# Mount Allifson U N I V E R S I T Y 

2003-2004

ACADEMIC CALENDAR

Sackville, New Brunswick, Canada

Academic Calendar 2003-2004
Mount Allison University
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## WELCOME TO MOUNT ALLISON UNIVERSITY

When you first arrive at Mount Allison, you know this University is special. The charming campus tells a tale of rich history, with historic buildings, antique books delicately bound, and stately portraits of past presidents and chancellors hanging in Convocation Hall. But Mount Allison also has its sights firmly set on the future. Underground, for example, the campus is connected by an intricate network of fibre-optic wiring, granting all on campus access to the Internet. Mount Allison was the first university in Canada to offer this access, and the University continues to embrace innovative technology in other new and exciting ways.

## OUR MISSION

Mount Allison University is committed to the creation and dissemination of knowledge in a community of higher learning, centred on undergraduate students, in an intimate and harmonious environment. Our teaching, research and creative enterprise are combined with extracurricular activities, in a liberal education tradition, that emphasizes development of the whole person. This integrated approach involves collaborative efforts among all members of the University community and leads to superior scholarship, cultural understanding and appreciation, personal and social maturation, leadership development and informed citizenship.

## WELL-ROUNDED STUDENTS IN A TIGHT-KNIT COMMUNITY

Mount Allison is primarily an undergraduate, liberal arts and science university with a controlled enrollment of approximately 2,250 full-time students. It has preserved the character of a compact, scholarly community to foster excellence in teaching, mentoring and student-centred research. A strong emphasis on extra-curricular activities, ranging from athletics to the exercise of student government complements the dedication to high academic performance. Mount Allison strongly supports the philosophy of developing the "whole student" intellectually, spiritually, socially, culturally and physically. It shapes leaders who are critical thinkers, problem solvers and creative participants in society. Moreover, our students agree that Mount Allison is more than a university...it's a way of life. If there is one common thread to Mount Allison students, it is their academic strength and their propensity of leadership. Mount Allison has produced 44 Rhodes Scholars, more per capita than any other university in the Commonwealth. The University has also graduated a number of Rotary International Scholars, Commonwealth Scholars, and in 1997, one of the first winners of the Canadian Cambridge Scholarship. Many graduates have become preeminent in their endeavours. Notable alumni include: playwright John Gray; artists Alex Colville, and Mary and Christopher Pratt; national broadcaster Ian Hanoomansing; former Lieutenant-Governor of New Brunswick Margaret McCain; Lieutenant-Governor of New Brunswick Marilyn Trenholme Counsell and Imasco Chairman Purdy Crawford, who also served as Chancellor of Mount Allison.

## THE FACULTY

The University's faculty is talented and dedicated, exemplifying a strong blend of teaching and research. In a recent University survey, $100 \%$ of graduates felt their professors were approachable, which speaks volumes about the relationships between faculty and students at Mount Allison.

## AN EDUCATION SUITED TO THE 21ST CENTURY

Mount Allison offers Bachelor's degrees in Arts, Science, Commerce, Fine Arts and Music, as well as Master's degrees in Biology and Chemistry and Certificates in Bilingualism. In 1995, it revised its curriculum to give students even greater "depth and breadth" to their education as they enter the 21st century. A series of majors and minors was developed in the traditional disciplines and in a number of interdisciplinary areas such as International Relations, Canadian Public Policy, Japanese Studies and Cognitive Science. The Bachelor of Arts and Bachelor of Science degrees are achieved through completion of one of a specialized honours program; a major plus a minor; a double major; or a general degree of three minors. In addition, each Arts and Science student takes at least six credits from each of four disciplinary areas of Arts and Letters, Humanities, Social Science, and Science. The revised requirements have resulted in very exciting intellectual opportunities for students, giving them a chance to examine problems and issues from a number of different perspectives. Prospective students often wonder about the purpose of receiving a bachelor's degree from a liberal arts institution in a globally competitive economy. The usefulness of a bachelor's degree is not only found in personal development but also in professional areas. A degree from Mount Allison, or a few carefully selected courses or electives as part of a Mount Allison degree, may permit a student admission to a professional programme. Some of these programmes include medicine, dentistry, pharmacy, veterinary medicine, law, education, theology, social work, audiology and speech, occupational physiotherapy, optometry, architecture and nutritional programmes as well as many others. These professional programmes may be accessed upon successful completion of courses and/or a degree from Mount Allison and in combination with other requirements as appropriate (e.g. LSAT, MCAT, GRE, etc.). Interested students should consult the Academic and Career Counsellor for advice on course selection and the process to enter these professional programmes after their undergraduate career at Mount Allison.

## A REPUTATION FOR LEADERSHIP

For more than a century, Mount Allison has been recognized as a leader. Mount Allison was the first university in the British Empire to confer a Bachelor's degree to a woman; Grace Annie Lockhart received a Bachelor of Science in 1875. It was also the first university in Canada to grant a Bachelor of Arts to a woman, Harriet Starr Stewart. Mount Allison boasts the oldest university art gallery in Canada; it was the first to wire all of campus to the information highway; it was the first to offer a Canadian Studies programme; and it is a pioneer in the establishment of services for students with learning disabilities. In recent years, it has consistently been ranked the number-one undergraduate university in Canada by Maclean's magazine. A high-calibre faculty, outstanding students and financial stability are among the reasons why.

## HISTORICAL SKETCH

Founder Charles Frederick Allison's grandfather emigrated from Ireland in the late 1700 s , as a result of a dinner with the local tax collector. Wanting to impress him, the family set the table with their one valuable
possession of silver spoons. After entertaining their guest, the Allisons were informed that if they could afford silver spoons, they could afford to pay more taxes. They left Ireland shortly thereafter. The spoons are on display in the main Library. In June 1839, Sackville merchant Charles Frederick Allison proposed to the Wesleyan Methodists that a school of elementary and high learning be built. His offer to purchase a site in Sackville, to erect a suitable building for an academy, and to contribute operating funds of 100 pounds a year for 10 years was accepted. The formal opening of the Mount Allison Academy for boys took place in 1843. In 1854, a branch institution for girls, known as the "Ladies College", opened to complement the Wesleyan Academy for boys. In July 1862, the degree-granting Mount Allison College was organized. The first two students graduated in May 1863. For nearly a century, Mount Allison functioned as three distinct, mutually enriching parts: the College proper, the Boys' Academy and the Ladies College. The closure of the School for Girls in 1946, and the Academy in 1953, coincided with a period of expansion and provided much-needed space. In 1958, the beginning of a period of construction and acquisition of buildings eased the strain of overcrowding. At this time, it was decided to reaffirm the traditional aim of providing a high-quality undergraduate liberal arts education, along with continuing to offer professional programs in already-established fields. Mount Allison has a long and proud tradition, and part of that tradition has been the ability to evolve and to adapt to new and changing demands. It is very much a university of the 21st century, while remaining the direct and recognizable descendant of the first Wesleyan Academy of 1843.

