community Nutrition
 6733 Dietetics Internship I (non-credit component)
 6734 Dietetics Internship II (non-credit component)
 6735 Dietetics Internship III (17 week Internship block - 10 credit hours)
 6736 Dietetics Internship IV (16 week Internship block - 10 credit hours)

28 Regulations Governing the Degree of Master of Science

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/science

www.mun.ca/become/graduate/apply/app_deadlines.php

The degree of Master of Science (M.Sc.) is offered at present in Aquaculture, Biochemistry, Biology, Boreal Ecosystems and Agricultural Sciences, Chemistry, Cognitive and Behavioural Ecology, Computer Science, Earth Sciences (Geology), Earth Sciences (Geophysics), Environmental Science, Experimental Psychology, Fisheries Science, Food Science, Geography, Marine Biology, Mathematics, Physical Oceanography, Physics, Scientific Computing, Scientific Computing (Co-operative), and Statistics. Interdisciplinary studies are encouraged; applicants should consult the academic unit concerned.

28.1 Qualifications for Admission

- Admission is limited and competitive. To be considered for admission an applicant will normally hold at least a high second class Honours Degree, or an M.D. Degree, or the equivalent of either, both in achievement and depth of study, from an institution recognized by the Senate, and shall have knowledge of the proposed field of specialization satisfactory to the Dean.
- Any other applicant may be considered for admission provided that:
 - the applicant's undergraduate record after the first year shows an average of at least Grade 'B' in courses in the proposed field of specialization.
 - the applicant's overall undergraduate record after the first year shows an average of at least Grade 'B' in all courses taken.
 In addition, an applicant may be required to demonstrate a satisfactory knowledge of the proposed field of study in an examination administered by the academic unit concerned.
- Only in exceptional circumstances, and only on the recommendation of the academic unit concerned, will the Dean consider applicants who do not meet these requirements of Clause 2.
- Applicants who do not possess the prerequisite academic qualifications should consult the appropriate academic unit about a program of further undergraduate courses. Such a program will be intended to raise their qualifications to a level considered academically equivalent to Honours. Such courses may not be used to fulfill the regulation course requirements of the M.Sc. Degree.
- A high degree of literacy in English is required of all graduate students in the University.

Note: Some Departments have specific regulations in addition to those outlined above, and prospective applicants are advised to turn to the relevant part of this Calendar and acquaint themselves with the regulations of the Department or appropriate academic unit in which they are interested.

28.2 Program of Study and Research

- The program of study for the Master of Science Degree shall consist of the successful completion of a program of courses and, in accordance with the specific program regulations, either of a thesis embodying original research or of a project and report.
- Every student shall read at least 6 credit hours in graduate program courses in one subject or in closely related subjects, and such other courses as may be required in an individual program. Undergraduate courses may, if necessary, be included as additional courses.
- Where Departmental regulations require more than the minimum number of credit hours, the Dean, on the recommendation of the appropriate academic unit, may waive in part the credit hour requirements for a Master's Degree, provided that no student may take less than the 6 required credit hours in graduate program courses.
- Students may, with the approval of the Dean, augment their studies with 6 credit hours in other courses of their choice. The grading system in non-program courses shall be that appropriate to the particular course, and the final grades in these courses will be recorded on the student's transcripts. However, passing grades are not required in these non-program courses in order to continue in graduate studies or obtain a Master's Degree. (See General Regulation **Evaluation, Evaluation of Graduate Students**).
- Every student shall submit a thesis or report on an approved subject in which systematic research has been conducted under the direction of a Supervisor recommended by the academic unit concerned and approved by the Dean. The student may be required to take an oral examination.
- The program of courses, the thesis or report topic and the Supervisor, and all changes in these, must be approved by the Dean.

28.3 Evaluation

- In order to continue in the School of Graduate Studies and in order to qualify for a Master's Degree, a student shall obtain an 'A' or 'B' grade in each program course. (See General Regulation **Evaluation, Evaluation of Graduate Students**).
- When it has been determined, on the basis of consultation with the student, the instructors in graduate courses, and the thesis or

report Supervisor, that a student's work has fallen below a satisfactory level, the Supervisor or the Head of the appropriate academic unit may recommend to the Dean that such a student be required to withdraw from the program.

28.4 Thesis

See General Regulation **Theses and Reports**.

Note: *Every student in graduate studies shall comply with the **General Regulations**, the Degree Regulations, and any additional requirements of the appropriate academic unit.*

28.5 Sustainable Aquaculture

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/science

www.mun.ca/become/graduate/apply/app_deadlines.php

The program of study leading to the Master of Science in Sustainable Aquaculture is designed to instruct students in research using scientific principles derived from a wide range of disciplines including Behaviour, Biochemistry, Biology, Ecology, Food Science, Genomics, Nutrition, and Physiology. It is an interdisciplinary program and often involves several fields of study. Research projects may include field and/or laboratory studies of one or more species of marine or freshwater flora and/or fauna. The Aquaculture group consists of faculty members from the Fisheries and Marine Institute of Memorial University of Newfoundland and the Departments of Biology, Biochemistry, and Ocean Sciences of Memorial University of Newfoundland. Research scientists at other institutions, e.g., Fisheries and Oceans Canada, complement the group in offering advice, facilities, and expertise to students in the program.

The Sustainable Aquaculture Administrative Committee is responsible for the program. This Committee is composed of seven members appointed by the Dean of Science including two to three members from the Department of Ocean Sciences, two to three members from the Fisheries and Marine Institute of Memorial University of Newfoundland, and two members from appropriate academic units at Memorial University of Newfoundland. In addition, the Heads of the Departments of Biochemistry, Biology, and Ocean Sciences, and the Head of the School of Fisheries of the Fisheries and Marine Institute of Memorial University of Newfoundland are ex-officio members. The Committee makes recommendations to the Dean of the School of Graduate Studies concerning the academic requirements of the program: admission, course programs of individual students, financial support, composition of supervisory committees, and theses examiners. The Chair of the Committee will also ensure that a supervisory report form for each student in the program is submitted annually to the Dean.

28.5.1 Qualifications for Admission

To be considered for admission to the Master of Science in Sustainable Aquaculture, an applicant shall normally hold one of the following: at least a second class Honours degree, or an equivalent both in achievement and depth of study, from an institution recognized by the Senate, or successful completion of the Advanced Diploma in Sustainable Aquaculture offered by the Fisheries and Marine Institute of Memorial University of Newfoundland, with academic standing deemed appropriate by the Committee.

28.5.2 Program of Study

1. The Master of Science Degree requires the successful completion of a program of courses and of a thesis embodying original research.
2. All students will be required to complete 6 credit hours in graduate courses which will normally include at least one of the following: AQUA 6000 - Shellfish Culture and Enhancement, AQUA 6100 - Finfish Aquaculture, or AQUA 6200 - Aquaculture and the Environment.
3. Students who do not hold the Advanced Diploma in Sustainable Aquaculture may be required to successfully complete a selection of its component courses.
4. Further courses may be required depending on the background of the individual student.
5. Before the thesis is submitted, the student shall present an open seminar on the topic of investigation to the appropriate academic units, as recommended by the Administrative Committee. Any serious deficiencies in the thesis noticed at this stage should be carefully considered, in consultation with the Supervisor, for rectification.
6. The student will be required to comply with all other regulations governing the graduate Degree of Master of Science.

28.5.3 Courses

A selection of the following graduate courses will be offered to meet the requirements of students as far as the resources of the Department will allow.

Aquaculture

6000 Shellfish Culture and Enhancement

6100 Finfish Aquaculture

6200 Aquaculture and the Environment

6201-6209 Special Topics in Aquaculture (*prerequisite: Permission of Chair of Program*)

Biochemistry

6630 Marine Biochemistry

Biology

6000 Research Topics in Microbiology

6710 Marine Benthic Biology

7101 Topics in Marine Biology

7220 Quantitative Methods in Biology

7551 Fisheries Resource Management

Cognitive and Behavioural Ecology

6351 Behavioural Ecology and Sociobiology

Engineering

9603 Environmental Sampling and Pollutant Analysis (*cross-listed as Environmental Science 6005*)

9605 Advanced Waste Water Treatment

9622 Environmental Statistics

Environmental Science

6000 Environmental Science and Technology
6001 Earth and Ocean Systems
6002 Environmental Chemistry and Toxicology
6003 Applied Ecology
6007 Environmental Risk Assessment (*same as Engineering 9609*)

Geography

6250 Conservation of Natural Resources
6410 Climatology

Marine Studies (Fisheries Resource Management) Program Courses

6001 Fisheries Ecology
6005 Overview of World Fisheries
6009 Current Issues for Sustainable Fisheries

Ocean Sciences

7100 Biological Oceanography
7200 Adaptations to the Marine Environment
7300 Plankton Dynamics
7400 Fisheries Resource Management
7500 Immunology and Diseases of Aquatic Organisms

Physics

6316 Ocean Data Analysis
6320 Ocean Turbulence and Mixing

Technology Management (Aquaculture Technology Option) Program Courses

6056 Management of International Development
6071 Management of Aquaculture Technology
6072 Animal Husbandry Management
6073 Aquaculture Environmental Management
6074 Aquaculture Site and Operational Assessment
6075 Aquaculture Engineering Technology Management

Note: Consult the Program for a list of titles and information regarding availability.

28.6 Biochemistry

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/biochem
www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Science (M.Sc.) is offered in Biochemistry or Food Science to full-time and part-time students.

28.6.1 Admission

The admission requirements for the graduate programs in Biochemistry and Food Science are as given under **Regulations Governing Master of Science Degrees**.

28.6.2 Program of Study

1. The program of a student for the M.Sc. Degree shall be the responsibility of the supervisory committee, composed of the Supervisor and at least two other faculty members recommended with the concurrence of the Supervisor by the Head of the Department or delegate.
2. All students must enrol in Biochemistry 6999 (Seminars in Biochemistry and Food Science), and must complete Biochemistry 7000 (Graduate Skills) plus a minimum of 6 credit hours of graduate courses with a minimum 'B' grade. Depending on the background and/or area of specialization, a student's program may include additional courses taken for credit in Biochemistry, Food Science, or related subjects.
3. It is the responsibility of the student to arrange regular meetings with the student's supervisory committee. A semi-annual report, prepared by the Supervisor and signed by all members of the supervisory committee, is required to be given to the Head of the Department or delegate.
4. Master of Science students are required to complete a M.Sc. oral defence of their thesis research. The defence will be examined by the Supervisory Committee (at least three voting members) and chaired by the non-voting Deputy Head (Graduate), or delegate. The defence and first round of questions will be open to the public; the second round of questions will be in camera. Outcomes of the defence will be:
 - a. "Proceed" - proceed to submission of thesis to the School of Graduate Studies for examination; or
 - b. "Do not proceed" - the supervisory committee will convene to make a final recommendation on the student's overall program as per the **General Regulations** of the School of Graduate Studies **Supervisory Reports** and **Termination of a Graduate Program**.
5. The M.Sc. Degree program will conclude with a thesis examination as prescribed in the **Regulations Governing the Degree of Master of Science**.

28.6.3 Courses

A series of advanced courses in the areas outlined below will be offered. Other than Biochemistry 6999 and Biochemistry 7000, normally only one course will be offered per semester.

6000 Advanced Topics in Lipid and Lipoprotein Metabolism
6001-6009 Special Topics in Biochemistry
6010-6019 Special Topics in Nutrition and Metabolism
6020-6029 Special Topics in Food Science
6400 Control of Intermediary Metabolism
6460 Structural Biochemistry

6520 Nutritional Biochemistry
 6530 Food Biochemistry
 6590 Cellular, Molecular and Developmental Biology (*credit restricted with Biology 6590 and Medicine 6590*)
 6630 Marine Biochemistry
 6680 Processing and Quality of Foods
 6999 Seminars in Biochemistry and Food Science
 7000 Graduate Skills

28.7 Biology

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/biology
www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Science is offered in Biology to full-time and part-time students. Students interested in animal behaviour should also consult the section in the Calendar describing the **Master of Science in Cognitive and Behavioural Ecology program**. In addition, a Master of Science Degree is offered in **Aquaculture** and in **Marine Biology**. See appropriate sections of this Calendar.

28.7.1 Program of Study

1. The program of a student shall be the responsibility of a Supervisory Committee composed of the Supervisor and at least two other appropriate members recommended to the Dean by the Head (or delegate) of the Department with the concurrence of the Supervisor.
2. The Supervisory Committee shall interview the student normally within a month of first registration, to discuss the student's program and to explore any areas of weakness in the student's biological knowledge, especially where these relate to the intended areas of research.
3. A student will be required to take a minimum of 6 credit hours and Biology 7000 (Graduate Core Seminar).
4. It is the function of a Supervisory Committee to have regular meetings, at least annually, with its graduate student. A meeting report, signed by all members of the Supervisory Committee and student, must be given to the Department. A copy will be sent to the graduate student and to the Dean of Graduate Studies.
5. The student will present a tentative outline of the proposed research to the Supervisory Committee, with a copy to the Department by the end of the second semester, and preferably prior to commencement of the research.
6. The student will present a research seminar to the Department, normally by the end of the second semester following admission, to describe the research topic being investigated and the methodologies to be employed. This seminar provides an opportunity for the student to receive constructive input from the broad biological community.
7. The student must present a thesis seminar of 30-40 minutes duration to the Department prior to submission of the thesis to the School of Graduate Studies. The student will be questioned by a panel approved by the Departmental Graduate Studies Committee, in consultation with the student's Supervisory Committee. All others in attendance will be invited to question the student before adjournment. Deficiencies noted at this stage should be carefully considered by the student and the Supervisory Committee prior to submission of the thesis for final examination.
 Under exceptional circumstances, this requirement may be waived by the Head of the Department (or delegate).
8. Each Master's student shall spend at least one semester in residence as a full-time student within the Department during the program. It is recommended that this semester be at the beginning of the program.
 Under exceptional circumstances, this requirement may be waived by the Head of the Department (or delegate).
9. If students, in the opinion of the Supervisor, Committee and Department, are not making satisfactory progress, they will be required to withdraw from the program.
10. Theses shall conform to **Theses and Reports** of the **General Regulations** of the School of Graduate Studies and to the regulations in the Departmental Guidelines.

28.7.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

6000 Research Topics in Microbiology
 6052 Plant Pathology (*credit cannot be obtained if already received for Biology 4052*)
 6131 Models in Biology (*credit cannot be obtained if already received for Biology 4607*)
 6351 Behavioural Ecology and Sociobiology (*cross-listed as Psychology 6351*) *credit cannot be obtained if already received for Biology 4701*
 6590 Molecular Biology I (*cross-listed as Medicine 6590 and credit-restricted with Biochemistry 6590*) *prerequisites: Biology 4241 (or equivalent)*
 6591 Molecular Biology II (*cross-listed as Medicine 6591 and credit-restricted with the former Biochemistry 6591*) *prerequisites: Biology 4241 (or equivalent)*
 6592 Bacterial Genetics (*credit-restricted with the former Biochemistry 6592*) *prerequisite: Biology 4241 (or equivalent)*
 6593 Selected Readings in Molecular Biology (*credit-restricted with the former Biochemistry 6593*) *prerequisites or Co-requisites: one of Biology, Biochemistry or Medicine 6590, and one of Biology 6591, Medicine 6591, or the former Biochemistry 6591 (or equivalent)*
 6710 Marine Benthic Biology
 7000 Graduate Core Seminar (*cross-listed as Ocean Science 7000*)
 7101 Topics in Marine Biology
 7201 Topics in Cellular and Molecular Biology and Physiology
 7220 Quantitative Methods in Biology (*credit cannot be obtained if already received for Biology 4605*)
 7300 Ornithology (*credit cannot be obtained if already received for Biology 4620*)
 7301 Topics in Ecology and Conservation Biology
 7530 The Molecular Biology of Development
 7535 Research Methods in Marine Science
 7920-7960 Special Topics in Biology (CMSC Biology 7931)
 7931 Research Methods in Genetic Biotechnology (Biology 7931 may be delivered in an accelerated format outside of the regular semester timeframe)

28.8 Chemistry

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/science

www.mun.ca/chem

www.mun.ca/become/graduate/apply/app_deadlines.php

28.8.1 Program of Study

- The Degree of Master of Science in Chemistry is offered as full-time or part-time study.
 - Preference for admission will be given to students with a B.Sc. (Honours) Degree in Chemistry from a recognized university.
 - Students holding a B.Sc. Degree in Chemistry from a university of recognized standing with a minimum overall average of 65% and minimum average of 65% in all Chemistry courses taken after the first year will be considered for admission to the Chemistry M.Sc. program. Students not admissible under 1.a. may, on the advice of the Supervisory Committee, be required to pass qualifying exams and/or supplementary undergraduate courses with a minimum 'B' grade.
 - Students with a first class B.Sc. in an area other than Chemistry will also be considered for admission. Students not acceptable under 1.a. or 1.b. who have a strong background in an appropriate area of specialization may, on the advice of the Supervisory Committee, be required to pass qualifying exams and/or supplementary undergraduate courses with a minimum 'B' grade.
 - Upon recommendation of their supervisor, students will write American Chemical Society (ACS) placement test(s) in the first two weeks of their initial semester of registration in order to determine an appropriate course program.
- Students will be assigned a Supervisory Committee consisting of the Supervisor and at least two other appropriate faculty members appointed by the Dean on the recommendation of the Chemistry Deputy Head (Graduate Studies).
- The program of a student must be arranged by the Supervisor before the second semester of registration in consultation with the Supervisory Committee and the student. It is the responsibility of the Supervisory Committee to meet at least annually with the student, to provide guidance at all stages of the student's program, and, in consultation with the student, to prepare written annual progress reports for submission to the Dean of Graduate Studies.
- Students are normally required to successfully complete Chemistry 6001 (Master's Seminar) and a minimum of 6 credit hours of graduate Chemistry courses with a minimum 'B' grade. Additional program courses may be assigned by the Supervisory Committee.
- Students are required to attend Departmental seminars.
- Students must submit a thesis deemed acceptable to two examiners as described under **Regulations Governing Master of Science Degrees**. An oral defence is not required.

28.8.2 Courses

6001 Master's Seminar

6004 Project Seminar

6110 Analytical Chemistry II

6150 Advanced Spectroscopic Techniques

6151 Analytical Separations and Organic Mass Spectrometry

6152 Electroanalytical Techniques

6153 Techniques in Sampling, Trace Analysis and Chemometrics

6154 Business Management and Good Laboratory Practice

6155 Computers in Instrumental Analysis and Basic Electronics (*same as Med 6070*)

6156 Analytical Method Development and Sampling

6160 Laboratory Projects in Sampling, Electroanalysis and Trace Analysis

6161 Laboratory Projects in Analytical Separations and Spectroscopic Techniques

6190-9 Selected Topics in Analytical Chemistry

6201 Bioinorganic Chemistry

6202 Main Group Chemistry

6204 Mechanisms in Catalysis

6205 Photochemistry of Transition Metal Complexes

6206 Green Chemistry

6210 Organometallic Chemistry

6290-9 Selected Topics in Inorganic Chemistry

6300 Quantum Chemistry I

6301 Quantum Chemistry II

6302 Molecular Spectroscopy

6304 Computational Chemistry I

6310 Electronic Structure Theory

6323 Chemical Thermodynamics I

6324 Chemical Thermodynamics II

6340 Biophysical Chemistry

6350 Electrochemical Kinetics

6360 Solid State Chemistry

6370 Nanoscale Phenomena

6380 Adsorption on Surfaces

6381 Surface and Interface Science

6382-9 Selected Topics in Physical Chemistry

6390-8 Selected Topics in Physical Chemistry

6399 Chemical Kinetics and Dynamics

6401 Organic Spectroscopic Analysis I

6402 Organic Spectroscopic Analysis II

6421 Natural Products Chemistry

6460 Organic Synthesis

6470 Physical Organic Chemistry

6490-9 Selected Topics in Organic Chemistry

6590-9 Selected Topics in Theoretical and Computational Chemistry

6600 Applications of Inorganic and Organometallic Chemistry to Toxicology

6620 Environmental Chemistry

28.9 Cognitive and Behavioural Ecology

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/become/graduate/apply/app_deadlines.php

28.9.1 General Information

1. The Cognitive and Behavioural Ecology Program is interdisciplinary and designed to train students in research that integrates cognitive and behavioural studies at the ecological level. Molecular, developmental, and evolutionary aspects of cognition and behaviour are also studied. Supervisors include faculty from the Departments of Biology, Ocean Sciences, Psychology, the Faculty of Medicine and the Environmental Science Program at Grenfell Campus, as well as adjunct faculty from the Canadian Wildlife Service, Department of Fisheries and Oceans, the Newfoundland and Labrador Forestry and Wildlife Divisions and Parks Canada. The Departments of Biology and Psychology jointly offer the Master of Science and the Doctor of Philosophy degrees in Cognitive and Behavioural Ecology.
2. The Administrative Committee is responsible for the Program. Committee members are appointed by the Dean of Science, on the recommendation of the Chair of the Committee and of the Heads of Biology and Psychology. The Committee Chair is elected by the committee members and appointed by the Dean of Science. The Committee makes recommendations to the Dean of Graduate Studies concerning admissions and academic requirements. In consultation with supervisors, recommendations are made concerning course programs, financial support, thesis committees, comprehensive and thesis topics, examiners and students' annual progress. Upon program completion, the Committee certifies that all requirements for the appropriate degree have been met. The Department of the Supervisor ensures that adequate facilities are provided for each student. Students in the Cognitive and Behavioural Ecology Program are considered for teaching assistantships in the Psychology or Biology Departments.

28.9.2 Program of Study

1. Students normally take three courses (9 credit hours) in the first year. Students will be required to take Behavioural Ecology and Sociobiology (CABE 6351), Field and Lab Methods in Animal Behaviour and Behavioural Ecology (CABE 7000) and one elective, normally Quantitative Methods in Biology (BIOL 7220) or Advanced Statistics in Psychology (6000), in consultation with the Supervisor.
2. Upon completion but before submission of the thesis, the student is required to give a formal thesis presentation.
3. The student will be required to comply with all other regulations governing the graduate Degree of Master of Science.

Table of Credit Restrictions - Master of Science in Cognitive and Behavioural Ecology

(Credit may be obtained for only one course from each of the pairs of courses listed in this table.)

Present Course	Former Course
CABE 6240	Biopsychology 6240
CABE 6350	Biopsychology 6350
CABE 6351	Biopsychology 6351
CABE 7000	Biopsychology 7000

28.9.3 Courses

Biology 7220 Quantitative Methods in Biology
 Cognitive and Behavioural Ecology 6240 Special Topics
 Cognitive and Behavioural Ecology 6350 Behavioural Ontogeny
 Cognitive and Behavioural Ecology 6351 Behavioural Ecology and Sociobiology
 Cognitive and Behavioural Ecology 7000 Field and Lab Methods in Animal Behaviour and Behavioural Ecology
 Psychology 6000 Advanced Statistics in Psychology

28.10 Computer Science

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/computerscience
www.mun.ca/become/graduate/apply/app_deadlines.php

The degrees of Master of Science and Doctor of Philosophy are offered in Computer Science.

28.10.1 Admission Requirements

Admission into a Master's program in Computer Science is restricted to students holding at least a Bachelor degree (major in Computer Science or Computer Engineering) with a minimum average of 75% overall. When circumstances warrant, this requirement may be waived on the recommendation of the Head of the Department. Applicants should also refer to the **Qualifications for Admission** given under the **Regulations Governing the Degree of Master of Science** within the School of Graduate Studies section of the current Calendar. International applicants are strongly encouraged to submit results of the (general) Graduate Record Examination (GRE) test.

28.10.2 Programs

28.10.2.1 Option 1 - Thesis Route

1. Students are required to complete a minimum of 15 credit hours in graduate program courses, 9 credit hours which are Computer Science courses as follows: COMP 690A/B and 6 additional courses in Computer Science (excluding COMP 601W and COMP 6999).
2. Full-time students are expected to complete their course work within their first year of studies. Part-time students are expected to complete their course work by the end of the seventh semester in their program.
3. Students must participate in the Research Forum at least once during their program. The Student Research Forum is organized by the Department of Computer Science and takes place in the Winter term of each academic year.

4. Each student is required to submit an acceptable thesis. The thesis project may involve a theoretical investigation and/or the development of an original, practical system. Each student is required to present a tentative outline of the student's proposed research to the Supervisor, with a copy to the Department Committee on Graduate Studies, by the end of the student's third semester in the program (sixth semester for part-time students). A fifteen minute oral presentation of the proposal is to be scheduled and given within four weeks of the submission date.
5. Prior to submission of a thesis, normally in the last semester of the program, students are required to present a seminar on the thesis topic, methods employed, and research results.

28.10.2.2 Option 2 - Work Term Route

1. Students are required to complete a minimum of 24 credit hours in graduate program courses, of which at least 18 credit hours must be in Computer Science, whereas the remaining 6 should be related to computer science, and included in the list of elective courses maintained by the Graduate Studies Committee, or previously approved by the Graduate Studies Committee, or its Chair.
2. Within this credit requirement, a student must take the following courses:
COMP 6999 (Master's Project)
One course in Software Engineering (COMP 6905)
One course in Algorithms (COMP 6901 or COMP 6902)
3. Additionally students are required to complete one co-operative education work term (COMP 601W). The work term is a full-time, paid work experience with one employer and either a four or eight months in duration. The work term should start in the third semester of the program. The work term can be deferred to the fourth semester, but normally only in the event of an unsuccessful job search for the third semester.
4. The dates for starting and finishing each work term are shown at www.mun.ca/coop.
5. Students must successfully complete at least 12 credit hours (four courses) prior to beginning their work term. Students must have at least one required course remaining after their work term.
6. Students will conduct job searches with an Academic Staff Member in Co-operative Education in cooperation with the Department of Computer Science. It is the student's responsibility to seek and obtain a work term placement and to communicate with all parties both within the University and beyond in a professional manner. Work term placements cannot be guaranteed by the Department of Computer Science or an Academic Staff Member in Co-operative Education, although every effort will be made to assist students in their job search. Work term placements obtained outside the job competition must be confirmed by letter from the employer and approved by the Head of Computer Science and by an Academic Staff Member in Co-operative Education on or before the first day of the work term. Work term placements may be outside Newfoundland and Labrador.
7. Each work term placement will be supervised by the student's program Supervisor, the on-site Supervisor assigned by the employer and the Academic Staff Member in Co-operative Education. The overall evaluation of the work term is the responsibility of the program Supervisor, on-site Supervisor and the Academic Staff Member in Co-operative Education. The work term shall consist of two components:
 - a. On-the-job Student Performance as evaluated by the on-site Supervisor and the Academic Staff Member in Co-operative Education, in consultation with the program Supervisor.
 - b. A Work Report graded by the program Supervisor in consultation with the on-site Supervisor.
8. Evaluation of the work term will result in the assignment of one of the following final grades:
 - a. Pass with Distinction: indicates outstanding performance in both the work report and work performance.
 - b. Pass: Indicates that PERFORMANCE MEETS EXPECTATIONS in both the work report and work performance.
 - c. Fail: Indicates FAILING PERFORMANCE in the work report and/or the work performance. If a failing grade is assigned, the student's Masters program will be terminated.
9. Prior to graduation and after successfully completing COMP 6999 (Master's Project), students are required to present a seminar on their projects.

28.10.3 Other Regulations

1. Students from either **Option 1 - Thesis Route** or **Option 2 - Course/Project Route with Work Term** may request to transfer between both options once during their studies, after at least two semesters in the program.
2. All students are expected to take an active part in seminars and other aspects of the academic life of the Department of Computer Science.
3. Full-time students are expected to complete all program requirements in two years. Part-time students are expected to complete all program requirements in four years.

28.10.4 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow. Normally, students will be expected to complete their course work during the fall and winter semesters. Courses might not be offered in the spring semester.

601W Work Term
 6758-6769 Special Topics in Computer Applications
 6770-6790 Special Topics in Computer Science
 690A/B Research Methods in Computer Science
 6901 Applied Algorithms (*credit may be obtained for only one of 6901 and 6783*)
 6902 Computational Complexity (*credit may be obtained for only one of 6902 and 6743*)
 6903 Concurrent Computing
 6904 Advanced Computer Architecture (*credit may be obtained for only one of 6904 and 6722*)
 6905 Software Engineering (*credit may only be obtained for one of 6905 or 6713*)
 6906 Numerical Methods (*credit may only be obtained for one of 6906 or 6731*)
 6907 Data Mining Techniques and Methodologies (*credit may be obtained for only one of 6907 and 6762*)
 6908 Database Technology and Applications (*credit may be obtained for only one of 6908 and 6751*)
 6909 Fundamentals of Computer Graphics (*credit may be obtained for only one of 6909 or 6752*)
 6910 Services Computing, Semantic Web and Cloud Computing
 6911 Bio-inspired Computing
 6912 Autonomous Robotics (*credit may be obtained for only one of 6912 and 6778*)

6913 Bioinformatics
 6914 3D Modelling and Rendering
 6915 Machine Learning
 6916 Security and Privacy
 6918 Digital Image Processing (*credit may be obtained for only one of 6918 or 6756*)
 6921 Syntax and Semantics of Programming Languages (*credit may be obtained for only one of 6921 or 6711*)
 6922 Compiling Methods (*credit may be obtained for only one of 6922 and 6712*)
 6924 Formal Grammars, Automata and Languages
 6925 Advanced Operating Systems
 6926 Performance Evaluation of Computer Systems (*credit may be obtained for only one of 6726 and 6926*)
 6928 Knowledge-Based Systems (*credit may be obtained for only one of 6928 or 6755*)
 6929 Advanced Computational Geometry (*credit may be obtained for only one of 6929 or 6745*)
 6930 Theory of Databases (*credit may be obtained for only one of 6930 or 6742*)
 6931 Matrix Computations and Applications (*credit may be obtained for only one of 6931, 6732, and CMSC 6910*) (*cross-listed with CMSC 6910*)
 6932 Matrix Computations in Control (*credit may be obtained for only one of 6932 or 6738*)
 6933 Nonlinear and Linear Optimization (*cross-listed with Mathematics 6202*)
 6934 Introduction to Data Visualization (*credit may be obtained for only one of 6934 or 6774*)
 6980-6998 Special Topics in Computer Science
 6999 Master's Project

28.11 Earth Sciences

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/earthsciences
www.mun.ca/become/graduate/apply/app_deadlines.php

The degrees of Master of Science and Doctor of Philosophy are offered in Earth Sciences (Geology) and Earth Sciences (Geophysics) by full-time and part-time study.

28.11.1 Program of Study

1. Admission into a Master's Degree program in Earth Sciences (Geology) and Earth Sciences (Geophysics) is restricted to students holding at least a B.Sc. Degree with second class Honours. When circumstances warrant, this requirement may be waived by the School of Graduate Studies on the recommendation of the Head of the Department.
2. Each student will be assigned a multi-member supervisory committee. This committee shall consist of the Supervisor and at least one other member. Within two weeks of the first registration in the M.Sc. Degree program, a student will meet with the student's supervisory committee. Within six months, the student and the supervisory committee will agree on a written thesis proposal outlining the objectives, methods, timetable and funding for the project, and provide the proposal (signed by the student and supervisory committee) to the Head for inclusion in the student's file.
3. A student for the M.Sc. Degree must complete a minimum of 6 credit hours in program courses. The courses must be selected from the overview and general courses below or with the approval of the supervisory committee and Head of the Department, other graduate level courses including those offered by other departments. Depending on background and/or area of specialization, a student also may be required to complete additional courses in Earth Sciences or related subjects.
4. All course requirements should be completed within one year from the date of first registration in the M.Sc. Degree program.
5. A student is required to give an oral presentation to the Department on the results of their research. This presentation is normally given during the second year of the program and must take place within the Graduate Student Seminar Series.
6. A student is required to give an oral defence of their thesis research. The defence will consist of three voting members and will be comprised of the supervisory committee, a third supervisory committee member (if one exists), or one other regular faculty member (who may also be suggested to examine the thesis), and the chair or delegate (non-voting). The defence presentation will be open to the public, but examiner questions will be held in camera. Possible outcomes of the defence are the same as for the Ph.D. as outlined under **Evaluation of Ph.D. and Psy.D. Theses, The Examination Process**. Students who earn a "Pass" can proceed to the thesis examination following the procedures of the School of Graduate Studies (SGS). Students who earn a "Re-Examination Required" have six months to complete that re-examination or their program will be terminated. Students who earn a "Fail" will have their program terminated. Once the defence and any necessary revisions are completed, the supervisory committee will complete the Supervisory Approval Form and the thesis may then proceed to examination following the SGS procedures.
7. The M.Sc. Degree program will conclude with a thesis examination as prescribed in the **Regulations Governing the Degree of Master of Science**.
8. The Supervisor and the Head of the Department may recommend to the Dean of Graduate Studies that a student who is not making satisfactory progress be required to withdraw from the program.

28.11.2 Courses

A selection of courses will be offered to meet the requirements of students as far as the resources of the Department will allow.

28.11.2.1 Overview Courses

7000 Graduate Internship in Earth Sciences
 7110 Physics of the Solid Earth
 7120 Crustal Geophysics
 7300 Changes in Global Paleoenvironment
 7400 Tectonic Regimes
 7410 Engineering and Environmental Geology
 7500 Chemical Fluxes in the Earth
 7810 Paleocology (*same as the former 6810. credit may be obtained for only one of 7810 or 6810*)

28.11.2.2 General Courses

6070 Quantitative Techniques in Mineralogy and Metamorphic Petrology
 6105 Advanced Field Course in Applied Geophysics (may be offered in accelerated format)
 6141 Rotation of the Earth

6142 Theory of Global Geodynamics
 6152 Paleomagnetism
 6171 Advanced Exploration Seismology
 6172 Borehole Seismic
 6175 Gravity and Magnetic Methods
 6177 Mathematical Formulations of Seismic Wave Phenomena
 6210 Genesis of Mineral Deposits
 6320 Marine Geology
 6400 Flow and Transport in Fractured Rock
 6410 Advanced Engineering and Environmental Geology
 6420 Deformation Mechanisms
 6500 Stable Isotope Geochemistry
 6510 Trace Element Geochemistry
 6520 Methods in Advanced Research in Geochemistry
 6540 Radiogenic Isotope Geochemistry
 6550 Biogeochemistry
 6600 Petroleum Geology
 6740 Modern and Ancient Sedimentary Environments
 6750 Sequence Stratigraphy
 6801 Palaeobiology of Early Animal Life
 6820 Palynology and Paleobotany
 6900-6999 Special Topics in Earth Sciences

28.12 Environmental Science

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/become/graduate/apply/app_deadlines.php

(see also **Master of Environmental Science**)

28.12.1 Program of Study

1. The Environmental Science Program is an interdisciplinary graduate program involving the departments of the Faculty of Science, the Faculty of Humanities and Social Sciences, the Faculty of Medicine, and the Faculty of Engineering and Applied Science. There are three Environmental Science Graduate Degree streams: the Master of Science (M.Sc., Environmental Science), Master of Environmental Science (M.Env.Sci.), and the Doctor of Philosophy (Ph.D., Environmental Science). The program is available on a full or part-time basis.
2. The program is administered by a Board of Studies appointed by the Dean of Science. Supervisors of graduate students in the program include faculty from the Faculty of Science, the Faculty of Humanities and Social Sciences, the Faculty of Engineering and Applied Science, the Faculty of Medicine, and the Environmental Science Program at the Grenfell Campus, as well as adjunct appointees to the program (as a co-supervisor).

28.12.2 Qualifications for Admission

Admission is limited and competitive. To be considered for admission applicants shall normally hold a Bachelor's (Honours) degree in Science, Geography, or Environmental Science with at least second class standing, or equivalent, or a Bachelor's degree in Engineering from an institution recognized by the Senate or shall have qualifications and/or experience in environmental science acceptable to the Dean of Graduate Studies and the Board of Studies. The Board of Studies make recommendations on admission to the Dean of Graduate Studies.

28.12.3 Degree Requirements

1. To the extent that resources permit, individual programs will be developed to suit students' interests and needs. However all programs must be approved by the Board of Studies and by the Dean of Graduate Studies. All **General Regulations** of the School of Graduate Studies shall apply to these degrees.
2. The Master of Science (Environmental Science) is a research Degree which includes a thesis and course work. The thesis research will focus on environmental topics relevant to the student's background. The course component has two aims: to broaden the student's understanding of environmental issues; and to provide further training in areas of research specialization for the thesis.
3. Each student will have a Supervisory Committee normally consisting of a Supervisor and two others. The Supervisory Committee will be appointed by the Dean of Graduate Studies on the recommendation of the Board of Studies for Environmental Science.
4. The program of each student will consist of a minimum of 12 credit hours in program courses which will include Environmental Science 6000 and Environmental Science 6010. Of the 6 credit hours remaining in program courses, 3 credit hours will be from Environmental Science 6001, 6002, and 6003 and the other 3 credit hours will be related to the student's specialty and will normally be chosen from graduate courses offered by the Faculties of Science, Humanities and Social Sciences, Medicine, and Engineering and Applied Science.
5. All students will be required to submit a thesis embodying the results of systematic research on an approved topic. The thesis will be evaluated according to procedures outlined in **General Regulations, Theses and Reports**.

28.12.4 Courses

6000 Environmental Science and Technology
 6001 Earth and Ocean Systems
 6002 Environmental Chemistry and Toxicology
 6003 Applied Ecology
 6004 Environmental Pollution and Mitigation (*cross-listed as ENGI 9601*)
 6007 Environmental Risk Assessment (*cross-listed as ENGI 9609*)
 6008 Air Pollution (*same as ENGI 9624*)
 6009 Environmental Science Project
 6010 Environmental Seminar
 6201-6210 Special Topics in Environmental Science

28.13 Food Science

See **Biochemistry**.

28.14 Geography

www.mun.ca/sgs/contacts/sgscontacts.php
 www.mun.ca/hss
 www.mun.ca/science
 www.mun.ca/geog
 www.mun.ca/become/graduate/apply/app_deadlines.php

28.14.1 General Information

1. The degrees of Master of Arts and Master of Science are offered in Geography by full-time or part-time study.
2. Admission requirements are set forth in the **General Regulations** of the School of Graduate Studies and Degree Regulations for **Master of Arts** and **Master of Science**.
3. The deadline for submission of applications for admission is January 15. Students will normally commence their programs in the Fall semester.
4. An applicant will be admitted to a graduate program only if a faculty member agrees to act as Supervisor. A supervisory committee will be established after admission, normally consisting of the Supervisor and two other individuals, one of whom will normally be a member of the Department.
5. Major research areas for graduate study at the master's level are cultural, political, historical, economic, urban, resource management, community and regional development, geomorphology, Quaternary environments, climatology, and geographic information sciences.
6. Students will register for the M.A. program if their fields of interest lie in an area of Human Geography or for the M.Sc. if their fields of interest are in Physical Geography or Geographic Information Sciences.
7. It is expected that the program of study and research for the M.A. or M.Sc. will normally be completed in a maximum of two years of full-time work, or three years of part-time work.
8. Students must successfully complete a minimum of 12 credit hours of graduate program courses with a minimum grade of 'B' in each. Geography 6000 and 6001 will be required courses for all students who have not already completed equivalent courses at the Honours or post-graduate level.
9. Students whose undergraduate Degree is not in geography will normally be required to complete some additional undergraduate program courses during their first year of study, in addition to the required graduate program courses. Normally four such undergraduate courses will be required, and a minimum grade of 70% must be obtained in each.
10. Each student will be required to present a seminar on their research to the Department.
11. Each student must submit a thesis based on their own original research. This thesis will be examined in accordance with the **General Regulations** of the School of Graduate Studies.

28.14.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students as far as the resources of the Department will allow.