## ONE OF THE MOST BEAUTIFUL CAMPUSES IN CANADA

The Mount Allison calendar for 1851 declared Sackville a "pleasant and healthy" community, "easy of access from all parts of the Lower Provinces." The Mount Allison buildings are "elegant, spacious and comfortable, and delightfully situated upon an elevation of ground." The facilities offered were, "all that could be desired, either for the enterprising Teacher to aid him in his work of instruction, or to the ambitious Student to facilitate his honourable progress." Writing styles have changed since then, but Mount Allison still continues to take pride in its campus. The campus encompasses about 76 acres, 45 buildings and one million square feet of assignable space. The tree and shrub count is about 1,100 , giving the campus a tranquil, park-like setting. The physical surroundings are enhanced even further by the Swan Pond, a symbol of Mount Allison since its introduction in 1901. It has traditionally been the site of picnics, cultural events, orientation activities and wintertime skating. The past few years have witnessed a number of improvements to the facilities. Almost $\$ 25$ million was spent on much-needed repairs to buildings and grounds, including residences. A three-phase project to upgrade the underground steam and electrical tunnels was completed, and the University seized this opportunity to spruce up the landscaping, particularly in the heart of the campus. Improvements continue to take place to enhance the learning environment. For example, the opening of the Dr. Y.S. Wu Teaching Centre in 1996 provides faculty and students with state-of-the-art facilities for teaching and learning. Unlike some other institutions, this University has never moved from its original campus; it has expanded in area, but is still centred on that rise of ground named "Mount Allison" after the founder. The traditional use of red and grey local sandstone, plus continual efforts to beautify and upgrade facilities, offers a setting that honours the past, yet embraces the future.

## UNIVERSITY CHANCELLORS

Ralph Pickard Bell<br>1960-1968<br>Harold Roy Crabtree<br>1968-1977<br>Angus James MacQueen<br>1977-1985<br>Margaret Norrie McCain 1986-1994<br>Harold Purdy Crawford<br>1995-2000<br>James J Keith<br>2001-

## UNIVERSITY PRESIDENTS

| Humphrey Pickard | $1862-1869$ |
| :--- | :--- |
| David Allison | $1869-1878$ |
| James Robert Inch | $1878-1891$ |
| David Allison | $1891-1911$ |
| Byron Crane Borden | $1911-1923$ |
| George Johnstone Trueman | $1923-1945$ |
| William Thomas Ross Flemington | $1945-1962$ |
| William Stanley Hayes Crawford (Acting) | $1962-1963$ |
| Laurence Harold Cragg | $1963-1975$ |
| William Stanley Hayes Crawford | $1975-1980$ |
| Guy Robertson MacLean | $1980-1986$ |
| Donald Otis Wells | $1986-1990$ |
| Sheila A. Brown (Interim) | $1990-1991$ |
| Ian David Campbell Newbould | $1991-2001$ |
| A. Wayne Mackay | $2001-$ |

## ACCREDITATION

Mount Allison University is a member of: The Association of Universities and Colleges of Canada and The Association of Commonwealth Universities

## GLOSSARY OF <br> ACADEMIC TERMS AND CALENDAR OF EVENTS

## GLOSSARY OF ACADEMIC TERMS

This page provides a list of commonly used academic terms found in this calendar. The definitions provided are intended to help readers understand the outlines of academic regulations and programmes which follow.

## Academic Dismissal

Denial of all registration privileges for a minimum of three academic years because of failure to meet academic standards.

## Academic Distinction

A designation awarded to any student completing an undergraduate degree with an overall Grade Point Average of at least 3.7 on all courses attempted.

## Academic Probation

Permission to continue registration, subject to meeting terms required for returning to Good Standing.

## Academic Semester

Either the September to December or the January to April portion of an academic year.

## Academic Suspension

Denial of all registration privileges for a specified period of time because of failure to meet academic standards.

## Academic Year

The academic session which last from September through April.

## Advanced Placement

Registration at an advanced level in a course because of previously acquired background knowledge. Unlike advanced standing, this permission is not granted with credits awarded for the previously acquired knowledge.

## Advanced Standing

Registration at an advanced level in a discipline because of transfer credits granted for courses completed at another recognized institution.

## Audit

Registration status of a student who attends class(es) with written permission of the course instructor. Students auditing a course will not write final examinations or receive a grade for the course. See calendar regulation [6.1.9]

## Corequisite

A course which must be taken at the same time as another course.

## Credit

The weight value assigned to a course. A course that normally meets for 3 hours each week throughout the academic year is worth 6 credits; a course that normally meets for 3 hours each week in one semester is worth 3 credits. Ensemble performance courses in Music which meet on a regular basis throughout the academic year are worth 1 credit.

## Cross-listed Course

A course listed for credit under more than one discipline. The course may only be taken once for credit.

## CGPA (Cumulative Grade Point Average)

An average calculated by dividing the total number of grade points obtained (credit hours $x$ grade points) by the number of credit hours attempted during all academic sessions.

## Discipline

A subject area or branch of knowledge.

## Elective

A credit course which is outside of the specialization component of a programme.

## Exclusion

A course which is similar enough in content to the course with which it is listed that it cannot count for additional credit toward a degree.

## Faculty

a) The academic teaching staff of a university and b) A grouping of related academic departments administered by a Dean.

## Full-time Student

A student enrolled for the equivalent of 9 or more credits per semester.

## Good Standing

An academic status achieved by passing at least 18 credits of work in the September through April academic session with a minimum Grade Point Average of 1.50 .

## GPA (Grade Point Average)

An average calculated by dividing the total number of grade points obtained (credit hours x grade points) by the number of credit hours attempted.

## Honours Programme

A specialized Arts, Commerce or Science degree programme which must be completed at an above average academic level.

## Interdisciplinary Studies

A group of related courses from various disciplines.

## Intersession

The academic session that lasts from mid-May to the end of June.

## Letter of Permission

An official document granting prior approval to take a course from another university for credit to a Mount Allison programme.

## Major

The discipline(s) or area of specialization selected to fulfill part of the requirements for most Arts, Commerce or Science degrees.

## Minor

A secondary discipline(s) or area of specialization selected to fulfill part of the requirements for most Arts, Commerce or Science degrees.

## Prerequisite

A course or courses that must be completed before registration in another course is permitted. Note: Students must obtain a grade of at least C - in all courses used to fulfill prerequisite requirements. Otherwise written permission of the appropriate Department or Programme Coordinator must be obtained.

## Registration

The process of choosing, enrolling in and paying fees for courses taken in an academic session.

## Sessional GPA (Grade Point Average)

An average calculated by dividing the total number of grade points obtained (credit hours x grade points) by the number of credit hours attempted during the academic session.

## Summer Session

The academic session that last from the beginning of July to mid-August.
Transcript
An official document that lists the entire academic record of a student at an educational institution.

## Transfer Credit

Credit granted on a degree and/or certificate for work completed at another recognized institution. Transfer credits are not used in calculation of any Grade Point Average.

## CALENDAR OF EVENTS 2003-2004

| Sept. 1 | Monday | Arrival of New International Students, International Orientation Begins |
| :---: | :---: | :---: |
| Sept. 4 | Thursday | Arrival of New Students |
| Sept. 4 | Thursday | Beginning of Orientation |
| Sept. 6 | Saturday | Returning Students may enter residence. Supplemental Exams for eligible students |
| Sept. 8 | Monday | Classes Begin |
| Sept. 15 | Monday | Change in registration in first term 3 credit courses begins |
| Sept. 16 | Tuesday | Last day for change in registration in first term 3 credit courses |
| Sept. 17 | Wednesday | Last day to make Fall Fee payment without penalty |
| Sept. 22 | Monday | Last day for change in registration in year long 6 credit courses |
| Sept. 24 | Wednesday | Meeting of the Faculty Council |
| Sept. 30 | Tuesday | Meeting of the Senate |
| Sept. 29 | Monday | Deadline for application to Graduate |
| Oct. 13 | Monday | Thanksgiving Day - no classes |
| Oct. 23 | Thursday | Meeting of the Faculty Council |
| Oct. 30 | Thursday | Meeting of the Senate |
| Oct. 31 | Friday | End of withdrawal period for first term 3 credit courses |
| Nov. 14 | Monday | One day study break |
| Nov. 19 | Wednesday | Meeting of the Faculty Council |
| Nov. 26 | Wednesday | Meeting of the Senate |
| Dec. 1 | Monday | Deadline for Registration and Residence deposits for students admitted for the academic session commencing in January |
| Dec. 3 | Wednesday | Last day of classes |
| Dec. 5 | Friday | Final Exam Period begins for the firs term 3 credit courses and mid-year tests in 6 credit courses. |
| Dec. 15 | Monday | Meeting of Senate |
| Dec. 16 | Tuesday | Last Day for Exams |
| Jan. 3 | Saturday | Returning students may enter residence |
| Jan. 5 | Monday | Classes resume |
| Jan. 5 | Monday | Deferred exams in first term 3 credit courses (To be written in the evening) |
| Jan. 12 | Monday | Change of registration in second term 3 credit courses begins |
| Jan. 13 | Tuesday | Last day for change of registration in second term 3 credit courses |
| Jan. 14 | Wednesday | Last day to pay account balance without penalty |
| Jan. 16 | Friday | End of withdrawal period for year long 3 and 6 credit courses |
| Jan. 20 | Tuesday | Meeting of the Faculty Council |
| Jan. 26 | Monday | Meeting of the Senate |
| Feb. 16 | Monday | Meeting of the Faculty Council |
| Feb. 19 | Thursday | Meeting of the Senate |

Feb. 21 - Feb. Saturday to Week of independent study - no 29 Sunday classes Mar. 1 Monday

Mar. $5 \quad$ Friday
Mar. 25 Thursday
Mar. 31 Wednesday
Apr. 1 Thursday

Apr.
Apr. 9
Apr. 10
Apr. 13 Tuesday

Apr. 20
Apr. 22 Thursday
May 6 Thursday
May 6 Thursday
May 10 Monday

Deadline for returning students to apply to transfer to Music programme End of withdrawal period for second term 3 credit courses
Meeting of the Faculty Council
Meeting of the Senate
Deadline for returning students to apply to transfer to the B.F.A. programme
Last day of classes in second term Good Friday - no classes
Final Exam Period begins
Deadline for returning students to apply to transfer to B.A., B.Sc., or B.Comm. programmes

Last day for Exams Joint Meeting of the Faculty Council and the Senate
Meeting of the Faculty Council
Meeting of the Senate
University Convocation

## 3 ADMISSION

### 3.1 CONTACT INFORMATION

All correspondence regarding admission should be submitted to the Office of Student Services, Mount Allison University, 65 York St., Sackville, NB, E4L 1E4; phone (506) 364-2269; e-mail
[admissions@mta.ca](mailto:admissions@mta.ca). Application forms and a prospectus providing full information on admissions procedures are available from the Office of Student Services and on the web at <http: / /www.mta.ca>

### 3.2 ADMISSION TO THE UNIVERSITY

### 3.2.1 Admission Criteria

Mount Allison University recognizes a strong academic performance at the high school level as the primary indicator of university-level success. It also recognizes the added potential of those students with a well-balanced record of academic and extra-curricular activities. In making admissions decisions, both high school marks and other activities are considered. The University is interested in applicants possessing a strong academic record, leadership skills, a high level of commitment, and the potential for personal growth. Among the additional information requested from applicants will be evidence of extra-curricular involvement, volunteer activities in school and in the community, and work experiences.

### 3.2.2 Refusal of Admission

The University reserves the right to reject any application for admission on the basis of the overall record even if, technically, the entrance requirements are satisfied.

### 3.2.3 Special Circumstances

In special circumstances, a student lacking the specified requirements may be admitted.

### 3.2.4 Students with Learning Disabilities

Applications from students identified as having specific learning disabilities are considered individually. Students must include an assessment from the high school made within the previous year, detailing the type of learning disability, the techniques used to compensate for it, and the special requirements or considerations requested of the University. Students admitted under these conditions may be required to take a reduced load.

### 3.3 MINIMUM GENERAL ADMISSION REQUIREMENTS

### 3.3.1 Provincial Requirements

Students registering at Mount Allison are expected to have graduated from high school at the university preparatory level. In New Brunswick, Nova Scotia, Prince Edward Island, Newfoundland, Manitoba, Saskatchewan, Alberta, British Columbia, the Northwest Territories, the Yukon, and Nunavut, this is Grade 12. Students from Quebec will be expected to have completed either Grade 12 Senior Matriculation or Grade 11 and one year of a CEGEP academic programme. Students from Ontario will be expected to have completed either the university
preparatory level (Ontario Academic Credit) programme or beginning June 2003, the Grade 12 curriculum.

### 3.3.2 Minimum Grade/Average

For an application to be considered, during the final two years of preparatory work a minimum grade of $65 \%$ must have been achieved on each academic course considered for admission. Meeting the minimum requirements guarantees only that the application will be considered; normally, students who are admitted have averages that are well above the minimum.

### 3.4 ADDITIONALADMISSION REQUIREMENTS

### 3.4.1 University Preparatory Courses

All students must have successfully completed a university preparatory English course among their university preparatory courses. Whenever possible, students should anticipate their first year of university study and take the appropriate preparatory courses. (See Section 3.5). The University strongly recommends that students undertake a wellbalanced preparatory year that includes courses in the Humanities, Mathematics, Sciences and the Social Sciences.

### 3.4.2 Requirements for Specific Programmes

Students are advised to complete the following courses for specific programmes:
Bachelor of Arts: University preparatory English is required and it is strongly recommended that university preparatory courses in the Humamities, Mathematics, Sciences and the Social Sciences be completed.
Bachelor of Music: University preparatory English is required and it is strongly recommended that university preparatory courses in the Humanities, Mathematics, Sciences and the Social Sciences be completed. All Music applicants must have a satisfactory audition/interview and pass a one-hour test in elementary theory (materials of Music).
Bachelor of Fine Arts: University preparatory English is required and it is strongly recommended that university preparatory courses in the Humanities, Mathematics, Sciences and the Social Sciences be completed. All Fine Arts applicants are required to present a portfolio of their previous artwork for assessment.
Bachelor of Science: University preparatory English and science preparatory Mathematics are required and it is strongly recommended that two university preparatory courses in the Sciences, and one in either Humanities or Social Sciences, be completed.
Bachelor of Commerce: University preparatory English and science preparatory Mathematics are required and it is strongly recommended that university preparatory courses in the Humanities, Mathematics, Sciences and the Social Sciences be completed.