6000 Development of Geographical Thought and Practice I
 6001 Development of Geographical Thought and Practice II
 6002 Directed Readings in Geography
 6100 Research Techniques in A Selected Field of Geography I
 6101 Research Techniques in A Selected Field of Geography II
 6120 Geospatial Modelling and Analysis
 6150 Environmental Remote Sensing and Image Analysis
 6200 Economic Geography I
 6201 Economic Geography II
 6204 Sustainable Community and Regional Development
 6250 Conservation and Sustainability of Natural Resources
 6251 Survey Design, Questionnaire Development and Techniques of Data Collection
 6300 Problems in Fisheries Geography
 6400 Fluvial Geomorphology
 6401 Glacial Geomorphology
 6402 Coastal Geomorphology
 6410 Climatology
 6420 Quaternary Geography
 6430 Biogeography
 6500 Cultural Geography
 6600 Historical Geography
 6700 Political Geography
 6800 Urban Geography
 6821 Advanced Computer Mapping
 6900 Graduate Seminar in Regional Geography
 6990-95 Special Topics in Geography

28.15 Geology

See **Earth Sciences**.

28.16 Geophysics

See **Earth Sciences**.

28.17 Marine Biology

www.mun.ca/sgs/contacts/sgscontacts.php
 www.mun.ca/science
 www.mun.ca/osc
 www.mun.ca/become/graduate/apply/app_deadlines.php

The degree of Master of Science (M.Sc.) is offered in Marine Biology by full-time and part-time study through the Department of Ocean Sciences. Areas of concentration include: Biological Oceanography, Marine Ecology and Evolution, Functional Biology of Marine Organisms, Fisheries and Aquaculture, and Marine Biogeochemistry.

28.17.1 Admission and Program of Study

1. Admission into the Master of Science degree program in Marine Biology is normally restricted to students holding at least a Bachelor of Science degree with second class Honours. When circumstances warrant, the requirement for a second class Honours may be waived by the School of Graduate Studies on the recommendation of the Head of the Department.
2. Each student will be assigned a Supervisory Committee consisting of the Supervisor and at least one other member. Within three months of the first registration in the M.Sc. degree program, the student will meet with the student's Supervisory Committee. Within six months, the student and the Supervisory Committee will agree on a written thesis proposal outlining the objectives, methods, timetable and funding for the project, and provide the proposal (signed by the student and the supervisory committee) to the Head for inclusion in the student's file.
3. A student is required to complete a minimum of 9 credit hours of graduate program courses as follows:
 - Ocean Sciences 7000
 - One of Ocean Sciences 7100 or 7200
 - 3 additional credit hours selected from other Ocean Sciences graduate courses or relevant courses in other Departments as approved by the Supervisory Committee
4. All course requirements should be completed within four semesters from the date of first registration in the M.Sc. degree program.
5. A student is required to give an oral presentation to the Department on the results of the student's research. This presentation should be given after completion of a thesis draft.
6. The M.Sc. degree program will conclude with a thesis examination as prescribed in the School of Graduate Studies **General Regulations, Theses and Reports**.

28.17.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

OCSC 7000 Graduate Core Seminar (*cross-listed as Biology 7000*)
 OCSC 7100 Biological Oceanography
 OCSC 7200 Adaptations to the Marine Environment
 OCSC 7300 Plankton Dynamics
 OCSC 7400 Fisheries Resource Management
 OCSC 7500-7515 Special Topics in Ocean Sciences

28.18 Mathematics and Statistics

www.mun.ca/sgs/contacts/sgscontacts.php
 www.mun.ca/science
 www.mun.ca/math
 www.mun.ca/become/graduate/apply/app_deadlines.php

The degrees of **Master of Applied Statistics** (see appropriate calendar entry), Master of Science, and Doctor of Philosophy are offered in the Department of Mathematics and Statistics. The Masters' degrees are offered by full-time and part-time studies.

28.18.1 Specific Requirements for the M.Sc. in Mathematics

Every student for the M.Sc. in Mathematics is required to complete one of two options:

1. **Option 1:** MATH 696A/B, two courses from MATH 6160, 6310, 6332, 6351, and a minimum of 9 further credit hours in courses chosen from the departmental course offerings, excluding MATH 6299, and a thesis as per **General Regulations, Theses and Reports**.
2. **Option 2:** MATH 6299, 696A/B, three courses from MATH 6160, 6310, 6332, 6351, and a minimum of 9 further credit hours in courses chosen from the departmental course offerings.

28.18.2 Specific Requirements for the M.Sc. in Statistics

Every student for the M.Sc. in Statistics is required to complete a minimum of 18 credit hours in graduate courses including STAT 6510 and one of STAT 6500 or STAT 6560 as well as the series STAT 697A/B or the completion of an additional 3 credit hour graduate course from the list below (courses STAT 6509 and STAT 6519 cannot be used to satisfy this requirement). A thesis is required as per **General Regulations, Theses and Reports**.

Students who already hold a Master of Applied Statistics are only required to complete STAT 6510 and one of STAT 6500 or STAT 6560 and a thesis as per **General Regulations, Theses and Reports**.

Table of Credit Restrictions for Present Mathematics Courses with Former Mathematics Courses

(Credit may be obtained for only one course from each of the pairs listed in this table.)

Present Course	Former Course	Present Course	Former Course
6323	6030	6212	6080
6321	6032	6310	6130
6322	6035	6330	6200
6340	6040	6331	6210
6341	6041	6332	6350
6342	6042	6312	6500

28.18.3 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

28.18.3.1 Mathematics

6100 Dynamical Systems
6101 Modern Perturbation Theory
6102 Mathematical Biology
6104 Infinite Dimensional Dynamical Systems
6110 Advanced General Relativity
6111 Calculus in Manifolds
6112-6119 Special Topics in Applied Mathematics
6120 Theoretical Fluid Dynamics
6121 Functional Differential Equations
6130 Introduction to General Relativity
6160 Partial Differential Equations
6201 Numerical Methods for Partial Differential Equations
6202 Nonlinear and Linear Optimization (*credit restricted with Computer Science 6933*)
6204 Iterative Methods in Numerical Linear Algebra
6205-6209 Special Topics in Numerical Analysis
6210 Numerical Solution of Differential Equations
6212 Numerical Methods for Initial Value Problems
6230 Differentiable Manifolds and Riemannian Geometry
6252 Quantum Information and Computing (*cross-listed with Physics 6852*)
6299 Master's Project
6300 Homology Theory
6301 Homotopy Theory
6302 Theory of Fibre Bundles
6304-6309 Special Topics in Topology
6310 Functional Analysis
6311 Complex Analysis
6312 Measure Theory
6313 Functional Analysis II
6315-6319 Special Topics in Analysis
6320 Group Theory
6321 Ring Theory
6322 Nonassociative Algebra
6323 Homological Algebra
6324-6329 Special Topics in Algebra
6330 Analytic Number Theory
6331 Algebraic Number Theory
6332 Point Set Topology
6333 Representation Theory
6340 Graph Theory
6341 Combinatorial Design Theory
6342 Advanced Enumeration
6343-6349 Special Topics in Combinatorics
6351 Advanced Linear Algebra
696A/B Graduate Seminar (2 credit hours)

28.18.3.2 Statistics

6500 Probability (*credit restricted with former 6586*)
6503 Stochastic Processes
6505 Survival Analysis
6510 Mathematical Statistics
6520 Linear Models
6530 Longitudinal Data Analysis
6540 Time Series Analysis
6545 Computational Statistics
6550 Nonparametric Statistics
6559 Statistical Exploration of Data
6560 Continuous Multivariate Analysis
6561 Categorical Data Analysis
6563 Sampling Theory

6564 Experimental Designs
 6571 Financial and Environmental Time Series
 6573 Statistical Genetics
 6570-6589 Selected Topics in Statistics and Probability (excluding 6571, 6573, 6586)
 697A/B Graduate Seminar Series in Statistics (2 credit hours)

28.19 Physics and Physical Oceanography

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/physics
www.mun.ca/become/graduate/apply/app_deadlines.php

Programs leading to the Degree of Master of Science in Physics and in Physical Oceanography are offered to both full and part-time students. The following Departmental Regulations are supplementary to the General Regulations governing the M.Sc. degrees.

28.19.1 Program of Study for Master of Science in Physical Oceanography

1. Preference for admission will be given to students with a B. Sc. Honours Degree who have taken senior undergraduate courses in fluids, oceanography, and mathematical physics.
2. Students are normally required to take a minimum of 12 credit hours in graduate level courses, of which at least 6 credit hours shall be selected from among the courses listed in **Courses** below between the numbers 6300 - 6399.
3. Before submission of the thesis to the School of Graduate Studies for examination, the student must present a seminar on the topic of his/her thesis research.

28.19.2 Program of Study for Master of Science in Physics

1. Preference for admission will be given to students with a B. Sc. Honours Degree in physics. Students should normally have taken senior undergraduate courses in physics, such as electricity and magnetism, statistical physics, quantum mechanics, or experimental physics.
2. Students are normally required to take a minimum of 12 credit hours in graduate level courses, of which at least 6 credit hours shall be selected from **Courses** below.
3. Before submission of the thesis to the School of Graduate Studies for examination, the student must present a seminar on the topic of his/her thesis research.

28.19.3 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

6000 Condensed Matter Physics I
 6001 Condensed Matter Physics II
 6002 Superconductivity
 6003 Path Integral Techniques in Condensed Matter Physics
 6010-19 Special Topics in Condensed Matter Physics
 6040 Biophysics
 6060-69 Special Topics in Interdisciplinary Areas
 6200 Nonlinear Dynamics
 6308 Ocean Dynamics I
 6309 Ocean Dynamics II
 6310 Physical Oceanography
 6313 Physical Fluid Dynamics
 6314 Field Oceanography
 6315 Polar Oceanography
 6316 Ocean Measurements and Data Analysis
 6317 Ocean Acoustics
 6318 Numerical Modelling
 6319 Climate Dynamics
 6320 Turbulence
 6321 Coastal Oceanography
 6322 Stratified Fluids
 6323 Stability Theory
 6324 Models in Ocean Ecology
 6360-69 Special Topics in Physical Oceanography (excluding 6363)
 6363 Laboratory Experiments in Geophysical Fluid Dynamics
 6400 Statistical Mechanics
 6402 Theory of Phase Transitions
 6403 Stochastic Processes, Time-Dependent and Non-equilibrium Statistical Mechanics
 6413 Soft Matter Physics
 6502 Electrodynamics
 6722 Light Scattering Spectroscopy
 6760-69 Special Topics in Atomic and Molecular Physics
 6800 Group Theory
 6810-19 Special Topics in Theoretical and Mathematical Physics
 6850 Quantum Mechanics I
 6851 Quantum Mechanics II
 6852 Quantum Information and Computing (*cross-listed with Math 6252*)
 6900 Techniques in Experimental Condensed Matter Physics
 6910-19 Special Topics in Experimental and Applied Physics

Note: For Geophysics, see **Earth Sciences**.

28.20 Psychology

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/psychology
www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Science is offered in Experimental Psychology. The Degree of Doctor of Philosophy is offered in Experimental Psychology. Interested students may wish to consult the sections in the Calendar describing the **Master of Applied Psychological Science (Co-operative)** and the Master of Science and Doctor of Philosophy in Cognitive and Behavioural Ecology programs.

28.20.1 Program of Study

A student may be accepted into a program leading to the M.Sc. in Experimental Psychology.

Experimental Psychology

1. The areas of specialization offered are: Animal Behaviour (see **Cognitive and Behavioural Ecology Program**), Behavioural Neuroscience and Clinical, Cognitive, Developmental and Social Psychology.
2. Students in the Behavioural Neuroscience area shall normally complete 12 credit hours, including: Advanced Statistics in Psychology (6000), Research Design (6001), and 6 credit hours related to their area of specialization. Students will also register for the Colloquium Series in Psychology (6010) each Fall and Winter semester of their program for a maximum of four registrations.
3. Students shall normally complete 15 credit hours, including: Advanced Statistics in Psychology (6000), Research Design (6001), an additional 3 credit hours of Advanced Statistics Courses (either PSYC 6002, PSYC 6003, or PSYC 6004), and 6 credit hours related to their area of specialization. Students will also register for the Colloquium Series in Psychology (6010) each Fall and Winter semester of their program for a maximum of four registrations.
4. Every student shall submit an original thesis based upon an approved experimental research topic.

28.20.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

6000 Advanced Statistics in Psychology
 6001 Research Design
 6002 Advanced Statistics in Psychology II
 6003 Directed Studies in Advanced Statistics I
 6004 Directed Studies in Advanced Statistics II
 6010 Colloquium Series in Psychology (repeatable, non-credit)
 6100-6130 Special Topics in Experimental Psychology
 6200 Learning I
 6201 Learning II
 6203 Behavioural Pharmacology
 6210 Behavioural Analysis of Toxins
 6351 Behavioural Ecology and Sociobiology (*cross-listed as CABE 6351*)
 6400 Theory and Methods in Social Psychology
 6401 Social Cognition
 6402 Group Processes
 6403 Program Evaluation and Applied Research
 6404 Project in Applied Psychological Science (*Note: This course is open only to students in the Master of Applied Psychological Science*)
 6500 Developmental Psychology I
 6501 Developmental Psychology II
 6502 Developmental Changes During Old Age
 6700 Perception
 6710 Human Information Processing
 6720 Human Memory
 6800 Behavioural Neuroscience I
 6801 Behavioural Neuroscience II
 6810 Psychometrics
 6910 Personality
 699A/B Core Graduate Seminar in Psychology

28.21 Scientific Computing

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/become/graduate/apply/app_deadlines.php

28.21.1 Administrative Committee

The Administrative Committee, appointed by the Dean of the School of Graduate Studies on the recommendation of the Dean of the Faculty of Science, consists of at least one representative of each participating academic unit, and one member external to the University.

28.21.2 Participating Departments and Organizations

This interdisciplinary program offers the Master of Science Degree in both Scientific Computing and Scientific Computing (Co-operative). The departments of Biochemistry, Chemistry, Computer Science, Earth Sciences, Mathematics and Statistics, Physics and Physical Oceanography and the Faculty of Engineering and Applied Science are participants in this program. Other departments and faculties may be involved, depending on the nature of the thesis or project. External organizations may provide placements for co-op students, jointly supervise students, share computing resources and participate in teaching courses.

28.21.3 Admission Criteria and Procedures

1. The criteria for acceptance of an applicant are: the applicants' anticipated successful and timely completion of the program, and the willingness of a participating faculty member to supervise the applicant.
2. Students will be expected to hold a B.Sc. (Honours) or B.Eng. Degree with honours standing, or equivalent, with a strong computational orientation. At the time of application, the student is expected to provide evidence (for example, transcripts of completed courses) of the student's knowledge of a modern computer language such as Fortran, and/or C and/or C++, and/or Matlab, and/or Python. Evidence of knowledge of differential equations; and/or linear algebra and/or computer graphics would be an asset. Students with an inadequate background may be encouraged to take certain undergraduate courses.
3. Admission decisions will be made by the School of Graduate Studies on the recommendation of the Chair of the Administrative Committee.

28.21.4 Program of Study

1. The goal of Scientific Computing is to solve technical problems, in science and engineering, using computers and computational methods. Our program is designed to educate students to apply computational, numerical and programming concepts and tools to solve and model complex problems in science and engineering.
2. The Program is offered in thesis and project (non-thesis) versions, with the option of a co-operative education program. It is intended that the overall level of student effort and performance required in each version will be comparable. The normal length of time to complete each option is 24 months.
3. The work for the thesis or project will be carried out under the guidance of a supervisor (or joint supervisors). The home department of the student will be the same as that of the Supervisor. Upon completion of the work for the thesis or project, each student is required to present a seminar suitable for the interdisciplinary audience of Scientific Computing program students.
4. All students are required to complete a minimum of 3 core courses (9 credit hours) selected from the list of **Core Courses** listing below. All students are also recommended to complete CMSC 6950. Additional courses are required in accordance with the program options as outlined below and will normally be selected from the student's discipline of specialization. The course requirements for each student are approved by the Program Chair on the recommendation of the student's supervisor(s), and should reflect the interdisciplinary nature of the program. Students are expected to attend research seminars in their home department as well as those relevant to Scientific Computing, when advertised.
 - a. The thesis option requires the completion of a minimum of four graduate courses (12 credit hours) numbered 6000 or higher, which must include three courses (9 credit hours) from the **Core Courses** listing below. Equivalent courses may be considered for substitution with approval of the Program Chair. The additional course(s) will normally be chosen from the **Additional Courses** listing below in the same discipline as the thesis work. The submission of an acceptable thesis is required. The thesis is to contain an original scholarly contribution which must be submitted to the School of Graduate Studies for final examination. The thesis must be written in a format according to procedures outlined in Guidelines for Theses and Reports by the School of Graduate Studies at www.mun.ca/sgs/go/guid_policies/theses.php.
 - b. The project option requires the completion of a minimum of eight graduate courses (24 credit hours) numbered 6000 or higher, which must include CMSC 6009 and at least three courses (9 credit hours) from the **Core Courses** listing below. Equivalent courses may be considered for substitution with approval of the Program Chair. The additional courses will normally be chosen from the **Additional Courses** listing below in the same discipline as the project work. An acceptable project report is also required that is based on research performed with the guidance of the student's supervisor. The project, which will include an in-depth written report, shall require the equivalent of at least one and no more than two semesters of full time work. The project report must be written in a format according to procedures outlined in Guidelines for Theses and Reports by the School of Graduate Studies at www.mun.ca/sgs/go/guid_policies/theses.php. The report will be evaluated by the student's supervisor, by the Chair of the Board of Study (or delegate), as well as by one other faculty member. Acceptance of a final version of the report (and a passing grade for CMSC 6009) requires the agreement of the three examiners.

28.21.5 Co-operative Education Option

1. A co-operative education option will be available to students who are accepted into the M.Sc. program. Students in this option may follow the thesis or non-thesis version of the program. It is expected to take up to 24 months to complete.
2. Students will normally declare their intention to complete the co-operative education option at the start of the second semester of their academic program.
3. Students will complete two work terms consecutively, normally following the successful completion of a minimum of four courses (12 credit hours).
4. The dates for starting and finishing each work term are shown at www.mun.ca/coop.
5. A competition for work term employment is organized by Co-operative Education in cooperation with a designated faculty member from Scientific Computing. Students may also obtain their own work term jobs outside the competition. Such jobs must be confirmed by letter from the employer and approved by the Chair of Scientific Computing and by Co-operative Education on or before the first day of the work term. Work term jobs may be outside St. John's and possibly outside Newfoundland and Labrador. Students who do not wish to accept a work term job arranged by Co-operative Education shall be responsible for finding an acceptable alternative. By entering the competition, students give permission for Co-operative Education to supply their Memorial University of Newfoundland transcripts and resumes to potential employers.
6. Each work term placement will be supervised by the student's program supervisor, the on-site supervisor assigned by the employer and Co-operative Education. The overall evaluation of the work term is the responsibility of the program Supervisor, on-site Supervisor, and Co-operative Education. The work term shall consist of two components:
 - On-the-job Student Performance as evaluated by the on-site supervisor and Co-operative Education, in consultation with the program supervisor.
 - A Work Report graded by Co-operative Education and the program supervisor in consultation with the on-site supervisor.
7. Evaluation of the work term will result in the assignment of one of the following final grades:
 - *Pass with Distinction*: Indicates OUTSTANDING PERFORMANCE in both the work report and work performance.
 - *Pass*: Indicates that PERFORMANCE MEETS EXPECTATIONS in both the work report and work performance.
 - *Fail*: Indicates FAILING PERFORMANCE in the work report and/or the work performance. If a student fails to achieve a final grade of Pass or Pass with Distinction, and provided the student has not failed to achieve a grade of 'B' or better in any program course, the student may request to repeat the work term component. The request will be considered by the Chair of Scientific Computing in consultation with the program supervisor and Co-operative Education. Only one repetition of a work term will be

permitted in the student's program.

8. Following the completion of the two work terms, each student must complete any remaining course requirements and project report or thesis. Assuming that prior written authorization of the employer and the supervisory committee was obtained and submitted to the School of Graduate Studies, students may include material from the work terms in their reports or theses. For students following the non-thesis version of the program, the two work-term reports may be combined into a single, integrated report for this purpose. All other students must write a thesis on a research project which may be based on research completed during the work terms.
9. Students who are accepted into the co-op option are not guaranteed placements. In the event that a student fails to obtain two semesters of placements, but successfully completes all other requirements of the Degree, the student will still be eligible for graduation, but without the designation of a co-op degree.

28.21.6 Courses

28.21.6.1 Core Courses

Computer Science 6731 Topics in Numerical Methods
 Mathematics 6201 Numerical Methods for Partial Differential Equations
 Mathematics 6210 Numerical Solutions of Differential Equations
 Scientific Computing 6009 Master's Project
 Scientific Computing 6910 Matrix Computations and Applications or Computer Science 6931 Matrix Computations and Applications
(credit may be obtained for only one of the CMSC 6910, COMP 6732, and COMP 6931)
 Scientific Computing 6920 Applied Scientific Programming
 Scientific Computing 6930 Algorithms for Distributed and Shared Memory Computers
 Scientific Computing 6950 Computer Based Tools and Applications *(credit may be obtained for only one of CMSC 6950 and the former CMSC 6940)*

28.21.6.2 Additional Courses

The following courses are identified as suitable for students in this program. Other courses may be permitted with the approval of the Program Chair.

Biochemistry

6000-6009 Special Topics in Biochemistry
 6010-6019 Special Topics in Nutrition and Metabolism
 6020-6029 Special Topics in Food Science
 6400 Control of Intermediary Metabolism
 6460 Structural Biochemistry
 6520 Nutritional Biochemistry
 6530 Food Biochemistry
 6590 Cellular, Molecular and Developmental Biology *(credit restricted with Biology 6590 and Medicine 6590)*
 6630 Marine Biochemistry
 6680 Processing and Quality of Foods

Chemistry

6201 Bioinorganic Chemistry
 6204 Mechanisms in Catalysis
 6205 Photochemistry of Transition Metal Complexes
 6210 Organometallic Chemistry
 6300 Quantum Chemistry I
 6301 Quantum Chemistry II
 6302 Molecular Spectroscopy
 6304 Computational Chemistry I
 6310 Electronic Structure Theory
 6323 Chemical Thermodynamics I
 6324 Chemical Thermodynamics II
 6340 Biophysical Chemistry
 6350 Electrochemical Kinetics
 6360 Solid State Chemistry
 6380 Adsorption on Surfaces
 6381 Surface and Interface Science
 6382-6389 Selected Topics in Physical Chemistry
 6390-6398 Selected Topics in Physical Chemistry
 6399 Chemical Kinetics and Dynamics
 6401 Organic Spectroscopic Analysis I
 6402 Organic Spectroscopic Analysis II
 6470 Physical Organic Chemistry
 6590-6599 Selected Topics in Theoretical and Computational Chemistry
 6600 Applications of Inorganic and Organometallic Chemistry to Toxicology

Computer Science

6904 Advanced Computer Architectures *(credit may be obtained for only one of 6904 and the former 6722)*
 6905 Software Engineering *(credit may be obtained for only one of 6905 and the former 6713)*
 6906 Numerical Methods *(credit may be obtained for only one of 6906 and the former 6731)*
 6909 Fundamentals of Computer Graphics *(credit may be obtained for only one of 6909 and the former 6752)*
 6918 Digital Image Processing *(credit may be obtained for only one of 6918 and the former 6756)*
 6931 Matrix Computations and Applications *(credit may be obtained for only one of 6931, the former 6732, and CMSC 6910)*

Earth Sciences

6141 Rotation of the Earth
 6142 Theory of Global Geodynamics
 6171 Advanced Exploration Seismology
 6172 Borehole Seismic
 6175 Gravity and Magnetic Methods
 6177 Mathematical Formulations of Seismic Wave Phenomena
 6918 Airborne and Borehole Electromagnetic Methods

6994 Special Topics in Earth Sciences - Geophysical Inversion and Applications
 7110 Physics of the Solid Earth
 7120 Crustal Geophysics

Engineering and Applied Science

9015 Ocean Engineering Hydrodynamics
 9052 Ice Properties and Mechanics
 9501 Finite Element Analysis with Engineering Applications
 9713 Stochastic Hydrology
 9815 Electromagnetic Propagation
 9821 Digital Signal Processing
 9826 Advanced Control Systems
 9861 High-Performance Computer Architecture
 9865 Advanced Digital Systems
 9869 Advanced Concurrent Programming
 9871 Information Theory and Coding

Mathematics and Statistics

6112-6119 Special Topics in Applied Mathematics
 6201 Numerical Methods for Partial Differential Equations
 6210 Numerical Solution of Differential Equations (required course for Scientific Computing)
 6212 Numerical Methods for Initial Value Problems
 6588 Selected Topics in Statistics and Probability - Generalized Additive Models with Applications in Scientific Visualization

Physics and Physical Oceanography

6000 Condensed Matter Physics I
 6200 Nonlinear Dynamics
 6308 Ocean Dynamics I
 6309 Ocean Dynamics II
 6310 Physical Oceanography
 6316 Ocean Measurements and Data Analysis
 6317 Ocean Acoustics
 6318 Numerical Modelling
 6320 Turbulence
 6321 Coastal Oceanography
 6323 Stability Theory
 6400 Statistical Mechanics
 6402 Theory of Phase Transitions
 6800 Group Theory
 6850 Quantum Mechanics I

Scientific Computing

601W Work Term 1
 602W Work Term 2
 6910 Matrix Computations and Applications (*credit may be obtained for only one of CMSC 6910, the former COMP 6732, and 6931*)
 (*cross-listed with COMP 6931*)
 6920 Applied Scientific Programming
 6925 Tools of the Trade for Programming High Performance Computers (2 credit hours)
 6930 Algorithms for Distributed and Shared Memory Computers
 6950 Computer Based Tools and Applications (*credit may be obtained for only one of CMSC 6950 and the former CMSC 6940*)

29 Regulations Governing the Degree of Master of Science in Applied Geomatics

www.mun.ca/sgs/contacts/sgscontacts.php
www.grenfell.mun.ca/academics-and-research/Pages/graduate-programs.aspx
www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Science in Applied Geomatics (MAG) is a unique program that combines intensive training in Geomatics offered at the College of the North Atlantic's post-diploma program in GIS (September to June, year 1) followed by focused research toward a Master's thesis based at Grenfell Campus. The Degree is offered in the School of Science and the Environment, Grenfell Campus by full-time or part-time study.

29.1 Qualifications for Admission

1. The application deadline for the Fall semester is 1 February each year. Students can only enter this program in the Fall semester. Late applications may be processed if space is available.
2. Admission to the Master of Science in Applied Geomatics program is by application. Information regarding the application process is available at www.mun.ca/become/graduate/apply.
3. Applicants are required to simultaneously apply to the College of the North Atlantic's post-diploma program in Geographic Information Systems (GIS).
4. All applicants are required to have a Bachelor's degree from a senate recognized post-secondary institution with a minimum 'B' average.
5. All applicants meeting the requirements will be given conditional acceptance into the MAG program pending successful completion of the Post-diploma GIS Specialist program at the College of the North Atlantic.
6. Admission to the program is competitive, having only a limited number of spaces each year.
7. Applicants should identify and contact a faculty member who is willing to supervise their thesis research throughout the duration of the program. Applicants are advised to contact the graduate officer to discuss potential supervisors prior to submitting an application to the program.
8. Applicants must meet the English Proficiency Requirements described under **General Regulations, English Proficiency Requirements**.

29.1.1 Alternative Method of Entry

Individuals who have completed the post-diploma previously and meet the admission requirements above and wish to apply to the Master of Science in Applied Geomatics program must contact a potential supervisor, and organize a research project prior to the February 1 deadline. All alternative entry applicants must complete a research proposal within one month of entry to the program.

29.2 Program of Study

The Master of Science in Applied Geomatics program requires completion of courses in the Post-diploma program in Geospatial Analysis at the Corner Brook campus of the College of the North Atlantic. Additionally, students are required to enroll in either BEAS 600A/B Graduate Research Seminar or ENVP 6002 Research Design and Methods (or any other ENVP course listed below in **Courses** pending approval of the supervisory committee) once they have met the program admission requirements.

29.3 Evaluation

1. In order to continue in the School of Graduate Studies and qualify for a Master's Degree, a student shall obtain an 'A' or 'B' grade in each program course as outlined under **General Regulations, Evaluation, Evaluation of Graduate Students**.
2. When it has been determined, on the basis of consultation with the student, the instructors in graduate courses, and the thesis or report Supervisor, that a student's work has fallen below a satisfactory level, the Supervisor or the Head of the appropriate academic unit may recommend to the Dean that such a student be required to withdraw from the program.

29.4 Thesis

Students should refer to **General Regulations, Theses and Reports** of the School of Graduate Studies. Every student in graduate studies shall comply with the **General Regulations**, the Degree Regulations, and all additional requirements of the appropriate academic unit.

29.5 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, pending resource availability of the Academic unit:

Applied Geomatics

AGEO 6050-6150 Special topics in Applied Geomatics

Boreal Ecosystems and Agricultural Sciences

BEAS 6000 Issues in Boreal Ecosystems and Agricultural Sciences
 BEAS 6002 Advanced Quantitative Research Methods for the Natural Sciences
 BEAS 6003 Advanced Quantitative Research Methods for the Social Sciences
 BEAS 6010 Agriculture and Forestry Economics
 BEAS 6020 Management of Crop Nutrition
 BEAS 6021 Organic Farming for Sustainable Agriculture
 BEAS 6022 Plant Biochemistry
 BEAS 6023 Plant Physiology
 BEAS 6030 Chemical Speciation Modeling for Environmental Matrices
 BEAS 6031 Soil Functions Soil as a Bioreactor
 BEAS 6032 Environmental Soil Physics
 BEAS 6033 Soil and Water Conservation
 BEAS 6040 Advanced Groundwater Management
 BEAS 6041 Applied Hydrology
 BEAS 6042 Soil and Groundwater Remediation
 BEAS 6050-6150 Special topics in Boreal Ecosystems and Agricultural Sciences

Environmental Policy

ENVP 6052 Political Economy, Political Ecology and Policy
 ENVP 6053 Ecological Economics
 ENVP 6054 Labour and Environmental Policy
 ENVP 6055 Environmental Impact Assessment
 ENVP 6056 Risk Assessment and Analysis
 ENVP 6057 Energy Policy
 ENVP 6058 Management and Regulation of Water Resources
 ENVP 6059 Natural Resources Policy and Administration
 ENVP 6520-6530 Special topics in Environmental Policy

Geography

GEOG 4202 Advanced Cartography
 GEOG 4250 Environmental Image Analysis
 GEOG 4261 Advanced Methods in Geographic Information Systems (GIS)

30 Regulations Governing the Degree of Master of Science in Boreal Ecosystems and Agricultural Sciences

www.mun.ca/sgs/contacts/sgscontacts.php

www.grenfell.mun.ca/academics-and-research/Pages/graduate-programs.aspx

www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Science in Boreal Ecosystems and Agricultural Sciences (M.Sc. (Boreal Ecosystems and Agricultural Sciences)) is offered by the School of Science and the Environment, Grenfell Campus to full-time and part-time students in Boreal Ecosystems and Agriculture research areas focussed on, but not exclusively to, Economics and Social Science, Plant Sciences, Soil and Land Resource, and Water Resources.

30.1 Qualifications for Admission

To be considered for admission, applicants shall hold a Bachelor's (Honours) degree normally in Science, Agriculture, Forestry, Engineering, Geography, or Environmental Science with at least second class standing, or equivalent, from an institution recognized by the Senate or shall have qualifications and/or experience in environmental science acceptable to the Dean of Graduate Studies and the Grenfell Campus graduate committee. The Grenfell Campus graduate committee makes recommendations on admission to the Dean of Graduate Studies for this program.

Admission is limited and competitive, and will follow the general qualifications for admission to Masters Programs at Memorial University of Newfoundland as set out under **General Regulations, Qualifications for Admission** of the School of Graduate Studies. All applicants found academically acceptable to the Master of Science in Boreal Ecosystems and Agricultural Sciences program are required to have a faculty supervisor before final acceptance can be offered.

As well, applicants are required to demonstrate English proficiency by submission of a minimum score in TOEFL, IELTS, or another acceptable language test, in accordance with **General Regulation, Qualifications for Admission, English Language Proficiency Requirements** of the School of Graduate Studies.

30.2 Program of Study and Research

1. The program of study for the Master of Science in Boreal Ecosystems and Agricultural Sciences degree shall consist of the successful completion of a program of courses and a thesis embodying original research.
2. Every student shall successfully complete at least 12 credit hours as outlined under **Program Requirements** below. Undergraduate courses at the fourth year level may be required at the recommendation of the supervisory committee; these courses do not count against the required graduate credit requirements but are necessary for graduation.
3. Every student shall submit a thesis, as outlined under **General Regulations, Theses and Reports**, on an approved subject in which systematic research has been conducted under the direction of the Supervisor recommended by the academic unit concerned and approved by the Divisional Head.
4. In addition to courses and thesis research, it is a requirement that all graduate students of this program must participate in Grenfell campus-wide graduate student seminars. This is graded by supervisor(s) for participation as satisfactory/unsatisfactory; a satisfactory evaluation is required for graduation.

30.3 Program Requirements

1. Students admitted to the program must complete a research thesis under the supervision of a faculty member or members, and a minimum of four courses (12 credit hours) as determined by the thesis supervisor. Three courses are selected from four core courses. A fourth course can be selected from a list of optional courses.
2. All students must complete three core courses:
 - BEAS 6000 - Issues in Boreal Ecosystems and Agricultural Sciences (3 credit hours). This course will initially be offered during the Fall semester.
 - BEAS 600A/B - Graduate Research Seminar (3 credit hours). Students will normally register for BEAS 600A in the Fall semester and BEAS 600B in the following Winter semester. A grade of NC (No Grade Expected) will be assigned to BEAS 600A.
3. Students must also complete one of the two following courses: BEAS 6002 - Advanced Quantitative Research Methods for the Natural Sciences or BEAS 6003 - Advanced Quantitative Research Methods for the Social Sciences (3 credit hours).
4. A further 3 credit hours will be accumulated in elective courses related to the student's research area. Students should view **Table 1 Research Areas and Sample Elective Courses** for suggestions.

Table 1 Research Areas and Sample Elective Courses

Economics & Social Science	Plant Science	Soil and Land Resource	Water Resources
BEAS 6010 Agriculture and Forestry Economics	BEAS 6020 Management of Crop Nutrition BEAS 6021 Organic Farming for Sustainable Agriculture BEAS 6022 Plant Biochemistry BEAS 6023 Plant Physiology	BEAS 6030 Chemical Speciation Modeling for Environmental Matrices BEAS 6031 Soil Functions: Soil as a Bioreactor BEAS 6032 Environmental Soil Physics BEAS 6033 Soil and Water Conservation	BEAS 6040 Advanced Groundwater Management BEAS 6041 Applied Hydrology BEAS 6042 Soil and Groundwater Remediation

30.4 Evaluation

1. In order to continue in the School of Graduate Studies and in order to qualify for a Master's Degree, a student shall obtain an 'A' or 'B' grade in each program course as outlined under **General Regulations, Evaluation, Evaluation of Graduate Students**.
2. When it has been determined, on the basis of consultation with the student, the instructors in graduate courses, and the thesis Supervisor, that a student's work has fallen below a satisfactory level, the Supervisor or the Head of the appropriate academic unit may recommend to the Divisional Head that such a student be required to withdraw from the program as outlined under **General Regulations, Evaluation, Evaluation of Graduate Students**.

30.5 Courses

BEAS 6000 Issues in Boreal Ecosystems and Agricultural Sciences
 BEAS 600A/B Graduate Research Seminar
 BEAS 6002 Advanced Quantitative Research Methods for the Natural Sciences
 BEAS 6003 Advanced Quantitative Research Methods for the Social Sciences
 BEAS 6010 Agriculture and Forestry Economics
 BEAS 6020 Management of Crop Nutrition
 BEAS 6021 Organic Farming for Sustainable Agriculture
 BEAS 6022 Plant Biochemistry
 BEAS 6023 Plant Physiology
 BEAS 6030 Chemical Speciation Modeling for Environmental Matrices
 BEAS 6031 Soil Functions Soil as a Bioreactor
 BEAS 6032 Environmental Soil Physics
 BEAS 6033 Soil and Water Conservation
 BEAS 6040 Advanced Groundwater Management
 BEAS 6041 Applied Hydrology
 BEAS 6042 Soil and Groundwater Remediation
 BEAS 6050-6150 Special topics in Boreal Ecosystems and Agricultural Sciences (excluding 6052)
 BEAS 6052 Statistical Model Building in Boreal Ecology

31 Regulations Governing the Master of Science in Fisheries Science

www.mun.ca/sgs/contacts/sgscontacts.php

www.mi.mun.ca

www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Science in Fisheries Science is a research-focused Master's degree offered by the School of Fisheries, at the Fisheries and Marine Institute. The Degree of Master of Science in Fisheries Science is offered in Fisheries Science and Technology and Stock Assessment.

An Academic Advisory committee will be appointed by the Dean of Graduate Studies on recommendation of the Vice-President (Marine Institute). This committee will consist of an Academic Director as Chair, three members from the Marine Institute and two members from other academic units of the University. Normally, all appointments will be for a period of three years.

In addition to meeting the regulations governing the Degree of Master of Science in Fisheries Science, students must also meet the **General Regulations of the School of Graduate Studies** and any additional requirements of the appropriate academic unit.

31.1 Fisheries Science (Fisheries Science and Technology)

The Degree of Master of Science in Fisheries Science (Fisheries Science and Technology) is a research-focused Master's degree offered by the School of Fisheries at the Fisheries and Marine Institute. This program is for students who aim to pursue a career in fisheries science, and includes skills training that will empower students to conduct publication-quality research in any aspect of fisheries science. The degree is normally offered to full-time students. These regulations must be read in conjunction with the **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland.

31.1.1 Qualifications for Admission

1. Admission is limited and competitive. To be considered for admission an applicant will normally hold at least a high second class Honours Degree, or an M.D. Degree, or the equivalent of either, both in achievement and depth of study, from an institution recognized by the University Senate.
2. Any other applicant may be considered for admission provided that:
 - a. the applicant's undergraduate record after the first year shows an average of at least a grade of 'B' in courses in the proposed field of specialization;
 - b. the applicant's overall undergraduate record after the first year shows an average of at least a grade of 'B' in all courses taken; and
 - c. the applicant demonstrates a commitment and passion for aquatic science, ideally in fisheries, through employment or experience in field schools, research programs, the fishing industry, regulatory agencies or government departments, non-governmental organizations, consulting activities, or other relevant activities.
3. Applicants must meet the English Proficiency Requirements described under **General Regulations, English Proficiency Requirements**.

31.1.2 Program of Study and Research

Every student for the Master of Science in Fisheries Science (Fisheries Science and Technology) degree shall normally be required to complete all of:

1. 12 credit hours including:
 - a. FISH 6000 Science Communication for Fisheries
 FISH 6001 Ecology, Management, and Practice of North Atlantic Fisheries
 FISH 6002 Data Collection, Management, and Display
 FISH 6003 Statistics and Study Design for Fisheries Science
 - b. A thesis composed of at least one chapter of original research.
2. A student may be required by the Supervisory Committee to take additional courses.
3. All program course requirements should be completed within four semesters from the date of first registration in the M.Sc. degree program. Students will normally complete course requirements in their first two semesters.
4. Within three months of the first registration in the M.Sc. degree program, the student will meet with the Supervisory Committee. A meeting report, signed by all members of the Supervisory Committee and student, must be given to the Academic Unit. A copy will be sent to the student and to the Dean of Graduate Studies. Subsequent meetings must occur at least annually, with a report filed after each meeting.
5. The student must present the thesis seminar of 20-30 minutes duration prior to submission of the thesis to the School of Graduate

Studies.

- The thesis shall conform to the School of Graduate Studies **General Regulations, Theses and Reports**.