### 3.4.3 Provincial Guidelines

Students are advised of the following provincial guidelines for admission, including the above programme-specific requirements:
British Columbia, Yukon: Four provincially-examinable grade 12-level subjects.
Alberta, Northwest Territories, Nunavut: Four academic 30- or 31-level subjects of which at least four are departmentally examinable.

Saskatchewan: Five academic 30-level subjects.
Manitoba: Five academic 40- or 41-level or 45-level subjects.
Ontario: Five academic OAC subjects, or five academic grade 12-level subjects (new curriculum).
Quebec: Five academic grade 12-level subjects, or Grade 11 and one year of an academic CEGEP programme. Only CEGEP courses with a credit value of 2.00 or higher will be considered for admission.
New Brunswick: Five academic grade 12-level subjects.
Prince Edward Island: Five academic 600-level subjects.
Nova Scotia: Five academic grade 12 -level subjects.
Newfoundland: Ten credits in academic 3000- or 4000-level subjects. English Language 3101 and one of Thematic Literature 3201 or Literary Heritage 3202 must be included.

### 3.5 NOTES ON ENTRY TO FIRST-YEAR COURSES

a) Students enrolling in Chemistry 1001 should normally have completed a university preparatory-level* course in Chemistry.
b) Students enrolling in Computer Science 1711 should normally have completed a university preparatory-level* course in Mathematics.
c) Students enrolling in Economics 1000 should normally have completed a university preparatory-level* course in Mathematics.
d) Students enrolling in Mathematics 1111 should normally have completed a university preparatory-level ${ }^{*}$ course in Mathematics designed to prepare them for university calculus.
e) Students enrolling in Physics 1051 should normally have completed a university preparatory-level ${ }^{*}$ course in Mathematics.
*See section 3.3

### 3.6 REQUIREMENTS FOR NON-CANADIAN EDUCATION SYSTEMS

### 3.6.1 American School System

Students studying an American high school curriculum will be considered for admission provided they have successfully completed a selection of university/college preparatory courses and graduated from an accredited high school. The required academic standing is comparable to those outlined in sections 3.3 and 3.4. Scholastic Achievement Test (SAT) results are not required, but students are encouraged to submit their results.

### 3.6.2 General Certificate of Education (GCE)

For those studying towards the General Certificate of Education or the General Certificate of Secondary Education, (e.g. in the United Kingdom, West Indies, Bermuda, East and West Africa, Hong Kong) the University requires a minimum of two subjects at the Advanced 'A' Level and three at the Ordinary 'O' Level, or three at the 'A' Level and one at the ' O ' level, with an overall average of ' C ' and no subject below a 'D' grade. Two Advanced Standard (AS) Level courses may be used in place of one Advanced Level course.

### 3.6.3 International Baccalaureate

Students pursuing an International Baccalaureate (IB) diploma programme must include three courses in each of the higher and standard levels, with a minimum score of 4 in each subject and a minimum overall score of 28 points (excluding bonus points). Credit may be granted for specific higher level courses with minimum scores of 5 points (see section 3.9.1).

### 3.6.4 Baccalaureate

Students following France's system of education, must complete the requirements for the Baccalaureate with a minimum academic standing of 'Assez Bien'.

### 3.6.5 Other Educational Systems

Students studying in other educational systems are expected to satisfy the university admissions requirements of their own country, and must demonstrate a high level of accomplishment.

### 3.7 ENGLISH REQUIREMENTS

As English is the primary language of instruction at Mount Allison University, students must possess a mastery of English sufficient to follow lectures and to write assignments and examinations in English. All applicants will be required to provide evidence of English language proficiency. This evidence may take one of the following forms:
a) Successful completion of at least three years of instruction in Canada at a secondary institution as recognized by Mount Allison University.
b) Successful completion of at least 30 credit hours (or equivalent) at a post-secondary institution as recognized by Mount Allison University where English is the primary language of instruction.
c) TOEFL score of 550 (paper test) or 213 (computer test).
d) Michigan English Language Assessment Battery MELAB score of 85\%.
e) International English Language Testing System (IELTS) score of 6.5.
f) Completion of the ELS USA Programme with a score of 109 .
g) Canadian Academic English Language Assessment CAEL with an overall score of 70, and no sub-test result below 60 .

### 3.8 MATURE STUDENTS

Mature applicants who have not satisfied the admission requirements will be considered for admission upon submission of evidence of ability and motivation to successfully undertake university-level study. Usually mature applicants will not have been registered as full-time students for at least five years.

### 3.9 ADMISSIONWITH ADVANCED STANDING

### 3.9.1 International Baccalaureate

The University grants a maximum of 18 credits on a 120 -credit degree programme for higher level International Baccalaureate subjects completed with grades of 5,6 , or 7 .

### 3.9.2 Collège d'Enseignement Général et Professionnel (CEGEP)

Students accepted to Mount Allison from the CEGEP system may receive up to 30 credits according to the criteria listed below:

| CEGEP | Mt. Allison Credits Granted |
| :--- | :--- |
| 16 courses | 6 |
| 18 courses | 12 |
| 20 courses | 18 |
| 22 courses | 24 |
| 24 courses | 30 |

### 3.9.3 General Certificate of Education (GCE)

Students who have successfully completed Advanced 'A' Level papers may receive up to 30 credits.

### 3.9.4 Advanced Placement 'AP' Programme

The University grants a maximum of 18 credits on a 120 -credit degree programme for subjects completed in the Advanced Placement programme at a level of 4 or 5 . Evidence of completion of appropriate laboratory or studio work would be required.

### 3.9.5 New Brunswick Community College

The University may grant up to 30 credits on a 120 -credit degree programme for appropriate courses completed at New Brunswick Community Colleges. The Registrar will determine suitable credits in consultation with appropriate departments.

### 3.10 TRANSFER STUDENTS

Students pursuing post-secondary studies at a recognized university or college should present a minimum overall grade point average of 2.0 (or equivalent) on their post-secondary studies to be considered for admission. Please be aware that possession of the minimum requirement does not guarantee admission; students may be expected to present higher grades for admission to any given year. If course work has been completed at multiple institutions, the academic performance at all institutions will be taken into consideration. Students who are not eligible to return to their home institution will normally be required to wait at least one academic year before applying for admission. For information regarding transfer credits for students transferring from other recognized post-secondary institutions, please see section 6.5.1 in the Academic Regulations Section.

### 3.11 SPECIAL CIRCUMSTANCES

Students may be admitted under special circumstances to individual courses which they are qualified to take.

### 3.12 GRADUATE STUDIES

For Admission requirements to the Master of Science programme (Biology or Chemistry) please see the Master of Science programme outline in the Academic Programmes section 7.4.

## 4 FEES

The following sections deal with fees, refunds and related matters. We want to ensure that the process of registering students in courses and residences goes as smoothly as possible. To ensure that this is the case, students should read the sections that apply to their situations. Please contact us through the Office of Student Services if you have any questions.
Please note that Mount Allison University cannot accept responsibility for any loss, damage, or interruption of classes, accommodation or meal service as a result of circumstances beyond the reasonable control of the University.

### 4.1 FEES AND EXPENSES

## 4.1.ו Full-time/Part-time Enrolment

For fee administration purposes students enrolled in nine or more credits in a semester, including credits for Continuing and Distance Education courses, are full-time for that semester provided they are registered in at least two on-campus courses. All other students are part-time for fee administration purposes for that semester.

### 4.1.2 Tuition Fees

Tuition fees are set in May by the Mount Allison Board of Regents. Fees will also be posted on the University web site at
[http://www.mta.ca/administration/sas/](http://www.mta.ca/administration/sas/). Inquiries should be directed to the Office of Student Services.
The following are the 2002/03 tuition fees. They are subject to change for the 2003/2004 academic year.

## Full-Time Students

$\begin{array}{lr}\text { Undergraduate Tuition - Canadian } & \$ 4,980.00 \\ \text { Undergraduate Tuition - Non- Canadian } & \$ 9,960.00 \\ \text { Graduate students - first year } & \$ 500.00 \\ \text { Graduate students - subsequent year } & \$ 250.00\end{array}$
Students who are full-time for a semester will pay half of these fees for that semester.

## Part-Time Students

per six credit course - Canadian
$\$ 996.00$
per three credit course - Canadian
\$498.00
per six credit course - Non-Canadian
\$1992.00
per three credit course - Non-Canadian
$\$ 996.00$

### 4.1.3 Overload Fees for Full-Time Students

Full-time students who have permission to take course overloads (see Academic Regulations) may take up to 18 credits per semester without being charged additional tuition. However, students taking more than 15 credits in a semester will be charged additional tuition fees if any of their credits are for Continuing and Distance Education courses. All full-time students will be charged additional tuition fees for credits over 18 in a semester and for any auditing fees for credits over 18 in a semester.

### 4.1.4 Auditing Fees and Tuition for Senior Citizens

Courses may be audited for half the normal tuition. Special tuition discounts are available for senior citizens. Further information is available from the Office of Student Services.

### 4.1.5 Mail Service Fee

All full-time students must have a University mail box and pay a $\$ 7.50$ non-refundable mail service fee per semester. Part-time students may also receive mail service by paying the fee.

### 4.1.6 Student Organization Fees

The per semester student organization fees for full-time students, other than Graduate students and Exchange Students are listed below. Such fees payable in the fall term are not refundable after September 30. In the winter term they are not refundable after January 31.

## Mount Allison Students' Union Membership Fees * \$53.00 <br> Argosy (student newspaper) ${ }^{*} \quad \$ 10.50$ <br> CHMA (student radio) ${ }^{\star} \quad \$ 15.00$

* The above rates are subject to change for the 2003-04 Academic year.


### 4.1.7 Other Fees

The following fees are payable at the time of request:

| Application for full-time admission | $\$ 40.00$ |
| :--- | ---: |
| Application for part-time admission | $\$ 20.00$ |
| Replacement mail key (HST included) | $\$ 10.00$ |
| Replacement residence key (HST included) | $\$ 10.00$ |
| Supplemental examination | $\$ 50.00$ |
| Special examination | $\$ 50.00$ |
| Examination re-read | $\$ 25.00$ |
| Diploma replacement (HST included) | $\$ 50.00$ |
| Permission slip | $\$ 25.00$ |
| Transcript - 1st copy | $\$ 5.00$ |
| Transcript - additional copies ordered at same time | $\$ 3.00$ |
| ID card replacement (HST included) | $\$ 23.00$ |
| Returned cheque handling charge | $\$ 35.00$ |
| Correspondence course extensions | $\$ 30.00$ |

### 4.1.8 Field Work Travel Expenses

Travel expenses incurred during the course of field work (eg. accommodation, travel, meals, etc.) within prescribed courses (eg. Geography, Biology, Fine Arts, etc.) will be the responsibility of the individual student. These costs must be paid to the Office of Student Services prior to the trip as per the payment schedule provided by the faculty member.

### 4.1.9 Residence Communications and Meal Plan Fees

Residence communications and meal plan fees are set in May by the Mount Allison Board of Regents. Fees will also be posted on the University web site at
[http://www.mta.ca/administration/sas/](http://www.mta.ca/administration/sas/). Inquiries should be directed to the Office of Student Services. The following are the

2002/03 room communications and meal plan fees for the full academic year. They are subject to change for the 2003/04 academic year.

## Room

| Double | $\$ 3,140.00$ |
| :--- | ---: |
| Single | $\$ 3,690.00$ |
| Super-single | $\$ 3,890.00$ |
| Communications Fee | $\$ 280.00$ |

All students living in residence will be charged the communications fee. This provides for local phone, cable television, and internet connection services.

## Meals

$$
\begin{array}{ll}
19 \text { meals per week } & \$ 2,920.00 \\
14 \text { meals per week } & \$ 2,870.00
\end{array}
$$

All students with a meal plan will be charged for the 19 meals per week plan. A credit of $\$ 50$ for transferring to the 14 meals per week plan will only be made until September 30. For more information please check with Sodhexo Food Services.
With the exception of students housed in the Language House, all students living in residence must purchase one of the above meal plans.

### 4.2 DEPOSITS FOR FULL-TIME STUDENTS

### 4.2.1 Registration Deposits for New Students

A non-refundable $\$ 100$ Registration Deposit is due by May 14, or such later date as may be specified in the offer of admission. The date this deposit is received or post-dated, whichever is later, determines the position on the room selection list. Late payment may delay registration until September. See section 4.4.1 The Registration Deposit will be applied against second term tuition fees and will be forfeited if a student is registered in January but fails to attend classes or notify the university in writing of withdrawal from the University.

### 4.2.2 Residence Deposits for New Students

A $\$ 500$ Residence Deposit for students who apply to live in residence is due by June 27. Residence accommodations are guaranteed if all deposits are received on time and all other deadlines are met. The Residence Deposit will be applied against second term residence fees.

### 4.2.3 Refunds of Residence Deposits

A residence room can be cancelled prior to the beginning of the fall academic semester but only in writing addressed to the Office of Student Services, or by e-mail to [sas@mta.ca](mailto:sas@mta.ca) or by fax (506) 364-2272. If you cancel your residence room, a refund of the Residence Deposit will be made as follows: $\$ 500$ by June $27 \$ 200$ by July $18 \$ 150$ by August 22 no refund after August 22.

### 4.2.4 Registration Deposits for Returning Students

A non-refundable $\$ 100$ Registration Deposit is due by June 27. A late payment will result in a late processing fee being charged (see section 4.4.1) and may delay registration. The Registration Deposit will be applied against second term tuition fees and will be forfeited if a student is registered in January but fails to attend classes or notify the university in writing of withdrawal from the University.

### 4.2.5 Residence Deposits for Returning Students

A $\$ 500$ Residence Deposit for students who intend to live in residence is due by June 13. (The Residence Deposit will be applied against second term residence fees.) Late payment will result in an additional \$100 room holding fee. If both the Deposit and this additional fee are not paid by June 27, the University can no longer hold the student's room or guarantee any room in residence. Students who cancel their rooms before June 14 will be charged a $\$ 25$ room draw fee. Those who neither cancel their rooms nor pay their residence deposit by June 13 will be charged a $\$ 100$ room holding fee.
Depending on the date a residence room is cancelled, a refund of the Residence Deposit will be made as follows:

$$
\begin{aligned}
& \$ 475 \text { by June } 13 \\
& \$ 400 \text { by June } 27 \\
& \$ 200 \text { by July } 18 \\
& \$ 150 \text { by August } 22 \\
& \text { no refund after August } 22
\end{aligned}
$$

## Students who wish to cancel their rooms for the fall but intend to have a room for the winter should contact the Office of Student Services.