31.1.3 Evaluation

- In order to continue in the School of Graduate Studies and in order to qualify for a Master's Degree a student shall obtain a grade of 'A' or 'B' in each program course as per **General Regulations, Evaluation, Evaluation of Graduate Students**.
- The Supervisor and the Supervisory Committee may recommend that a student be required to withdraw from the program, if after consultation with the student, it is determined that the student is not making satisfactory progress towards completion of the program and unsatisfactory progress is unlikely to be corrected.

31.1.4 Thesis

A student must meet the requirements as outlined under the School of Graduate Studies **General Regulations, Theses and Reports**.

31.1.5 Courses

FISH 6000 Science Communication for Fisheries
 FISH 6001 Ecology, Management, and Practice of North Atlantic Fisheries
 FISH 6002 Data Collection, Management, and Display
 FISH 6003 Statistics and Study Design for Fisheries Science

31.2 Fisheries Science (Stock Assessment)

The Degree of Master of Science in Fisheries Science (Stock Assessment) is a research-focussed Master's degree offered by the School of Fisheries at the Fisheries and Marine Institute. This program is for students who aim to pursue a specific career in quantitative stock assessment of fisheries. The Degree is normally offered to full-time students. These regulations must be read in conjunction with the **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland.

31.2.1 Qualifications for Admission

- Admission is limited and competitive. To be considered for admission an applicant will normally hold at least a high second class Honours Degree, or an M.D. Degree, or the equivalent of either, both in achievement and depth of student, from an institution recognized by the University Senate.
- Applicants must be able to demonstrate a satisfactory knowledge of mathematics, statistics, and scientific computing.
- Any other applicant may be considered for admission provided that:
 - the applicant's undergraduate record after the first year shows an average of at least a grade of 'B' in courses in the proposed field of specialization;
 - the applicant's overall undergraduate record after the first year shows an average of at least a grade of 'B' in all courses taken, and;
 - the applicant demonstrates a commitment and passion for mathematics or statistics, through employment or experience in field schools, research programs, regulatory agencies or government departments, non-governmental organizations, consulting activities, or other relevant activities.
- Applicants must meet the English Proficiency Requirements described under **General Regulations, English Proficiency Requirements**.

31.2.2 Program of Study and Research

Every student for the Master of Science in Fisheries Science (Stock Assessment) degree shall normally be required to complete all of:

- 12 credit hours including:
 - FISH 6000 Science Communication for Fisheries
 FISH 6001 Ecology, Management, and Practice of North Atlantic Fisheries
 FISH 6004 Overview of Statistical Stock Assessment
 FISH 6005 Advanced Statistical Stock Assessment
 - A thesis composed of at least one chapter of original research.
- A student will normally complete course requirements in the first four semesters of the program.
- Within three months of the first registration in the M.Sc. degree program, the student will meet with their Supervisory Committee. A meeting report, signed by all members of the Supervisory Committee and student, must be given to the Academic Unit. A copy will be sent to the student and to the Dean of Graduate Studies. Subsequent meetings must occur at least annually, with a report filed after each meeting.
- A student may be required by the Supervisory Committee to take additional courses.
- The student must present the thesis seminar of 20-30 minutes duration prior to submission of the thesis to the School of Graduate Studies.
- The thesis shall conform to the School of Graduate Studies **General Regulations, Theses and Reports**.

31.2.3 Evaluation

- In order to continue in the School of Graduate Studies and in order to qualify for a Master's Degree a student shall obtain a grade of 'A' or 'B' in each program course as per **General Regulations, Evaluation, Evaluation of Graduate Students**.
- The Supervisor and the Supervisory Committee may recommend that a student be required to withdraw from the program, if after consultation with the student, it is determined that the student is not making satisfactory progress towards completion of the program and the unsatisfactory progress is unlikely to be corrected.

31.2.4 Thesis

A student must meet the requirements as outlined under the School of Graduate Studies **General Regulations, Theses and Reports**.

31.2.5 Courses

FISH 6000 Science Communication for Fisheries
 FISH 6001 Ecology, Management, and Practice of North Atlantic Fisheries
 FISH 6004 Overview of Statistical Stock Assessment
 FISH 6005 Advanced Statistical Stock Assessment

32 Regulations Governing the Degree of Master of Science in Kinesiology

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hkr
www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Science in Kinesiology (M.Sc. (Kinesiology)) is offered to qualified full-time and part-time students by the School of Human Kinetics and Recreation. The **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland outlined in the current Calendar, and the Degree Regulations of the School of Human Kinetics and Recreation outlined below will apply to the Master of Science in Kinesiology program.

32.1 Qualifications for Admission

1. The admission requirements for the Master of Science in Kinesiology are as given under the **General Regulations** of the School of Graduate Studies. Admission is limited and competitive. The deadline for receipt of applications is April 1 for admission into the subsequent Fall semester. Preference for admission may be given to students with undergraduate degrees in relevant disciplines, with a minimum overall B average. Applications submitted through the School of Graduate Studies will be evaluated by the Graduate Studies Committee of the School of Human Kinetics and Recreation. Admission of a student to the program shall be made by the Dean of Graduate Studies.
2. Only in exceptional circumstances, and only on the recommendation of the Dean of the School of Human Kinetics and Recreation, shall the Dean of Graduate Studies consider applicants who do not meet the requirements above.

32.2 Program and Degree Requirements

1. The program of a student for the Master of Science in Kinesiology shall be the responsibility of the Supervisory Committee, composed of the Supervisor and at least one other faculty member recommended with the concurrence of the Supervisor by the Dean of the School, or delegate.
2. Students for the Master of Science in Kinesiology shall be required to complete a minimum of 12 credit hours plus a thesis. Either HKR 6000 or HKR 6001 is normally required for all students. In addition, all on-campus students shall be required to complete four semester-length seminars represented by registration and successful completion of HKR 6314 (a non-credit, repeatable course) in each of four semesters during their tenure in the program. Off-campus or part-time students who cannot attend the on-campus seminar series can substitute 24 hours of participation in (over their two-year tenure) and one presentation at national, provincial or regional conferences, workshops, professional development seminars, or equivalent activities. The remaining course requirements will be selected, in agreement with the Supervisory Committee, to reflect the kinesiology areas of specializations offered with the School.
3. It is the responsibility of the student to arrange regular meetings with their supervisory committee. An annual report, prepared by the Supervisor and signed by all members of the Supervisory Committee and the student, is submitted to the Dean of the School of Human Kinetics and Recreation (or delegate) as required by the School of Graduate Studies.
4. Depending on the background of the student or the student's area of intended specialization, a student's program may be modified. Such modifications may include a reduction in course requirements where a student demonstrates that the student brings graduate level competency to their program in specific areas, or may include additional graduate or undergraduate courses, as specified by the student's Supervisory Committee. A minimum of three courses or 9 credit hours completed in the School of Human Kinetics and Recreation is mandatory.
5. A student completing a Master of Science in Kinesiology will be required to present a thesis proposal for the student's proposed thesis normally by the end of the third semester of study. The thesis proposal shall normally consist of a full written proposal (including literature review) submitted to the Supervisory Committee, a summary to be distributed to graduate students and faculty one week prior to the presentation and a formal presentation normally at the seminar series. The student may be questioned on the student's proposal by the Supervisory Committee and seminar audience. Any deficiencies noted during the presentation should be carefully considered by the student and the Supervisory Committee prior to proceeding with the thesis.
6. All graduate students are expected to attend and participate in the School of Human Kinetics and Recreation seminars and thesis proposal presentations.
7. In conjunction and collaboration with other Faculties and Schools of Memorial University of Newfoundland, students may pursue their special interests through electives from departments/schools outside the School of Human Kinetics and Recreation. These courses must be approved by the Graduate Studies Committee and the Dean of Graduate Studies in the preceding semester.
8. Students may apply for transfer course credits. All course transfers require the approval of the Dean of Graduate Studies, on the recommendation of the Dean of the School of Human Kinetics and Recreation, and are subject to General Regulation **Program Requirements, Transfer of Course Credits** of the School of Graduate Studies.

32.3 Evaluation

1. In order to continue as a student for a Master of Science in Kinesiology Degree, a student who receives a final grade of 'C' or less in a program course must repeat that course and obtain a minimum grade of 'B'. In the case of an elective course a suitable replacement course, acceptable to the Graduate Studies Committee of the School of Human Kinetics and Recreation, may be substituted for the failed course. Only one such repetition/replacement shall be permitted in the student's graduate program. Should a grade of lower than 'B' be obtained in the repeated course/replacement course, or any other program course, the student shall be required to withdraw from the program.
2. When the Graduate Studies Committee of the School of Human Kinetics and Recreation has determined, through consultation with the student, the instructors of graduate courses and the program advisor or thesis Supervisor that the student's work has fallen below satisfactory level, it may request that the Dean of the School of Human Kinetics and Recreation recommend to the Dean of Graduate Studies that the student's program be terminated.

32.4 Period of Study

The period of study for a graduate program shall not normally exceed seven years beyond first registration.

1. A student in full-time attendance may register for a maximum of 12 credit hours in any regular semester and a maximum of 6 credit hours in intersession or summer session.
2. A student in part-time attendance may register for a maximum of 3 credit hours in any semester, including intersession or summer session.

32.5 Thesis

The School of Graduate Studies General Regulation describes the requirements in **Theses and Reports**.

32.6 Courses

6000 Quantitative Research Methods
 6001 Qualitative Research Methods
 6003 Physical Education, Culture and Society
 6111 Canadian Delivery Systems in Physical Education, Recreation and Sport
 6120 Curriculum Development in Physical Education
 6121 Physical Education Leadership
 6122 Comprehensive School Health
 6123 Coaching and Long-term Athlete Development
 6124 Adapted Physical Activity
 6130 Computer Applications for Physical Activity Measurement and Intervention
 6201 Foundations of Sport Psychology and Mental Training Techniques
 6202 Intervention and Enhancement Techniques in Mental Training Consultation
 6203 Sport Psychology Consulting
 6310 Exercise Physiology I
 6314 Graduate Seminar Series (repeatable, non-credit)
 6320 Exercise Physiology II
 6330 The Application and Implementation of Kinesiology Technologies
 6340 Occupational Biomechanics
 6350 Human Error in Complex Work Systems
 6360 Knowledge Translation: Applications to Ergonomics and Occupational Health and Safety
 6370 Movement and Neural Science
 6410 Sport and Society
 6500 Introduction to Research in Physical Education
 6710-6719: Individual Reading and Research in Special Areas of Exercise and Work Physiology
 6720-6729: Individual Reading and Research in Special Areas of Biomechanics and Ergonomics
 6730-6739: Individual Reading and Research in Special Areas of Psychology of Sport, Exercise and Leisure

33 Regulations Governing the Degree of Master of Science in Management

www.mun.ca/sgs/contacts/sgscontacts.php

www.business.mun.ca

www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Science in Management is a research-focused Master's degree offered by the Faculty of Business Administration. The Degree is offered to full-time students in four areas in management: (1) **General Management**; (2) **Human Resources Management/Organizational Behavior**; (3) **Information Management**; and (4) **Operations Management**. These regulations must be read in conjunction the **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland.

33.1 Qualifications for Admission

Admission is limited and competitive. General qualifications for admission to Masters Programs at Memorial University of Newfoundland are set out under **General Regulations, Qualifications for Admission**. In addition, the following admission requirements will apply:

1. A Graduate Management Admissions Test (GMAT) score of at least 600. A Graduate Records Examinations (GRE) score of at least 310 will be accepted in lieu of GMAT scores.
2. An applicant who did not complete a four-year baccalaureate degree at a recognized university where English is the primary language of instruction must normally complete either the:
 - a. Test of English as a Foreign Language (TOEFL) and achieve a paper-based score of 580 or higher, computer-based score of 237 or higher, or Internet-based score of 92-93 or higher; or
 - b. International English Language Testing System (IELTS) and achieve a score of 7 or higher.

33.2 General Program Requirements

1. The program of study for the Master of Science in Management Degree is the responsibility of the Supervisor.
2. It is the responsibility of the Supervisor to meet regularly (at least annually) with the student and to provide guidance at all stages of the student's program. An annual report prepared by the Supervisor and signed by the student and the Supervisor is required to be submitted to the Director of the Master of Science in Management Program (Faculty of Business Administration).
3. Course requirements are set by each of the program areas and are described under **Program Areas** below.
4. In addition to courses and research, graduate students are expected to participate in Faculty of Business Administration seminars.
5. The Master of Science in Management program requires the successful completion of a written thesis. See School of Graduate Studies **General Regulations, Theses and Reports** regarding thesis examination.

33.3 Program Areas

Program areas are available in **General Management**, **Human Resources Management/Organizational Behavior**, **Information Management**, and **Operations Management**. The program requirements for each program area are outlined below:

33.3.1 General Management Program Requirements

Business 9901; Business 9923; Business 9927; one of Business 8103, Business 9903 or Business 9904; two electives chosen from any other graduate course(s) approved by the student's supervisor.

33.3.2 Human Resources Management/Organizational Behavior Program Requirements

Business 9901; Business 9920, Business 9921; Business 9924, Business 9925; one of Business 8103, Business 9903 or Business 9904.

33.3.3 Information Management Program Requirements

Business 9901; one of Business 8103, Business 9902, Business 9903 or Business 9904; two of Business 9911, Business 9913, Business 9915 or Business 9918; two other graduate courses approved by the student's supervisor.

33.3.4 Operations Management Program Requirements

Business 9901; Business 9910; one of Business 8103, Business 9902, Business 9903 or Business 9904; one of Business 9912, Business 9914, or Business 9917; and two other graduate course approved by the student's supervisor.

33.4 Courses

A selection of courses will be offered to meet the requirements of students as far as the resources of the Faculty of Business Administration will allow.

8103 Statistical Applications in Management
 9901 Approaches to Management Research
 9902 Modeling Methods in Management Research (*prerequisite: 9901*)
 9903 Quantitative Methods in Management Research (*prerequisite: 9901*)
 9904 Qualitative Methods in Management Research (*prerequisite: 9901*)
 9910 Optimization
 9911 Data and Process Models in Information Systems Development
 9912 Probabilistic Models
 9913 Human-Computer Interaction and Decision Support Systems
 9914 Supply Chains: Models and Management
 9915 Electronic Commerce
 9917 Special Topics in Operations Management
 9918 Special Topics in Information Systems
 9920 Foundations in Organizational Behaviour
 9921 Foundations in Human Resource Management
 9923 Foundations in Organization Theory
 9924 Current Issues in Organizational Behaviour
 9925 Current Issues in Human Resource Management
 9927 Current Issues in Organization Theory

34 Regulations Governing the Degree of Master of Science in Maritime Studies (Safety: The Human Element)

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/socwrk
www.mun.ca/become/graduate/apply/app_deadlines.php

The degree of Master of Science in Maritime Studies is a research-focused Master's degree offered by the School of Maritime Studies, at the Fisheries and Marine Institute. The degree of Master of Science in Maritime Studies is offered, at present, in Safety: The Human Element.

An Academic Advisory Committee will be appointed by the Dean of Graduate Studies on the recommendation of the Vice-President (Marine Institute). This Committee will consist of an Academic Director as Chair, three members from the Marine Institute, and two members from other academic units of the University. Normally, all appointments will be for a period of three years.

Every student in graduate studies shall comply with the **General Regulations**, the Degree Regulations, and all additional requirements of the appropriate academic unit.

34.1 Maritime Studies (Safety: The Human Element)

The degree of Master of Science in Maritime Studies (Safety: The Human Element) is a research-focused Master's degree offered by the School of Maritime Studies, at the Fisheries and Marine Institute. This program is for students who aim to pursue a career in maritime studies, and includes skills training that will empower students to conduct publication-quality research in areas of safety and survival. The degree is normally offered to full-time students.

These regulations must be read in conjunction with the **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland.

34.2 Qualifications for Admission

1. Admission is limited and competitive. To be considered for admission an applicant will normally hold at least a high second class Honours Degree (from areas such as, but not limited to, emergency management, engineering, kinesiology, maritime studies, occupational therapy, physiotherapy, psychology), or an M.D. Degree, or the equivalent of either, both in achievement and depth of study, from an institution recognized by the Senate.
2. The applicant demonstrates a commitment and passion for safety and survival. Experience in research programs, marine-based

industries (e.g., fisheries, oil and gas), marine transport, firefighting, search and rescue, regulatory agencies or government departments, non-governmental organizations, consulting activities, or other relevant activities is considered an asset.

3. Any applicant who does not hold a high second class Honours Degree or an M.D. Degree may be considered for admission provided that:
 - a. the applicant's undergraduate record after the first year shows an average of at least Grade 'B' in courses in the proposed field of specialization; and
 - b. the applicant's overall undergraduate record after the first year shows an average of at least Grade 'B' in all courses taken.
4. Admission requirements related to English proficiency follows and are described under **General Regulations, English Proficiency Requirements** of the School of Graduate Studies.

34.3 Program of Study and Research

1. Every student in the Master of Science in Maritime Studies (Safety: The Human Element) program shall be required to complete all of:
 - a. 12 credit hours of core course work, including MARI 6000, MARI 6001, MARI 6002, and MARI 6003;
 - b. 3 credit hours of course work relevant to the student's research area and chosen in consultation with the supervisor; and
 - c. a thesis composed of at least one manuscript of original research.
2. Students may be required by their Supervisory Committee to take additional courses.
3. All program course requirements should be completed within four semesters from the date of first registration in the M.Sc. degree program. Students will normally complete course requirements in their first three semesters.
4. Within three months of the first registration in the M.Sc. degree program, the student will meet with their Supervisory Committee. A meeting report, signed by all members of the Supervisory Committee and student, must be given to the Academic Unit. A copy will be sent to the graduate student and to the Dean of Graduate Studies. Subsequent meetings must occur at least annually, with a report filed after each meeting.
5. The student shall complete a written thesis proposal that is approved by the Supervisor and Supervisory Committee and normally submitted within twelve months of the first registration in the M.Sc. degree program. The proposal shall be provided to the Head for inclusion in the student's file.
6. The student must present a thesis seminar of 20-30 minutes duration prior to submission of the thesis to the School of Graduate Studies.
7. Theses shall conform to **General Regulation Theses and Reports** of the School of Graduate Studies.

34.4 Evaluation

1. In order to continue in the School of Graduate Studies and in order to qualify for a Master's degree, a student shall obtain an 'A' or 'B' grade in each program course as indicated under **General Regulation, Evaluation, Evaluation of Graduate Students** of the School of Graduate Studies.
2. The Supervisor and the Supervisory Committee may recommend that a student be required to withdraw from the program, if after consultation with the student, it is determined that the student is not making satisfactory progress towards completion of the program and the unsatisfactory progress is unlikely to be corrected.

34.5 Thesis

Theses shall conform to **General Regulation Theses and Reports** of the School of Graduate Studies.

34.6 Courses

MARI 6000 Introduction to Maritime Safety and Survival Research

MARI 6001 Statistics and Research Design for Maritime Studies

MARI 6002 Science Communication for Maritime Studies (*may be offered in accelerated format*)

MARI 6003 Human Factors in Safety and Survival (*may be offered in accelerated format*)

MARI 6004 Special Topics in Safety and Survival (Learning) (*prerequisite: MARI 6000*)

MARI 6005 Special Topics in Safety and Survival (Human Behavior) (*prerequisite: MARI 6000*)

MARI 6006 Special Topics in Safety and Survival (Engineering Technology) (*prerequisite: MARI 6000*)

35 Regulations Governing the Degree of Master of Science in Medicine

www.mun.ca/sgs/contacts/sgscontacts.php

www.med.mun.ca

www.mun.ca/become/graduate/apply/app_deadlines.php

The Faculty of Medicine offers the degree of Master of Science in Medicine in eight program areas: Applied Health Services Research, Cancer and Development, Cardiovascular and Renal Sciences, Clinical Epidemiology, Community Health, Human Genetics, Immunology and Infectious Diseases, and Neurosciences. The Faculty of Medicine also offers the degrees of Master of Health Ethics and Master of Public Health. Each program area has a Co-ordinator/Principal who is responsible for communicating the interests of the programs to the Faculty of Medicine Graduate Studies Committee and participates in the admission of graduate students into the program in Medicine.

The Degree of Master of Science in Medicine (in all of the programs excluding the Applied Health Services Research Program) is offered in the Faculty of Medicine to full-time and part-time students. The Applied Health Services Research program is offered by full-time study only. The graduate diploma programs in Community Health and Clinical Epidemiology are offered to full-time and part-time students.

The following regulations will apply in conjunction with the **General Regulations** of the School of Graduate Studies.

35.1 Master of Science in Medicine

35.1.1 Qualification for Admission

The admission requirements for each of the M.Sc. program areas in Medicine are described under Programs of Study.

35.1.2 General Program Requirements

1. The program of study for the M.Sc. in Medicine Degree is the responsibility of the Supervisory Committee composed of a Supervisor and at least two other faculty members.
2. It is the responsibility of the supervisory committee to meet regularly (at least annually) with the student and to provide guidance at all stages of the student's program. An annual report prepared by the Supervisor and signed by the student and all members of the committee is required to be submitted to the Assistant Dean of Research and Graduate Studies (Medicine).
3. Course requirements are set by each of the program areas and are described under **Programs of Study**.
4. In addition to courses and research, graduate students are expected to participate in Faculty of Medicine seminars and journal clubs.
5. The M.Sc. in Medicine requires the successful completion of a research project and a written thesis.

35.1.3 Program Areas

35.1.3.1 Applied Health Services Research

The Applied Health Services Research program is jointly offered by the University of New Brunswick (UNB), Memorial University of Newfoundland (MUN), and the University of Prince Edward Island (UPEI). Students will be educated in an interdisciplinary environment and will develop a substantive understanding of: the Canadian health system, the conduct of ethical research, critical appraisal, appropriateness of research design for particular policy questions and determinants of health models. They will also gain first-hand exposure in a decision-making/policy environment and learn how to conduct research through completion of a thesis. Access to specific computer software and the Internet is required and will be the responsibility of each student.

1. **Administration**
 - a. An Advisory Board, consisting of the Deans of Graduate Studies, the Principals from each site, plus student representation as well as health care decision makers and stakeholders from the Atlantic Region will oversee the academic program across the Universities and ensure program integrity.
 - b. A Program Management Committee, consisting of the Principals from UNB, Memorial University of Newfoundland, and UPEI will oversee the operation of the program.
 - c. At Memorial University of Newfoundland, the program shall be administered through the Office of Research and Graduate Studies (Faculty of Medicine) by a Principal who shall be appointed by the Dean of Graduate Studies on the recommendation of the Dean, Faculty of Medicine.
2. **Qualifications for Admission**
 - a. Admission is limited and competitive. To be considered for admission to the program, an applicant shall normally have a bachelor's degree with a minimum 75% average (or equivalent) from an institution recognized by the Senate. Normally, students should have completed an undergraduate course in statistics.
 - b. Students are normally admitted to the Fall semester (September). The deadline for receipt of applications is March 1. Late applications will only be considered if admissions decisions have not yet been made.
3. **Program Requirements**
 - a. All students will be required to successfully complete seven core courses, a four-month residency placement and a thesis. In addition, students must participate in five conference workshops.
 - b. Prior to submission of the thesis to the School of Graduate Studies for examination (see **General Regulation Theses and Reports**), students shall present an open seminar.
 - c. Outline of program of study:

Outline of Program of Study

Term	Required Courses
Semester 1 Fall	Workshop 1 Theme: Orientation to first year MED 6282 MED 6284 MED 6286 Workshop 2 Theme: Research Issues and Critical Appraisal
Semester 2 Winter	MED 6288 MED 6290 Workshop 3 Theme: Policy and Decision Making
Semester 3 Spring	Residency Placement: All students are required to complete a 16-week residency placement. The residency placement is negotiated by the Principal in consultation with the student and governed by the agreements outlined in the Atlantic Regional Training Centre residency manual. Workshop 4 Theme: Orientation to second year
Semester 4 Fall	MED 6293 MED 6294 or MED 6295 Workshop 5 Theme: Communication and Dissemination
Semester 5 & 6 Winter & Spring	Thesis, including public presentation

35.1.3.2 Cancer and Development

The graduate program in Cancer and Development offers study in fundamental cell and molecular biological areas including viral oncogenesis, growth factors, and oncogenes in developmental models, programmed cell death and drug resistance.

1. Qualifications for Admission

The admission requirements are as given under the **General Regulations** governing Master's degrees. All courses in the program have as a prerequisite, successful completion of an advanced, upper-level biochemistry, biology or medical course, with an emphasis on molecular biology or medicine.

2. Program Requirements

All students are required to attend, for credit, and participate in the Cancer and Development Journal Club (Cancer, Seminars, MED 6400, 6401, 6402, 6403). One other graduate course (chosen from MED 6580, 6590, 6591, 6340, 6341, or 6342) is required for M.Sc. Medicine students although other courses may be required in individual cases.

35.1.3.3 Cardiovascular and Renal Science

The graduate program in Cardiovascular and Renal Sciences enables students to pursue research and academic studies in selected topics including hypertension and stroke, neural and endothelial control of vasculature and blood pressure as well as physiological mechanisms promoting heart failure.

1. Qualifications for Admission

The admission requirements are as given under the **General Regulations** governing Master's degrees.

2. Program Requirements

Students will be required to take a minimum of two graduate courses. Basic Cardiovascular and Renal Physiology (MED 6140) is required and must be taken within 1.5 years after entry into the program. Students will choose a second course from MED 6141, 6142, 6143, 6144, or 6194 or any other graduate course approved by the student's supervisory committee.

35.1.3.4 Clinical Epidemiology

The program in Clinical Epidemiology is aimed at university graduates intending a career in health services, faculty members seeking advanced training in clinical epidemiology, medical doctors and other health care professionals interested in health research.

1. Qualifications for Admission

The admission requirements are as given under the **General Regulations** governing Master's degrees. In exceptional circumstances, a professional equivalent qualification will be considered for admission.

2. Program Requirements

- a. Students are required to take: MED 6262, MED 6250, MED 6255, or MED 6260, plus a minimum of one elective. Electives are normally chosen from MED 6095, MED 6263 and MED 6265 as recommended by the supervisory committee and approved by the Director or Coordinator. In addition students are required to take the Seminar Series (MED 6400, 6401, 6402 and 6403). MED 6250 and MED 6262 are normally completed in the Fall semester. MED 6255 and MED 6260 are normally completed in the Winter semester.
- b. Students are expected to give an oral presentation or course lecture in each year of their program.

35.1.3.5 Community Health

The graduate program in Community Health enables students to pursue research and academic studies in selected topics including community health, epidemiology, socio-behavioural health, biostatistics, health services utilization, health policy, and health promotion.

1. Qualifications for Admission

The admission requirements are as given under the **General Regulations** governing Master's degrees. In exceptional circumstances, a professional equivalent qualification will be considered. Students are expected to have successfully completed at least one basic university-level statistics course.

2. Program Requirements

Students are required to take three core courses: MED 6220, MED 6270, and MED 6280; 2 core stream courses: either the quantitative stream, consisting of MED 6200 and MED 6275 or the qualitative stream, consisting of MED 6294 and MED 6102; and 1 elective; and to attend, for credit, and participate in four semester-length seminar courses (MED 6400-6403).

Graduate students of the Division of Community Health and Humanities may be required to participate in education experiences which occur outside of the St. John's metropolitan area. Students may be responsible for their own associated transportation and accommodation.

35.1.3.6 Human Genetics

The graduate program in human genetics will enable students to pursue academic studies and research in a number of areas of genetics including molecular genetics, genomics, genetics of complex traits, genetic epidemiology, gene mapping, medical genetics, birth defects, and population genetics. Faculty members from all three divisions of the Faculty of Medicine (BioMedical Sciences, Community Health and Humanities, and the Clinical Disciplines) participate in the program.

1. Qualifications for Admission

The admission requirements are as given under the General Regulations governing Master's degrees. Applicants with backgrounds in the fields of genetics, biochemistry and biology are preferred.

2. Program Requirements

- a. Students will be required to complete a minimum of two graduate courses. Within the Human Genetics program the following courses are offered: Human Molecular Genetics (MED 6393), Human Population Genetics (MED 6390), Applied Human Genetics (MED 6392), Cancer Genetics (MED 6394), Genetic Epidemiology (MED 6395) and Selected Topics in Human Genetics (MED 6391). In addition, there are a number of courses in other graduate programs which could be suitable for some students in this program, including Epidemiology I (MED 6270), Molecular Biology of Cancer (MED 6580), Molecular Biology I (MED 6590) and Molecular Biology II (MED 6591). Course selection for each student is determined by the supervisory committee in consultation with the student and is based on the area of study and past course credits.
- b. Students must also participate in the Genetics Seminar Series (MED 6400, 6401, 6402, 6403) and are expected to participate in other Discipline of Genetics activities including an annual graduate student research forum.

35.1.3.7 Immunology and Infectious Diseases

The Immunology and Infectious Diseases group has an interdisciplinary character and consists of faculty from biomedical science. The graduate programs are designed to provide individualized training oriented towards basic research and a solid and scientific background in the discipline of immunology and infectious diseases.

1. Qualifications for Admission

The admission requirements are as given under the General Regulations governing Master's degrees. A Bachelor of Science Degree or equivalent is required.

2. Program Requirements

Students in the program are required to take a minimum of two courses. Students will choose from: MED 6114, MED 6119, MED 6127, MED 6128, MED 6580 or any other graduate course approved by the student's supervisory committee. Some students may be required to take additional courses depending upon their thesis topic. All students are required to attend, for credit, and participate in the Immunology and Infectious Diseases Seminar Series (MED 6400-6403).

35.1.3.8 Neurosciences

The Neuroscience Program offers graduate studies in an interdisciplinary setting including faculty from biomedical science within the Faculty of Medicine. Graduate students may pursue research in a number of specialty areas including the physiological basis of learning and memory, stroke and neuroplasticity, neuroregeneration, signal transduction mechanisms, neuronal circuitry, neuroimmunology, and membrane physiology.

1. Qualifications for Admission

The admission requirements are as given under the General Regulations governing Master's degrees. It is expected that the students will have had courses in biochemistry, biology and/or psychology with some exposure to basic university-level statistics.

2. Program Requirements

- a. Students in the program are required to take Systems Neuroscience (MED 6196) and one other graduate level course. Additional courses may be required based on the recommendation of the supervisory committee.
- b. Students are expected to attend and participate in the activities of the neuroscience group including the weekly seminar and journal club.

35.2 Graduate Diploma in Medicine

The Faculty of Medicine offers a Graduate Diploma providing an opportunity for professionals and individuals within the health sector to obtain or upgrade their training in Clinical Epidemiology or Community Health.

35.2.1 Qualifications for Admission

To be admitted into the respective graduate diploma program a student must be eligible to register as a graduate student, as described under **General Regulations, Graduate Diploma Programs**. In special circumstances, and upon the recommendation of the Director of Clinical Epidemiology or Associate Dean of Community Health and Humanities, for their respective program, a suitable combination of training and professional experience relevant to that program may be acceptable for admission.

35.2.2 Program Requirements

1. Graduate Diploma in Medicine (Clinical Epidemiology)

A graduate diploma in Clinical Epidemiology requires successful completion of MED 6262, 6250, and 6255 and the completion of two of the Clinical Epidemiology seminar courses: MED 6400 and 6401. Students are expected to give an oral presentation in the seminar series.

2. Graduate Diploma in Medicine (Community Health)

A graduate diploma in Community Health requires successful completion of MED 6220, MED 6270, 3 electives, and 2 semester-length seminar courses (MED 6400-6401).

35.2.3 Graduate Courses

6030-6050 Special Topics
 6070 Seminars in Physiological Instrumentation
 6075 Human Physiology, Performance and Safety in Extreme Environments (HSPE)
 6090-6101 Special Topics
 6102 Critical Theory in Health and Society
 6103-6119 Special Topics
 6127 Immunology I
 6128 Immunology II
 613A/B Advanced Immunological Methods (*same as the former 6130*)
 6131-6139 Special Topics
 6140 Basic Cardiovascular and Renal Physiology
 6141 Cardiovascular/Renal Techniques
 6142 Selected Topics in Cardiovascular and Renal Physiology
 6143 Cardiovascular Anatomy
 6144 Current Concepts in Cardiovascular and Renal Pathophysiology
 6150 Principles of Scholarly Writing for Rural Doctors (may be delivered outside the regular semester timeframe)
 6151 Principles of Research for Rural Doctors (may be delivered outside the regular semester timeframe)
 6180 Structure, Function and Pharmacology of Muscle
 6190 General Pharmacology
 6192 Pharmacology of Receptors and Receptor Effector Coupling Processes
 6193 Advanced Topics in Neuroscience
 6194 Advanced Topics in Physiology
 6195 Neurobiology of Nervous System Diseases
 6196 Systems Neuroscience
 6197 Cellular Neuroscience
 6198 Neuroanatomy for Graduate Students (accelerated format)

6199 Health Sciences: Writing and Grantsmanship
 6200 Biostatistics I (*credit may be obtained for only one of MED 6200 or MED 6262*)
 6220 Introduction to Community Health
 6225 Health Inequities and the Social Determinants of Health
 6226 Postcolonial Theory: Considering the "Other" in Science, Medicine and Bioethics
 6250 Basic Clinical Epidemiology
 6255 Clinical Research Design
 6260 Applied Data Analysis for Clinical Epidemiology
 6262 Biostatistics in Clinical Medicine (*credit may be obtained for only one of MED 6200 or MED 6262*)
 6263 Conducting and Publishing Systematic Review and Meta-analysis
 6265 Genetics and Clinical Epidemiology
 6268 Patient Engagement in Health Research
 6270 Epidemiology I
 6274 Chronic Disease Epidemiology
 6275 Epidemiology II
 6276 Current Topics in Canada's Health Care System
 6277 Issues in Northern, Rural and Remote Health in Canada
 6278 Advanced Biostatistics for Health Research
 6279 Quantitative Methods for Applied Health Research
 6280 Community Health Research Methods
 6281 Theory and Approaches to Medical Publication
 6282 Canadian Health Care System
 6284 Research and Evaluation Design and Methods
 6286 Ethical Foundations of Applied Health Research
 6288 Policy and Decision Making
 6290 Determinants of Health: Healthy Public Policy
 6292 Qualitative and Quantitative Methods for Health Services Research
 6293 Knowledge Transfer and Research Uptake
 6294 Advanced Qualitative Methods
 6295 Advanced Quantitative Methods
 6296 Residency
 6297 Theories of Social Justice in Health
 6340 Research Topics in Cancer I
 6341 Research Topics in Cancer II
 6342 Basic Principles of the Pathology of Cancer
 6390 Human Population Genetics
 6391 Selected Topics in Human Genetics
 6392 Applied Human Genetics
 6393 Human Molecular Genetics
 6394 Cancer Genetics
 6395 Genetic Epidemiology
 6400 Research Seminars for M.Sc. Students I (one-credit hour)
 6401 Research Seminars for M.Sc. Students II (one-credit hour)
 6402 Research Seminars for M.Sc. Students III (one-credit hour)
 6403 Research Seminars for M.Sc. Students IV (one-credit hour)
 6410 Research Seminars for Ph.D. Students I (one-credit hour)
 6411 Research Seminars for Ph.D. Students II (one-credit hour)
 6412 Research Seminars for Ph.D. Students III (one-credit hour)
 6413 Research Seminars for Ph.D. Students IV (one-credit hour)
 6420 Medical Science/Social Responsibility in Health Care: Aspects of Medical History (*same as History 6125*)
 6580 Molecular Biology of Cancer (*prerequisites: Biology 4241, Biochemistry 4100 [or equivalent]*)
 6590 Molecular Biology I (*cross-listed as Biology 6590 and credit-restricted with Biochemistry 6590*) *prerequisites: Biology 4241 (or equivalent)*
 6591 Molecular Biology II (*cross-listed as Biology 6591 and credit-restricted with the former Biochemistry 6591*) *prerequisites: Biology 4241 (or equivalent)*
 6592 Practicing and Teaching Professionalism
 6900 Medical Geography I - Introduction to Geographic Information Science and Spatial Analysis in Health
 6901 Medical Geography II - Geospatial Analysis and Modelling in Health *prerequisite: 6900*
 6950 Simulation & Technology-based Learning in the Health Professions
 6951 Assessment and Evaluation in Health Professions Education (*cross-listed as Pharmacy 6951*)
 6953 Current Perspectives and Advances in Medical Education

36 Regulations Governing the Degree of Master of Science in Nursing

www.mun.ca/sgs/contacts/sgscontacts.php
<https://www.mun.ca/become/graduate/programs/nursing.php>
www.mun.ca/become/graduate/apply/app_deadlines.php

The Master of Science in Nursing (Nurse Practitioner) Program and the Post-Master's Nurse Practitioner Graduate Diploma are approved by the College of Registered Nurses of Newfoundland and Labrador (CRNNL). The CRNNL approval designation assures both the public and our students that the programs prepare ethical entry-level nurse practitioners who provide safe quality health care. These programs prepare graduates to meet the requirements for licensure and professional practice as nurse practitioners in Newfoundland and Labrador.

36.1 Program

1. The responsibility for the administration of all graduate programs shall reside with the Dean of Graduate Studies.
2. Applicants for the program shall be required to apply for admission to the Dean of the School of Graduate Studies and shall be expected to follow the regulations, policies, and practices required of the School. Deadline for receipt of applications should be no later than February 15. If space is available, students who apply after the deadline date may be accepted.
3. The Faculty of Nursing offers a Master of Science in Nursing (M.Sc.N.) Program with two options: Practicum and Nurse Practitioner as well as a **Graduate Diploma in Nursing (Post Master's Nurse Practitioner)**.

36.2 Qualifications for Admission

1. Applicants to the Master of Science in Nursing program in any of the two options listed above must have a baccalaureate degree in nursing from an accredited program in Canada or an equivalent from a non-Canadian institution recognized by the University, and a knowledge of nursing satisfactory to the Faculty of Nursing.
2. Admission to the program is limited and competitive. To be considered for admission, the applicant must have maintained at least a grade 'B' standing in the baccalaureate program.
3. Applicants are also required to have a minimum of one year of experience (1950 hours) in nursing practice for the Practicum Option or two years of experience (3900 hours) in nursing practice for the nurse practitioner options prior to submitting their application. In addition, applicants must have completed an undergraduate nursing research course (minimum 'B' standing) and an undergraduate statistics course (minimum 'B' standing).
4. For the Practicum option applicants must hold a practising licence and be in good standing from the College of Registered Nurses of Newfoundland and Labrador or must be currently registered and be in good standing as a practising nurse in another Canadian jurisdiction. Applicants from other countries who do not meet the above criteria will be assessed on an individual basis. However, they must submit proof of registration and standing as a practising nurse (or an equivalency) from their country or jurisdiction. Students in the program are expected to maintain their practicing licence and remain in good standing with the appropriate regulatory body throughout their graduate program.
5. Since all clinical placements are completed at a clinical setting in Canada, applicants to the Nurse Practitioner and Graduate Diploma option must hold a practicing licence and be in good standing from the College of Registered Nurses of Newfoundland and Labrador or must be currently registered as a practicing nurse in good standing in another Canadian jurisdiction where they will complete their clinical placements. Students must maintain their practicing licensure and be in good standing for the full duration of the program.
6. In addition to requirements 1. and 4., applicants seeking admission to the **Graduate Diploma in Nursing (Post Master's Nurse Practitioner)** program must have completed a Master's degree (minimum 'B' standing) in Nursing or an equivalent degree with a nursing focus, a graduate level statistics course (minimum 'B' standing), a graduate level research course (minimum 'B' standing), a graduate level nursing theories course (minimum "B" standing), a Bachelor's degree (minimum 'B' standing) in Nursing, and have two years of clinical nursing experience preferably in their chosen specialty area.
7. In addition to requirements 1., 4., and 5. applicants seeking admission to the Master of Science in Nursing, Nurse Practitioner Option and the **Graduate Diploma in Nursing (Post Master's Nurse Practitioner)** program will note that preference will be given to applicants who are living and working as Registered Nurses in Newfoundland and Labrador. On average, a very limited number of applicants from outside the province are accepted each year.
8. Only in exceptional circumstances and only on the recommendation of the Faculty of Nursing shall the Dean of Graduate Studies consider applicants who do not meet admission requirements listed above.