### 4.2.6 Exchange Deposits

For students who have been accepted to one of the exchange programmes offered by Mount Allison a non-refundable $\$ 125.00$ Exchange Deposit is due by April 15. This deposit is in addition to the Registration Deposit required in 4.2.4

### 4.2.7 Registration Deposits for January Admissions (New and Former Students)

A non-refundable $\$ 100.00$ Registration Deposit is due November 28, or such later date as may be specified in the offer of admission

### 4.2.8 Residence Deposits for January Admissions (New and Former Students)

For students wishing to enter residence in January, a $\$ 250$ Residence Deposit must be paid by November 28. Refunds of this deposit will be made as follows:
$\$ 250$ by November 28
$\$ 100$ by December 12
No refund after December 12

### 4.3 PAYMENT OF FEES

### 4.3.1 Payments and Charges

Payments must be received by the University, not post-marked, by the dates specified in section 4.3.3 and below. To avoid problems created by postal service delays, please forward payments well in advance of their due dates. Cheques may be post- dated to the due dates.

### 4.3.2 Fall and Winter Payments by Part-Time Students

All fees for courses taken in the fall or winter semester are due and payable at the time of registration.

### 4.3.3 Fall Payments by Full-time Students

The fall semester payments due September 17, are in addition to the deposits listed.
The amount of the September payment will be included on the Payment Calculation Form which will be sent to all students with the Registration package. In the situations outlined in section 4.3.7 only, payments may be made that are less than these amounts. Registered students may view their accounts through WebSIS at [https://websis.mta.ca](https://websis.mta.ca).
University services may be revoked if by the fall payment due date either 1) the correct fall payment has not been received, or 2 ) late payment arrangements have not been approved. See section 4.4.2. Therefore, please forward your payments well in advance of their due dates, and if you cannot make your full payment on time please consult as early as possible before the due date with a) the Financial Aid Officer in the Office of Student Services, if payment is delayed by the Canada Student Loans Programme or b) the General Accountant in Financial Services if payment is delayed for other reasons.

### 4.3.4 Winter Payments by Full-time Students

All amounts pertaining to the winter semester are payable by January 14. Students are encouraged to leave post-dated cheques in the drop box, located outside the Office of Student Services on the first floor of Centennial Hall, before leaving campus in December. Alternatively, students may pick up a Bank Payment Remittance Forms from the Office of Student Services so they can make their payments at any Chartered Bank in Canada. Detailed statements of account based on winter registration information will be sent to students during the fall semester indicating the account balance which must be paid in January. Students admitted to the University beginning in January will be advised upon registration of the amount owing. The winter fees for students may change if courses are added or dropped after statements are prepared in the fall and before the due date for winter payments. Registered students may access their accounts through WebSIS at [https://websis.mta.ca](https://websis.mta.ca).
University services may be revoked if by the winter payment due date either 1) the correct winter payment has not been received, or 2) late payment arrangements have not been approved. See section 4.4.2. Therefore, please forward your payments well in advance of their due dates, and if you cannot make your full payment on time please consult as early as possible before the due date with a) the Financial Aid Officer in the Office of Student Services, if payment is delayed by the Canada Student Loans Programme or b) the General Accountant in Financial Services if payment is delayed for other reasons.

### 4.3.5 Fall and Winter Payments for Students Participating in Exchange Programmes

## Fall Payments - Strasbourg Programme

For students participating in the Strasbourg exchange programme the fall payment is due and payable September 2. The amount of the fall payment will be the tuition for the fall semester plus the residence fee for the full year.

## Fall Payments - Zhejiang

For Mount Allison students participating in the Zhejiang exchange programme the fall payment is due and payable September 2.

## Fall Payments - All Other Exchange Programmes

For all other exchange programmes the fall payment is due and payable September 17. The amount of the fall payment for outgoing Mount Allison students will be the tuition for the fall semester. Students who live in residence while participating in the exchange programme will be obliged to pay the residence fees to the host university.

## Winter Payments

For all Mount Allison students participating in exchange programmes the winter payment will be due and payable January 14. The amount of the winter payment will be the tuition for the winter semester.

## In-coming exchange students

In-coming exchange students who will be staying in Mount Allison residences should contact the Office of Student Services for information on their residence and meal plan financial commitments, and their fee payment deadlines

### 4.3.6 Method of Payment

In order to improve service to students by avoiding line ups, the University strongly suggests that students use methods of payment other than payments in person.
Cheques, bank drafts or money orders, made payable to "Mount Allison University", can be mailed to the Office of Student Services or placed in the drop box located outside that office on the first floor of Centennial Hall. Fees may also be paid through telephone banking or on-line services. For information please contact your bank. Students may also make payments at any Chartered Bank in Canada but only if the payment is accompanied by the Bank Payment Remittance
Form. Forms are available from the Office of Student Services. Due to the costs involved for the University, and ultimately for its students, payments by credit card are not accepted.

### 4.3.7 Reducing the Amount of Payments

There are three circumstances in which students can reduce the amount of the above payments. The first is when students who have been awarded Mount Allison scholarships and bursaries; please refer to the offer letter for information regarding disbursement. The second is when students have proof of the amount of the Canada Student Loan they will receive. The third is when students have an external sponsor who will be invoiced by the University; this category does not include external scholarships and bursaries.
To reduce the amount of the above payments, students must complete a Payment Calculation Form and attach the required documentation. If after completing this form a payment is due to the University students must include a completed form and documentation with their payments. If no payment is due students must still include the completed form and documentation to the Office of Student Services. When the amount paid has been reduced because students will receive a loan from the Canada Student Loans Programme or have external sponsorships, temporary registration status will be granted. It is the student's responsibility to ensure that government or sponsorship funding is received by the University by September 30 or January 31, as the case may be. If the University has not received the funds by these dates, students must make temporary financial arrangements through some other source to meet their financial obligations to the

University or contact the Financial Aid Officer in the Office of Student Services to discuss bridge financing.

### 4.4 LATE FEES AND INTEREST CHARGES

### 4.4.1 Late Registration Deposit Processing Fee

A $\$ 50$ late payment processing fee will be charged if the University does not receive the Registration Deposit from returning students by the due date.

### 4.4.2 Services Reinstatement Fee

University services may be revoked in the case of dishonoured payments or failure to meet the defined payment schedule. Students wishing to have their services reinstated, including reinstatement of their academic programme, will be charged a services reinstatement fee of $\$ 100$.

### 4.4.3 Interest Charge

Interest will be applied to outstanding balances at the rate of $1.5 \%$ per month.

### 4.4.4 Appeals of Academic Standing

Letters of appeal from students appealing their academic standing at the end of the academic year will only be forwarded to the Admissions and Re-admissions Committee for consideration if there are no outstanding fees payable on the students' accounts.