36.3 Registration

See School of Graduate Studies **General Regulations, Registration.**

36.4 Programs of Study

There are two routes offered that lead to a Master of Science in Nursing Degree: the **Practicum Option** and the **Nurse Practitioner Option**. In addition to the M.Sc.N. Degree program, the Faculty of Nursing also offers a **Graduate Diploma in Nursing (Post Master's Nurse Practitioner)**.

36.4.1 Practicum Option

1. Students must complete an approved program of study consisting of a minimum of 24 credit hours in graduate program courses and 6 credit hours in practicum courses.

Required courses:

6011 Philosophical and Theoretical Foundations of Nursing
 6012 Statistics for Advanced Nursing Practice
 6013 Research Methods in Nursing
 6221 Population-based Nursing (equivalent to N6220 and N6230)
 6240 Nursing Individuals and Families Through Life Transitions (equivalent to N6200 and N6210)
 6250 Writing for Advanced Nursing Practice
 6260 Knowledge Translation in Nursing
 6270 Leading Change in Nursing

The following practicum courses:

6660 Practicum 1
 6661 Practicum 2

2. The program of each student shall be approved by the Dean of Graduate Studies on the recommendation of the Dean of the Faculty of Nursing.

36.4.2 Nurse Practitioner Option

1. Students must complete an approved program of studies consisting of a minimum of 36 credit hours in graduate program courses including an integrated clinical practice experience, comprising 12 credit hours.

Required courses:

6011 Philosophical and Theoretical Foundations of Nursing
 6012 Statistics for Advanced Nursing Practice
 6013 Research Methods in Nursing
 6221 Population-Based Nursing (*equivalent to 6220 and 6230*)
 6250 Writing for Advanced Nursing Practice
 6260 Knowledge Translation in Nursing
 6703 Advanced Health Assessment and Clinical Practicum 1 (4 credit hours)
 6704 Applied Pathophysiology and Clinical Practicum 2 (4 credit hours)
 6705 Pharmacotherapy and Therapeutics
 6706 Nurse Practitioner Roles and Practice Issues

Either one of: 6800 Adult Advanced Clinical Decision Making 3 (4 credit hours), (or the former 6900 Adult Advanced Clinical Decision Making (4 credit hours)), 6802 Family/All Ages Clinical Decision Making 3 (4 credit hours), (or the former 6802 Family/All Ages Clinical Decision Making (4 credit hours)), or, one of: 6803 to 6809 Nursing Specialty Option Courses (4 credit hours)
690X Advanced Clinical Practicum 4 (The Integrated practice component will normally consist of a minimum of 400 hours of preceptored specialty clinical practice and biweekly seminars) (12 credit hours), (or the former 690X 2). The integrated practice component will normally consist of a minimum of 400 hours of preceptored specialty clinical practice and biweekly seminars) (12 credit hours)).

- The program of each student shall be approved by the Dean of Graduate Studies on the recommendation of the Dean of the Faculty of Nursing.
- The maximum time frame from commencement of the first NP specific course until program completion shall normally be no longer than 3 years.
- Students must complete the required clinical hours per course in order to progress in the program and they must complete the required clinical hours for each life stage (for example, children, pregnancy, older adult) by the end of 690X in order to complete the Nurse Practitioner Option.
- Students will be given the opportunity to request their clinical placements in particular locations. While efforts will be made to accommodate requests, students may be assigned to any participating site within Newfoundland and Labrador. Accommodations, travel expenses, and other costs related to the clinical placement are the responsibility of the student.

36.4.3 Graduate Diploma in Nursing (Post Master's Nurse Practitioner)

- Students with a Master's degree in Nursing or an equivalent degree with a nursing focus must complete an approved program of study consisting of a minimum of 18 credit hours in graduate program courses and integrated clinical practice experience, comprising 12 credit hours.

Required courses:

6703 Advanced Health Assessment and Clinical Practicum 1 (4 credit hours)

6704 Applied Pathophysiology and Clinical Practicum 2 (4 credit hours)

6705 Pharmacotherapy and Therapeutics

6706 Nurse Practitioner Roles and Practice Issues

Either one of: 6800 Adult Advanced Clinical Decision Making 3 (4 credit hours), (or the former 6800 Adult Advanced Clinical Decision Making (4 credit hours)), 6802 Family/All Ages Clinical Decision Making 3 (4 credit hours), (or the former 6802 Family/All Ages Clinical Decision Making (4 credit hours)), or, one of: 6803 to 6809 Nursing Specialty Option Courses (4 credit hours)

690X Advanced Clinical Practicum 4 (The integrated practice component will normally consist of a minimum of 400 hours of preceptored specialty clinical practice and biweekly seminars).

- Programs for some students may exceed the above minimum requirements.
- The program for each student shall be approved by the Dean of Graduate Studies on the recommendation of the Dean of the Faculty of Nursing.
- The maximum time frame from commencement of the first NP specific course until program completion shall normally be no longer than 3 years.
- Students must complete the required clinical hours per course in order to progress in the program and they must complete the required clinical hours for each life stage (for example, children, pregnancy, older adult) by the end of 690X in order to complete the program.
- Students will be given the opportunity to request their clinical placements in particular locations. While efforts will be made to accommodate requests, students may be assigned to any participating site within Newfoundland and Labrador. Accommodations, travel expenses, and other costs related to the clinical placement are the responsibility of the student.

36.5 Evaluation

- In order to continue in graduate studies and in order to qualify for a Master's degree or Graduate Diploma, a student shall obtain an 'A' or 'B' grade in each program course.
- When the Dean of the Faculty of Nursing has determined on the basis of consultation with the student, the Associate Dean, Graduate Programs, and the practicum Supervisor, that a student has fallen below a satisfactory level, the Dean of the Faculty of Nursing may recommend to the Dean of Graduate Studies that the student be required to withdraw from the program.

36.6 Courses

A selection of the following graduate courses will be offered to meet the requirements of students as far as the resources of the Faculty of Nursing will allow.

6010 Research in Nursing: Quantitative Methods

6011 Philosophical and Theoretical Foundations of Nursing

6012 Statistics for Advanced Nursing Practice

6013 Research Methods in Nursing

6020 Program Development in Nursing

6031 Education in Nursing

6100 Research in Nursing: Qualitative Methods (*pre or co-requisite: 6011*)

6221 Population-Based Nursing (*equivalent to 6220 and 6230*)

6240 Nursing Individuals and Families Through Life Transitions (*equivalent to 6200 and 6210*)

6250 Writing for Advanced Nursing Practice (*This course is a prerequisite for all other courses for students in the practicum option though may be taken as a co-requisite in the first term of the program*)

6251 Writing Skills for Nurse Practitioners (1 credit hour) (*This course is a prerequisite for all other courses for students in the MN-NP option though may be taken as a co-requisite in the first term of the program*)

6260 Knowledge Translation in Nursing

6270 Leading Change in Nursing

6310-6350 Special Topics in Nursing

6501-6510 Individual Readings and Research in Special Areas

6660 Practicum 1 (*prerequisites: All required courses including 6020 or 6031, and 6240/6221 or 6200/6210 or 6220/6230*)

6661 Practicum 2 (*prerequisite: 6660 Practicum 1*)

6703 Advanced Health Assessment and Clinical Practicum 1 (4 credit hours)

6704 Applied Pathophysiology and Clinical Practicum 2 (4 credit hours) (*prerequisite: 6703*)

6705 Pharmacotherapy and Therapeutics (*prerequisite: 6704*)

6706 Nurse Practitioner Roles and Practice Issues

6800 Adult Advanced Clinical Decision Making 3 (4 credit hours), (or the former 6800 Adult Advanced Clinical Decision Making (4 credit hours)) (*prerequisites: 6705 and 6706*)

6802 Family/All Ages Clinical Decision Making 3 (4 credit hours), (or the former 6802 Family/All Ages Clinical Decision Making (4 credit hours)) One of: 6803 to 6809 Nursing Option Courses (4 credit hours) (*prerequisites: 6705 and 6706*)

690X Advanced Clinical Practicum 4 (*The integrated practice component will normally consist of a minimum of 400 hours of preceptored clinical practice and biweekly seminars*) (12 credit hours), (or the former 690X Advanced Clinical Practicum 2 (*The integrated practice component will normally consist of a minimum of 400 hours of preceptored clinical practice and biweekly seminars*)) (12 credit hours) (*prerequisite: 6800 or 6802*)

37 Regulations Governing the Degree of Master of Science in Pharmacy

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/pharmacy

www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Science in Pharmacy (M.Sc. (Pharm.)) is offered to qualified full-time and part-time students by the School of Pharmacy. The **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland outlined in the current Calendar, and the Degree Regulations of the School of Pharmacy outlined below will apply to the M.Sc. (Pharm.) program. Every student in graduate studies shall comply with the **General Regulations**, the Degree Regulations, and all additional requirements of the School of Pharmacy.

37.1 Qualifications for Admission

Admission to the M.Sc. (Pharm.) program will be offered on the basis of academic excellence. The basic requirements for admission are those established by the School of Graduate Studies of Memorial University of Newfoundland. The minimum qualification for admission is a recognized four-year undergraduate degree in Pharmacy, or a recognized four-year undergraduate degree in physical, chemical or biological science, or equivalent, with an overall B average.

Applications submitted through the School of Graduate Studies will be evaluated by the Graduate Studies Committee of the School of Pharmacy. No student will be admitted to the program without a recommendation of acceptance by the Graduate Studies Committee. Admission of a student to the M.Sc. (Pharm.) program shall be made by the Dean of Graduate Studies.

37.2 Formulation of Program of Study

Upon acceptance to the program, the Supervisor will assess the student's research interests, background, strengths, and weaknesses. The Supervisor will formulate a program of study (see below) and select a supervisory committee for the student. The program of study will be selected on the basis of the thesis research, the background of the student, and the perceived need for specific graduate courses that will complement the student's working knowledge in the student's area of research. The supervisory committee will include the Supervisor, one other academic staff person from the School of Pharmacy, and one external academic staff person from Memorial University of Newfoundland. This committee will advise the student about the student's thesis research. Accordingly, they will meet with the student within two months of the student's initial registration, at the end of the second semester (8th month of study), at the end of the fourth semester (16th month), and immediately before the student begins to write the thesis. Both the program of study and the supervisory committee must be approved by the Graduate Studies Committee.

37.3 Program of Study

1. Minimum requirements for the M.Sc. (Pharm.) Degree will be the successful completion of:
 - a. Six credit hours in program graduate courses chosen from those available in Pharmacy, Medicine, or Biochemistry.
 - b. Pharmacy Seminar
 - c. A thesis embodying original research
2. Graduate courses will be chosen based on the academic background of the student and the area of the student's thesis research.

Note: Qualified students accepted into the program who are considered to have an insufficient background for their thesis research may be required to successfully complete additional courses as selected by their Supervisor.
3. Pharmacy Seminar: All students for the Degree of M.Sc. (Pharm.) will be required to participate in the Pharmacy Seminar during the first two years of their program. Selected topics in pharmaceutical sciences will be presented and discussed by faculty, students and visiting speakers. Graduate students will be required to present one seminar each year. In the second year of study, the graduate student will present a progress report of the student's research in the seminar. Upon successful completion of the seminar the Chair of the Graduate Studies Committee will so notify the Dean of Graduate Studies.

37.4 M.Sc. (Pharm.) Thesis

Every student shall submit a thesis to the School of Graduate Studies. The thesis shall contain original research conducted by the student and approved by the supervisory committee.

In preparation for the thesis examination, the student will provide a copy of the thesis to each member of the supervisory committee. Each member of this committee will submit a written report to the Chairman of the Graduate Studies Committee.

Before the thesis is submitted, the student shall present an open seminar on the topic of investigation to the School of Pharmacy. Any serious deficiencies noticed at this stage should be carefully considered, in consultation with the supervisory committee, for revision.

Three copies of the thesis shall be submitted to the School of Graduate Studies through the School of Pharmacy, in a form and format as specified by the School of Graduate Studies.

As specified in General Regulation **Theses and Reports** of the School of Graduate Studies, the written thesis will be reviewed by examiners appointed by the Dean of Graduate Studies on the recommendation of the Dean of the School of Pharmacy or the Chairman of the Graduate Studies Committee.

37.5 Courses

Permission of the instructor and the Graduate Studies Committee of the School of Pharmacy is required for admission to any of the graduate Pharmacy courses.

6000 Medicinal Chemistry
 6001 Advanced Physical Pharmacy
 6002 Dosage Form Design and Novel Drug Delivery Systems
 6003 Pharmacokinetic Modelling
 6004 Principles of General Pharmacology
 6005 Toxicology of Therapeutic Agents and Chemicals
 6006 Health Economics
 6100-6108 Special Topics in Pharmacy

38 Regulations Governing the Degree of Master of Social Work

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/socwrk
www.mun.ca/become/graduate/apply/app_deadlines.php

The degrees of Master of Social Work and Doctor of Philosophy are offered in social work.

The Master of Social Work (M.S.W.) may be completed by part-time or full-time study. All program components are offered online except on-campus institutes and field practicum.

The focus of the M.S.W. program is creative approaches to critical thinking for leadership in diverse social work practice. The program allows professionally qualified social workers holding the Degree of B.S.W. or an equivalent professional undergraduate degree in Social Work to undertake intensive advanced work in a specialized area of social work knowledge and practice.

The program is designed to be accessible to students in remote and rural areas, and requires that: (1) students have a computer and Internet access; and (2) can travel to St. John's for the institute portion of three practice courses. Students may incur charges for Internet services, long distance telephone charges, and travel and accommodation expenses.

Entrance into all courses and the offering of any course in an academic year is by approval of the School, consistent with the student's program. Students are admitted only into a designated program of studies.

The School of Social Work may deliver special offerings of the M.S.W. and/or other programs of the School to identified groups of out-of-province students where numbers warrant. These offerings will be self supporting, and therefore subject to an additional one-time non-refundable tuition fee as approved by the Board of Regents and payable on first registration following formal admission to the program. Students will also pay appropriate tuition fees for each semester during their tenure in the program.

Admission to the special offerings of these programs will be competitive, using the same procedures and standards that are in place for students applying to the St. John's campus program(s).

Subject to approval by the M.S.W. Program Committee of the School of Social Work, students admitted to an out-of-province program offering may apply to transfer to the equivalent program on the St. John's campus. In such instances, the fee structure under which the student was admitted will not change. Subject to approval by the M.S.W. Program Committee of the School of Social Work, students admitted to a St. John's based program may apply to transfer to the equivalent out-of-province program. In these instances, students transferring from the St. John's based program offerings to an equivalent out-of-province offering will be required to pay a pro-rated one-time fee upon formal transfer to the special offering.

38.1 Qualifications for Admission

1. Admission to the M.S.W. program is limited, selective, and competitive. Meeting the minimum criteria for admission does not guarantee acceptance to the program.
2. To be considered for admission, an applicant shall hold a Bachelor of Social Work (B.S.W.) degree (or an equivalent professional undergraduate degree in social work approved by the M.S.W. Program Committee of the School of Social Work) from an institution recognized by the Senate, with at least second class standing, and an average of at least 70% in the last 60 undergraduate credit hours.
3. In addition to the stated academic requirements, the applicant must have completed, subsequent to obtaining the B.S.W. degree, at least two years employment in professional social work practice or in a comparable human service discipline or activity. Extensive relevant experience prior to undergraduate degree work may be recognized in full or partial fulfillment of this requirement.
4. For ten percent of seats per year, priority is given to applicants of Indigenous ancestry who meet the minimum criteria for admission. When the number of eligible applicants wishing to be considered under this clause exceeds the number of seats available, priority will normally be given to bona fide residents of Newfoundland and Labrador (see **Qualifications for Admission**). Applicants wishing to be considered under this clause shall complete the Educational Equity section of the Supplementary Information form at the time of application.
5. For an additional ten percent of seats per year, priority is given to applicants from other equity-seeking groups, based on sexual orientation, gender identity, race, ethnicity, disability and/or being disadvantaged by their economic position/background and who meet the minimum criteria for admission. When the number of eligible applicants wishing to be considered under this clause exceeds the number of seats available, priority will normally be given to bona fide residents of Newfoundland and Labrador (see **Qualifications for Admission**). Applicants wishing to be considered under this clause shall complete the Educational Equity section of the Supplementary Information form at the time of application.
6. Notwithstanding the above, and in keeping with the School's commitment to achieving equitable representation in the student body, the M.S.W. Program Committee of the School of Social Work, at its discretion, may give preference to additional applicants of Indigenous ancestry and/or members of other equity-seeking groups who meet the minimum criteria for admission.
7. Notwithstanding the above, and in keeping with the University's special obligation to educate the citizens of Newfoundland and Labrador, when the number of eligible applicants exceeds the number of seats available, priority will normally be given to bona fide residents of Newfoundland and Labrador (see **Qualifications for Admission**).
8. Applicants will be deemed bona fide residents of Newfoundland and Labrador if at the time of application they are currently residing or have a permanent address in the province.

38.2 Procedure for Admission

1. Applicants must submit an application for admission with supporting documentation to the School of Graduate Studies, which

approves recommendations for admission made by the M.S.W. Program Committee of the School of Social Work. The supporting documentation will consist of: an official transcript of the applicant's previous academic record submitted directly from the institution(s) attended; a statement of previous professional employment; a list of any published or unpublished works; a declaration of program emphasis and educational objectives; and two letters of appraisal, to be submitted by two referees, one assessing the applicant's previous academic performance and one assessing the applicants previous practice performance. Letters of appraisal are to be submitted directly to the School of Graduate Studies by the referees.

Note: *Independent of admission to the program, a field practicum agency may require a Criminal Record Check, Vulnerable Sector Check, Child Protection Records Check, Health Check, etc.*

2. The deadline date for receipt of applications for admission in September of each year is January 15 of the same year. All application forms and supporting documentation for admission to the program must be submitted to the School of Graduate Studies on or before the deadline of January 15.
3. The M.S.W. Program Committee of the School of Social Work may require the applicant to be interviewed by one or more faculty members of the M.S.W. Program Admissions Subcommittee.
4. A person who meets the basic admission requirements under **Qualifications for Admission**, may, space permitting, take SCWK 6012 without being admitted to the M.S.W. program. Persons wishing to take a course under this provision must have applied for admission to the M.S.W. program by January 15th of the same year, and been placed on the waitlist. If there are available seats in the course, the applicant will need to submit to the School of Social Work the appropriate form requesting permission to register in a graduate course, and apply or reapply for admission to Memorial University of Newfoundland as an undergraduate.
5. A person who has completed an M.S.W. degree is eligible to register in any M.S.W. course offering, space permitting.

38.3 Plan of Study

1. A student's plan of study will be developed cooperatively by the student and the M.S.W. Student Services Coordinator.
2. Specified supplementary studies may be required to ensure requisite knowledge pertinent to the requirements for the degree.
3. A student electing a thesis program shall be assigned a Supervisor by the Dean of the School in consultation with the student. It is recommended that a thesis Supervisor be assigned as early in the program as possible. The thesis supervisor, when assigned, shall normally assume the duties of faculty advisor and Pathway mentor.
4.
 - a. Students who choose the thesis route must complete a thesis and a minimum of 21 credit hours consisting of SCWK 6012, 6013, 6014, 6313, 6413, 6917, and at least one of SCWK 6314 or 6315. Course route students must complete a minimum of 27 credit hours consisting of SCWK 6012, 6013, 6014, 6313, 6314, 6315, 6413, 6417, and 6917. Students in either route may be required to take additional courses.
 - b. In addition to the above, students will be required to register for SCWK 6000 during each of the relevant semesters as prescribed below, in accordance with their plan of study. This course comprises the academic mentorship component of the program and is designed to provide students with the opportunity to integrate curriculum with their individual academic and practice interests throughout their time in the program. For course route students, SCWK 6000 serves as a foundation for SCWK 6417. For thesis route students, SCWK 6000 serves as a foundation for their thesis.
 - i. Full-time course route and all thesis route students will register for SCWK 6000 beginning in the Fall of their first year and in each subsequent semester in which they are actively completing course work in the M.S.W. program.
 - ii. Part-time course route students completing the program in 6 semesters will register for SCWK 6000 beginning in the Fall of their first year and in each subsequent semester in which they are actively completing course work in the M.S.W. program.
 - iii. Part-time course route students completing the program in 9 semesters will register for SCWK 6000 beginning in the Fall of their second year and in each subsequent semester in which they are actively completing course work in the M.S.W. program.
 - iv. By the end of the final week of the first semester in which students are registered in SCWK 6000, they are required to submit the M.S.W. Pathway Learning Contract to their Mentor. Progress related to the contract is reviewed by the student and mentor prior to the student enrolling in SCWK 6417. The mentor must approve enrolment in SCWK 6417.
 - v. A grade of NC (No Grade Expected) will be awarded in all semesters of SCWK 6000 prior to the final Semester. The final grade in this non-credit course will be either Pass or Fail.

38.4 Field Practicum SCWK 6917

Each M.S.W. student is required to complete a 500 hour field practicum in a social work field setting, supervised by a qualified field instructor, approved by the School of Social Work. Field Instructors must have as a minimum qualification a M.S.W. Degree and a minimum of two years post-M.S.W. social work employment.

Scheduling of a field practicum is flexible. SCWK 6917 may be completed on a full time or part time basis, may occur in whole or in part within or outside the normal start and end dates of a semester, and in any case shall not exceed two semesters.

The M.S.W. Field Education Coordinator is responsible for facilitating appropriate matches among the student, field instructor, and field practicum setting. Although consideration will be given to all factors affecting the location and type of social work field practica, final approval of field practica rests with the School of Social Work. The School cannot guarantee the availability of M.S.W. field instruction in all communities and at all times. Students are responsible for their own financial support during the field practicum.

At least six months prior to the commencement of the semester in which they intend to begin SCWK 6917, all students shall submit a completed Intent to Register in M.S.W. Field Practicum form and a current resume to the M.S.W. Field Education Coordinator. The School of Social Work depends on the cooperation of community agencies external to the University to provide field practica and instruction to its students. A field agency may, prior to starting the practicum, require a Criminal Record Check, Vulnerable Sector Check, Child Protection Records Check, Health Check etc. Students unable to meet the agency's requirements may be delayed in their program or prevented from completing their program of study. Students are required to complete and update these requirements in a timely fashion and at their own expense. The procedures of any given agency may change from time to time and are beyond the control of the University.

Evaluation of the field practicum will be on a PASS/FAIL basis. Students who voluntarily withdraw from the field practicum without prior approval of the M.S.W. Field Education Coordinator, or who conduct themselves in such a manner as to cause the agency and the M.S.W. Field Education Coordinator to terminate the practicum, will normally be awarded a grade of FAIL in the field practicum.

Students who voluntarily withdraw from the field practicum with the prior approval of the M.S.W. Field Education Coordinator cannot be guaranteed a second practicum during that semester. In this case, the student will be awarded a grade of INC for the field practicum. The student shall normally complete a field practicum in a subsequent semester.

38.5 Course Format

To increase accessibility for students in remote and rural areas, courses are offered in the following formats:

1. SCWK 6012, 6013, 6014, and 6413 are online courses.
2. SCWK 6313, 6314 and 6315 are online courses with a mandatory on-campus institute component consisting of 36 hours of classroom instruction. Course materials and activities for the pre-institute and post-institute components of the courses are available online for students. Classes are taught full time and students are expected to attend classes and complete assignments and group projects during this portion of the courses. It is recommended that students take leave from their employment for the duration of an on-campus institute, which may be scheduled in a combination of weekday, evening, and weekend hours within a two-week time period. The final decision regarding the on-campus institute schedule rests with the School of Social Work.
3. SCWK 6917 can be completed where appropriate supervision is available.
4. SCWK 6000 and 6417 can be completed in consultation with the student's Pathway mentor.
5. In exceptional circumstances, and contingent upon student numbers and school resources, additional course sections may be offered in a regular classroom format.

38.6 Period of Study

For students admitted to the program under **Plan of Study** above:

1. For part-time students, the program is designed to permit completion of all degree requirements within three academic years (nine semesters) or two academic years (six semesters). The following is a sample program of study for nine semesters:

Fall Semester:

SCWK 6012 in Year 1
 SCWK 6000, 6013, 6313, 6315 or 6413 in Year 2
 SCWK 6000, 6013, 6313, 6315 or 6413 in Year 3

Winter Semester:

SCWK 6013, 6014, 6313, 6314, or 6413 in Year 1
 SCWK 6000, 6013, 6014, 6313, 6314, or 6413 in Year 2
 SCWK 6000, 6013, 6014, 6313, 6314, or 6413 in Year 3

Spring Semester:

SCWK 6014, 6314 or 6315 in Year 1
 SCWK 6000, 6014, 6314 or 6315 in Year 2
 SCWK 6917 (Field Practicum) may be completed in Fall/Winter/Spring of Year 3
 SCWK 6417 (Pathway Scholarship) is the final requirement to be completed and may be completed in the same semester as SCWK 6917 (Field Practicum). Students are required to register for SCWK 6000 concurrently with SCWK 6917 and 6417.

2. For full-time students, course route, the program is designed to permit completion of all degree requirements within one academic year (three semesters), as follows:

Fall Semester:

SCWK 6000, 6012, 6313 (Institute) and 6413. Thesis students are required to complete 6313 and only one of the two institute courses 6314 or 6315

Winter Semester:

SCWK 6000, 6013, 6014, and 6314 (institute)

Spring Semester:

SCWK 6000, 6315 (Institute), 6417 (pathway scholarship), and 6917 (Field Practicum).

3. For full-time students, thesis route, the program is designed to permit completion of all degree requirements within one academic year (three semesters), as follows:

Fall Semester:

SCWK 6000, 6012, 6313 (Institute) and 6413

Winter Semester:

SCWK 6000, 6013, 6014, 6314 Institute). Thesis students are required to complete 6313 and only one of the two institute courses 6314 or 6315

Spring Semester:

SCWK 6000, 6315, 6917 (Field Practicum), thesis. Thesis students are required to complete 6313 and only one of the two institute courses 6314 or 6315

38.7 Evaluation

1. Failure to attain a final passing grade of 'A' or 'B' in a program course, or PAS in a PASS/FAIL course, shall lead to termination of the student's program, unless a re-read has been requested. Failure to obtain the required grades in the re-read shall lead to termination of the student's program.
2. To remain in good standing students are required to maintain professional behaviour consistent with the current Code of Ethics of the Canadian Association of Social Workers (www.casw-acts.ca/en/Code-of-Ethics). Students who are registered in their home province are required to comply with the current Code of Ethics of their provincial social work regulatory body. Students who are not registered in their home province are required to comply with the current Code of Ethics of the Canadian Association of Social Workers (www.casw-acts.ca/en/Code-of-Ethics). Students who fail to meet this requirement will be required to withdraw from the School upon the recommendation of the M.S.W. Program Committee.

38.8 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the School will allow.

38.8.1 Program Courses

6000 Pathway (mandatory repeatable non-credit course)
 6012 Critical Thinking and Reflection
 6013 Leadership for Social Justice (*prerequisite/co-requisite 6012*)

6014 Leadership in Social Policy and Programs (*prerequisite/co-requisite 6012*)
 6313 Perspectives with Individuals and Families (*prerequisite/co-requisite 6012*)
 6314 Perspectives with Diverse Communities (*prerequisite 6012*)
 6315 Perspectives with Groups (*prerequisite 6012*)
 6413 Research Theory, Design, and Analysis (*prerequisite/co-requisite 6012*)
 6417 Pathway Scholarship (following completion of all other program components)
 6917 Field Practicum (*prerequisites 6012, 6013, 6014, 6313 and 6413 and prerequisite/co-requisite two of 6314 and 6315 for course route students; one of 6314 or 6315 for thesis route students*)

Although the School does not currently offer a program in Social Policy and Administration, it has faculty expertise in these areas and, in the future, may offer the following courses:

6210 Seminar in Social Planning and Social Development
 6220 Seminar in Organization Development
 6230 Seminar in Community Development
 6510 Seminar in Social Administration: Social Policy Analysis, Development and Administration
 6520 Seminar in Social Administration: Program Design and Development
 6530 Seminar in Social Administration: Evaluation of Policies and Programs
 6540 Supervision in Professional and Clinical Practice
 6550 Feminist Therapy in Social Work Practice
 6820-29 Individual Reading and Research in Special Areas

38.8.2 Thesis

See **General Regulations, Theses and Reports**.

Note: *Every student shall comply with the **General Regulations** governing the School of Graduate Studies and the M.S.W. Degree Regulations.*

39 Regulations Governing the Degree of Master of Technology Management

www.mun.ca/sgs/contacts/sgscontacts.php
www.mi.mun.ca
www.mun.ca/become/graduate/apply/app_deadlines.php

39.1 Administration

The Program will be administered by an Academic Director appointed by the Associate Vice-President (Marine Institute), Academic & Student Affairs, together with an Academic Advisory Committee.

An Academic Advisory Committee will be appointed by the Dean of Graduate Studies on recommendation of the Associate Vice-President (Marine Institute), Academic & Student Affairs. This committee will consist of the Academic Director as Chair, three members from the Marine Institute and two members from other academic units of the University, normally the Faculty of Business Administration and the Faculty of Engineering and Applied Science. Normally, all appointments will be for a period of three (3) years.

A Technical Advisory Committee consisting of a cross-section of members with professional expertise related to the technology sector, will provide regular feedback on program content, instruction, and future direction of the Program. Members of this Committee will be appointed by the Dean of Graduate Studies on recommendation of the Associate Vice-President (Marine Institute), Academic & Student Affairs. The Academic Director will be an ex officio member and Chair of the Technical Advisory Committee. Normally all appointments will be for a period of three (3) years.

39.2 Program

The Master of Technology Management (MTM) is a comprehensive academic program that provides a broad understanding of the structure and operation of organizations and the factors that influence business decisions in the context of technology-based organizations. It provides a technology management focus through the development of knowledge and understanding of the nature of technical operations and the factors that have an impact on their success, as well as the ability to apply these concepts within their organizations.

The program consists of two Options:

- Engineering Technology and Applied Science Option
- Aquaculture Technology Option

The program is offered online and requires successful completion of either 1) 24 credit hours of course work and a comprehensive project and report (6 credit hours), or 2) 30 credit hours of comprehensive course work. Students will typically register on a part-time basis.

39.2.1 Admission Requirements

Admission to the program is on a competitive basis.

1. To be considered for admission to the Engineering Technology and Applied Science Option an applicant will normally possess a second class or better undergraduate degree from a university of recognized standing and will normally have:
 - appropriate technology sector and business management course work; and
 - a minimum of two (2) years relevant employment experience.
2. To be considered for admission to the Aquaculture Technology Option an applicant will normally possess a second class or better undergraduate degree from a university of recognized standing and will normally have:
 - a post-graduate aquaculture credential or an aquaculture focus in their undergraduate degree; or significant professional experience in the aquaculture industry; and
 - a minimum of two (2) years relevant employment experience.
3. In exceptional cases, applicants who have not completed an undergraduate degree, but who meet all other requirements, may be considered for admission. Preference will be given to those who have significant and relevant professional experience, and have successfully completed several years of post-secondary studies. Applicants who do not meet normal admission requirements shall be required to complete, with a high level of achievement, certain undergraduate courses before being considered for admission.

4. Applicants who did not complete a baccalaureate or post-graduate degree at a recognized university where English is the primary language of instruction must normally complete either the:
 - Test of English as a Foreign language (TOEFL) and achieve a paper-based score of 580 (or higher), computer-based score of 237 (or higher), or Internet based score of 92-93 (or higher); or
 - International English Language Testing System (IELTS) and achieve a score of 7 (or higher).
 Information regarding the TOEFL is available from the Educational Testing Service at www.ets.org. IELTS information is available at www.ielts.org. It is noted that other equivalent tests acceptable to the School of Graduate Studies will also be considered.
5. Upon acceptance into the program, students will be admitted to one of the two Options: the Engineering Technology and Applied Science Option or the Aquaculture Technology Option.

39.2.2 Program of Study

39.2.2.1 Master of Technology Management - Engineering Technology and Applied Science Option

1. Students in the Master of Technology Management (Engineering Technology and Applied Science Option) shall be required to complete a minimum of either:
 - a. 24 credit hours of course work and a major project and report (6 credit hours). Course work includes three compulsory core courses (9 credit hours) and five **Category A Electives** (15 credit hours). Students on the project route will complete TECH 6100: Project in Engineering Technology, Applied Science and Technology Management (6 credit hours). During TECH 6100 students will choose a topic in consultation with the Academic Director and will work independently to carry out an in-depth study of a problem or application within the area of technology management and fully document and present their findings. Preferably the problem will be directly related to a workplace situation.
 - b. 30 credit hours on a comprehensive-course route. Course work includes three compulsory core courses (9 credit hours) and seven **Category A Electives** (21 credit hours).
2. Up to three relevant elective courses (9 credit hours) may be transferred from other graduate programs within the School of Graduate Studies or from other post-secondary institutions recognized by Senate, subject to the approval of the Dean of Graduate Studies on the recommendation of the Academic Director.
3. Students with full-time status may register for a maximum of 9 credit hours in any regular semester and a maximum of 6 credit hours in intersession or summer session.
 Students with part-time status may register for a maximum of 6 credit hours in any regular semester and a maximum of 3 credit hours in intersession or summer session.
 Students may register for additional courses in a semester or session with the permission of the Academic Director of the Program.

39.2.2.2 Master of Technology Management - Aquaculture Technology Option

1. Students in the Master of Technology Management (Aquaculture Technology Option) shall be required to complete a minimum of either:
 - a. 24 credit hours of course work and a major project and report (6 credit hours). Course work includes three compulsory core courses (9 credit hours); and five elective courses (15 credit hours), of which at least 3 must be from **Category B Electives**. Students on the project route will complete MSTM 6102: Project in Aquaculture Technology Management (6 credit hours). During MSTM 6102 students will choose a topic in consultation with the Academic Director or designate and will work independently to carry out an in-depth study of a problem or application within the area of aquaculture technology management and fully document and present their findings. Preferably the problem will be directly related to a workplace situation.
 - b. 30 credit hours on a comprehensive-course route. Course work includes three compulsory core courses (9 credit hours); and seven elective courses (21 credit hours), of which at least 3 must be from **Category B Electives**.
2. Up to three relevant elective courses (9 credit hours) may be transferred from other graduate programs within the School of Graduate Studies or from other post-secondary institutions recognized by Senate, subject to the approval of the Dean of Graduate Studies on the recommendation of the Academic Director.
3. Students with full-time status may register for a maximum of 9 credit hours in any regular semester and a maximum of 6 credit hours in intersession or summer session.
 Students with part-time status may register for a maximum of 6 credit hours in any regular semester and a maximum of 3 credit hours in intersession or summer session.
 Students may register for additional courses in a semester or session with the permission of the Academic Director of the Program.

39.2.3 Evaluation

1. Students for the Master of Technology Management Degree must obtain a grade of 'B' or better in all program courses.
2. Students who receive a grade of less than 'B' in any course will be permitted to remain in the program provided the course is repeated and passed with a grade of 'B' or better. Alternatively, the student may, on the recommendation of the Academic Director, and with the approval of the Dean of Graduate Studies, substitute another graduate course. Only one course repetition or substitution will be permitted during the student's program after which the student shall be required to withdraw from the program.

39.2.4 Courses

39.2.4.1 Core Courses

TECH 6031 Overview of Technical Operations (*credit restricted with the former MSTM 6031*)
 TECH 6032 Managing Technological Innovation (*credit restricted with the former MSTM 6032*)
 TECH 6054 Technology Assessment (*credit restricted with the former MSTM 6054*)

39.2.4.2 Elective Courses

Category A Electives

MSTM 6056 Management of International Development
 TECH 6022 Communication and Conflict Resolution in a Technical Environment (*credit restricted with the former MSTM 6022*)
 TECH 6023 Strategic Planning, Policy, Participation and Management in Technical Operations (*credit restricted with the former MSTM*)

6023)

TECH 6030 Principles of Management for Engineering Technology Enterprises (*credit restricted with the former MSTM 6030*)TECH 6033 Quality Systems (*credit restricted with the former MSTM 6033*)TECH 6034 Project Management in the Offshore, Health, Fisheries and Engineering Technology Environments (*credit restricted with the former MSTM 6034*)TECH 6035 Information Technology Applications in the Health and Engineering Technology Environments (*credit restricted with the former MSTM 6035*)TECH 6036 Supply Chain Management and Advanced Engineering Technology Operations (*credit restricted with the former MSTM 6036*)TECH 6037 Risk Analysis and Operations in the Engineering Technology Sector (*credit restricted with the former MSTM 6037*)TECH 6038 Manufacturing and Engineering Technology Management (*credit restricted with the former MSTM 6038*)TECH 6039 Sustainability and Environmental Responsibility (*credit restricted with the former MSTM 6039*)TECH 6052 Management of Intellectual Property (*credit restricted with the former MSTM 6052*)TECH 6053 Legal Implications of Technology Management (*prerequisite MSTM 6032*)

TECH 6055 Asset Integrity Management

Category B Electives

MSTM 6071 Management of Aquaculture Technology

MSTM 6072 Animal Husbandry Management

MSTM 6073 Aquaculture Environmental Management

MSTM 6074 Aquaculture Site and Operational Assessment

MSTM 6075 Aquaculture Engineering Technology Management

39.2.4.3 Project CoursesMSTM 6102 Project in Aquaculture Technology Management (*6 credit hours*)TECH 6100 Project in Engineering Technology, Applied Science and Technology Management (*6 credit hours*) (*credit restricted with the former MSTM 6100*)**40 Regulations Governing the Degree of Doctor of Philosophy**

In this and following regulations and notes, "Head" and "Department" shall be understood to mean "Dean or Director" and "Faculty or School" respectively, applying the regulations to a Faculty or School in which there are no Departmental divisions.

Students should consult the General Information and Regulations Governing All Graduate Students for information concerning the Degree of Doctor of Philosophy. For information concerning the number of courses required for specific programs, students should consult the following listing for the appropriate Department.

The degree of Doctor of Philosophy (Ph.D.) is offered in selected areas in Anthropology, Archaeology, Atomic and Molecular Physics, Biochemistry, Biology, Chemistry, Cognitive and Behavioural Ecology, Computer Science, Condensed Matter Physics, Earth Sciences (Geology), Earth Sciences (Geophysics), Education, Engineering, English, Environmental Science, Ethnomusicology, Experimental Psychology, Folklore, Food Science, Geography, History, Interdisciplinary, Linguistics, Management, Marine Biology, Mathematics, Medicine, Pharmacy, Philosophy, Physical Oceanography, Social Work, Sociology, Statistics, and Theoretical Physics.