### 4.5 WITHDRAWALS AND STUDENT ACCOUNTS

### 4.5.1 Academic Withdrawals

## Absence from classes does not constitute withdrawal.

Full-time students who wish to withdraw from the University must begin the process with the Dean of Students located in the Student Life Office, University Centre. Withdrawal is not effective until the Dean of Students has approved the withdrawal request. The date of withdrawal for the purpose of fee administration will be the date this approval is given.
Full-time and part-time students who wish to withdraw from one or more courses must submit a completed "Change of Registration" form to the Office of Student Services. The date of withdrawal for the purpose of fee administration will be the date this form is received. There will be no fee charged for courses dropped within the first week of classes. For withdrawals after the first week of classes, fees will be calculated as $15 \%$ of the tuition for the semester times the number of weeks since the first day of classes. Full tuition is charged for withdrawals after the sixth week of classes.
Students changing from full-time to part-time status should contact the Office of Student Services regarding their fee obligations.
Withdrawals from non-credit courses will be assessed on a per course basis depending on the nature and duration of the course.
Any inquiries regarding the calculation/proration of tuition fees on academic withdrawal should be directed to the Office of Student Services.

### 4.5.2 Academic Withdrawals (Distance Education Courses)

Refunds are calculated from the date that written, faxed or e-mailed notification of withdrawal is received by the Office of Student Services. Full time students who wish to withdraw from a correspondence course that is part of their full time course load and for which they have not paid an additional fee over full time tuition, will only be eligible for a refund if their status changes to part time. These students should contact the Office of Student Services regarding their eligibility for a credit.
All refunds are calculated from the date that students register for a correspondence course and the date that the request for withdrawal is received by the Office of Student Services. Fee credits will be calculated as the tuition fee paid for the course minus $15 \%$ times the number of weeks including the week of withdrawal, since the student registered for the course. A two week grace period is given to distance education students to take into account the fact that materials often need to be sent to them before they can be expected to begin a course. There is no credit (refund) given 8 weeks after the student has registered in a correspondence course. ( 8 weeks includes two weeks grace period). Refunds will not be given to students who do not adhere to these deadlines.

### 4.5.3 Residence and Meal Plan Withdrawals

Students wishing to withdraw from residence and/or the meal plan must begin the process with the Dean of Students located in the Student Life Office, University Centre. Withdrawal is not effective until the Dean of Students has approved the withdrawal request. The date of withdrawal for the purpose of fee administration will be the date this approval is given, or the date students have checked out of residence and meal cards and keys have been returned, which ever is later.
The student's account will be adjusted to reflect residence and/or meal plan charges as follows:

## Month of withdrawal:

September
October
November
December
January
February
March
April
$40 \%$ of the full year cost $50 \%$ of the full year cost $60 \%$ of the full year cost $70 \%$ of the full year cost $80 \%$ of the full year cost $90 \%$ of the full year cost $97 \%$ of the full year cost
$100 \%$ of the full year cost

Students entering residence and/or meal plan for one semester will have their accounts adjusted to reflect residence and/or meal plan charges as follows:

## Month of withdrawal, as determined above:

September or January
October or February
November or March
December or April
$50 \%$ of semester cost $75 \%$ of semester cost 95\% of semester cost $100 \%$ of semester cost

Students who decide during the Christmas break not to return to the University in January must so advise the University by December 31 to be treated for fee purposes as a December withdrawal. This may be done even if University offices are closed by e-mail to [sas@mta.ca](mailto:sas@mta.ca),
or by leaving a voice mail message at the Office of Student Services; phone 506-364-2279, or with the Dean of Students; phone 506-364 2255. Any student who wishes counselling before making this decision should so inform the Dean of Students by December 31, by voice mail if University offices are closed.
Students entering residence and purchasing meal plans in the middle of a semester who subsequently withdraw should contact the Office of Student Services regarding their charges for the semester. Any inquiries should be directed to the Office of Student Services.

### 4.5.4 Payments to Students from their Accounts

Payments will only be made to students from their accounts with the University if, and to the extent that, their accounts have a credit balance. Students may forfeit a scholarship or bursary from Mount Allison if they do not complete the academic year and this may affect whether there is a refund on withdrawal and the amount of any such refund. Furthermore, if any portion of a student's fees was paid by Canada Student Loan Programme, the University is obliged to remit any refund upon withdrawal to the Canada Student Loan Programme, or student's bank, for credit towards their government student loan.

### 4.5.5 Required to Withdraw

Students required to leave the University or its residences for failing to meet the required payment schedule, or for academic or disciplinary reasons, will be required to complete the withdrawal process and will be responsible for the charges detailed in sections 4.5.1, 4.5.2, and 4.5.3.

## 5 FINANCIALASSISTANCE

### 5.1 SCHOLARSHIPS

Mount Allison is well known for its scholarship programme, resulting primarily from the generosity of numerous benefactors.

### 5.1.1 Eligibility

The University awards scholarships to entering students for academic achievement. Students need not apply for these scholarships, as consideration for scholarship eligibility is automatic and part of the Admissions process. All students who have financial need are urged to apply for the Sharp and Goodridge scholarships which are based on academic achievement and financial need by completing Section C of the application form. The deadline for application for the September 2003 session is March 15.

### 5.1.2 Entrance Scholarships

Scholarships awarded to entering students are tenable as long as the student is carrying a full course load, and all other conditions of the award are fulfilled. Some scholarships are renewable if stated in the scholarship offer.

### 5.1.3 The Bell Scholarship

The Bell Scholarship is an entrance scholarship that was established in 2002 as the premier entrance scholarship at Mount Allison. It was established to perpetuate the memory of the Bell Family and their significant contributions to Mount Allison. The scholarship celebrates students who have demonstrated strong academic ability, leadership potential, volunteer work, extracurricular activities, work experience and good citizenship. Students interested in this scholarship must submit their completed application form by March 15th, following the criteria outlined on the Mount Allison application for admission form.

### 5.1.4 Scholarships for Returning Students

All students who attend Mount Allison will be considered for scholarships after their first year of study. These scholarships will be awarded annually to the very best students enrolled in a full course load in each faculty.

### 5.2 BURSARIES

The Mount Allison bursary programme provides assistance to full-time and part-time students who demonstrate financial need and who have exhausted all other avenues of support. Prior to applying for a Mount Allison bursary, applicants should apply to their Province or Country of residence for financial aid. Bursaries are awarded on the basis of financial need to students who have made satisfactory academic progress. Students needing assistance are encouraged to obtain an application form early in the semester. Application forms are found on the web under the Office of Student Services at
[http://www.mta.ca/sas/](http://www.mta.ca/sas/).

### 5.2.1 Entrance Bursary Programme

Mount Allison's Entrance Bursary Programme has been established to offer assistance to students who have financial need in order to provide access to post-secondary education and to help them successfully
complete their studies within a reasonable time period. Bursaries "are determined based on financial need and are intended to supplement, but not replace, the student's own resources and the resources of the applicant's immediate family." Financial need is established when a student can demonstrate that his/her expenses exceed his/her resources. This financial aid component was developed and implemented in 2001. It has been designed to help entering students with exceptional financial need who show academic promise. Students are encouraged to send in their completed entrance bursary application prior to mid-April in order to be considered.
Students must first be accepted for admission at Mount Allison before his/her Entrance Bursary application is processed.
To maintain their eligibility, students must also apply to their province for a student loan.
Students starting in January are not eligible for this award.