40.1 Anthropologywww.mun.ca/sgs/contacts/sgscontacts.phpwww.mun.ca/hsswww.mun.ca/anthrowww.mun.ca/become/graduate/apply/app_deadlines.php**40.1.1 Program of Study**

1. The Ph.D. in Anthropology is offered in historic anthropology and ethnography of Newfoundland and Labrador, and Western Europe.
2. An applicant must normally hold a Master's Degree with a specialization in social and cultural anthropology. In exceptional circumstances, a student who has spent three semesters in the M.A. program may be recommended for transfer into the Ph.D. stream.
3. Residency: the Department requires a minimum residency of two years for Ph.D. students.
4. A supervisory committee will be established for each student as per **General Regulations, Supervision, Ph.D. and Psy.D. Candidates**.
5. A student will normally be required to complete four courses during their first three semesters in the program: Anthropology 6300 and 6412, and two other courses, to be determined by the supervisory committee. The supervisory committee may also require the students to complete additional graduate courses.
6. All students must demonstrate a reading knowledge of a second language to be determined in consultation with the supervisory committee. This language will normally be a language in which there is a substantial body of literature in Social and Cultural Anthropology. It could also be a field language pertinent to the student's project. The exam will be set and marked by an authority determined by the Head of the Department and the Dean of Graduate Studies as per **General Regulations, Evaluation, Evaluation of Graduate Students**, 4., and will normally be completed before the Comprehensive Examination is undertaken.
7. The Ph.D. Comprehensive Examination shall be administered in accordance with **General Regulations, Comprehensive Examinations**. The examination may be oral, written or both, and shall consist normally of three sessions, each of up to three hours duration, within a one week period, or three (3) one week take home examinations. A student will prepare for these examinations by undertaking supervised readings in three fields prescribed by the three members of the comprehensive exam committee. The examination will deal with specified areas of social/cultural anthropology. The examination will normally be scheduled in the third week of November each year in the second year of the student's program.
8. The student must submit a written thesis proposal for presentation to the Department two months following completion of the student's comprehensive examination.
9. As stated in the **General Regulations** for Graduate Studies, the time limit for completion of the Degree is 7 years.
10. Submission of dissertation and the oral defence of dissertation will follow **General Regulations, Theses and Reports, Evaluation of Ph.D. and Psy.D. Theses**.

40.1.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

6010 Environmental Anthropology
 6071 Health and Illness: Cultural Contexts and Constructions
 6072 Marx and Social Inquiry
 6081 Anthropology of Gender
 6089 Anthropology of Underclass Life
 6100 Social Organization
 6110 Culture and Personality
 6140 The Community
 6210 Language and Culture
 6240 Atlantic Regional Studies
 6260 Anthropology of Development
 6280 Newfoundland Ethnography
 6281 Labrador Ethnography
 6282 Ethnography of a Single Region
 6300 Fieldwork and Interpretation of Culture
 6400 Current Themes in Cultural Anthropology
 6410 History of Anthropology
 6412 Anthropological Theory
 6413 Applied Anthropology
 6430 Audiovisual Anthropology
 6440 Master's Research Paper (9 credit hours)
 6580 Selected Themes in Political Anthropology
 6580-6599 Special Areas in Anthropology (excluding 6580, 6583)
 6583 Economics and Societies
 6600 Contemporary Debates in Anthropology
 6890 Graduate Seminar

40.2 Archaeology

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/archaeology
www.mun.ca/become/graduate/apply/app_deadlines.php

40.2.1 Program of Study

1. The Ph.D. in Archaeology is offered in prehistoric and historic archaeology of Northeastern North America and the Arctic.
2. An applicant must normally hold a Master's Degree with a specialization in Archaeology.
3. The Department requires a minimum residency of six semesters for Ph.D. students.
4. A supervisory committee will be established for each student as per **General Regulations, Supervision, Ph.D. and Psy.D. Candidates**, 2.
5. Students will normally be required to successfully complete two courses during their first three semesters in the program: Archaeology 6700 and 6411. The supervisory committee may require the students to complete additional graduate courses.
6. All students must demonstrate a reading knowledge of a second language to be determined in consultation with the supervisory committee. This language will normally be a language in which there is a substantial body of literature in Archaeology. The exam will be set and marked by an authority determined by the Head of the Department and the Dean of Graduate Studies (see **General Regulations, Evaluation of Graduate Students**, 4.) and will normally be completed before the Comprehensive Examination is undertaken.
7. The Ph.D. Comprehensive Examination shall be administered in accordance with **General Regulations, Comprehensive Examinations**. The examination may be oral, written or both, and shall consist normally of three sessions, each of up to three hours duration, within a one week period, or three (3) one week take home examinations. Students will prepare for these examinations by undertaking supervised readings in three fields prescribed by the three members of the comprehensive exam committee. The examination will deal with specified areas of archaeology. The examination will normally be scheduled in the third week of November each year in the second year of the student's program.
8. The student must submit a written thesis proposal for presentation to the Department two months following completion of the student's comprehensive examination.
9. As stated in the **General Regulations** for Graduate Studies, the time limit for completion of the Degree is 7 years.
10. Submission of dissertation and the oral defence of dissertation will follow **General Regulations, Theses and Reports, Evaluation of Ph.D. and Psy.D. Theses**.

40.2.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

6000 Theory and Method in the Study of Archaeology and Prehistory (*same as the former 6411*)
 6001 Interpretative Methods in Archaeology (*same as the former 6700*)
 6095 Advanced Studies in Ethnohistory (*same as History 6095*)
 6191 Approaches to Early Modern Material Culture
 6409 History of Archaeology
 6680 Space, Place and Landscape
 6681-6699 (excluding 6683, 6685, 6686, 6687) Special Topics in Archaeology
 6682 Advances in Environmental Archaeology
 6685 When World's Meet: Nature/Culture and Ontological Conflicts
 6686 Archaeology of the Body
 6687 Applied Archaeological Sciences

40.3 Biochemistry

www.mun.ca/sgs/contacts/sgscontacts.php
 www.mun.ca/science
 www.mun.ca/biochem
 www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Doctor of Philosophy is offered in Biochemistry or Food Science to full-time and part-time students.

40.3.1 Admission

The admission requirements for the graduate programs in Biochemistry and Food Science are as given under **General Regulations**.

40.3.2 Program of Study

1. The program of a student for the Ph.D. Degree shall be the responsibility of the supervisory committee, composed of the Supervisor and at least two other faculty members recommended with the concurrence of the Supervisor by the Head.
2. All students must enrol in Biochemistry 6999 (Seminars in Biochemistry and Food Science), and must complete Biochemistry 7000 (Graduate Skills) if they have not already done so. Depending on the background and/or area of specialization, a student's program may include additional courses taken for credit in Biochemistry, Food Science or related subjects.
3. It is the responsibility of the student to arrange regular meetings with the student's graduate supervisory committee. A semi-annual report, prepared by the Supervisor and signed by all members of the supervisory committee, is required to be given to the Head of the Department or delegate.
4. A student for the Ph.D. degree shall normally take the Comprehensive Examination within the first seven semesters of the student's program. The examination will have two components: the preparation of a grant proposal on a topic related to the student's research specialization followed by an oral examination of the proposal. Failure of this examination will result in the termination of the student's program.

40.3.3 Courses

A series of advanced courses in the areas outlined below will be offered. Other than Biochemistry 6999 and Biochemistry 7000, normally only one course will be offered per semester.

6000 Advanced Topics in Lipid and Lipoprotein Metabolism
 6001-6009 Special Topics in Biochemistry
 6010-6019 Special Topics in Nutrition and Metabolism
 6020-6029 Special Topics in Food Science
 6400 Control of Intermediary Metabolism
 6460 Structural Biochemistry
 6520 Nutritional Biochemistry
 6530 Food Biochemistry
 6590 Cellular, Molecular and Developmental Biology (*credit restricted with Biology 6590 and Medicine 6590*)
 6630 Marine Biochemistry
 6680 Processing and Quality of Foods
 6999 Seminars in Biochemistry and Food Science
 7000 Graduate Skills

40.4 Biology

www.mun.ca/sgs/contacts/sgscontacts.php
 www.mun.ca/science
 www.mun.ca/biology
 www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Doctor of Philosophy is offered in Biology to full-time and part-time students. Students interested in animal behaviour should also consult the section in the Calendar describing the Doctoral programs **Cognitive and Behavioural Ecology**. Students interested in **Marine Biology** should consult the section of the Calendar specific to the Doctoral program in that area of study.

40.4.1 Program of Study

1. A student will be required to take Biology 7000 (Graduate Core Seminar).
2. Admission to a Ph.D. program in Biology shall not normally take place until after the completion of the course requirements and the submission of the thesis for the M.Sc. Degree. However, on the recommendation of the Department, this requirement may be waived by the Dean of Graduate Studies.
3. The program of a student shall be the responsibility of a Supervisory Committee composed of the Supervisor and at least two other appropriate members recommended to the Dean by the Head (or delegate) of the Department with the concurrence of the Supervisor.
4. The Supervisory Committee shall interview the student normally within a month of first registration, to discuss the student's program and to explore any areas of weakness in the student's biological knowledge, especially where these relate to the intended areas of research. The Supervisory Committee will recommend a student's subdiscipline within Biology to the Department in writing after this meeting.
5. It is the function of a Supervisory Committee to have regular meetings, at least annually, with its graduate student. A meeting report, signed by all members of the Supervisory Committee and student, must be given to the Department. A copy will be sent to the graduate student and to the Dean of Graduate Studies.
6. The student will present a tentative outline of the proposed research to the Supervisory Committee, with a copy to the Department by the end of the second semester, and preferably prior to commencement of the research.
7. The student will present a research seminar to the Department, normally by the end of the second semester following admission, to describe the research topic being investigated and the methodologies to be employed. This seminar provides an opportunity for the student to receive constructive input from the broad biological community.
8. When the Supervisory Committee deems it necessary, a working knowledge of a language other than English may be required.
9. Comprehensive Examination

- a. Timing of Examination
 - i. Timing of the comprehensive examination shall follow General Regulation, 1. under **Comprehensive Examination, Ph.D. Comprehensive Examination** governing the Degree of Doctor of Philosophy. A student registered in a full-time Ph.D. program in the Faculty of Science, Department of Biology shall normally take the comprehensive examination during the first year of the program, and no later than one year after completion of the prescribed courses.
 - ii. The procedure shall be initiated by the student's Supervisor who will notify the Department of Biology, in writing, of the student's readiness. Failure to meet the above requirement can result in the student being required to withdraw from the program.
 - b. Examination Committee

The Examination Committee shall be appointed by the Dean of Graduate Studies on the recommendation of the Department of Biology according to Regulation **Comprehensive Examinations, Ph.D. Comprehensive Examination**, 2. of the **General Regulations** of the School of Graduate Studies. No more than two members of the Examination Committee may be members of the student's Supervisory Committee. The committee shall meet and recommend to the Department in writing an examination seminar topic within the student's previously determined subdiscipline.
 - c. Examination Procedure

The Department shall provide the student the examination date and the seminar topic in writing not more than six nor less than four weeks prior to the examination. The student shall provide each member of the Examination Committee a written paper on the seminar topic one week prior to the examination. The Examination Committee shall evaluate the student's presentation and response to questions put to the student during the Oral Examination both on the seminar and within the student's subdiscipline of Biology.
 - d. Subsequent Action

The Examination Committee will meet in camera to arrive at its conclusions. The Chair shall report the results of the Examination to the Head and the Dean of Graduate Studies for transmission to the student. The report will include one of the following decisions: a) the student passed or failed. b) if failed and it is the first examination whether the student may be re-examined.
 - e. Re-examination

Comprehensive Re-examination if permitted will occur not sooner than one month and not more than six months after the first. The student and the Supervisory Committee shall be informed of the deficiencies found. The format for the second examination will be determined by the Examination Committee with the approval of the Biology Graduate Studies Committee. The student will be informed of the topic and format four to six weeks prior to the examination. The examination will follow the procedure outlined in 8.c and d. above. A failure will require the student to withdraw from the program.
10. Theses shall conform to **Theses and Reports** of the **General Regulations** of the School of Graduate Studies and the Departmental Guidelines.

40.4.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

- 6000 Research Topics in Microbiology
- 6052 Plant Pathology (*credit cannot be obtained if already received for Biology 4052*)
- 6131 Models in Biology (*credit cannot be obtained if already received for Biology 4607*)
- 6351 Behavioural Ecology and Sociobiology (*cross-listed as Psychology 6351*) *credit cannot be obtained if already received for Biology 4701*
- 6590 Molecular Biology I (*cross-listed as Medicine 6590 and credit-restricted with Biochemistry 6590*) *prerequisites: Biology 4241 (or equivalent)*
- 6591 Molecular Biology II (*cross-listed as Medicine 6591 and credit-restricted with the former Biochemistry 6591*) *prerequisites: Biology 4241 (or equivalent)*
- 6592 Bacterial Genetics (*credit-restricted with the former Biochemistry 6592*) *prerequisite: Biology 4241 (or equivalent)*
- 6593 Selected Readings in Molecular Biology (*credit-restricted with the former Biochemistry 6593*) *prerequisites or co-requisites: one of Biology, Biochemistry or Medicine 6590, and one of Biology 6591, Medicine 6591, or the former Biochemistry 6591 (or equivalent)*
- 6710 Marine Benthic Biology
- 7000 Graduate Core Seminar (*cross-listed as Ocean Science 7000*)
- 7101 Topics in Marine Biology
- 7201 Topics in Cellular and Molecular Biology and Physiology
- 7220 Quantitative Methods in Biology (*credit cannot be obtained if already received for Biology 4605*)
- 7300 Ornithology (*credit cannot be obtained if already received for Biology 4620*)
- 7301 Topics in Ecology and Conservation Biology
- 7530 The Molecular Biology of Development
- 7535 Research Methods in Marine Science
- 7920-7960 Special Topics in Biology (*excluding Biology 7931*)
- 7931 Research Methods in Genetic Biotechnology (Note: Biology 7931 may be delivered in an accelerated format outside of the regular semester time frame)

40.5 Boreal Ecosystems and Agricultural Sciences

www.mun.ca/sgs/contacts/sgscontacts.php
www.grenfell.mun.ca/academics-and-research/Pages/graduate-programs.aspx
www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Doctor of Philosophy in Boreal Ecosystems and Agricultural Sciences (Ph.D.(BEAS)) is a unique program that combines intensive training in theory and analytical approaches to boreal systems. The Degree is offered in the School of Science and the Environment, Grenfell Campus by full-time or part-time study.

40.5.1 Qualifications for Admission

1. Admission is limited and competitive. The application deadline for Fall (September) admission is March 1 for Canadian students and February 1 for International students each year. Applications submitted after these dates may be considered on a case-by-case basis.
2. Admission to the Ph.D.(BEAS) program is by application to the School of Graduate Studies. Information regarding the application

process is available at www.mun.ca/become/graduate/apply.

- Applicants normally shall hold a Master of Science degree, with a cumulative average of at least 75% in the last two years of study, from an institution recognized by Senate. Applicants may come from diverse fields of study, including but not limited to agricultural sciences, biology, environmental science, earth sciences, ecology, and natural resources.
- Applicants must demonstrate ability for creativity, independent thoughts, advanced study, and independent research.
- Applicants must meet the English Proficiency Requirements described under **General Regulations, English Proficiency Requirements**.

40.5.1.1 Transferring from a Master of Science Program to the Doctor of Philosophy in Boreal Ecosystems and Agricultural Sciences Program

Students in the Master of Science in Boreal Ecosystems and Agricultural Science program or other related Master of Science program (such as Environmental Science or Biology) at Memorial University of Newfoundland may request a transfer to the Doctor of Philosophy in Boreal Ecosystems and Agricultural Sciences program after a minimum of 12 months in their program of study, and completion of all required BEAS (or equivalent) course work with clear evidence of exceptional research productivity. Final decision for transfer from any Masters program to the Ph.D. (BEAS) program rests with the Dean of the School of Graduate Studies. Prior to proceeding with a formal application, potential students will be required to contact potential supervisors from within their area of research interest to determine the availability of positions and supervisor interest. If potential supervisors are accepting students, they will instruct the student to prepare a formal application. Potential students must identify a supervisor willing to provide a commitment that a research project and funding are available before an application can be processed.

40.5.2 Program of Study

Students enrolled in the Ph.D.(BEAS) program will be required to complete BEAS 6000 Issues in Boreal Ecosystems and Agricultural Sciences, BEAS 600A/B a seminar course, a comprehensive examination, a research seminar and a thesis. Students who have completed the coursework for the M.Sc.(BEAS) will not be required to re-take these two mandatory courses. However, students may be required to take additional courses in consultation with the thesis supervisory committee to fill the gaps related to the research project if required. The duration of the program will aim to be four years. The program will be available on a full-time and part-time basis. The program will be delivered at the Grenfell Campus of Memorial University of Newfoundland and courses will be offered by faculty in the respective sub-disciplines as suggested by the supervisory committee. The make-up of the supervisory committees, comprehensive examination committees, seminar and other program requirements will be scheduled as outlined in the guidelines of the School of Graduate Studies of Memorial University of Newfoundland.

40.5.3 Evaluation

- Every student in graduate studies shall comply with the **General Regulations**, the Degree Regulations, and all additional requirements of the appropriate academic unit.
- To continue in the School of Graduate Studies and to qualify for a Ph.D.(BEAS) degree, a student shall obtain an 'A' or 'B' grade in each program course as outlined under **General Regulations, Evaluation, Evaluation of Graduate Students**. When it has been determined, based on consultation with the student, the instructors in graduate courses, and the thesis or report Supervisor, that a student's work has fallen below a satisfactory level, the Supervisor or the Head of the academic unit may recommend to the Dean that such a student be required to withdraw from the program.
- The student shall undertake a written and an oral comprehensive examination, which will follow General Regulation **Comprehensive Examinations, Ph.D. Comprehensive Examination** which sets out the procedures for the comprehensive examination. The comprehensive examination will be held upon completion of all coursework, and no later than the seventh semester of the student's program. In this examination, students must demonstrate a mastery of the general literature associated with Boreal Ecosystems and Agricultural Sciences and the program broadly and a mastery of literature appropriate to their specific research area, as well as their ability to present their arguments in a coherent, logical, and scientific manner. The topic will be assigned by the Examination Committee, which also determines the submission date for the paper, and the date of the examination.

40.5.4 Thesis Regulations

The student must submit a written thesis proposal to the supervisory committee no later than the end of the fifth semester in the program. The thesis proposal must include a working title, statement of purpose and research scope, outline of theoretical and methodological approach, working plan, and a preliminary bibliography. The research proposal is accepted if all supervisory committee members agree to accept it. Before submitting the thesis proposals, students are required to make public presentations of their thesis research proposals and methodologies, to discuss them with fellow students and faculty members, aiming to improve the research proposals based on received feedback and suggestions.

The Ph.D. thesis will be evaluated according to the **General Regulations, Theses and Reports, Evaluation of Ph.D. and Psy.D. Thesis** governing the School of Graduate Studies. All students are required to follow the Memorial University of Newfoundland Policy for Integrity in Scholarly Research. Every student in graduate studies shall comply with the **General Regulations**, the Degree Regulations, and all additional requirements of the appropriate academic unit.

40.5.5 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Academic unit will allow.

Boreal Ecosystems and Agricultural Sciences

BEAS 6000 Issues in Boreal Ecosystems and Agricultural Sciences
 BEAS 600A/B Graduate Research Seminar
 BEAS 6002 Advanced Quantitative Research Methods for the Natural Sciences
 BEAS 6003 Advanced Quantitative Research Methods for the Social Sciences
 BEAS 6010 Agriculture and Forestry Economics
 BEAS 6020 Management of Crop Nutrition
 BEAS 6021 Organic Farming for Sustainable Agriculture
 BEAS 6022 Plant Biochemistry
 BEAS 6023 Plant Physiology
 BEAS 6030 Chemical Speciation Modeling for Environmental Matrices
 BEAS 6031 Soil Functions Soil as a Bioreactor
 BEAS 6032 Environmental Soil Physics
 BEAS 6033 Soil and water Conservation

BEAS 6040 Advanced Groundwater Management
 BEAS 6041 Applied Hydrology
 BEAS 6042 Soil and Groundwater Remediation
 BEAS 6050-6150 Special topics in Boreal Ecosystems and Agricultural Science

40.6 Chemistry

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/chem
www.mun.ca/become/graduate/apply/app_deadlines.php

40.6.1 Program of Study

The Degree of Doctor of Philosophy in Chemistry is offered as full-time or part-time study. A Master's Degree in Chemistry or related area from a recognized university is normally required for entry into the Ph.D. program. Students holding a Bachelor's Degree (Honours or equivalent) in Chemistry may be considered for direct admission into the Ph.D. program. Students currently registered in the Memorial University of Newfoundland's Chemistry M.Sc. program for a minimum of three semesters may request transfer into a Ph.D. program. The transfer should be supported by the Supervisor and the Supervisory Committee and subsequent to satisfactory presentation of a written progress report and Ph.D. research proposal.

1. Upon recommendation of their supervisor, students will write American Chemical Society (ACS) placement test(s) in the first two weeks of their initial semester of registration in order to determine an appropriate course program.
2. Students will be assigned a Supervisory Committee consisting of the Supervisor and at least two other appropriate faculty members appointed by the Dean on recommendation of the Chemistry Deputy Head (Graduate Studies).
3. The program of a student must be arranged by the Supervisor in consultation with the Supervisory Committee and the student before the second semester of registration. It is the responsibility of the Supervisory Committee to meet at least annually with the student, to provide guidance at all stages of the student's program, and, in consultation with the student, to prepare annual written progress reports for submission to the Dean of Graduate Studies.
4. Students holding a Master's Degree from a recognized university are normally required to successfully complete a minimum of 6 credit hours of graduate Chemistry courses with a minimum grade of 'B' and to present a seminar describing the student's research (Chemistry 6003). Courses taken towards a Master's Degree may not be repeated. Students not holding a Master's Degree must successfully complete at least 12 credit hours of graduate Chemistry courses with a minimum grade of 'B' in addition to Chemistry 6003.
5. Students are required to attend Departmental seminars.
6. Students must pass a comprehensive examination, as described in the **General Regulations**, according to one of the following descriptions:
 - a. A three-hour written part covering topics in Organic Chemistry, and, subsequent to the written examination at the discretion of the comprehensive examination committee, an oral exam designed to explore areas of perceived deficiency.
 - b. A paper on a research topic selected by the student in consultation with the student's supervisor and the examination committee, and subsequently, an oral examination designed to explore general areas of Analytical, Inorganic and/or Physical Chemistry and areas of chemistry related to the research topic.
7. Students must submit and successfully defend a thesis deemed acceptable by two internal and one external examiner as outlined in the **General Regulations**.

40.6.2 Courses

6002 Doctoral Seminar
 6003 Doctoral Research Seminar
 6110 Analytical Chemistry II
 6150 Advanced Spectroscopic Techniques
 6151 Analytical Separations and Organic Mass Spectrometry
 6152 Electroanalytical Techniques
 6153 Techniques in Sampling, Trace Analysis and Chemometrics
 6154 Business Management and Good Laboratory Practice
 6155 Computers in Instrumental Analysis and Basic Electronics (*same as Med 6070*)
 6156 Analytical Method Development and Sampling
 6160 Laboratory Projects in Sampling, Electroanalysis and Trace Analysis
 6161 Laboratory Projects in Analytical Separations and Spectroscopic Techniques
 6190-9 Selected Topics in Analytical Chemistry
 6201 Bioinorganic Chemistry
 6202 Main Group Chemistry
 6204 Mechanisms in Catalysis
 6205 Photochemistry of Transition Metal Complexes
 6206 Green Chemistry
 6210 Organometallic Chemistry
 6290-9 Selected Topics in Inorganic Chemistry
 6300 Quantum Chemistry I
 6301 Quantum Chemistry II
 6302 Molecular Spectroscopy
 6304 Computational Chemistry I
 6310 Electronic Structure Theory
 6323 Chemical Thermodynamics I
 6324 Chemical Thermodynamics II
 6340 Biophysical Chemistry
 6350 Electrochemical Kinetics
 6360 Solid State Chemistry
 6370 Nanoscale Phenomena
 6380 Adsorption on Surfaces
 6381 Surface and Interface Science

6382-9 Selected Topics in Physical Chemistry
 6390-8 Selected Topics in Physical Chemistry
 6399 Chemical Kinetics and Dynamics
 6401 Organic Spectroscopic Analysis I
 6402 Organic Spectroscopic Analysis II
 6421 Natural Products Chemistry
 6460 Organic Synthesis
 6470 Physical Organic Chemistry
 6490-9 Selected Topics in Organic Chemistry
 6590-9 Selected Topics in Theoretical and Computational Chemistry
 6600 Applications of Inorganic and Organometallic Chemistry to Toxicology
 6620 Environmental Chemistry

40.7 Cognitive and Behavioural Ecology

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/become/graduate/apply/app_deadlines.php

40.7.1 Program of Study

1. The Cognitive and Behavioural Ecology Graduate Program focuses on interdisciplinary animal behaviour research. Research integrates mechanistic, developmental, evolutionary, and ecological perspectives on behaviour through molecular, individual, and population levels of analysis. Supervisors include faculty from the Departments of Biology, Ocean Sciences, Psychology, the Faculty of Medicine and the Environmental Science Program at Grenfell Campus, as well as adjunct faculty from the Canadian Wildlife Service, Department of Fisheries and Oceans, the Newfoundland and Labrador Forestry and Wildlife Divisions and Parks Canada. The Departments of Biology and Psychology jointly offer the Master of Science and the Doctor of Philosophy degrees in Cognitive and Behavioural Ecology.
2. The Administrative Committee is responsible for the Program. Committee members are appointed by the Dean of Science, on the recommendation of the Chair of the Committee and of the Heads of Biology and Psychology. The Committee Chair is elected by the committee members and appointed by the Dean of Science. The Committee makes recommendations to the Dean of Graduate Studies concerning admissions and academic requirements. In consultation with supervisors, recommendations are made concerning course programs, financial support, thesis committees, comprehensive and thesis topics, examiners and students' annual progress. Upon program completion, the Committee certifies that all requirements for the appropriate degree have been met. The Department of the Supervisor ensures that adequate facilities are provided for each student. Students in Cognitive and Behavioural Ecology are considered for teaching assistantships in the Psychology or Biology Departments.

40.7.2 Regulations

1. There are no required courses for the doctoral program. However, the Doctoral Seminar (CABE 6992) and/or other courses tailored for individual students may be included in the student's program by the Dean of Graduate Studies on the recommendation of the Chair of the Committee.
2. The comprehensive examination shall normally be taken within the first 5 semesters of the program. An Examination Committee will be struck in accordance with **General Regulations**. At least one member of either the Department of Biology or of the Department of Psychology (other than the Supervisor) must be on the Examination Committee, along with one other representative from among the faculty members currently associated with Cognitive and Behavioural Ecology and an additional representative from either within or outside of Cognitive and Behavioural Ecology. The student's Supervisor will be on the Examination Committee with a maximum of one other member from the student's supervisory committee permitted to serve when appropriate. The Examination Committee is chaired by the Chair of the Cognitive and Behavioural Ecology Committee. The examination will include a comprehensive, integrative review and critical evaluation of novel ideas with regard to a topic in Animal Behaviour or Behavioural Ecology. The review topic is assigned by the Examination Committee, which also determines the submission date for the paper, and the date of the examination. Normally, the student will write the paper in 10 weeks, and the oral examination will occur within two to three weeks of the paper's submission. This paper will form the basis of a public seminar. The Examination Committee will question the student about the paper, the topic and its broader relationship with Cognitive and Behavioural Ecology.

40.7.3 Courses

Biology 7220 Quantitative Methods in Biology
 Cognitive and Behavioural Ecology 6240 Special Topics
 Cognitive and Behavioural Ecology 6350 Behavioural Ontogeny
 Cognitive and Behavioural Ecology 6351 Behavioural Ecology and Sociobiology
 Cognitive and Behavioural Ecology 6992 Doctoral Seminar
 Cognitive and Behavioural Ecology 7000 Field and Lab Methods in Animal Behaviour and Behavioural Ecology
 Psychology 6000 Advanced Statistics in Psychology

Table of Credit Restrictions - Doctor of Philosophy in Cognitive and Behavioural Ecology

(Credit may be obtained for only one course from each of the pairs of courses listed in this table.)

Present Course	Former Course
CABE 6240	Biopsychology 6240
CABE 6350	Biopsychology 6350
CABE 6351	Biopsychology 6351
CABE 7000	Biopsychology 7000

40.8 Computer Science

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/science

www.mun.ca/computerscience

www.mun.ca/become/graduate/apply/app_deadlines.php

The degrees of Master of Science and Doctor of Philosophy are offered in Computer Science.

40.8.1 Program of Study

1. Admission into the Ph.D. program in Computer Science is normally restricted to students holding a Master's Degree (or equivalent) in Computer Science or a closely related area. Others may be considered for admission. See **Qualifications for Admission** of the **General Regulations**. International applicants are strongly encouraged to submit results of the (general) Graduate Record Examination (GRE) Test.
2. Each student for the Ph.D. shall complete a program of graduate courses prescribed by the supervisory committee.
The program of each student must consist of a minimum of 12 credit hours in graduate courses which will include 9 credit hours from Computer Science, and the other 3 credits will be one of:
 - a. a course in Computer Science, or a related area, as established in the list of graduate electives; or
 - b. a course related to the student's area of research.
 In addition to the 12 credits mentioned above, a student is strongly recommended to take Comp 690A/B, if the student has not previously taken this course (or an equivalent). The supervisory committee may add more courses to the student's program of studies, if it deems this appropriate.
3. The student shall take the Comprehensive Examination within the time limits specified in **Comprehensive Examinations** of the **General Regulations**. Students should consult the Departmental guidelines for a detailed description of the content of the Comprehensive Examination.
4. The Ph.D. Degree program will conclude with an oral defence of the thesis as described in **Theses and Reports** of the **General Regulations**.

40.8.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

6758-6769 Special Topics in Computer Applications

6770-6790 Special Topics in Computer Science

690A/B Research Methods in Computer Science

6901 Applied Algorithms (*credit may be obtained for only one of 6901 and 6783*)

6902 Computational Complexity (*credit may be obtained for only one of 6902 and 6743*)

6903 Concurrent Computing

6904 Advanced Computer Architecture (*credit may be obtained for only one of 6904 and 6722*)

6905 Software Engineering (*credit may only be obtained for one of 6905 or 6713*)

6906 Numerical Methods (*credit may only be obtained for one of 6906 or 6731*)

6907 Data Mining Techniques and Methodologies (*credit may be obtained for only one of 6907 and 6762*)

6908 Database Technology and Applications (*credit may be obtained for only one of 6908 and 6751*)

6909 Fundamentals of Computer Graphics (*credit may be obtained for only one of 6909 or 6752*)

6910 Services Computing, Semantic Web and Cloud Computing

6911 Bio-inspired Computing

6912 Autonomous Robotics (*credit may be obtained for only one of 6912 and 6778*)

6913 Bioinformatics

6914 3D Modelling and Rendering

6915 Machine Learning

6916 Security and Privacy

6918 Digital Image Processing (*credit may be obtained for only one of 6918 or 6756*)

6921 Syntax and Semantics of Programming Languages (*credit may be obtained for only one of 6921 or 6711*)

6922 Compiling Methods (*credit may be obtained for only one of 6922 and 6712*)

6924 Formal Grammars, Automata and Languages

6925 Advanced Operating Systems

6926 Performance Evaluation of Computer Systems (*credit may be obtained for only one of 6726 and 6926*)

6928 Knowledge-Based Systems (*credit may be obtained for only one of 6928 or 6755*)

6929 Advanced Computational Geometry (*credit may be obtained for only one of 6929 or 6745*)

6930 Theory of Databases (*credit may be obtained for only one of 6930 or 6742*)

6931 Matrix Computations and Applications (*credit may be obtained for only one of 6931, the former 6732 and CMSC 6910*) (*cross-listed with CMSC 6910*)

6932 Matrix Computations in Control (*credit may be obtained for only one of 6932 or 6738*)

6933 Nonlinear and Linear Optimization (*cross-listed with Mathematics 6202*)

6934 Introduction to Data Visualization (*credit may be obtained for only one of 6934 or 6774*)

6980-6998 Special Topics in Computer Science

40.9 Earth Sciences

www.mun.ca/sgs/contacts/sgscontacts.php
 www.mun.ca/science
 www.mun.ca/earthsciences
 www.mun.ca/become/graduate/apply/app_deadlines.php

The degrees of Master of Science and Doctor of Philosophy are offered in Earth Sciences (Geology) and Earth Sciences (Geophysics) by full-time and part-time study.

40.9.1 Program of Study

1. Admission into a Ph.D. program in Earth Sciences (Geology) and Earth Sciences (Geophysics) is normally restricted to students holding a Master's Degree or its equivalent. Students holding B.Sc. (Honours) degrees who show evidence of exceptional ability may be considered for a direct entry into a Ph.D. program. In exceptional circumstances, a student with a B.Sc. (Honours) Degree who has spent not less than 12 months in an M.Sc. Degree program may be recommended for transfer into a Ph.D. program, provided that the student can demonstrate, to the satisfaction of the Department of Earth Sciences, the student's ability to pursue research at the doctoral level.
2. A student in the Ph.D. Degree is normally required to complete 6 credit hours in addition to the credit hours required for the M.Sc. Degree. The courses must be selected from the overview and general courses below or with the approval of the supervisory committee and Head of Department, other graduate level courses including those offered by other departments. Depending on background and/or area of specialization, a student also may be required to complete additional courses in Earth Sciences or related subjects. All course requirements should be completed within 12 months from the date of the first registration in the Ph.D. program.
3. The Ph.D. Comprehensive Examination shall normally be taken within the first four semesters of registration in the Ph.D. program. A detailed description of the Ph.D. Comprehensive Examination can be found in the Department of Earth Sciences Graduate Student Handbook.
4. The Ph.D. Degree program will conclude with a thesis examination and an oral defense of thesis as prescribed in the **General Regulations, Theses and Reports**.
5. The Supervisor and the Head of the Department may recommend to the Dean of Graduate Studies that the program of a student who is not making satisfactory progress be terminated, in accordance with **General Regulation, Termination of a Graduate Program**.
6. A student is required to give an oral presentation to the Department on the results of the student's research. The presentation must be given during the second or third year of the program.

40.9.2 Courses

A selection of courses will be offered to meet the requirements of students as far as the resources of the Department will allow.

40.9.2.1 Overview Courses

7000 Graduate Internship in Earth Sciences
 7110 Physics of the Solid Earth
 7120 Crustal Geophysics
 7300 Changes in Global Paleoenvironment
 7400 Tectonic Regimes
 7410 Engineering and Environmental Geology
 7500 Chemical Fluxes in the Earth
 7810 Paleocology (*same as former 6810, credit may be obtained for only one of 7810 or 6810*)

40.9.2.2 General Courses

6070 Quantitative Techniques in Mineralogy and Metamorphic Petrology
 6105 Advanced Field Course in Applied Geophysics (may be offered in accelerated format)
 6141 Rotation of the Earth
 6142 Theory of Global Geodynamics
 6152 Paleomagnetism
 6171 Advanced Exploration Seismology
 6172 Borehole Seismic
 6175 Gravity and Magnetic Methods
 6177 Mathematical Formulations of Seismic Wave Phenomena
 6210 Genesis of Mineral Deposits
 6320 Marine Geology
 6400 Flow and Transport in Fractured Rock
 6410 Advanced Engineering and Environmental Geology
 6420 Deformation Mechanisms
 6500 Stable Isotope Geochemistry
 6510 Trace Element Geochemistry
 6520 Methods in Advanced Research in Geochemistry
 6540 Radiogenic Isotope Geochemistry
 6550 Biogeochemistry
 6600 Petroleum Geology
 6740 Modern and Ancient Sedimentary Environments
 6750 Sequence Stratigraphy
 6801 Palaeobiology of Early Animal Life
 6820 Palynology and Paleobotany
 6900-6999 Special Topics in Earth Sciences

40.10 Education

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/educ
www.mun.ca/become/graduate/apply/app_deadlines.php

The degrees of Master of Education and Doctor of Philosophy are offered in Education.

The Degree of Doctor of Philosophy in Education is offered to qualified students, normally by full-time study. The **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland outlined in the current Calendar, and the Degree Regulations of the Faculty of Education outlined below will apply.

40.10.1 Admission to the Ph.D. Program

General qualifications for admission to the Ph.D. Programs at Memorial University of Newfoundland are set out in the University Calendar under School of Graduate Studies, General Regulation **Qualifications for Admission, Ph.D. Program**.

In addition, the following admission requirements apply:

1. an 'A' standing in a Master's Degree in Education or in an equivalent Master's Degree from an accredited university;
2. evidence of scholarly work, such as a master's thesis, directed research project, or qualifying research paper;
3. normally, completion of two years of professional experience in an educational setting;
4. an interview may be required.

40.10.2 Supervisory Committee

Each student will have a supervisory committee comprised of a minimum of three members, at least two of whom shall be members of the Faculty of Education. The thesis Supervisor shall be a faculty member in the Faculty of Education, Memorial University of Newfoundland.

40.10.3 Program of Study

1. Courses

Students are required to successfully complete four courses on the doctoral program.

- a. Education 701A/B - Doctoral Seminar in Education: Area of Specialization

Education 702A/B - Advanced Educational Research

Students register for the 'A' portion of the above-noted courses in the Fall semester of their program of study and the corresponding 'B' portion of the course in the following Winter semester. A grade of NC (No Grade Expected) will be assigned to the 'A' portion of each of these courses. Students must register for the 'A' portion of the above-noted courses in the first Fall semester of their program of study and the corresponding 'B' portion of the course in the following Winter semester. A grade of NC (No Grade Expected) will be assigned to the 'A' portion of each of these courses.

- b. Students will also be required to complete two available graduate courses related to their program focus and specialty, based on the advice of the student's supervisory committee.
- c. Normally, no more than four courses may be undertaken on a student's program.
- d. Education 7003-30 - Special Topics (offered as required)

2. Comprehensive Examination

The student shall undertake a written and an oral comprehensive examination, which will follow General Regulation **Comprehensive Examinations, Ph.D. Comprehensive Examination** which sets out the procedures for the comprehensive examination.

- a. A student in a Ph.D. program in Education shall normally take the examination no later than the end of the seventh semester in the program. The student will have completed required courses prior to taking the Comprehensive Examination. In preparation for the Comprehensive Examination, the doctoral student, with the guidance of the student's Supervisor, will undertake study of the sub-disciplines/areas of concentration identified by the student and supervisory committee and approved by the Doctoral Committee. Normally, these will include the student's area of concentration and two additional sub-disciplines/areas of concentration.
- b. Such study of sub-disciplines will normally include but not be limited to developing a reading list of important historical and current publications within the sub-disciplines, identifying emerging research emphases within the sub-disciplines, and writing scholarly review papers of these publications.
- c. In preparation for the written comprehensive examination, the doctoral student and the supervisory committee will agree on the topics to be examined. The examination will be written over a three-week period.
- d. Normally, the oral comprehensive examination will occur within six weeks of the written examination, which if judged to be successful by the Comprehensive Examination Committee, will form the basis of an oral comprehensive examination.
- e. The procedure for scheduling the Comprehensive Examination shall be initiated by the student's Supervisor who will notify, in writing, the Dean of Education of the student's readiness. The date of both the written examination and the oral examination will be determined by the Dean of Education. The student will receive a written notice of the scheduled date for both examinations from the Dean of Education.
- f. The Comprehensive Examination Committee shall be appointed by the Dean of Graduate Studies in accordance with School of Graduate Studies General Regulation **Comprehensive Examination, Ph.D. Comprehensive Examination** on the recommendation of the Dean, Faculty of Education. There will be six members of the Comprehensive Examination Committee as follows:

Dean of Education or delegate (Chair)

Chair of the Doctoral Committee of the Faculty Council of Education

Student's Supervisor

Second member of student's supervisory committee

Dean of School of Graduate Studies or delegate (non-voting)

Member of the Faculty of Education or educational community selected by the Dean of Education.

In the event that the Chair of the Doctoral Committee is the student's Supervisor, the Dean of Education shall appoint an additional member.

3. Ph.D. Thesis Regulations

- a. The student must submit a thesis proposal based on the student's own research interest to all members of the Supervisory Committee for critical evaluation. Normally, the proposal must be approved prior to the eighth semester of the program. The Chairperson of the Supervisory Committee will inform the student within one month of its acceptance, rejection or acceptance with recommended changes.
- b. If the proposal is not acceptable, the student will normally be permitted a second attempt. The revised proposal must be submitted and deemed acceptable by the Supervisory Committee within a semester. Failure to resubmit within this time period will lead to termination of the student's program.
- c. The thesis shall give evidence of the student's ability to carry out independent and original research, develop the necessary theoretical and methodological framework and analyses, and present the findings in a scholarly manner.
- d. Each student will be required to present a seminar on the student's thesis research to the Faculty.
- e. Ph.D. program will conclude with the examination and oral defence of the completed thesis in accordance with the appropriate sections of the General Regulation **Theses and Reports, Evaluation of Ph.D. Theses** governing the School of Graduate Studies.

40.10.4 Courses

701A/B Doctoral Seminar in Education: Area of Specialization (*credit may not be obtained for 701A/B and the former 7001*)

702A/B Advanced Educational Research (*credit may not be obtained for 702A/B and the former 7002*)

7003-30 Special Topics

40.11 Engineering and Applied Science

www.mun.ca/sgs/contacts/sgscontacts.php

www.engr.mun.ca

www.mun.ca/become/graduate/apply/app_deadlines.php

The degree of Doctor of Philosophy (Ph.D.) is offered in the Faculty of Engineering and Applied Science and may be obtained either through full-time or part-time studies. The Ph.D. degree can be obtained through programs in Civil Engineering, Computer Engineering, Electrical Engineering, Mechanical Engineering, Ocean and Naval Architectural Engineering, Oil and Gas Engineering, and Process Engineering.

40.11.1 Qualifications for Admission

Admission to the Ph.D. program is limited and competitive. All applicants must meet the minimum qualifications described in the **General Regulations** for the School of Graduate Studies. Admission is normally restricted to students holding a Master's Degree in Engineering or a related area. Decisions on admission, however, will also take into account such things as the applicant's rank in class, referees' assessments, general performance throughout the applicant's previous academic programs, and the availability of supervisors in the area of the applicant's interest. In cases of demonstrated ability, a student enrolled in the M.Eng. program may be allowed to transfer to the Ph.D. program without the completion of all the M.Eng. Degree requirements. As well, in exceptional cases, direct entry to the Ph.D. program, after completion of a Bachelor's Degree in Engineering or a related area, is possible.

Normally, applicants will be considered in January for admission for the following September. In special cases, applicants may also be considered in April and August. Applications should be made sufficiently far in advance to permit the University to obtain all relevant documents and review the application.

40.11.2 Program of Study and Research

A Ph.D. program shall normally consist of three components:

1. a minimum of 6 credit hours consisting of graduate courses recommended by the student's supervisory committee,
2. a comprehensive examination as detailed in **Regulations for Ph.D. Comprehensive Examination**, and
3. a thesis satisfying the requirements of the **General Regulations** for the School of Graduate Studies.

In cases of direct entry after a Bachelor's Degree or promotion from a Master's program before fulfilment of the Master's course requirements, it is likely that the student will be required to take more credit hours than the normally required minimum. In such cases, the requirements for the course component of the student's program will be reviewed on an individual basis by the student's supervisory committee and the Dean of the Faculty of Engineering and Applied Science.

40.11.3 Regulations for Ph.D. Comprehensive Examination

1. Timing

A student registered in the Ph.D. Program shall normally take the Comprehensive Examination within four semesters of the start of the student's program. The student must have successfully completed all required courses prior to the Comprehensive Examination. The Comprehensive Examination Committee shall be appointed by the Dean of Graduate Studies on the recommendation of the Dean of Engineering and Applied Science, normally within three semesters of the start of the student's program.

The Examination Committee shall be appointed by the Dean of Graduate Studies on the recommendation of the Dean of Engineering and Applied Science, normally within three semesters of the start of the student's program.

2. Examination Procedure

The Comprehensive Examination (as prescribed under **General Regulations, Comprehensive Examinations, Ph.D. and Psy.D. Comprehensive Examination**), shall be an oral examination that is open to the University community; however, only members of the Examination Committee are permitted to ask questions. Following the examination, the Examination Committee shall meet in camera to decide.

40.11.4 Ph.D. Thesis Regulations

1. Upon successful completion of the Comprehensive Examination, and normally prior to the end of the sixth semester in the program, the student must submit a thesis proposal to the Supervisory Committee for evaluation and approval. The proposal shall consist of 1) a written research proposal, normally of no more than 10,000 words, that should clearly define the research problem, survey literature, present the research method or experimental design, and may include a summary of results already obtained, and 2) a 20 to 30 minute presentation. The student should submit the written proposal at least one month prior to the presentation which is open to the University community.

- The presentation will be chaired by the Dean of Engineering and Applied Science or delegate. Immediately following the presentation, the Supervisory Committee shall question the student regarding the proposal and shall then meet in camera to assess the proposal. Assessment shall result in one of the following three outcomes: (1) accept; (2) accept with changes, or (3) reject. The results of this assessment shall be provided to the student following the meeting. Assessments of 'accept with changes' or 'reject' shall be accompanied by written comments within one week of the proposal presentation.
- If the proposal is rejected, the student shall be permitted to submit a second proposal. This proposal must be submitted and deemed acceptable by the Supervisory Committee within four months of the original proposal presentation. Failure to submit an acceptable second proposal within the time period shall lead to termination of the student's program.
- The Ph.D. thesis shall constitute an independent and original research contribution.
- The Ph.D. thesis shall be evaluated according to the process established in **General Regulations, Theses and Reports, Evaluation of Ph.D. and Psy.D. Theses** governing the School of Graduate Studies.

40.11.5 Courses

For a list of graduate courses offered by the Faculty of Engineering and Applied Science refer to the list of "Core Courses" and the list of "Other Courses" offered for the Master of Engineering program.

40.12 English

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/hss

www.mun.ca/english

www.mun.ca/become/graduate/apply/app_deadlines.php

The degrees of Master of Arts and Doctor of Philosophy are offered in English.

Students for the M.A. in English may complete the program as either part-time or full-time students. Students for the Ph.D. in English must be in attendance as full-time students for at least three semesters of the program.

40.12.1 Program of Study

- Admission to the Ph.D. in English is limited and competitive. Applicants should have a Master's Degree in English or its equivalent from a recognized university and should have an outstanding academic record.
- All students will be required to complete 15 credit hours in graduate courses. These courses will be selected by the student in consultation with the student's Supervisory Committee.

While students will normally be free to choose graduate courses of interest to them, it will be a primary responsibility of their Supervisory Committees to ensure that any serious deficiencies in their record of previous courses, graduate and undergraduate, are remedied, particularly in the area of proposed thesis research.

- Students who have not previously taken English 7003 or its equivalent will take English 7003, which will count as one of the required courses for the Ph.D. Students who have taken English 7003 or its equivalent before entering the Ph.D. program must still complete 15 credit hours.
- Students who have not completed English 4900 or English 5900 or an equivalent course will be required to complete English 5900, which will not count as one of the required courses for the Ph.D. The course will be graded "pass" or "fail". As in other graduate courses a grade of 65B or above is considered a pass.
- Students must submit a thesis proposal which includes a statement of topic, a working title, a plan of research, and a preliminary bibliography. The thesis proposal should be approved by the Supervisory Committee and submitted to the Departmental Graduate Studies Committee for its approval before the Comprehensive Examination and before the end of the fifth semester. The Departmental Graduate Studies Committee shall return the thesis proposal to the student no later than one month after receiving it.
- Reading knowledge of a second language will be required of all students. Reading knowledge is defined as a minimum 'B' grade in a second-year language course taken within the previous five years, a passing grade in an approved second-language course for graduate students, or performance satisfactory to the Department in an arranged reading proficiency test (in which a dictionary may be used).

The language requirement should be completed before the Comprehensive Examination is taken.

The second language will normally be French. In exceptional circumstances, and on the recommendation of the Supervisory Committee and the Departmental Graduate Studies Committee, a language other than French may be substituted.

The Supervisory Committee may also require a demonstrated reading knowledge of an additional language (other than French or the substituted language) if such knowledge is deemed necessary for the student's research interests.

- The Ph.D. Comprehensive Examination in English will have written and oral components, will have two parts, and will be prepared by the student's Comprehensive Examination Committee. The Comprehensive Examination Committee will determine the submission dates for papers and the dates of oral examinations. The Ph.D. Comprehensive Examination in English shall in all circumstances be in accordance with General Regulation **Comprehensive Examinations, Ph.D. Comprehensive Examination**.

The student's Comprehensive Examination Committee will include the Head (or the Head's delegate, usually the Graduate Coordinator), the Dean of the School of Graduate Studies (or delegate), the student's Supervisor, and three other members of the Department.

The examination shall take place before the end of the seventh semester.

The first part of the examination will be in a complementary area (Complementary Examination) and the student will have a choice of either writing an essay in response to questions determined by the Comprehensive Examination Committee or completing a set of assignments related to teaching in the field.

The second part of the examination will be in the student's thesis area (Thesis Area Examination) and will require the student to write in response to questions determined by the Comprehensive Examination Committee and that paper will form the basis of a departmental presentation. The Comprehensive Examination Committee will orally examine the student about the paper topic and the broader relationship to the thesis area.

All examinations, both written and oral, will comply with Departmental Guidelines.

Students will be graded "pass", "re-examination", or "fail." Students who are marked for "re-examination" will be re-examined in the area or areas in which the Comprehensive Examination Committee has determined that the student's performance is deficient. The nature of this re-examination (and whether it will be written or oral) is left to the discretion of the Comprehensive Examination Committee.

40.12.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

- Notes: 1. *Since it is impossible to list in detail the many topics that may from time to time be offered, the titles below refer only to the major periods and general subject areas in which specific courses may be available. The content and approach in specific courses will vary according to the research interests of students and faculty involved in the course. Students should consult the Department's annual Graduate Student Guide (or the Graduate Co-ordinator) for detailed descriptions of specific course offerings. Normally, no fewer than 30 credit hours in graduate courses are offered in any given academic year.*
2. *English 5900 cannot be counted as one of the required graduate courses in any program.*
3. *All students will normally take English 7003 - Trends in Contemporary Literary Theory, usually in their first semester.*
4. *Students who took graduate courses in English at Memorial University of Newfoundland before 1997 should consult with the Department before selecting further courses.*

602F Foundation English for Graduate Students
 6999 Master's Essay (for non-thesis students)
 7003 Trends in Contemporary Critical Theory
 7099 Masters Internship
 7100-7149 Author Studies
 7150-7199 Book Histories
 7200-7249 Creative Writings
 7250-7299 Critical Theories
 7300-7349 Cultural Studies
 7350-7399 Genre Studies
 7400-7449 Global Literatures
 7450-7499 Indigenous Voices
 7500-7549 Literary Movements
 7550-7599 National Literatures
 7600-7649 Period Studies
 7650-7699 Regional Literatures
 7700-7749 Special Topics
 7750-7799 Visual Narratives

40.13 Environmental Science

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/become/graduate/apply/app_deadlines.php

40.13.1 General Information

1. The Environmental Science Program is an interdisciplinary graduate program involving the departments of the Faculty of Science, the Faculty of Humanities and Social Sciences, the Faculty of Medicine and the Faculty of Engineering and Applied Science. There are three Environmental Science Graduate Degree streams: the Master of Science (M.Sc., Environmental Science), Master of Environmental Science (M.Env.Sci.), and the Doctor of Philosophy (Ph.D., Environmental Science). The program is available on a full or part-time basis.
2. The program is administered by a Board of Studies appointed by the Dean of Science. Supervisors of graduate students in the program include faculty from the Faculty of Science, the Faculty of Humanities and Social Sciences, the Faculty of Engineering and Applied Science, the Faculty of Medicine, and the Environmental Science Program at the Grenfell Campus, as well as adjunct appointees to the program (as a co-supervisor).

40.13.2 Program of Study

1. The Doctor of Philosophy (Ph.D., Environmental Science) is a research degree which includes a doctoral dissertation and course work. Normally, students entering the Ph.D. program in Environmental Science will have a M.Sc. degree from an institution recognized by the Senate. Students in the Master of Science (Environmental Science) program, after a minimum of 12 months in their program of studies, may request a transfer to the Ph.D. program. Final decision for transfer from the M.Sc. program to the Ph.D. program rests with the Dean of the School of Graduate Studies. There are two courses (6 credit hours) required for the doctoral program. All students take Environmental Science 6010 and those with a disciplinary M.Sc. degree in Science from a recognized university also take Environmental Science 6000. Other courses tailored for individual students are included in the student's program by the Dean of Graduate Studies on the recommendation of the Chair of the Board of Studies.
2. The comprehensive examination should be taken on completion of all course work. An Examination Committee will be struck in accordance with the **General Regulations**. At least two members of the Board of Studies must be on the Examination Committee. The student's Supervisor will be on the Examination Committee and will be the only examiner from the student's Thesis Supervisory Committee. The Head of the Department of the Supervisor or delegate is invited to serve on the Comprehensive Examination Committee. The Examination Committee is chaired by the Chair of the Environmental Science Program. The examination will be both written and oral. The topic is assigned by the Examination Committee, which also determines the submission date for the paper, and the date of the examination. Normally, the student will write the paper within four months, and the oral examination will occur within six weeks of the paper's submission. This paper will form the basis of a public seminar. The Examination Committee will question the student about the paper, the topic and its broader relationship with Environmental Science.
3. The doctoral thesis is based on the results of systematic, independent research on an approved scientific topic. To ensure the research is interdisciplinary, the supervisory committee must be made up of members from at least two different departments. The student will be required to present a Ph.D. research proposal to the supervisory committee. The completed thesis will be evaluated according to the **General Regulations** of the School of Graduate Studies. It must contribute significantly to knowledge in the field of Environmental Science.

40.13.3 Courses

6000 Environmental Science and Technology
 6001 Earth and Ocean Systems
 6002 Environmental Chemistry and Toxicology
 6003 Applied Ecology
 6004 Environmental Pollution and Mitigation (*cross-listed as ENGI 9601*)

6007 Environmental Risk Assessment (*cross-listed as ENGI 9609*)

6008 Air Pollution (*cross-listed as ENGI 9624*)

6010 Environmental Seminar

6201-6210 Selected Topics in Environmental Science

40.14 Ethnomusicology

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/hss

www.mun.ca/folklore

www.mun.ca/music

www.mun.ca/become/graduate/apply/app_deadlines.php

The Doctor of Philosophy program in Ethnomusicology is administered by the School of Music in consultation with the Department of Folklore, and generally in response to recommendations from an Interdisciplinary Advisory Committee with representation from both academic units, chaired by the Program Co-ordinator.

The Degree of Ph.D. in Ethnomusicology is offered by part-time and full-time study. This program is a research Degree, generally involving extended fieldwork. The resources of the Memorial University of Newfoundland Folklore and Language Archive are available to graduate students in Ethnomusicology.

40.14.1 Qualifications for Admission

Applicants may be admitted to the program if they have at least a B+ average in a M.A. Degree in Ethnomusicology, another field of Music, or other relevant discipline in the Humanities or Social Sciences with evidence of specialization in music. Applicants from a discipline other than Music will be expected to demonstrate the following skills:

- Competent performance in any musical tradition, as judged by a musician knowledgeable about that tradition.
- Knowledge of culturally appropriate language for discussion of performance techniques in that tradition.
- Ability to discuss musical details on the basis of aural and/or written sources, as appropriate to that tradition.

Students for admission may, at the discretion of the Interdisciplinary Advisory Committee, be required to write diagnostic examinations measuring skills and knowledge in music literacy, theory, or aural perception. Students with deficiencies in any of these areas may be required to take remedial course work prior or in addition to the required program.

Upon completion of M.A. course work, students who have attained an A average may wish to be considered for transfer to the Ph.D. program. Students who seek this option must apply to the Interdisciplinary Advisory Committee to be considered for transfer one month prior to the completion of their M.A. courses or by the end of the 5th semester (see General Regulation **Qualifications for Admission, Master's Program**).

40.14.2 Program of Study

The Ph.D. program may be completed within twelve to fifteen consecutive semesters of full-time study, depending on fieldwork requirements. The Degree is normally taken by completing course work, comprehensive examinations, a language proficiency requirement, and a Ph.D. thesis, defended in accordance with General Regulation **Theses and Reports** of the School of Graduate Studies.

1. Students must complete a minimum of 21 credit hours of course work. If required courses have been completed at the M.A. level, electives may be substituted (with approval of the Interdisciplinary Advisory Committee). The required courses are:
 - a. Music 8001; Folklore 6030 or Folklore 6070 or other social theory course by approval of the Interdisciplinary Advisory Committee; and Folklore 7100.
 - b. Twelve credit hours of electives selected from courses listed below or from relevant courses offered in another discipline (with the approval of the Interdisciplinary Advisory Committee). Ph.D. students may take up to two courses (6 credit hours) in a cognate discipline.
 - c. Reading proficiency in one language other than English, relevant to the research area, demonstrated to the satisfaction of the Interdisciplinary Advisory Committee. The choice of language must be approved by the Interdisciplinary Advisory Committee. The language exam should normally be completed before the comprehensive exams.
 - d. Further courses beyond the minimum number may be required, depending on the background and needs of the student.
2. Comprehensive examinations will be administered in a major area, minor area, and theoretical/interdisciplinary area; a component of the comprehensive examination will test audio-visual skills. Bibliographies and discographies for several focussed topics will be developed by the student in consultation with the student's supervisory committee and will be the basis of examination questions. The written portion of the examination will be scheduled over a one-week period. The Comprehensive Examination Committee will normally schedule a consultation with the student to discuss the written essays within one month following the completion of the written examination. For further information see General Regulation **Comprehensive Examinations, Ph.D. Comprehensive Examination**.
3. Students must complete a thesis, examined and defended in accordance with General Regulation **Theses and Reports** of the School of Graduate Studies. A thesis proposal, including a working title, statement of purpose and research scope, outline of theoretical and methodological approach, working plan, and preliminary bibliography, together with proposed membership of the supervisory committee, must be submitted to the Interdisciplinary Advisory Committee no later than the fifth semester of study. The thesis shall demonstrate the student's ability to carry out original and independent research, develop the necessary theoretical and methodological framework, and present the findings in a scholarly manner.

40.14.3 Courses

Theories and Methods:

Music 6807 Video Documentary Production (*credit may be received for only one of Music 6807, Music 7003 or Music 7803*)

Music 7001 Research Problems and Methods in Ethnomusicology

Music 7003 The Politics of Ethnographic Video Methods in Ethnomusicology

Music 7803 Radio Documentary Production (*credit may be received for only one of Music 6807, Music 7003 or Music 7803*)

Music 8001 Theoretical Issues in the Study of Music

Folklore 6010 Survey of Folklore Genres and Processes

Folklore 6020 Field and Research Methods

Folklore 6030 Folklore Theories

Folklore 6040 Feminist Theories: Perspectives and Issues

Folklore 6080 Vernacular Theories
 Folklore 6090 Ethnology
 Folklore 7100 Advanced Folkloristics II: Research and Ethnography

Form and Performance:

Music 7005 Performance Option
 Folklore 6100 Song and Music
 Folklore 6120 Ballad
 Folklore 6130 Folk Music Canons and Documentary Sound Recordings
 Folklore 6200 Folktale
 Folklore 6210 Legend
 Folklore 6220 Personal Experience Narrative
 Folklore 6250 Language and Play
 Folklore 6260 Ethnography of Communications
 Folklore 6300 Ethnography of Belief
 Folklore 6310 Health Systems
 Folklore 6350 Custom
 Folklore 6360 Traditional Drama
 Folklore 6400 Material Culture
 Folklore 6410 Vernacular Architecture
 Folklore 6420 Art and the Artifact
 Folklore 6430 Food and Culture
 Folklore 6720 Folklore and Literature

Area and Genre Studies:

Folklore 6120 Ballad
 Folklore 6600 Folklore of Newfoundland
 Folklore 6610 Folklore of Canada
 Folklore 6620 Folklore of the United States
 Folklore 6630 Folklore of the British Isles
 Folklore 6770 The Global and the Local

Social Identities:

Music 7006 Urban Ethnomusicology
 Music 7007 Music in the Study of Gender, Race and Class
 Music 7009 Music and Place
 Music 7001 Research Problems and Methods in Ethnomusicology
 Music 7802 Music and Intercultural Processes
 Folklore 6510 Occupational Folklore
 Folklore 6551 Indigenous Expressive Cultures in Cross-cultural Encounter
 Folklore 6730 Folklore and Gender
 Folklore 6780 Ethnicities

Independent Study:

Music 7026-29 Directed Reading in Ethnomusicology
 Folklore 6570-79 Reading Course in Folklore

Special Topics:

Music 6800-09 Special Topics in Music (excluding Music 6807)
 Music 7800-09 Special Topics in Music (excluding Music 7802 and 7803)
 Folklore 6511-29 Special Topics in Folklore
 Folklore 6570-79 Reading Course in Folklore

Public and Applied Ethnomusicology and Folklore:

Music 6750 Music Industries Internship (2 credit hours)
 Folklore 6740 Public Sector Folklore
 Folklore 6760 Archiving
 Folklore 6790 Museums: Perspectives and Practices
 Folklore 6800 Applied Folklore

Interdisciplinary Perspectives:

Music 7008 Media Studies
 Folklore 6700 Folklore and Culture
 Folklore 6710 Oral Tradition and Oral History
 Folklore 6750 Popular Culture: Theory and Debate

40.15 Fisheries Science

www.mun.ca/sgs/contacts/sgscontacts.php
www.mi.mun.ca

www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Doctor of Philosophy is offered in Fisheries Science to full-time and part-time students. The following regulations must be read in conjunction with the **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland.

An Academic Advisory Committee will be appointed by the Dean of Graduate Studies on recommendation of the Vice-President (Marine Institute). The Committee will consist of an Academic Director as Chair, three members from the Marine Institute, and two members from other academic units of the University. Normally, all appointments will be for a period of three years.

40.15.1 Admission and Program of Study

1. Admission into the Ph.D. program in Fisheries Science is normally restricted to applicants holding a Master's Degree or its equivalent. In exceptional circumstances, an applicant with a B.Sc. Degree who has spent not less than 12 months in an M.Sc. Degree program may be recommended for transfer into a Ph.D. program. For this transfer to be accepted, the applicant must demonstrate, to the satisfaction of the Supervisor and Supervisory Committee, the ability to pursue research at the doctoral level.
2. In addition to completing a thesis of original research, a student will normally be required to take FISH 6000 and 6001. A student will normally be required by the Supervisor and Supervisory Committee to take two of FISH 6002, 6003, 6004, and/or 6005.

3. Within three months of the first registration in the Ph.D. degree program, the student will meet with the Supervisory Committee. It is the function of a Supervisory Committee to have regular meetings, at least annually, with its graduate student. A meeting report, signed by all members of the Supervisory Committee and student, must be given to the Academic Unit. A copy will be sent to the graduate student and to the Dean of Graduate Studies.
4. At the first committee meeting, the Supervisory Committee shall discuss the student's program and will explore areas of weakness in the student's knowledge, especially where these relate to the intended areas of research. The Supervisory Committee may require the student to take additional courses.
5. The student and the Supervisory Committee will agree on a written thesis proposal outlining the objectives, methods, timetable and funding for the project, and provide the proposal (signed by the student and the Supervisory Committee) to the Head for inclusion in the student's file. This proposal should be no more than five pages in length.
6. The student will present a research seminar to the Academic Unit, normally by the end of the fourth semester following admission, to describe the research topic being investigated and the methodologies to be employed. This seminar provides an opportunity for the student to receive constructive input from the broad research community.
7. A student must successfully complete a Comprehensive Examination, as outlined under **General Regulations, Comprehensive Examinations, Ph.D. and Psy.D. Comprehensive Examination**. The comprehensive examination will be both written and oral.
8. A theses shall conform to **General Regulations, Theses and Reports** of the School of Graduate Studies.

40.15.2 Courses

FISH 6000 Science Communication for Fisheries
 FISH 6001 Ecology, Management, and Practice of North Atlantic Fisheries
 FISH 6002 Data Collection, Management, and Display
 FISH 6003 Statistics and Study Design for Fisheries Science
 FISH 6004 Overview of Statistical Stock Assessment
 FISH 6005 Advanced Statistical Stock Assessment

40.16 Folklore

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/folklore
www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Doctor of Philosophy in Folklore is offered by part-time and full-time study and is primarily a research Degree. The program normally requires extensive fieldwork research in Newfoundland and/or the Maritimes.

Integral to the teaching of the Department of Folklore is the work of the Memorial University of Newfoundland Folklore and Language Archive; see section under **Master of Arts, Folklore**.

40.16.1 Program of Study

1. An applicant for admission to the Ph.D. program in Folklore must hold an M.A. Degree in Folklore, or its equivalent as determined by the Head of the Department and the Dean, with an average grade in M.A. courses of not less than 80%.
2. All Ph.D. students in the Folklore program must complete *at least* 18 credit hours in program graduate courses which shall include Folklore 7000 and 7100. Students will normally be free to choose graduate courses of interest to them in Folklore or related disciplines, though it will be a primary responsibility of their committees to ensure that any serious deficiencies are made good. At the end of the second semester of the program and further status of the student will be reviewed.
3. Second Language Requirements:
 - a. All Ph.D. students are required to demonstrate an adequate reading knowledge of a second language - normally a common, modern language.
 - b. Reading knowledge is defined as a minimum 'B' grade in a second-year language course taken within the previous five years, or performance satisfactory to the Department in an arranged reading proficiency test.
 - c. The selection of a second language can be based on the student's research requirements.
 - d. The selection of a second language must be made in consultation with the student's faculty advisor or Supervisor. Confirmation that the choice is acceptable must be obtained from the Department.
 - e. The language requirement must normally be fulfilled before a student takes the Ph.D. Comprehensive Examination.
4. Comprehensive Examination for the Ph.D.:
 - a. The Ph.D. Comprehensive Examination shall be administered in accordance with **General Regulations, Comprehensive Examinations**. Students will prepare for three examinations by undertaking supervised readings in three fields decided by the Comprehensive Examinations Committee. The basic principle is to integrate knowledge within specific areas of folklore and folklife scholarship. The examination normally will be written with the format to be determined by the Comprehensive Examination Committee in consultation with the student. Assessment will be based on the examination of three papers each of one week duration or three open book examinations each of eight hour duration. The Committee will recommend to the Dean of Graduate Studies a grade of PAS (pass), REX (re-examination), or FAL (fail).
 - b. Examination normally will take place only upon the completion of the second language requirements and no earlier than the end of the first year after admission to candidacy but no later than one year after the completion of the program courses. The examination normally will be scheduled in the second semester following the student's completion of courses.
5. Ph.D. Thesis:
 - a. The student will normally submit a thesis proposal based on the student's own interests no later than the end of the semester following the completion of comprehensive examinations. The thesis proposal will include a working title, names of preferred Supervisor and two other Committee members, statement of topic, plan of research, statement of methodological and theoretical approach, a brief review of the literature and a preliminary bibliography. The proposal will be circulated to the Department for critical evaluation on the basis of which the student will be informed, within one month, by the Supervisor, of its acceptance, rejection, or acceptance with recommended changes.
 - b. The thesis shall give evidence of the student's ability to carry out independent and original research, develop the necessary theoretical and methodological framework and present the findings in a scholarly manner.

40.16.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, normally after consultation with the Head of the Department or the Graduate Studies Administrator, and as far as the resources of the Department will allow. Courses are structured according to the categories of: Theories and Methods, Issues, Form and Performance, Special Topics, Regional, National and International Heritage, Social Identities, Public and Applied Folklore, Interdisciplinary Perspectives and Required (Ph.D.).

Theories and Methods

6010 Survey of Folklore Genres and Processes
 6020 Field and Research Methods
 6030 Folklore Theories
 6040 Feminist Theories: Perspectives and Issues
 6080 Vernacular Theories
 6090 Ethnology

Issues

6050 Issues in Folkloristics
 6060 Issues in Folk Literature
 6070 Issues in Folklife

Form and Performance

6100 Song and Music
 6120 Ballad
 6130 Folk Music Canons and Documentary Sound Recordings
 6200 Folktale
 6210 Legend
 6220 Personal Experience Narrative
 6250 Language and Play
 6260 Ethnography of Communications
 6300 Ethnography of Belief
 6310 Health Systems
 6350 Custom
 6360 Traditional Drama
 6370 Ritual, Festival and Public Display
 6400 Material Culture
 6410 Vernacular Architecture
 6420 Art and the Artifact
 6430 Food and Culture
 6720 Folklore and Literature

Special Topics

6511-29 Special Topics in Folklore
 6550 Special Research in Folklore
 6551 Indigenous Expressive Cultures in Cross-Cultural Encounter
 6552-69 Special Research in Folklore
 6570-79 Reading Course in Folklore

Regional, National and International Heritage

6600 Folklore of Newfoundland
 6610 Folklore of Canada
 6620 Folklore of the United States
 6630 Folklore of the British Isles
 6640 Traditional Culture of Scotland
 6650 Culture and Traditions of Ireland
 6660 Folklore of the Francophone Regions
 6690 International Folklore

Social Identities

6510 Occupational Folklife
 6730 Folklore and Gender
 6770 The Global and the Local
 6780 Ethnicities

Public and Applied Folklore

6380 Perspectives on Cultural Tourism
 6740 Public Sector Folklore
 6760 Archiving
 6790 Museums: Perspectives and Practices
 6800 Applied Folklore

Interdisciplinary Perspectives

6700 Folklore and Culture
 6710 Oral Tradition and Oral History
 6750 Popular Culture: Theory and Debate

Required (Ph.D.)

7000 Advanced Folkloristics I
 7100 Advanced Folkloristics II Research and Ethnography

Credit may not be obtained for both 6010 and the former 6110; 6020 and the former 6111; 6030 and the former 6112; 6100 and the former 6430; 6120 and the former 6445; 6300 and the former 6230; 6350 and the former 6230; 6400 and the former 6501; 6720 and the former 6460.

40.17 Food Science

See **Biochemistry**.

40.18 Geography

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/science
www.mun.ca/geog
www.mun.ca/become/graduate/apply/app_deadlines.php

40.18.1 Program of Study

1. To be admitted to the program, an applicant must have completed either a Master of Arts or a Master of Science Degree, or its equivalent, in Geography or a related discipline. In exceptional circumstances, a student who has completed either a B.A. (Honours) or B.Sc. (Honours) Degree, and who has spent not less than 12 months in a M.A. or M.Sc. Degree program may apply for transfer into a Ph.D. program. A successful application for transfer will require that the student demonstrate to the satisfaction of the Department an ability to pursue research at the doctoral level.
2. The deadline for submission of applications for admission is January 15. Students will normally commence their programs in the Fall semester.
3. Research areas for graduate study at the Doctoral level are cultural, political and historical geography, economic geography, resource management, community and regional development, physical geography, and geographic information sciences.
4. An applicant will be admitted to a doctoral program only if a faculty member agrees to act as Supervisor, and at least two other individuals are willing to serve on the supervisory committee.
5. All students must successfully complete Geography 6000 and 6001 if these courses, or equivalent courses, have not been included in their Master's program. In addition, all students are required to successfully complete a minimum of 3 credit hours in graduate program courses.
6. The supervisory committee may decide that a student successfully completes an examination for reading or speaking a language other than English.
7. After the successful completion of all required courses, students must take a comprehensive examination which will have both a written and an oral component.
8. Following successful completion of the comprehensive examination the student will submit a written research proposal to the supervisory committee. The proposal must then be approved by the Committee prior to the commencement of research by the student.
9. Each student will be required to present a seminar on their research to the Department.
10. The Ph.D. program will conclude with the examination and oral defence of the completed thesis in accordance with the appropriate sections of the **General Regulations** governing the School of Graduate Studies.

40.18.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students as far as the resources of the Department will allow.

6000 Development of Geographical Thought and Practice I
6001 Development of Geographical Thought and Practice II
6002 Directed Readings in Geography
6100 Research Techniques in A Selected Field of Geography I
6101 Research Techniques in A Selected Field of Geography II
6120 Geospatial Modelling and Analysis
6150 Environmental Remote Sensing and Image Analysis
6200 Economic Geography I
6201 Economic Geography II
6204 Sustainable Community and Regional Development
6250 Conservation and Sustainability of Natural Resources
6251 Survey Design, Questionnaire Development and Techniques of Data Collection
6300 Problems in Fisheries Geography
6400 Fluvial Geomorphology
6401 Glacial Geomorphology
6402 Coastal Geomorphology
6410 Climatology
6420 Quaternary Geography
6430 Biogeography
6500 Cultural Geography
6600 Historical Geography
6700 Political Geography
6800 Urban Geography
6821 Advanced Computer Mapping
6900 Graduate Seminar in Regional Geography
6990-95 Special Topics in Geography

40.19 Geology

See **Earth Sciences**.

40.20 Geophysics

See **Earth Sciences**.

40.21 History

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/history
www.mun.ca/become/graduate/apply/app_deadlines.php

The degrees of Doctor of Philosophy and Master of Arts are offered in History by full-time or part-time study.

40.21.1 Program of Study

1. The Ph.D. Degree in History is offered in accordance with **General Regulations** and current department strengths.
2. An applicant must hold either a Master's Degree in History or a Bachelor's Degree in History with first-class Honours or their equivalents as determined by the Head of the Department and the Dean.
3. During the first semester, a Ph.D. student must successfully complete History 7000 and 7001 if these courses (or their equivalents) have not been included in the student's Master's program. The Supervisory Committee may require the student to complete additional graduate courses.
4. A student must demonstrate in accordance with regulations established by the School of Graduate Studies a reading knowledge of French before taking the comprehensive examination. On the recommendation of the Supervisory Committee a modern language other than French may be substituted. In addition, the Supervisory Committee may require a demonstrated reading knowledge of a second language other than French or English (or the substitute language).
5. A student will undertake supervised reading in fields prescribed by the Department. The Supervisors of these programs of reading, along with the thesis Supervisor, will comprise the student's Supervisory Committee.
6. In the second year of the program, after the successful completion of all required courses, a student must take a Comprehensive Examination, which will have both written and oral components.
7. Following successful completion of the Comprehensive Examination, a student must submit a thesis proposal, deemed acceptable by the Supervisory Committee, to the Department.
8. An interested applicant is urged to consult with the Head of the Department on these prerequisites and other requirements before filing an application for admission.

40.21.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students as far as the resources of the Department will allow.

6000 Advanced Studies in Newfoundland History
 6010 Advanced Studies in Canadian History
 6020 Advanced Studies in the History of the United States
 6030 Advanced Studies in French History
 6040 Advanced Studies in British History
 6050 Advanced Studies in German History
 6060 Advanced Studies in North Atlantic History
 6070 Advanced Studies in Social History
 6075 Advanced Studies in Labour and Working Class History
 6080 Advanced Studies in Intellectual History
 6090 Advanced Studies in Women's History
 6095 Advanced Studies in Ethnohistory
 6100 Advanced Studies in Military History
 6105 Advanced Studies in Diplomatic History
 6110 Advanced Studies in Maritime History
 6120 Advanced Studies in Economic and Business History
 6125 Medical Science and Social Responsibility in Health Care: Aspects of Medical History (*Cross-listed as Medicine 6420*)
 6130 Quantification and Measurement in History
 6140-59 Research in Special Topics
 6160-79 Reading Courses (Special Topics)
 6190 Theory and Method
 6200 Masters Seminar I
 6999 Masters Research Paper (12 credit hours)
 7000 Ph.D. Seminar I
 7001 Ph.D. Seminar II

40.22 Interdisciplinary

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/sgs
www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Doctor of Philosophy (Interdisciplinary) is offered by part-time and full-time study.

The **General Regulations** of the School of Graduate Studies and the regulations outlined below will apply.

40.22.1 Administration

1. The program shall be administered by a Director, together with the School of Graduate Studies Interdisciplinary Ph.D. Committee (ID Ph.D. Committee). Duties of this committee include recommendation of applications for acceptance into the program.
2. The program of study of each student will be guided for the duration of the program by a Supervisory Committee of either three (3) or five (5) faculty members, appointed by the Dean of Graduate Studies on the recommendation of the ID Ph.D. Committee at the time of admission.

In addition, the Director shall be an ex officio member of each Interdisciplinary Ph.D. Supervisory Committee.

Duties of this Committee shall involve supervising the overall program of study, including the recommendation of appropriate courses, the setting and scheduling of comprehensive examinations, advising on the development of a research proposal and thesis-writing and recommendation of thesis examiners.

The Supervisory Committee is also responsible for recommending fellowship support to the ID Ph.D. Committee and to the Dean of Graduate Studies at the time of admission and throughout the student's program.

3. Normally, the "academic home" for the student is in the Department or faculty/school of the Chair of the Supervisory Committee.

40.22.2 Admission

1. Prospective students should normally hold a Master's Degree and have an excellent academic record. Applications for admission must include:
 - a. two letters of reference;
 - b. a detailed research proposal;
 - c. letters expressing a commitment to the research project and to supervisory duties from three Memorial University of Newfoundland faculty members, one of whom is prepared to assume the role of Chair of the Supervisory Committee and at least one whose unit of primary responsibility is a Ph.D. granting unit;
 - d. letters of endorsement from the administrative heads of each of the units involved in the proposed program.
2. Normally, admission is offered for the Fall semester. The deadline for admission or readmission is January 15. Students applying for admission to the IDPhD must submit all required materials to the School of Graduate Studies on or before this deadline. Where circumstances permit, applications will be considered for the Winter and Spring semesters.

40.22.3 Program of Study

1. **Courses**
 - a. Students will normally be required to take 12-18 credit hours of courses to be determined by the Supervisory Committee. These courses should reflect and address the research area(s) of the student's thesis proposal and may also include INTE 902A/B. Directed reading courses may be included to support the development of the thesis work.
 - b. Where appropriate, extra language and/or methodology courses may be prescribed. See **Evaluation, Evaluation of Graduate Students**, 4. concerning language(s) requirement.
2. **Comprehensive Examination**

The scope and format of the comprehensive examination shall be determined by the Supervisory Committee in consultation with the student and in accordance with the needs of the student's particular program of study. Students will be required to take a comprehensive examination no later than the end of the seventh semester of study and after the completion of all required course work. Comprehensive examinations shall follow procedures in accordance with **General Regulations, Comprehensive Examinations, Ph.D. Comprehensive Examination**, with the exception of 2.
3. **Thesis**

Students must complete a thesis, examined and defended in accordance with General Regulations of the School of Graduate Studies. The thesis shall give evidence of the student's ability to develop independent and original research.

40.22.4 Doctoral Internship

1. The School of Graduate Studies allows doctoral students, Interdisciplinary Ph.D. students, to undertake internships of work. Students approved to undertake an internship will be required to register for the Doctoral Internship course (INTE 6000). Students will be expected to obtain their own internships (with the help of supervisors when possible) and must have completed their comprehensive exams prior to starting their internships.
2. Internships must be approved by the supervisor, Director of the Interdisciplinary Ph.D. program, and Head of the academic unit (in cases where INTE 6000 is approved for a doctoral student outside of the Interdisciplinary Ph.D. program). In cases where approval is granted, students must add INTE 6000 to their program of study and register using a Course Change form.
3. The doctoral internships shall normally be one semester in duration and consist of a minimum of 420 hours of paid or unpaid work. Students undertaking the internship shall submit a concise report to their supervisors at the end of the semester while on internship. The report and performance in the internship shall be graded as pass/fail by the supervisor upon consultation with the on-site work supervisor. If a student fails to achieve a final grade of pass, and provided the student has not failed to achieve a grade of 'B' or better in any other program course, the student may request to repeat the internship or replace with a substitute course. Only one such repeat or substitution will be permitted in a student's program. Students who drop an internship without permission, fail to honour an agreement to work with a host employer, or who conduct themselves in a manner as to cause their discharge from the internship position will normally be awarded a failed grade for the internship.

40.22.5 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the participating Departments will allow.

6000 Doctoral Internship
7000-04 Special Topics
902 A/B Interdisciplinary PhD Colloquium

40.23 Linguistics

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/hss
www.mun.ca/linguistics
www.mun.ca/become/graduate/apply/app_deadlines.php

The degrees of Master of Arts and Doctor of Philosophy are offered in Linguistics.

40.23.1 Program of Study

1. The Degree of Doctor of Philosophy is offered in the following areas:
 - a. Theoretical issues in Core Areas of Grammar (phonetics, phonology, morphology, syntax, semantics);
 - b. Languages in which the Department has demonstrated expertise, especially languages of the Newfoundland and Labrador Area;
 - c. Language Acquisition; and

- d. Language Variation and Language Contact.
2. In order to be admitted to the Ph.D. in Linguistics, a student shall normally hold a Master's Degree in Linguistics. In the case of a student who does not meet the above requirement but who holds a language-oriented Master's Degree, a program of additional linguistics courses, supplementary to those normally considered to be required in the Ph.D. program, may be required.
3. The program of each student must be approved by the Dean of Graduate Studies upon the recommendation of the Supervisory Committee in consultation with the Head of the Department.
4. Students who fulfill the requirement in Clause 2 and who otherwise possess the qualifications of Ph.D. students will embark on a program approved on an individual basis. This will normally include not less than 15 credit hours in graduate courses, at least 6 credit hours of which must be at the 7000-level.
5. Where needed, each program will include appropriate courses to ensure that the student will have completed 9 credit hours from graduate courses in each of two required fields selected from the following:
 - a. Phonetics and Phonology
 - b. Morphology and Syntax
 - c. Language Acquisition
 - d. Sociolinguistics
6. The student must research and write two comprehensive papers, each to be defended at an oral examination (see Regulation **Comprehensive Examinations, Ph.D. and Psy.D. Comprehensive Examination of the General Regulations**).
 - a. The written examinations consist of two separate research papers. These papers will be submitted to the Examination Committee. At least one of the papers must be in one of the core areas of phonetics/phonology, morphology, syntax or semantics. The topic selected for each paper must obtain the prior approval of the Graduate Studies Committee of the Department. In each of these papers, students must demonstrate knowledge of the literature on the topic selected, general mastery of the discipline of linguistics and ability to undertake independent research.
 - b. The Examination Committee will examine the student orally, on each paper, within one month of submission. Questioning can be as wide-ranging as the Committee deems necessary to ensure that the student displays a thorough and comprehensive knowledge of the area in question.
 - c. The Examination Committee shall consist of the Head of Department (or delegate) who shall Chair the Committee, the Supervisor, the Dean of Graduate Studies (or delegate), and other members necessary to satisfy General Regulation **Comprehensive Examinations, Ph.D. and Psy.D. Comprehensive Examination, 2.**, who may normally include the members of the Supervisory Committee. If the Head of Department is also a member of the Supervisory Committee, an additional representative of the Department shall be appointed to chair the Examination Committee.
7. Initially, students must obtain approval for their Ph.D. thesis topics from the Graduate Studies Committee of the Department, in consultation with the Supervisory Committee. The thesis topic is normally selected before the end of the second full year in the program. Once the topic is approved, a more detailed thesis proposal must be presented to the Department in both written and oral format, and must receive formal Departmental approval prior to the writing of the thesis.
8. Proficiency in a language other than the student's first language will be required, as demonstrated by a minimum 'B' grade in a second-year language course, or performance satisfactory to the Department in an arranged reading proficiency test. A structural knowledge of a non-Indo-European language is also required, as demonstrated by a minimum 'B' grade in a field methods/language structure course or other performance satisfactory to the Department. Depending on the program, a reading knowledge of one or more additional languages may be required. Students must meet all language requirements before undertaking their comprehensive examinations.
9. All Ph.D. students are advised to consult the Department's Graduate Program web page for details on program requirements and for general information relating to the graduate program.

40.23.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow. Full information is to be found in the Department's Graduate Course Descriptions web page.

6050-54 Structure of a North American Indigenous Language (*credit restriction: except where an exemption is supplied by the Head of the Department, a student may not obtain credit for more than one course in the 6050-54 series. Students may not obtain credit for any of the previously offered 6010, 6011, 6020, 6021, 6030, 6031, 6040, 6041 in addition to a course in the 6050-54 series.*)

6055-59 Structure of an Uncommonly-Taught Language (*credit restriction: Except where an exemption is supplied by the Head of the Department, a student may not obtain credit for more than one course in the 6055-59 series.*)

6100 Issues in Morphosyntax (*credit may not be obtained for both Linguistics 6100 and the former 6001*)

6110 Selected Topics in Transformational Grammar

6115 Topics in the Syntax of A Selected Language (*prerequisite: 6001 or 6110*)

6150 Principles of Language Acquisition

6151 Selected Topics in Language Acquisition (*prerequisite: Permission of the instructor*)

6203 Phonological Theory (*credit may not be obtained for both 6203 and the former 6200*)

6204 Selected Topics in Phonology (*prerequisite: 6203; credit may not be obtained for both 6204 and the former 6201*)

6210 Sociolinguistics (*credit restriction: A student may not obtain credit for both 6210 or the former 6211*)

6212 Selected Topics in Language and Gender

6220 Areal and Temporal Variations in Language

6300-6309 Special Subjects

6400 Comparative and Historical Linguistics

6420 English Dialectology I

6421 English Dialectology II

6430 Selected Topics in Linguistic Variation (*prerequisite: 6220 or the former 6211*)

6500 Field Methods

6601 Modern Linguistic Theories

6700 Experimental Phonetics

6701 Selected Topics in Experimental Phonetics (*prerequisites: 6203, 6700*)

6800 Selected Topics in Morphology

6880 Selected Topics in Semantics

7000 Seminar in Research Methods

7001 Analytical issues in Linguistics

7100 Topics in North American Native Languages (*prerequisites: a course from series 6050-6054 or the former 6011, 6031, 6041*)

7200 Advanced Topics in Syntax (*prerequisites: 6110, plus either 6001 or 6115*)

7400 Seminar in Comparative and Historical Linguistics (*prerequisite: 6400 or 6410*)

7430 Seminar in Linguistic Variation (*prerequisite: 6430*)

7800 Seminar in Morpho-semantics (*prerequisite: 6800*)

7900-03 Special Topics in Linguistics

Note: *Appropriate equivalent credits may be given for courses taken at the Summer Institute of the Linguistic Society of America, or a similar institute. Students are encouraged to attend these institutes. They should, however, consult the Head of the Department as to what courses may be appropriate for credit.*

40.24 M.D.-Ph.D.

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/sgs

www.mun.ca/become/graduate/apply/app_deadlines.php

1. The M.D.-Ph.D. program is offered by full-time study to highly motivated students with an excellent academic record who wish to obtain an M.D. and a Ph.D., and whose academic excellence, research potential, and the suitability of the proposed research training environment is acceptable to the Program Admissions and Advisory Committee.
2. The purpose of the M.D.-Ph.D. program is to provide medical education, including clinical skills and training in health research.
3. The M.D.-Ph.D. program will be overseen by the Program Admissions and Advisory Committee (P.A.A.C.). The P.A.A.C. will be responsible for the recruitment and oversight of the program of highly qualified trainees.
4. The P.A.A.C. is composed of the M.D.-Ph.D. Program Director(s), a representative from the Faculty of Medicine, one or more faculty members representing the School of Graduate Studies and a senior M.D.-Ph.D student.
5. M.D.-Ph.D students are jointly enrolled in the M.D. program and the Ph.D. program. The student's Ph.D. program is overseen by the administrative Head of the appropriate academic unit in which the student is enrolled. The M.D. program is overseen by the Assistant Dean, Undergraduate Medical Education, Faculty of Medicine.

40.24.1 Qualifications for Admission

1. To be admitted into the M.D.-Ph.D. program, applicants must first meet the admission requirements of both the M.D. and Ph.D. programs. Admission to the Ph.D. program shall be by the Dean of Graduate Studies on the recommendation of the Head of the appropriate academic unit. Admission to the M.D. program is by the Dean of Medicine on the recommendation of the Assistant Dean, Admissions, Faculty of Medicine.
2. Normally, students will enter the M.D.-Ph.D. program from the M.D. program after successful completion of the pre-clerkship phase or from the Ph.D. program after one or two years of the graduate program and acceptance into the M.D. program.

40.24.2 Program of Study and Research

1. The program of study for the Ph.D. is described in the University Calendar entry for the student's chosen discipline. For the purposes of timing of the comprehensive examination, only the semesters in the Ph.D. component of the program will be counted.
2. The program of study for the M.D. follows the General Regulations governing the M.D. Degree.
3. During the Ph.D. component, students are expected to maintain clinical skills by arrangement with the Assistant Dean, Undergraduate Medical Education, Faculty of Medicine, and will be required to demonstrate competency in clinical skills before resuming full-time studies in the clerkship phase of the M.D. component.
4. During the M.D. component (including the clerkship phase), students, where required, are expected to participate in seminars and journals clubs in their area of research specialization.
5. The Ph.D. will be awarded to students in the M.D.-Ph.D. program on completion of all academic requirements appropriate to the Ph.D. Degree. The M.D. will be awarded to students in the M.D.-Ph.D. program on completion of all academic requirements appropriate to the M.D. Degree.

40.24.3 Evaluation

Failure to maintain academic standing in either the Ph.D. or M.D. components will lead to termination of the M.D.-Ph.D. program which will be annotated on the student's transcript. On failure of the M.D. component, the Dean of Graduate Studies may approve transfer to a Ph.D. program on the recommendation of the administrative Head of the appropriate academic unit. On failure of the Ph.D. component, the Dean of Medicine may approve transfer to a M.D. program on the recommendation of the Assistant Dean of Undergraduate Medical Education.

40.24.4 Courses

See course listing under the regulations for the relevant Ph.D. program and also for the M.D. program in the General Regulations governing the M.D. degree.

40.25 Management

www.mun.ca/sgs/contacts/sgscontacts.php

www.business.mun.ca

www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Doctor of Philosophy in Management is offered in the Faculty of Business Administration. The designation refers to management in the broad context. The Degree will offer specializations corresponding to functional areas in management. The Degree currently is offered with specializations in: (1) operations and information management, (2) organizational behaviour and human resources management, and (3) general management.

The Degree of Doctor of Philosophy in Management is offered by full-time study to qualified students. The **General Regulations** of the School of Graduate Studies and the Degree Regulations of the Faculty of Business Administration outlined below, will apply.

40.25.1 Admission to the Ph.D. Program

Admission is limited and competitive. General qualifications for admission to the Ph.D. Programs at Memorial University of Newfoundland are set out under **General Regulations, Qualifications for Admission**. Applicants from all disciplines will be considered.

In addition:

1. Quantitative and qualitative competency are required as evidenced by an acceptable balanced GMAT (minimum score of 600) (or a minimum GRE score of 302).
2. An applicant who did not complete a Master's degree at a recognized university where English is the primary language of instruction must normally complete either the: Test of English as a Foreign Language (TOEFL) and achieve a paper-based score of 580 (or higher), computer-based score of 237 (or higher), or Internet-based score of 92-93 (or higher); or International English Language Testing System (IELTS) and achieve a score of 7 (or higher).

Information regarding the TOEFL is available from the Educational Testing Service at www.ets.org. IELTS information is available at www.ielts.org. It is noted that other equivalent tests acceptable to the School of Graduate Studies will also be considered.

40.25.2 Supervisory Committee

Until a supervisory committee has been formed, the Ph.D. Program Director will be the designated advisor of each Ph.D. student. Each student will have a supervisory committee consisting of three or more members, at least two of whom shall be members of the Faculty of Business Administration. The thesis Supervisor shall be a doctorally qualified faculty member in the Faculty of Business Administration, Memorial University of Newfoundland, having a recent (past five years) research track record suitable to provide research supervision at the Ph.D. level. The supervisory committee will be appointed no later than the end of the first year of studies.

Students are encouraged to find a Supervisor within the first year of the program and, together with the Supervisor, find the remaining committee members by the time all required courses are completed.

40.25.3 Components of Study

40.25.3.1 Courses

Students are required to complete successfully a program of courses, normally over the first two years of the program. Students without an adequate background in the functional areas of business may be required to take additional breadth courses. Such determination will be made by the Graduate Research Programs Committee when a student is accepted into the program.

Required for all Specializations

Philosophy 6015 Theory of Knowledge
Business 9901 Approaches to Management Research

One of

Business 9902 Modelling Methods In Management Research
Business 9903 Quantitative Methods In Management Research*
Business 9904 Qualitative Methods In Management Research**

Business 9901 is to be completed before any of Business 9902, 9903, 9904 is attempted. In exceptional cases Business 9901 may be completed concurrently with 9902, 9903 or 9904, with approval from the Director of the Program and the Supervisor.

*Alternatively, students may elect to take an equivalent quantitative methods graduate course on the approval of the Ph.D. Program Director and the Supervisor.

**Alternatively, students may elect to take an equivalent qualitative methods graduate course on the approval of the Ph.D. Program Director and the Supervisor.

Note: *Waivers shall not be granted in the Ph.D. program for previously completed course work at either the undergraduate or master's level.*

Operations and Information Management (OIM) Specialization Courses

In addition to the above-noted courses required for all specializations, the following courses are required for the Operations and Information Management specialization.

1. Four of the following courses:
 - Business 9910 Optimization
 - Business 9911 Data and Process Models in Information Systems Development
 - Business 9912 Probabilistic Models
 - Business 9913 Human-Computer Interaction and Decision Support Systems
 - Business 9914 Supply Chains: Models and Management
 - Business 9915 Electronic Commerce
 - Business 9917 Special Topics in Operations Management
 - Business 9918 Special Topics in Information Systems
2. Two graduate courses subject to the approval of the Director of the Program and the Supervisor.

Recommended Sequence for Operations and Information Management (OIM) Specialization Table

Semester	Courses
Year 1 Fall	BUSI 9901 Approaches to Management Research Philosophy 6015 Theory of Knowledge Two of *, **, ***, ****: BUSI 9910 Optimization BUSI 9911 Data and Process Models in Information Systems Development BUSI 9912 Probabilistic Models BUSI 9913 Human-Computer Interaction and Decision Support Systems BUSI 9914 Supply Chains: Models and Management BUSI 9915 Electronic Commerce BUSI 9917 Special Topics in Operations Management BUSI 9918 Special Topics in Information Systems
Year 1 Winter	BUSI 9902 (Modelling), 9903 (Quantitative), or 9904 (Qualitative) Methods in Management Research Two of *, **, ***, ****: BUSI 9910 Optimization BUSI 9911 Data and Process Models in Information Systems Development BUSI 9912 Probabilistic Models BUSI 9913 Human-Computer Interaction and Decision Support Systems BUSI 9914 Supply Chains: Models and Management BUSI 9915 Electronic Commerce BUSI 9917 Special Topics in Operations Management BUSI 9918 Special Topics in Information Systems
Year 1 Spring	Summer Research Project
Year 2 Fall	Two graduate courses subject to the approval of the supervisor Graduate Program in Teaching (Recommended (non-credit))

- * A selection of courses will be offered to meet the requirements of students as far as the resources of the Faculty of Business Administration will allow.
- **Students who are planning to specialize in Information Systems are advised to take Business 9911, Business 9913, Business 9915, and Business 9918.
- *** Students who are planning to specialize in Operations Management are advised to take Business 9910, Business 9912, Business 9914, and Business 9917.

Organizational Behaviour and Human Resources Management Specialization Courses

In addition to the above-noted courses required for all specializations, the following courses are required for the Organizational Behaviour and Human Resources Management specialization.

- Required courses:
Business 9920 Foundations in Organizational Behaviour
Business 9921 Foundations in Human Resources Management
Business 9924 Current Issues in Organizational Behaviour
Business 9925 Current Issues in Human Resources Management
- Two of:
Business 9923 Foundations in Organizational Theory
Business 9927 Current Issues in Organizational Theory
Business 9928-9939 Special Topics in Organizational Behaviour/Human Resources Management

Any other graduate course subject to the Director of the Program and the Supervisor.

Recommended Sequence for Organizational Behaviour and Human Resources Management Specialization Table

Semester	Courses
Year 1 Fall	BUSI 9901 Approaches to Management Research BUSI 9920 Foundations of Organizational Behaviour BUSI 9921 Foundations of Human Resources Management Philosophy 6015 Theory of Knowledge
Year 1 Winter	BUSI 9902 (Modelling), 9903 (Quantitative), or 9904 (Qualitative) Methods in Management Research BUSI 9924 Current Issues in Organizational Behaviour BUSI 9925 Current Issues in Human Resources Management
Year 1 Spring	Summer Research Project
Year 2 Fall	Two of: BUSI 9923, 9927, 9928-9939* or any other graduate course subject to the approval of the Supervisor Graduate Program in Teaching (Recommended (non-credit))

Note: * A selection of courses will be offered to meet the requirements of students as far as the resources of the Faculty of Business Administration will allow.

General Management Specialization Courses

In addition to the above-noted courses required for all specializations, the following courses are required for the General Management specialization.

- Required courses:

Business 9923 Foundations in Organizational Theory
 Business 9927 Current Issues in Organizational Theory

2. Four graduate courses subject to the approval of the Director of the Program and the Supervisor

Recommended Sequence for General Management Specialization Table

Semester	Courses
Year 1 Fall	BUSI 9901 Approaches to Management Research BUSI 9923 Foundations of Organizational Theory Philosophy 6015 Theory of Knowledge One graduate course subject to the approval of the Supervisor*
Year 1 Winter	BUSI 9902 (Modelling), 9903 (Quantitative), or 9904 (Qualitative) Methods in Management Research BUSI 9927 Current Issues in Organizational Theory One graduate course subject to the approval of the Supervisor *
Year 1 Spring	Summer Research Project
Year 2 Fall	Two graduate courses subject to the approval of the Supervisor* Graduate Program in Teaching (Recommended (non-credit))

Note: * A selection of courses will be offered to meet the requirements of students as far as the resources of the Faculty of Business Administration will allow.

40.25.3.2 Summer Research Project

During the first summer in the program, students will complete a research project under the supervision of a qualified faculty member in the area of specialization. Projects must be presented at a Faculty of Business Administration research seminar during the second year of the program.

40.25.3.3 Research Seminar Participation

Students are expected to attend research seminars offered by the Faculty of Business Administration in their discipline. Presentation of student conference papers where the Faculty of Business Administration funds travel is expected at a Faculty of Business Administration research seminar. In addition, students may be requested to present their work at other Faculty seminars where and when feasible.

40.25.3.4 Comprehensive Examination

Students shall undertake a mandatory written comprehensive examination, following General Regulation **Comprehensive Examinations, Ph.D. Comprehensive Examination**, which sets out the procedures for the comprehensive examination.

In addition:

1. A student in the Ph.D. Program in Management shall normally take the written Comprehensive Examination by the end of the seventh semester of the program. The student must have successfully completed all required courses prior to writing the Comprehensive Examination. The scope of the Comprehensive Examination will be determined by the Examining Committee (as defined in General Regulation **Comprehensive Examinations, Ph.D. Comprehensive Examination**) under the guidance of the Supervisory Committee.
2. A list of topics/areas for the Comprehensive Examination will be provided to the student no later than three months prior to the date of the examination.
3. The written examination will take place in three phases over a one-week period.
4. Based on the results of the written examination, the Examining Committee may schedule a supplementary oral examination on any topics covered on the written examination. The oral examination request must be made to the Dean within two weeks of completion of the written examination. The oral examination, if any, must take place within six weeks of completion of the written examination.
5. The scheduling of the Comprehensive Examination will be initiated by the student's Supervisor who will notify the Dean of the Faculty of Business Administration or designate. The date of the written examination will be determined by the Dean of the School of Graduate Studies. The student will be provided with written notice of the scheduled dates of the written examinations. In the case of oral examinations, requests will be initiated by the Examining Committee or the student (as described above in 4.) through the School of Graduate Studies.

40.25.3.5 Ph.D. Thesis Regulations

1. The student will submit a thesis proposal to all members of the Supervisory Committee for evaluation and approval normally by the end of the eighth semester of the program. Within one month of submitting the proposal, the student will give a public oral presentation of the proposal, attended by the Committee. The presentation will provide the Committee and others in attendance with an opportunity to raise questions about the proposal research. Immediately following the presentation, the Supervisory Committee will meet to assess the proposal. Assessment will result in one of the following three outcomes: (1) accept; (2) accept with changes; or (3) reject. The results of this assessment will be provided to the student following the meeting. Assessments of accept with changes or reject will be accompanied by written comments within one week of the proposal presentation.
2. If the proposal is rejected, the student will be permitted a second proposal. This proposal must be submitted and deemed acceptable by the Supervisory Committee within four months of the original proposal presentation. Failure to resubmit within this time period will lead to termination of the student's program.
3. The Ph.D. thesis will constitute an independent and original research contribution.
4. The Ph.D. thesis will be evaluated according to the process established in General Regulation **Theses and Reports, Evaluation of Ph.D. Theses** governing the School of Graduate Studies.

40.26 Marine Biology

www.mun.ca/sgs/contacts/sgscontacts.php
 www.mun.ca/science
 www.mun.ca/osc
 www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree or Doctor of Philosophy (Ph.D) is offered in Marine Biology by full-time and part-time study through the Department of Ocean Sciences. Areas of concentration include: Biological Oceanography, Marine Ecology and Evolution, Functional Biology of Marine Organisms, Fisheries and Aquaculture, and Marine Biogeochemistry.

40.26.1 Admission and Program of Study

1. Admission into the Ph.D. program in Marine Biology is normally restricted to students holding a Master's Degree or its equivalent. In exceptional circumstances, a student with a B.Sc. (Honours) Degree who has spent not less than 12 months in an M.Sc. Degree program may be recommended for transfer into a Ph.D. program, provided that the student can demonstrate, to the satisfaction of the Department of Ocean Sciences, the student's ability to pursue research at the doctoral level.
2. Each student will be assigned a Supervisory Committee consisting of the Supervisor and at least one other member. Within three months of the first registration in the Ph.D. degree program, a student will meet with the student's Supervisory Committee. Within nine months, the student and the Supervisory Committee will agree on a written thesis proposal outlining the objectives, methods, timetable and funding for the project, and provide the proposal (signed by the student and the supervisory committee) to the Head for inclusion in the student's file.
3. A student is normally required to complete a minimum of 6 credit hours of graduate program courses as follows:
 - Ocean Sciences 7100 or 7200
 - Ocean Sciences 7000 or relevant course as approved by the Supervisory Committee
4. All course requirements should be completed within five semesters from the date of first registration in the Ph.D. program.
5. Normally, upon completion of required course work the student shall undertake a mandatory comprehensive examination, following the **General Regulations, Comprehensive Examinations, Ph.D. and Psy.D. Comprehensive Examination**. The comprehensive examination will be both written and oral. A student should consult the Departmental guidelines for further information and a detailed description of the content of the Comprehensive Examination.
6. The Ph.D. program will conclude with the examination and oral defense of the completed thesis in accordance with the School of Graduate Studies **General Regulations, Theses and Reports**.

40.26.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

OCSC 7000 Graduate Core Seminar (*cross-listed as Biology 7000*)
 OCSC 7100 Biological Oceanography
 OCSC 7200 Adaptations to the Marine Environment
 OCSC 7300 Plankton Dynamics
 OCSC 7400 Fisheries Resource Management
 OCSC 7500-7515 Special Topics in Ocean Sciences

40.27 Maritime Studies

www.mun.ca/sgs/contacts/sgscontacts.php
 www.mi.mun.ca
 www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Doctor of Philosophy is offered in Maritime Studies to full-time and part-time students. These regulations must be read in conjunction with the **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland.

An Academic Advisory Committee will be appointed by the Dean of Graduate Studies on the recommendation of the Vice-President (Marine Institute). This Committee will consist of an Academic Director as Chair, three members from the Marine Institute, and two members from other academic units of the University. Normally, all appointments will be for a period of three years.

40.27.1 Admission and Program of Study

1. Admission into the Ph.D. program in Maritime Studies is normally restricted to applicants holding a Master's degree or its equivalent with relevant background and core knowledge in, but not limited to, emergency management, engineering, human kinetics, maritime studies or psychology. Applicants are normally expected to have a 'B' in all course work completed for the Master's degree. In exceptional circumstances, an applicant with a B.Sc. degree who has spent not less than 12 months in an M.Sc. degree program may be recommended for transfer into a Ph.D. program. For this transfer to be accepted, the applicant must demonstrate, to the satisfaction of the Supervisor and Supervisory Committee, their ability to pursue research at the doctoral level.
2. In addition to completing a thesis, normally containing three or more papers of original research, students will be required to meet the M.Sc. core course requirements (MARI 6000, 6001, 6002 and 6003) either directly or via equivalent courses from their previous M.Sc. program, and complete, at minimum, two additional courses relevant to the program. Depending on the student's background, their Supervisor and Supervisory Committee may deem the student to be exempt from completing any or all of these courses.
3. Within three months of the first registration in the Ph.D. degree program, the student will meet with their Supervisory Committee. It is the function of a Supervisory Committee to have regular meetings, at least annually, with its graduate student. A meeting report, signed by all members of the Supervisory Committee and student, must be given to the Academic Unit. A copy will be sent to the graduate student and to the Dean of Graduate Studies.
4. At the first committee meeting, the Supervisory Committee shall discuss the student's program and will explore areas of weakness in the student's knowledge, especially where these relate to the intended areas of research. The Supervisory Committee may require the student to take additional courses.
5. The student and the Supervisory Committee will agree on a written thesis proposal outlining the objectives, methods, timetable, and funding for the project, and provide the proposal (signed by the student and the supervisory Committee) to the Head for inclusion in the student's file. This proposal shall normally be submitted within 15 months of the first registration in the Ph.D. degree program and a minimum of three months prior to the Comprehensive Exam.

6. The student will present a research seminar to the Academic Unit, normally by the end of the fourth semester following admission, to describe the research topic being investigated and the methodologies to be employed. This seminar provides an opportunity for the student to receive constructive input from the research community.
7. Within the first eighteen months, students must successfully complete a Comprehensive Examination, following the **General Regulations, Comprehensive Examinations, Ph.D. and Psy.D. Comprehensive Examination**. The comprehensive examination will be an oral examination. Students should consult with the academic unit's guidelines for further information and a detailed description of the content of the Comprehensive Examination.
8. Theses shall conform with **General Regulations, Theses and Reports** of the School of Graduate Studies. As part of these regulations, all Ph.D. candidates are required to participate in a formal oral defense of their work.

40.27.2 Courses

MARI 6000 Introduction to Maritime Safety and Survival Research
 MARI 6001 Statistics and Research Design for Maritime Studies
 MARI 6002 Science Communication for Maritime Studies (*may be offered in accelerated format*)
 MARI 6003 Human Factors in Safety and Survival (*may be offered in accelerated format*)
 MARI 6004 Special Topics in Safety and Survival (Learning) (*prerequisite: MARI 6000*)
 MARI 6005 Special Topics in Safety and Survival (Human Behavior) (*prerequisite: MARI 6000*)
 MARI 6006 Special Topics in Safety and Survival (Engineering Technology) (*prerequisites: MARI 6000*)

40.28 Mathematics and Statistics

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/math
www.mun.ca/become/graduate/apply/app_deadlines.php

The degrees of **Master of Applied Statistics** (see appropriate Calendar entry), **Master of Science**, and Doctor of Philosophy are offered in the Department of Mathematics and Statistics. The Masters' degrees are offered by full-time and part-time studies. The Department also participates in the interdisciplinary Ph.D. Program in Theoretical Physics.

40.28.1 Program of Study

The following regulations should be read in conjunction with the **General Regulations** of the School of Graduate Studies.

1. Students shall be assigned a supervisory committee consisting of the Supervisor (or Co-Supervisors) and at least two other members of faculty appointed by the Dean on the recommendation of the Head.
2. A student shall complete at least 6 credit hours in graduate courses in the area of specialization. A student may be required to take additional courses at any time during the student's program.
3. The Comprehensive Examination consists of two parts, called the "qualifying review" and the "intermediate review". Successful completion of both the qualifying and intermediate reviews constitutes successful completion of the Comprehensive Examination in the sense of General Regulation **Comprehensive Examinations**.
 - a. The **qualifying review** consists of written examinations and takes place once the student has successfully completed the courses specified in the student's program of study at the time of this review and the Supervisory Committee deems it appropriate. Its main purpose is to ensure that the student has a reasonably broad general knowledge of mathematics or of statistics, as appropriate.
 - b. The **intermediate review** consists of an oral presentation on the student's thesis topic followed by an oral examination based on the presentation although questions of a general nature relating to the field of specialization are also permitted. It must take place no later than the end of the student's seventh semester in the doctoral program and at least three months after the qualifying review. Its purpose is to ensure that the student has specialized knowledge in the student's chosen area sufficient to do original research of a high level.

More details concerning the Department's comprehensive examinations can be obtained from the Department.

40.28.2 Specific Regulations for the Ph.D. in Mathematics

A Masters Degree in mathematics or related area from a recognized university is required for entry into the Ph.D. program. Students currently registered in their first year at Memorial University of Newfoundland's M.Sc. Program in mathematics who have obtained A in at least four program courses are eligible to be transferred into a Ph.D. program. Such transfer must be supported by a prospective Ph.D. supervisory committee as well as the Graduate Studies Committee and approved by the Dean of Graduate Studies. Transferred students shall finish their Masters program courses plus the minimum Ph.D. requirements.

40.28.3 Specific Regulations for the Ph.D. in Statistics

A Masters Degree in statistics from a recognized university is normally required for entry into the Ph.D. program. Students currently registered in their first year at Memorial University of Newfoundland's M.A.S. or M.Sc. Program in statistics who have obtained A in at least four program courses are eligible to be transferred into a Ph.D. program. Such transfer must be supported by a prospective Ph.D. supervisory committee as well as the Graduate Studies Committee and approved by the Dean of Graduate Studies. Transferred students shall finish their Masters program plus the minimum Ph.D. requirements.

In addition to general Departmental requirements, each student for the Ph.D. in mathematics or statistics will be required to present at least one paper at a graduate seminar on a topic to be approved by the student's Supervisor.

Table of Credit Restrictions for Present Mathematics Courses with Former Mathematics Courses

(Credit may be obtained for only one course from each of the pairs of courses listed in this table.)

Present Course	Former Course	Present Course	Former Course
6323	6030	6212	6080
6321	6032	6310	6130
6322	6035	6330	6200
6340	6040	6331	6210
6341	6041	6332	6350
6342	6042	6312	6500

40.28.4 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

40.28.4.1 Mathematics

6100 Dynamical Systems
 6101 Modern Perturbation Theory
 6102 Mathematical Biology
 6104 Infinite Dimensional Dynamical Systems
 6110 Advanced General Relativity
 6111 Calculus in Manifolds
 6112-6119 Special Topics in Applied Mathematics
 6120 Theoretical Fluid Dynamics
 6121 Functional Differential Equations
 6130 Introduction to General Relativity
 6201 Numerical Methods for Partial Differential Equations
 6202 Nonlinear and Linear Optimization (*credit restricted with Computer Science 6933*)
 6204 Iterative Methods in Numerical Linear Algebra
 6205-6209 Special Topics in Numerical Analysis
 6210 Numerical Solution of Differential Equations (for Computational Science students only - required core course)
 6212 Numerical Methods for Initial Value Problems
 6230 Differentiable Manifolds and Riemannian Geometry
 6252 Quantum Information and Computing (*cross-listed with Physics 6852*)
 6300 Homology Theory
 6301 Homotopy Theory
 6302 Theory of Fibre Bundles
 6304-6309 Special Topics in Topology
 6311 Complex Analysis
 6312 Measure Theory
 6313 Functional Analysis II
 6315-6319 Special Topics in Analysis
 6320 Group Theory
 6321 Ring Theory
 6322 Nonassociative Algebra
 6323 Homological Algebra
 6324-6329 Special Topics in Algebra
 6330 Analytic Number Theory
 6331 Algebraic Number Theory
 6333 Representation Theory
 6340 Graph Theory
 6341 Combinatorial Design Theory
 6342 Advanced Enumeration
 6343-6349 Special Topics in Combinatorics

40.28.4.2 Statistics

6503 Stochastic Processes
 6505 Survival Analysis
 6520 Linear Models
 6530 Longitudinal Data Analysis
 6540 Time Series Analysis
 6545 Computational Statistics
 6550 Nonparametric Statistics
 6559 Statistical Exploration of Data
 6561 Categorical Data Analysis
 6564 Experimental Designs
 6563 Sampling Theory
 6571 Financial and Environmental Time Series
 6573 Statistical Genetics
 6570-6589 Selected Topics in Statistics and Probability (excluding 6571, 6573, 6586)
 Notice that, although the courses 6160, 6310, 6332, 6351, 6500, 6510 and 6560 cannot be used to fulfill the 6 credit hours graduate courses requirement, any of them can be listed as part of the program of study as additional course work, whenever the supervisory committee deems it appropriate.

40.28.5 Specific Regulations for the Ph.D. in Theoretical Physics

The **Ph.D. in Theoretical Physics** is an interdisciplinary program offered jointly with the Department of Physics and Physical Oceanography. The regulations for this program are described under the **Regulations Governing the Degree of Doctor of Philosophy - Theoretical Physics**.

40.29 Medicine

www.mun.ca/sgs/contacts/sgscontacts.php
www.med.mun.ca
www.mun.ca/become/graduate/apply/app_deadlines.php

The Faculty of Medicine offers the degree of Doctor of Philosophy in seven program areas: Cancer and Development, Cardiovascular and Renal Sciences, Clinical Epidemiology, Community Health, Human Genetics, Immunology and Infectious Diseases and Neurosciences. Each program area has a Co-ordinator who is responsible for communicating the interests of the program to the Faculty of Medicine Graduate Studies Committee and participate in the admission of graduate students into the graduate program in Medicine. The Faculty of Medicine also offers the opportunity for students registered in the Doctor of Medicine (M.D.) program to obtain a Ph.D. in a combined and integrated M.D.-Ph.D. program.

40.29.1 Qualifications for Admission

The admission requirements for the Ph.D. are as given under the **General Regulations** governing Ph.D. degrees.

40.29.2 Program of Study and Research

1. The program of study for a Ph.D. Degree is the responsibility of the supervisory committee composed of a Supervisor and at least two other faculty members.
2. It is the responsibility of the supervisory committee to meet regularly (at least annually) with the student and to provide guidance at all stages of the student's program. An annual report prepared by the Supervisor and signed by the student and all members of the committee is required to be submitted to the Assistant Dean of Research and Graduate Studies (Medicine).
3. Graduate Students are expected to participate in Faculty of Medicine seminars and journal clubs, for some of the program areas these are available as required courses.
4. Course requirements are set by each of the program areas and are described under Program Requirements. Some supervisory committees may require some students to successfully complete specified course work.
5. Graduate Students in the Ph.D. degree are required to successfully complete the comprehensive examination before the end of the seventh semester. The comprehensive examination consists of both written and oral components and is in accordance with the **General Regulations** governing Ph.D. degrees.
6. Graduate students in the Ph.D. degree must complete an original piece of research, a written dissertation which must be successfully defended in an oral examination in accordance with the **General Regulations** governing Ph.D. degrees.

40.29.2.1 Program Areas

1. **Cancer and Development**
 - a. The graduate program in Cancer and Development offers study in fundamental cell and molecular biological areas including viral oncogenesis, growth factors and oncogenes in developmental models, programmed cell death and drug resistance.
 - b. Program Requirements: Students are required to participate in the Seminar Series (MED 6410, 6411, 6412, 6413).
2. **Cardiovascular and Renal Sciences**
 - a. The graduate program in Cardiovascular and Renal Sciences enables students to pursue research and academic studies in selected topics including hypertension and stroke, neural and endothelial control of vasculature and blood pressure as well as physiological mechanisms promoting heart failure.
 - b. Program Requirements: Students are required to successfully complete MED 6140 if this course has not been previously taken. Students are required to present their thesis research to the Cardiovascular and Renal Sciences group.
3. **Clinical Epidemiology**
 - a. The program in Clinical Epidemiology is aimed at university graduates intending a career in health services, faculty members seeking advanced training in clinical epidemiology, medical doctors, and other health care professionals interested in health research.
 - b. Program Requirements: Students are required to successfully complete the following courses if they have not been previously completed: MED 6262, MED 6250, MED 6255, and MED 6260 plus a minimum of one elective. Electives are normally chosen from MED 6095, MED 6263 and MED 6265 or as recommended by the supervisory committee and approved by the Director or Coordinator. Students are required to take the Ph.D. Seminar Series (MED 6410, 6411, 6412, 6413). MED 6250 and MED 6262 are normally completed in the Fall semester. MED 6255 and MED 6260 are normally completed in the Winter semester. The supervisory committee, with the approval of the Director or Coordinator, can recommend an alternate program of study. Students are expected to give an oral presentation or course lecture in each year of their program.
4. **Community Health**
 - a. The graduate program in Community Health enables students to pursue research and academic studies in selected topics. Students may specialize in one of the following three streams: epidemiology and biostatistics; health services and policy research; or social justice and equity in health.
 - b. Program Requirements: Coursework as defined by the Supervisory Committee and this would normally include the Ph.D. Seminar Series (MED 6410, 6411, 6412, 6413).
5. **Human Genetics**
 - a. The graduate program in Human Genetics will enable students to pursue academic studies and research in a number of areas of genetics including cancer genetics, genomics, genetics of complex traits, genetic epidemiology, gene mapping, medical genetics, birth defects, and population genetics. Faculty members from all three divisions of the Faculty of Medicine (Biomedical Sciences, Community Health and Clinical Sciences) participate in the program.
 - b. Program Requirements: Students are required to take the Genetics Seminar Series (MED 6410, 6411, 6412, 6413).
6. **Immunology and Infectious Diseases**
 - a. The Immunology and Infectious Diseases group has an interdisciplinary character and consists of faculty from biomedical

science. The graduate programs are designed to provide individualized training oriented towards basic research and a solid scientific background in the discipline of immunology and infectious diseases.

- b. Students are required to successfully complete two courses if they have not been previously completed. Students will choose one course from MED 6114, MED 6119, MED 6127, MED 6128, MED 6580, or any other graduate course approved by the student's supervisory committee. Some students may be required to take additional courses depending upon their thesis topic. Students are required to attend, for credit, and participate in the Immunology and Infectious Diseases Seminar Series (MED 6410-6413).

7. Neurosciences

- a. The Neuroscience Program offers graduate studies in an interdisciplinary setting with the core faculty in the Division of BioMedical Sciences. Graduate students may pursue research in a number of specialty areas including the physiological basis of learning and memory, stroke and neuroplasticity, neuroregeneration, signal transduction mechanisms, neuronal circuitry, neuroimmunology, and membrane physiology.
- b. Program Requirements: Normally students in the Ph.D. program are required to complete two graduate level courses in Neuroscience, one of which is to be Systems Neuroscience (MED 6196). Course selection is made on the recommendation and advice of the supervisory committee. Students are expected to attend and participate in the activities of the neuroscience group including the weekly seminar and journal club.

40.29.2.2 Courses

For a list of courses offered by the Faculty of Medicine refer to **Courses** offered for the Master of Science in Medicine.

40.30 Nursing

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/nursing

www.mun.ca/become/graduate/apply/app_deadlines.php

The degree of Doctor of Philosophy (Ph.D.) is offered in Nursing in areas reflective of the strength and expertise of current faculty members in the Faculty of Nursing. All students will be required to attend as full-time students during the first six semesters (two academic years) of the program.

The following regulations must be read in conjunction with the **General Regulations** of the School of Graduate Studies.

40.30.1 Qualifications for Admission

1. Admission to the program is limited and competitive.
2. To be considered for admission an applicant must normally hold a Master of Nursing degree or equivalent from a recognized university and have a strong academic record (minimum GPA of 3.4 on a scale of 4).
3. Applicants must have completed either a graduate level course(s) in research that included both qualitative and quantitative approaches with some advanced statistical analysis in the quantitative work, or a graduate level statistics course.
4. Applicants must hold an active practicing license from the Association of Registered Nurses of Newfoundland or must be currently registered as a practicing nurse in another Canadian jurisdiction. Applicants from other countries who do not meet the above criteria will be assessed on an individual basis and must submit proof of registration as a practicing nurse (or an equivalency) from their country or jurisdiction.
5. Applicants must submit a statement about a research focus that is compatible with expertise within the current faculty of the Faculty of Nursing.

40.30.2 Program of Study

1. A Supervisory Committee shall be appointed for each student in accordance with **General Regulations, Supervision** of the School of Graduate Studies.
2. Students normally be required to successfully complete a minimum of 18-credit hours of program courses as follows: Nursing 7011, Nursing 7012, Nursing 7100, Nursing 7101, one of Nursing 7200-7210 (or another approved research course at the doctoral level), and one of Nursing 7300-7310 (or another approved course at the doctoral level in the area of the student's research interest). All courses will normally be completed within the first two years of the program.
3. Students will normally be required to complete a minimum of two mandatory, non-credit internships/institutes during the first two years of the program. The internships/institutes are designed to provide an opportunity for students to gain substantive knowledge of, and engage in, collaborative research and/or teaching. An internship/institute will be selected based on the student's area of interest and learning needs and will have a set or negotiated time limit during a semester depending on the nature and scope of the work.
4. Students will be required to participate in four graduate seminars per term in the Fall and Winter semesters in each of the first two academic years of the program (for a total of 16 graduate seminars).
5. Students must develop and maintain a professional portfolio that includes experience in research, teaching, and academic and professional service.
6. Students shall submit to a comprehensive examination in accordance with **General Regulations, Comprehensive Examinations** of the School of Graduate Studies. The Comprehensive Examination will consist of a written component and an oral component. The examination will normally be scheduled on completion of course work, but no later than the end of the student's seventh semester in the program.
7. Students must submit a written thesis proposal for presentation to the School, normally within three months of completion of the comprehensive examinations.
8. Students must submit a thesis, examined and defended in accordance with **General Regulations, Theses and Reports** of the School of Graduate Studies.
9. Students are required to spend a minimum of six semesters (two academic years) in residence.
10. In keeping with the **General Regulations, Period of Study** for the School of Graduate Studies, the time limit to complete the degree is seven years.

40.30.3 Courses

A selection of the following courses will be offered to meet the requirements of students, as far as the resources of the Faculty of

Nursing will allow.

7011 Nursing: The Science
 7012 Nursing: The Profession
 7100 Nursing Research 1: Conceptualizing Research
 7101 Nursing Research 2: Conducting Research
 7200-7210 Reading Courses in Research Methodology
 7300-7310 Reading Courses in a Substantive Area for Research

40.31 Pharmacy

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/pharmacy
www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Doctor of Philosophy in Pharmacy is offered to qualified students normally by full-time study. The **General Regulations** of the School of Graduate Studies of Memorial University of Newfoundland outlined in the current Calendar, and the Degree Regulations of the School of Pharmacy outlined below will apply. Every student in graduate studies shall comply with the **General Regulations**, Degree Regulations and all additional requirements of the School of Pharmacy.

40.31.1 Qualifications For Admission

1. Admission to the Ph.D. program is limited and competitive. Applicants must have completed an M.Sc. Degree in Pharmacy, or its equivalent in a related discipline, from a university of recognized standing.
2. Other students may be considered for admission to a Ph.D. provided that they have been registered in a M.Sc. Pharmacy program for a minimum of 12 months, and have demonstrated to the satisfaction of the Graduate Studies Committee of the School of Pharmacy an ability to pursue research at the doctoral level. Students wishing to transfer from the M.Sc. to the Ph.D. will have completed 6 credit hours. Prior to admittance to the Ph.D. program, a written thesis proposal will be submitted for assessment by the Supervisory Committee plus one additional faculty member. The recommendation of this Committee will be forwarded to the Graduate Studies Committee of the School of Pharmacy.
3. On admission to the program, a Supervisory Committee shall be appointed in accordance with General Regulation **Supervision** governing the School of Graduate Studies.

40.31.2 Program of Study and Research

1. As a minimum, each student shall successfully complete 6 credit hours as well as Pharmacy 6999 (Pharmacy Research Seminar). A minimum grade of 65% will be required in each course. Students shall complete additional undergraduate courses in Pharmacy or other related areas where the Supervisory Committee considers there to be a deficiency in the academic record. Students may select these courses in consultation with the Supervisory Committee. However, it will be the primary responsibility of the Supervisory Committee to ensure that deficiencies in the academic record are rectified.
2. All students must submit a thesis proposal to the Supervisory Committee for approval no later than the second semester of study after admission to the program.
3. All students must complete a comprehensive examination on or before the end of the sixth semester of study after admission to the program. The comprehensive examination will consist of two components: a written examination and an oral examination. The oral examination will normally be held no later than two weeks after successful completion of the written examination.
4. A Comprehensive Examination Committee shall be appointed in accordance with General Regulation **Comprehensive Examination**. The Committee will be responsible for preparing the questions for the written and oral examinations and evaluating the student's performance in the subject area. The Committee will consist of the Dean of Graduate Studies (or delegate), the Supervisor, and three other members, one of whom may be a member of the Supervisory Committee. All shall be voting members of the Committee except the Dean of Graduate Studies (or delegate).
5. Successful completion of the Ph.D program will require formal examination of the written thesis and an oral defence of the research, as prescribed in the General Regulation **Theses and Reports**. Final approval of the thesis shall be the responsibility of the School of Graduate Studies.

40.31.3 Courses

A selection of the following graduate courses will be offered to meet the requirements of students as far as the resources of the School will allow. Permission of the instructor and the Graduate Studies Committee of the School of Pharmacy is required for admission to any graduate Pharmacy course.

6000 Medicinal Chemistry
 6001 Advanced Physical Pharmacy
 6002 Dosage Form Design and Novel Drug Delivery Systems
 6003 Pharmacokinetic Modelling
 6004 Principles of General Pharmacology
 6005 Toxicology of Therapeutic Agents and Chemicals
 6006 Health Economics
 6100-6108 Special Topics in Pharmacy
 6999 Pharmacy Research Seminar

40.32 Philosophy

www.mun.ca/sgs/contacts/sgscontacts.php
 www.mun.ca/hss
 www.mun.ca/philosophy
 www.mun.ca/become/graduate/apply/app_deadlines.php

The degree of Doctor of Philosophy (Ph.D.) is offered in Philosophy by full-time study only. Graduate courses are taught as small seminars. Program students must spend a minimum of two years in residence at this institution.

40.32.1 Program of Study

- The Ph.D. in Philosophy is offered in accordance with the **General Regulations** of the School of Graduate Studies. Doctoral students will specialize in one or more of three departmental research clusters:
 - Metaphysics and its History
 - Kant and Continental Philosophy
 - Ethics, Social and Political Philosophy
- To be considered for admission to the program an applicant must have completed a Master of Arts Degree in Philosophy or hold an equivalent qualification.
- In addition to meeting the requirements listed under the **General Regulations** of the School of Graduate Studies, to complete a Ph.D. in Philosophy, students must complete a minimum of 15 credit hours in graduate Philosophy courses as follows:
 - 3 credit hours in Philosophy 6000, unless this course was previously completed as part of an MA program at this University
 - 12 credit hours in graduate Philosophy courses selected from the **Courses** listed below. Courses will be selected by the student in consultation with the student's Supervisory Committee.
- Proficiency in a second language is required since it is necessary for the purpose of the proposed doctoral research. The selection of a second language is based upon the student's research requirements, and the selection is to be made in consultation with the student's faculty advisor or supervisor. Confirmation that the choice is acceptable must be obtained from the department. Demonstration of proficiency will be determined in accordance with the governing general regulation of the School of Graduate Studies (**General Regulations, Evaluation, Evaluation of Graduate Students**). If a student is working in recent Anglo American philosophy, then the student can opt, with the permission of the Graduate Studies Committee, to complete an examination in philosophical logic. The language requirement must normally be fulfilled before a student takes the Ph.D. comprehensive examination.
- The Ph.D. Comprehensive Examination shall be administered and evaluated in accordance with **General Regulations, Comprehensive Examinations**. The examination shall consist of an oral and a written part. Students will write one essay on a predetermined Area question. and a second essay on a predetermined Breadth question. The student will then defend these essays in a 2-hour examination.
- No more than eight semesters after having been admitted to the program the student must submit a thesis proposal that is considered satisfactory by the supervisory committee.
- Students must submit and successfully defend a thesis in accordance with the School of Graduate Studies general regulations governing **Theses and Reports**.

40.32.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

6000 Graduate Research Seminar
 6011 Seminar in Ancient and Medieval Philosophy
 6012 Seminar in Modern Philosophy
 6013 Seminar in Contemporary Philosophy
 6014 Seminar in Metaphysics
 6015 Seminar in Epistemology
 6016 Seminar in Social and Political Philosophy
 6040-6099 Seminar in Special Topics
 6101 Seminar in Selected Philosophical Texts
 6102 Seminar in Current Issues in Philosophy

40.33 Physics and Physical Oceanography

www.mun.ca/sgs/contacts/sgscontacts.php
 www.mun.ca/science
 www.mun.ca/physics
 www.mun.ca/become/graduate/apply/app_deadlines.php

The following Departmental Regulations are supplementary to the **General Regulations** governing Ph.D. degrees.

The Degree of Doctor of Philosophy (Ph.D.) is offered in Physical Oceanography and in Physics. The Department also participates in the interdisciplinary Ph.D. programs in Environmental Science, in Scientific Computing, and in Theoretical Physics.

40.33.1 Program of Study

1. Course Requirements for the Ph.D. Degree in Physical Oceanography

Course requirements shall normally include a minimum of 9 graduate credit hours. At least 6 of these credit hours shall be selected from courses numbered 6300-6399 in **Courses** below. For students who have transferred from the M. Sc. degree program in Physical Oceanography (as outlined under the School of Graduate studies **General Regulations, Program Requirements, Ph.D. and Psy.D. Programs**), a minimum of 15 credit hours are required (including courses completed while enrolled in the M.Sc. program), of which at least 12 shall be selected from courses numbered 6300-6399 in **Courses** below.

In exceptional circumstances, modifications to these course requirements can be approved by the Departmental Graduate Studies Committee.

2. Course Requirements for the Ph. D. Degree in Physics

Course requirements shall normally include a minimum of 9 graduate credit hours. At least 6 of these credit hours shall be selected from **Courses** below. For students who have transferred from the M. Sc. degree program in Physics (as outlined under the School of Graduate studies **General Regulations, Program Requirements, Ph.D. and Psy.D. Programs**), a minimum of 15 credit hours are required (including courses completed while enrolled in the M.Sc. program), of which at least 12 shall be selected from **Courses** below.

In exceptional circumstances, modifications to these course requirements can be approved by the Departmental Graduate Studies Committee.

3. Comprehensive Examination

The Comprehensive Examination, (as prescribed under General Regulation **Comprehensive Examinations**), shall be an oral one, and will include the presentation of a written research proposal.

4. Thesis

The Ph.D. degree program will conclude with the submission of a thesis based on original research and an oral defense of the thesis, as prescribed in **General Regulations, Theses and Reports**.

40.33.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

6000 Condensed Matter Physics I
 6001 Condensed Matter Physics II
 6002 Superconductivity
 6003 Path Integral Techniques in Condensed Matter Physics
 6010-19 Special Topics in Condensed Matter Physics
 6040 Biophysics
 6060-69 Special Topics in Interdisciplinary Areas
 6200 Nonlinear Dynamics
 6308 Ocean Dynamics I
 6309 Ocean Dynamics II
 6310 Physical Oceanography
 6313 Physical Fluid Dynamics
 6314 Field Oceanography
 6315 Polar Oceanography
 6316 Ocean Measurements and Data Analysis
 6317 Ocean Acoustics
 6318 Numerical Modelling
 6319 Climate Dynamics
 6320 Turbulence
 6321 Coastal Oceanography
 6322 Stratified Fluids
 6323 Stability Theory
 6324 Models in Ocean Ecology
 6360-69 (excluding 6363) Special Topics in Physical Oceanography
 6363 Laboratory Experiments in Geophysical Fluid Dynamics
 6400 Statistical Mechanics
 6402 Theory of Phase Transitions
 6403 Stochastic Processes, Time-Dependent and NonEquilibrium Statistical Mechanics
 6413 Soft Matter Physics
 6502 Electrodynamics
 6722 Light Scattering Spectroscopy
 6760-69 Special Topics in Atomic and Molecular Physics
 6800 Group Theory
 6810-19 Special Topics in Theoretical and Mathematical Physics
 6850 Quantum Mechanics I
 6851 Quantum Mechanics II
 6852 Quantum Information and Computing (*cross-listed with Physics 6852*)
 6900 Techniques in Experimental Condensed Matter Physics
 6910-19 Special Topics in Experimental and Applied Physics

Note: For Geophysics, see **Earth Sciences**.

40.34 Psychology

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/psychology
www.mun.ca/become/graduate/apply/app_deadlines.php

The Degree of Master of Science (M.Sc.) is offered in Experimental Psychology. Interested students should also see the **Master of Science in Cognitive and Behavioural Ecology**. The Degree of Doctor of Philosophy is offered in Experimental Psychology. Interested students may wish to consult the section in the Calendar describing the **Doctor of Philosophy in Cognitive and Behavioural Ecology program**.

40.34.1 Admission

An applicant must hold either a Master's Degree or an Honours Bachelor's Degree with first class standing to be considered for admission.

40.34.2 Program of Study

1. The program of study will be specified at the time of admission. Decisions on (a) whether to include courses in the program, and if

so, (b) which specific courses are to be included will be based on the student's background and the proposed thesis topic.

2. Comprehensive Examination

The Ph.D. comprehensive in Experimental Psychology shall be taken during the first year of the student's program. The examination will consist of two parts. Part 1 consists of a broad review of the literature that normally pertains to the topic of the thesis area. The literature review should incorporate theoretical, methodological, and empirical findings. Part 2 consists of an oral defence of the literature review. The comprehensive exam aims to ensure that the student is knowledgeable about the range of theories, methodologies, and empirical findings that are fundamental to the chosen field of study. The examination committee for the comprehensive exam will be created according to **General Regulations, Ph.D. and Psy.D. Comprehensive Examination** of the School of Graduate Studies, except that the Supervisor and the Chairperson of the examination committee shall not be voting members.

40.34.3 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

6000 Advanced Statistics in Psychology
 6001 Research Design
 6002 Advanced Statistics in Psychology II
 6003 Directed Studies in Advanced Statistics I
 6004 Directed Studies in Advanced Statistics II
 6010 Colloquium Series in Psychology (repeatable, non-credit)
 6100-6130 Special Topics in Experimental Psychology
 6200 Learning I
 6201 Learning II
 6203 Behavioural Pharmacology
 6210 Behavioural Analysis of Toxins
 6351 Behavioural Ecology and Sociobiology (*cross-listed as CABE 6351*)
 6400 Theory and Methods in Social Psychology
 6401 Social Cognition
 6402 Group Processes
 6403 Program Evaluation and Applied Research
 6404 Project in Applied Psychological Science (*This course is open only to students in the Master of Applied Psychological Science*)
 6500 Developmental Psychology I
 6501 Developmental Psychology II
 6502 Developmental Changes During Old Age
 6700 Perception
 6710 Human Information Processing
 6720 Human Memory
 6800 Behavioural Neuroscience I
 6801 Behavioural Neuroscience II
 6810 Psychometrics
 6910 Personality
 6990 Doctoral Seminar I
 6991 Doctoral Seminar II
 6992 Doctoral Seminar in Cognitive and Behavioural Ecology (*cross-listed as CABE 6992*)
 699A/B Core Graduate Seminar in Psychology

40.35 Scientific Computing

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/become/graduate/apply/app_deadlines.php

40.35.1 General Information

The Faculty of Science offers a program in Scientific Computing leading to a Doctor of Philosophy (Ph.D.). Full-time and part-time options are available.

40.35.2 Qualifications for Admission

To be considered for admission,

1. Applicants shall normally hold an M.Sc. degree in Scientific Computing, or equivalent, from a university of recognized standing, or
2. Applicants shall normally hold an M.Eng. or an M.Sc. degree in an appropriate discipline from a university of recognized standing, or
3. Students currently registered in the Master of Science (Scientific Computing), after a minimum of 12 months of successful performance in their program of studies, may be recommended for transfer into the Ph.D. program, provided that the students can demonstrate, to the satisfaction of the Board of Study, an ability to pursue research at the doctoral level. This transfer normally occurs no later than the fifth semester of the student's M.Sc. program.
4. In exceptional cases, applicants holding a B.Sc. (Honours or equivalent) degree in an appropriate discipline that included completion of a thesis or dissertation from a university of recognized standing, may be considered for direct admission into the PhD program.

40.35.3 Program of Study

The supervisory committee, in consultation with the Board of Study, will determine the minimum course requirements and the program of study for each Ph.D. student in Scientific Computing. Substitutions for courses on the list of core scientific computing courses are possible. Given the interdisciplinary nature of the program, the following guidelines would be followed:

1. Students who have completed an M.Sc. degree in Scientific Computing or equivalent will be required to complete two courses (6 credit hours) chosen from the list of core courses or two courses (6 credit hours) from the application area as appropriate.
2. Students who have completed an M.Eng. or a disciplinary M.Sc. degree will be required to complete four courses (12 credit hours). Normally, three (9 credit hours) of these courses would be chosen from the list of core courses to ensure sufficient training in scientific computing.

3. Students who transfer to the Ph.D. program from the Master of Science (Scientific Computing) program are required to complete six courses (18 credit hours) in total. Normally three to four of these courses would be from the list of core courses.
4. Students holding a B.Sc (honours or equivalent) degree who are directly admitted into the program will be required to complete six courses (18 credit hours). Normally three to four of these courses would be from the list of core courses.
5. Students are required to pass a single Comprehensive Examination as prescribed under **General Regulations, Comprehensive Examinations, Ph.D. Comprehensive Examination**. This shall be an oral exam, and may include the presentation of a written research proposal.
6. Upon completion of the work for the thesis, each student is required to present a seminar suitable for the interdisciplinary audience of Scientific Computing program students.

The submission of an acceptable thesis is required. The thesis is to contain an original scholarly contribution which must be submitted to the School of Graduate Studies for final examination. The thesis must be written in a format according to procedures outlined in Guidelines for Theses and Reports by the School of Graduate Studies at www.mun.ca/sgs/go/guid_policies/theses.php.

40.35.4 Courses

Computational Science

6910 Matrix Computations and Applications or COMP 6732 Matrix Computations (*credit may be obtained for only one CMSC 6910 and COMP 6732*)

6920 Scientific Programming

6930 Algorithms for Distributed and Shared Memory Computers

6950 Computer Based Tools and Applications (*credit may be obtained for only one of CMSC 6950 and the former CMSC 6940*)

Computer Science

69016 Topics In Numerical Methods (*credit may be obtained for only one of COMP 6906 and COMP 6731*)

Mathematics

6201 Numerical Methods for Time Dependent Partial Differential Equations

6202 Nonlinear and Linear Optimization

6204 Iterate Methods In Numerical Linear Algebra

6210 Numerical Solutions of Differential Equations

40.36 Social Work

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/socwrk

www.mun.ca/become/graduate/apply/app_deadlines.php

40.36.1 Program of Study

The degrees of Master of Social Work and Doctor of Philosophy are offered in Social Work.

Course work commences in the Spring Semester and is completed over five semesters. The program includes two Spring Semester residencies, at which time students must attend on a full-time basis, and Fall and Winter semester courses which can be taken on or away from Campus.

1. An applicant for admission to the Ph.D. program in Social Work must hold a Master's Degree in social work, or equivalent professional social work Degree as determined by the Graduate Studies Committee of the School of Social Work. All applicants should also have a minimum of three years post-B.S.W. practice experience.
2. All Ph.D. students in the social work program must complete at least 24 credit hours in regulation graduate courses. These include:
 - a. 6 credit hours in foundation courses (7010 and 7020)
 - b. 6 credit hours in advanced practice courses (7310, 7320); or 3 credit hours in advanced practice courses (7310) and 3 credit hours on social work education (7510)
 - c. 9 credit hours on research (7411, 7421, and 7431)
 - d. one internship chosen from the Internships on Advanced Social Work Practice (7910), Social Work Education (7920), or Applied Social Work Research (7930).
3. Comprehensive Examination
 - a. A student registered in a Ph.D. program in Social Work shall normally take the Comprehensive Examination no later than the seventh semester in the program. Prior to proceeding to the Comprehensive Examination, students must have completed all required course work and the internship.
 - b. The Examination Committee shall be appointed by the Dean of Graduate Studies on the recommendation of the Dean (School of Social Work). It shall consist of:
 - i. the Ph.D. Program Co-ordinator who will serve as representative of the Dean of the School of Social Work and who shall occupy the Chair
 - ii. the student's Supervisor
 - iii. the Dean of Graduate Studies or delegate
 - iv. three other members recommended by the Dean of the School of Social Work. One of these normally will be on the student's Supervisory Committee.

Including the Supervisor, no more than two members of the Examination Committee may be nominated from the student's Supervisory Committee. All members of the Examination Committee, including the Chair, but excluding the Dean of Graduate Studies or delegate, shall be voting members.

- c. The Ph.D. Comprehensive Examination in Social Work will consist of a written paper and an oral defence. In the paper, the student will contextualize the student's substantive area using theories that inform social work and develop a research design relevant to this substantive area. The student will demonstrate a contextualized and in-depth understanding of the philosophical and theoretical frameworks informing the student's substantive area, including major critiques from competing theoretical, philosophical and historical understandings. In addition, the paper will demonstrate a thorough understanding of relevant methodological considerations and a justification for the choices made within the research design. The student will identify an area of empirical research that may be undertaken and will prepare a written paper that includes: an introduction of the substantive area and a formulation of the research question; a literature review that is consistent with the question, and which

both presents a critical evaluation of the theoretical and research literature and synthesizes this literature into the student's own theoretical framework; a research design for answering the research question, including a critical analysis of the chosen methodology as well as the methods of data collection, data analysis and ethical considerations. The focus and content of the written work will be defined by the Examination Committee in consultation with the student and will be approved by the Chair of the Ph.D. Program in the School of Social Work. The body of the paper will be no less than 50 pages and not more than 75 pages. It shall be defended orally. The student shall have 13 weeks to submit the paper for examination, following the comprehensive exam process approved by the Ph.D. Studies Committee.

- d. The Ph.D. examination procedure shall be initiated by the student's Supervisor who will notify, in writing, the Dean (School of Social Work) of the student's readiness. The student's Examination Committee will then be appointed according to section 3.b. (above).
 - e. Following the oral defence, the Examination Committee shall meet *in camera* to arrive at its conclusions. Evaluation of the student will be based on the following criteria:
 - i. demonstration of knowledge of social work theory, research, and issues relevant to the topic of inquiry in both the written and oral presentation.
 - ii. coherency of oral presentation and written paper (i.e. conceptualization, cogent argumentation, sufficient referencing of statements, clear writing style).
 - f. The Chair shall report the results of the examination to the Dean of Graduate Studies in accordance with General Regulation **Comprehensive Examinations, Ph.D. Comprehensive Examination, 4.**
4. Ph.D. Thesis
- a. A Supervisory Committee will be appointed for each student as indicated under the General Regulation **Supervision.**
 - b. The student must submit a thesis proposal to the Supervisory Committee based on the student's own interest, and normally the proposal must be approved by the end of the eighth semester of the program. The proposal will be circulated to the Supervisory Committee for critical evaluation. The Chairperson of the Supervisory Committee will inform the student within one month of its acceptance, rejection, or acceptance with recommended changes.
 - c. If the proposal is not acceptable, the student will normally be permitted a second attempt. The revised proposal must be submitted within a semester. Failure to resubmit within this time period will lead to termination of the student's program.
 - d. The thesis shall give evidence of the student's ability to carry out independent and original research, develop the necessary theoretical and methodological framework and analyses and present the findings in a scholarly manner.

40.36.2 Courses

The following courses that are offered during the spring semester residency will be offered every other year, as far as the resources of the School will allow.

7010 Philosophical and Historical Base of Social Work Practice (S*)

7020 Critical Thinking for Social Work Practice (S)

7310 Tutorial on Field of Practice (F** or W***)

7320 Tutorial in Advanced Social Work Practice (S)

7411 Philosophy of Science and Research Design (S)

7421 Qualitative Data Analysis (S)

7431 Quantitative Data Analysis (S)

7510 Social Work Education (S)

7910 Internship on Advanced Social Work Practice (F)

7920 Internship on Social Work Education (F)

7930 Internship on Applied Social Work Research (F)

*S = Spring Semester, **F = Fall Semester, ***W = Winter Semester

40.37 Sociology

www.mun.ca/sgs/contacts/sgscontacts.php

www.mun.ca/hss

www.mun.ca/soc

www.mun.ca/become/graduate/apply/app_deadlines.php

The Doctor of Philosophy (Ph.D.) is offered in Sociology by full-time and part-time study. Graduate courses are taught as tutorials or small seminars.

40.37.1 Program of Study

1. The Ph.D. degree in Sociology is offered in accordance with **General Regulations** and current department strengths.
2. To be admitted to the program an applicant must have completed either a Master of Arts or Master of Philosophy Degree or hold an equivalent qualification.
3. All Ph.D. students normally complete a minimum of 12 credit hours in graduate courses in Sociology, including the Sociology Graduate Seminar (6880), Social Theory (6150), Advanced Quantitative Methods (6040), and Advanced Qualitative Methods (6041), if these or equivalent courses have not been taken previously.

The supervisory committee in consultation with the Head or Graduate Officer will determine which additional courses, if any, may be required to ensure that students undertake appropriate course work in their area of research.
4. Proficiency in a second language will be required when the student's supervisory committee determines that knowledge of this second language is necessary for the purpose of the proposed doctoral research.
5. A written comprehensive examination, followed by a supplementary oral examination, shall normally be completed by full-time students by the end of the 5th semester of the program. Normally, part-time students shall take the examination within one year of the completion of prescribed courses. In accordance with **General Regulations, Comprehensive Examinations**, students must demonstrate knowledge of their special areas of research within the context of the discipline of Sociology. The examination shall consist of two components: a written and an oral examination. The written component shall be comprised of two essays: one in a broad area (e.g. theory, methods, social inequality, etc.) and a second in the student's area of specialization. The oral component will examine the student in areas covered by the written component.
6. No more than two years after having been admitted to the program the student must submit a thesis proposal that is considered satisfactory by the Supervisory Committee.

40.37.2 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the Department will allow.

6040 Advanced Quantitative Methods
 6041 Advanced Qualitative Methods
 6042-49 Special Topics in Advanced Sociology
 6090-94 Special Area in Sociology
 6120 Social Organization
 6130 Social Stratification
 6140 The Community
 6150 Social Theory
 6160 Theory Construction and Explanation in Sociology
 6240 Sociology in Medicine
 6280 Social and Economic Development
 6300 Maritime Sociology
 6310 Political Sociology
 6320 Gender and Society
 6330 Science and Technology
 6340 Comparative North Atlantic Societies
 6350 Environmental Sociology
 6360 Sociology of Work
 6370 Feminist Theory and Methods
 6380 Women, Nature, Science and Technology
 6390 Sociology of Culture
 6610 Socialization
 6620 Current Topics in Social Behaviour
 6880 Sociology Graduate Seminar

40.38 Theoretical Physics

www.mun.ca/sgs/contacts/sgscontacts.php
www.mun.ca/science
www.mun.ca/math
www.mun.ca/physics
www.mun.ca/become/graduate/apply/app_deadlines.php

40.38.1 General Information

1. The Theoretical Physics Program is an interdisciplinary Doctor of Philosophy program offered jointly by the Department of Mathematics and Statistics and the Department of Physics and Physical Oceanography. It is broadly based and includes several subdisciplines with the common denominator that each applies advanced mathematical techniques to the study of physical problems. The subdisciplines include, though are not necessarily limited to, theoretical astrophysics, general relativity, partial differential equations of mathematical physics, quantum mechanics, classical and quantum field theory, theoretical condensed matter physics, many-body theory, advanced classical mechanics and non-linear processes, and theoretical and geophysical fluid mechanics.
2. The program is administered by the Board of Studies which is appointed by the Dean of Science in consultation with those faculty members active in the program. The Board of Studies will consist of two members from the Department of Physics and Physical Oceanography and two members from the Department of Mathematics and Statistics. The Program Chair is elected by the Board of Studies and appointed by the Dean of Science. Responsibilities of the Board include making recommendations to the School of Graduate Studies concerning admissions to the program, determining course requirements, and administering comprehensive exams. It also determines minimum levels of funding, administers the School of Graduate Studies and Graduate Teaching Assistant budgets, and monitors students' annual progress through the submission of annual supervisory committee reports.

40.38.2 Program of Study

The following regulations should be read in conjunction with the **General Regulations**:

1. A program of study for the Ph.D. Degree in Theoretical Physics shall normally include a minimum of 9 graduate credit hours in courses offered by the Department of Mathematics and Statistics and/or the Department of Physics and Physical Oceanography. The courses will be determined by the student's supervisory committee in consultation with the Program Chair and approved by the Board of Studies. In special circumstances more or fewer graduate courses and/or undergraduate courses may be required.
2. Students are required to pass a single Comprehensive Examination as prescribed under **Comprehensive Examinations, Ph.D. Comprehensive Examination**. This shall be an oral one, and may include the presentation of a written research proposal.
3. The most important requirement is the writing of a doctoral thesis which demonstrates the student's ability to independently and originally attack and solve a significant problem in theoretical physics. The thesis must definitively advance the subject which it treats.

40.39 Transdisciplinary Sustainability

www.mun.ca/sgs/contacts/sgscontacts.php
www.grenfell.mun.ca/academics-and-research/Pages/graduate-programs.aspx
www.mun.ca/become/graduate/apply/app_deadlines.php

Membership of the Graduate Program Committee consists of five faculty members, the Dean of the School of Science and the Environment, and a graduate student.

40.39.1 General Information

The School of Science and the Environment offers a program in Transdisciplinary Sustainability leading to a Doctor of Philosophy (Ph.D.) degree. Full-time and part-time options are available.

40.39.2 Qualifications for Admission

1. Admission to the program is limited and competitive.
2. To be considered for admission, applicants shall normally hold a Master's degree from an institution recognized by the Senate, and have an excellent academic record, basic research skills and demonstrated ability for creativity, independent thought, advanced study and original research.
3. Applicants may come from diverse fields of study, including but not limited to: biology, earth sciences, agricultural sciences, sustainable agriculture (agronomy, plant science, soil science, plant physiology), ecology, environmental science, engineering, business, economics, environmental studies, environmental policy, geography, law, public administration, political science, and planning.
4. Students in the Master of Arts in Environmental Policy and Master of Science in Boreal Ecosystems and Agricultural Sciences programs may request a transfer to the doctoral program after a minimum of 12 months in their program of study, and completion of all Master's course work requirements with a minimum of 75% and clear evidence of exceptional research productivity. Such transfer should take place no later than the 5th semester of the student's Master's program.
5. Other students may be considered for admission to the program provided that they have been registered in a Master's program for a minimum of 12 months, and have demonstrated, to the satisfaction of the Graduate Committee, their ability to pursue research at the doctoral level.
6. In exceptional cases, applicants holding a Bachelor's Degree with Honours, or equivalent, in a relevant field, from a university of recognized standing, and having a minimum of 5 years of full-time professional experience, preferably in an environmental-related field, may be considered for direct admission into the Ph.D. program.
7. To be eligible for admission, applicants shall exceed the English Proficiency Requirements described under **General Regulations, Qualifications for Admission - English Proficiency Requirements, Additional Requirements, and English Language Requirements Subsequent to Admission**, both in the TOEFL and in the IELTS tests.

40.39.3 Program of Study

1. A Supervisory Committee shall be appointed for each student in accordance with the **General Regulations, Supervision, Ph.D. and Psy. D. Candidates**.
2. Students will normally be required to successfully complete a minimum of 9 credit hours of graduate program courses as follows: TRSU 7001, TRSU 7002, and an elective course. All courses will normally be completed within the first two semesters of the program.
3. Students may be required to take further graduate courses, beyond the minimum number, depending on their background and needs. These courses will be selected by the Supervisory Committee.
4. Students are expected to actively participate in graduate research seminars in the Fall and Winter semesters in each of the first two academic years of the program, in order to foster their scholarly discourse.
5. Students shall submit to a comprehensive examination in accordance with the School of Graduate Studies **General Regulations, Comprehensive Examinations**. The Comprehensive Examination will consist of a written component and an oral component. The examination will be normally scheduled upon completion of all course work, and no later than the seventh semester of the student's program.
6. Students must submit a written thesis proposal for presentation to the Supervisory Committee, normally within six weeks of completion of the comprehensive examinations, but no later than the end of the fifth semester of the program.
7. Students must submit a thesis, examined and defended in accordance with the **General Regulations, Theses and Reports, Evaluation of Ph.D. and Psy.D. Thesis**. The thesis is expected to bring a substantial contribution to research in transdisciplinary sustainability while also contributing to practical solutions to address contemporary sustainability challenges.
8. All graduate students are required to follow the Memorial University of Newfoundland's Policy for Integrity in Scholarly Research.
9. The duration of the program is normally four years. The program will be delivered on the Grenfell Campus of Memorial University of Newfoundland with the option for courses to be taken and supervisory involvement from other Memorial University of Newfoundland Campuses or other universities as well.

40.39.4 Courses

A selection of the following graduate courses will be offered to meet the requirements of students, as far as the resources of the School of Science and the Environment will allow:

Boreal Ecosystems and Agricultural Sciences

- 6021 Organic Farming for Sustainable Agriculture
- 6030 Chemical Speciation Modeling for Environmental Matrices
- 6031 Soil Functions Soil as a Bioreactor
- 6033 Soil and Water Conservation
- 6041 Applied Hydrology
- 6051 Applied Bioinformatics

Environmental Policy

- 6001 Applied Environmental Problem Solving: A Case-Based Approach
- 6003 Environmental Political Thought
- 6053 Ecological Economics
- 6056 Risk Assessment and Analysis
- 6057 Energy Policy
- 6058 Management and Regulation of Water Resources
- 6520-6530 Special Topics Courses (*excluding 6520, 6521, 6522*)
- 6520 Policy and Planning for Sustainable Communities
- 6521 Global Governance
- 6522 Sustainability Monitoring and Assessment

Transdisciplinary Sustainability

- 7001 Foundations of Sustainability and Sustainability Science
- 7002 Transdisciplinary Methods in Sustainability Research

41 Regulations Governing the Degree of Doctor of Psychology

www.mun.ca/sgs/contacts/sgscontacts.php
 www.mun.ca/science
 www.mun.ca/psychology
 www.mun.ca/become/graduate/apply/app_deadlines.php

The Doctor of Psychology (Psy.D.) degree in clinical psychology is offered by the Department of Psychology in partnership with the University Counselling Centre. This program is designed to train professional psychologists at the doctoral level within a scholar-practitioner orientation to provide a variety of psychological services to individuals, families and communities. The program was designed to meet all of the requirements for registration with the Newfoundland and Labrador Psychology Board and to meet the accreditation standards of the Canadian Psychological Association.

41.1 Administration

1. The Psy.D. Program Director, who must be a registered Psychologist and hold a full-time faculty position in the Department of Psychology at Memorial University of Newfoundland, is appointed by the Head of the Department of Psychology following a consultative process that includes the faculty most directly associated with the Psy.D. program.
2. The Psy.D. Administrative Committee consists of the Director and representatives from academic units involved in the program, Eastern Health, the Association of Psychology in Newfoundland and Labrador and the Psy.D. student body. The Head of the Department of Psychology, on the recommendation of the Director, appoints Committee members. The student representative is elected by the Psy.D. students.
3. The Psy.D. Administrative Committee is chaired by the Director, and is the main body for developing and monitoring policy, procedures, and program content. The administrative committee makes recommendations concerning admission and termination, financial support, thesis and comprehensive committees, and thesis topics and examiners. The Committee oversees individual student programs of study and monitors their annual progress.

41.2 Admission Criteria

1. Students with Master's level degrees who wish to be considered for the program must have completed the undergraduate degree in Psychology and the undergraduate course requirements described below.
2. Applicants are required to have an undergraduate Honours degree in psychology that includes an Honour's thesis as well as courses in each of the following areas:
 - a. abnormal psychology
 - b. cognition
 - c. developmental psychology
 - d. history and systems
 - e. learning theory
 - f. neuroscience
 - g. research design
 - h. social psychology
 - i. statistics
3. Admission to the program is competitive. Applicants will be ranked according to academic aptitude, personal and interpersonal competence, clinical and professional potential, and availability of a supervisor. The application shall include academic transcripts, results of the Graduate Record Examination (verbal, quantitative and analytical subtests), three letters of recommendation and a statement of interests and objectives. One letter of recommendation must specifically address the suitability of the applicant for clinical work. Applicants who are short-listed will be interviewed, either in person or via telephone. Work experience, research experience, extra-curricular activities, and clinically relevant public service will be taken into consideration.

41.3 Program of Study

Students are required to successfully complete at least 63 credit hours in regulation graduate courses. These include:

- a. 6 credit hours in statistics and research design courses (6000, 6602);
- b. 27 credit hours in core courses (6611, 6612, 6620, 6623, 6630, 6631, 6633, 6650, 6670); and
- c. 30 credit hours in practicum courses (7010, 7020, 7021, 7022, 7030, 7031, 7032, 7033, 7034, 7035).

Students must also complete a year-long internship, pass a comprehensive exam and successfully complete a research thesis.

41.3.1 Comprehensive Examination

The Psy.D. comprehensive exam, consisting of a written and an oral component, shall be taken during the second year of the program. The exam is intended to demonstrate clinical application of the knowledge acquired through course work and practica. The comprehensive exam will be administered according to the guidelines prescribed in the University Calendar for Ph.D. comprehensive examinations.

41.3.2 Thesis

Students will complete a thesis that is applied in nature and relevant to the practice and science of clinical psychology and the communities it serves. The School of Graduate Studies **General Regulations, Evaluation of Ph.D. and Psy.D. Thesis** concerning evaluation of Ph.D. Thesis will be followed.

41.3.3 Predoctoral Internship

All students will be required to complete a twelve-month, 1750 clock-hour predoctoral internship.

41.4 Courses

6000 Advanced Statistics
 6001 Research Design

6602 Research Design in Clinical Psychology
6611 Ethics of Professional Practice
6612 Adult Psychopathology
6614 Selected Topics in Psychopathology
6620 Principles of Adult Assessment and Diagnosis
6621 Principles of Child Assessment and Diagnosis
6622 Selected Topics in Assessment and Diagnosis
6623 Child Psychopathology, Assessment and Diagnosis
6630 Principles of Intervention with Adults
6631 Principles of Intervention with Children
6632 Community Interventions
6633 Clinical Psychopharmacology
6634 Selected Topics in Intervention
6640 Consultation Processes
6650 Supervision
6660-6669 Special Topics in Clinical Psychology
6670 Interprofessional Education (*3 credit hours over six terms: Fall and Winter terms for Years 1, 2, and 3*)
7010 Practicum in Ethics and Relationship Skills
7020 Practicum in Adult Assessment and Diagnosis I
7021 Practicum in Adult Assessment and Diagnosis II
7022 Practicum in Child Assessment and Diagnosis
7030 Practicum in Assessment and Intervention I
7031 Practicum in Assessment and Intervention II
7032 Practicum in Assessment and Intervention III
7033 Practicum in Advanced Assessment and Intervention I
7034 Practicum in Advanced Assessment and Intervention II
7035 Practicum in Rural Intervention and Interprofessional Practice
7050 Practicum in Supervision I
7051 Practicum in Supervision II