### 5.3 PRE-THEOLOGICAL BURSARIES

Various forms of financial assistance are available to students at Mount Allison who intend to study theology and enter some form of Christian Ministry.

### 5.3.1 The Mount Allison Theological Fund

The Mount Allison Theological Fund is administered by the Pre-Theological student advisor and is used in a variety of ways for the benefit of pre-theological students. Monies from the fund are available to students in the form of loans and bursaries. Various denominations provide assistance to students in Arts who intend to study for some form of Christian ministry. Information can be obtained from the Pre-Theological student advisor. In addition, some theological schools offer scholarships and bursaries to students in Arts who undertake to study theology at the theological school concerned. Pine Hill Divinity Hall (the United Church component of the Atlantic School of Theology) offers grants to students preparing for the ministry in the United Church. Students must commit themselves to taking full courses in Theology at the Atlantic School of Theology and plan to work for at least two years thereafter for the United Church of Canada. Students who do not fulfill these conditions are expected to arrange for repayment of monies received.

### 5.3.2 Application Procedure

Advanced applications are not necessary for Pre-Theological bursaries, but students who wish to avail themselves of these funds should contact the Pre-Theological student advisor at the beginning of the academic year.

### 5.4 SPECIAL SUMMER SCHOLARSHIPS

Bell Junior Research Fellowships
Dr. Harold E. Bigelow Scholarship
Class of '46 Summer Scholarship
Crake Junior Research Fellowships
Petrocan Research Fellowships
Universitas Research Fellowships
Goodridge Summer Fellowships

### 5.5 THE DONALD A. CAMERON STUDENT LOAN FUND

Donald A. Cameron served this University as Registrar from 1959 to 1986, following a term as Assistant Professor of Education. He obtained a B.Sc. in 1950 from Mount Allison University. In 1952-53, he held a Lord Beaverbrook Overseas Scholarship and received a Diploma in English Educational Thought and Practice from the University of London in 1953. Upon his retirement as Registrar in 1986, and in recognition of his long and distinguished service, the University established the Donald A. Cameron Student Loan Fund from which students with financial need and good academic standing might be able to obtain assistance. Interested students may apply at the Office of Student Services.

## 6 ACADEMIC REGULATIONS

The following regulations apply to students in all undergraduate degree or certificate programmes. Students are responsible for knowing and adhering to these regulations as well as to the regulations pertaining to their particular programmes.

### 6.1 REGISTRATION PROCEDURES

### 6.1.1 Registration Deadline

All full and part-time students must register each year, according to procedures and time frames supplied by the Office of Student Services. Failure to do so results in a financial penalty and possible denial of registration in certain courses. In September and in January no students may register after the first two weeks of classes following registration, unless allowed on presentation of a medical certificate or on compassionate grounds approved by an Academic Dean.

### 6.1.2 Pre-Registration

Some academic departments require pre-registration of returning students for courses in their departments. For further information, please consult Department Heads.

### 6.1.3 Graduating Under One Calendar

Students with continuous enrolment at the University may elect to graduate under any one calendar in force during their registration subject to the availability of courses. However, students returning after an interval of a year or more during which time there has been a change in the curriculum, will be governed by the calendar in force when they return. Where necessary, an Academic Dean will interpret the student's past record in terms of the new curriculum.

### 6.1. 4 Determining Year Level

Students must have earned 24 credits to register in second year, 54 to register in third year, and 84 to register in fourth year.

### 6.1.5 Normal Course Loads and Over Loads

Full-time students are expected to register for the equivalent of 30 credits in the September through April academic year, normally 15 credits per term.
a) Students in first year will not normally be permitted to register for more than 15 credits per term.
b) Students in years 2 and 3 may register for up to 18 credits per term, provided they have attained a GPA of at least 3.0 in the previous term. Students who do not meet this requirement must have permission from the appropriate Academic Dean in order to register for overload credits.
c) For students with fourth-year standing, no minimum GPA is required to register for up to 3 credits overload per term. The permission of the appropriate Academic Dean is required for registration above a 3 credits overload per term. Students in any programme may add ensemble credits in Music to a normal course load.
d) For overloads in excess of 6 credits ( 3 credits per semester) for the September through April academic year, additional fees will be charged.(see Fees section)

### 6.1.6 Introductory Courses

First-year students may select any courses introductory to a discipline for which they have the prerequisites. These will normally be numbered at the 1000 or 2000 level.

### 6.1.7 Repeating Courses

No student may take the same course more than three times or be examined in it more than four times.

### 6.1.8 Auditing Courses

Students admitted to the university who wish to audit a course must obtain written permission of the instructor before formally registering for the course. The instructor may deny permission to audit the course. The nature and degree of class participation must be clarified in advance and is at the discretion of the course instructor. Students auditing a course will not write final examinations or receive a grade for the course. The notation of 'AU' will be indicated on the transcript upon verification by the instructor that the student has completed the specified nature and degree of class participation. A course may not be changed from credit to audit or from audit to credit status after the last day of the change in registration period. Registration and withdrawal deadlines apply to audited courses. Fees are payable as indicated in the Financial Information section of the calendar.

### 6.2 CHANGES IN REGISTRATION/PROGRAMMES

### 6.2.1 Deadline for Registration Changes

Registration changes are allowed for 3 credit courses during the first week of classes of either term or for 6 credit courses during the first two weeks of first term. Application must be made to the Office of Student Services.

### 6.2.2 Withdrawal Without Penalty

All students registered during the regular academic session may withdraw without academic penalty from a three credit course before the end of the eighth week of classes and from a 6 credit course before the end of the second week of classes in the second term. The withdrawal deadline for a full year 3 credit course is the same as for a 6 credit course. To withdraw from a course a student must submit written notification to the Office of Student Services. "W" will be recorded on the transcript.
In all courses, work worth at least $20 \%$ of the final grade will normally be evaluated and returned to students before the withdrawal date for the course. Exemptions from the policy must be authorized by the appropriate Academic Dean.

### 6.2.3 Withdrawal After the Deadline

A student who wishes to withdraw after the deadline because of illness or other sufficient reason may apply to the appropriate Academic Dean for a "W" designation.

Any student who does not withdraw from a course in accordance with these regulations must remain registered in the course for the remainder of the term and will receive a grade.

### 6.2.4 Changing Programmes

A student wishing to transfer from one programme to another must apply to the Office of Student Services for a transfer, not later than APRIL 15. For students applying for transfer to Commerce, the deadline is APRIL 15 of their second year of study. For students applying for transfer to Music, the deadline is MARCH 1. For a student applying for transfer to Fine Arts, the deadline is APRIL 1. Request for Change of Degree Programme forms are available on the web at [http://www.mta.ca/administration/sas/form.html](http://www.mta.ca/administration/sas/form.html).

### 6.3 CONTINUINGAND DISTANCE EDUCATION

### 6.3.1 Continuing and Distance Education Courses as Part of a Normal Course Load

Full-time students registered at the Sackville campus are permitted to take up to 6 credits as part of a 30 credit course load through the Department of Continuing and Distance Education only if they have an unavoidable timetable conflict or other reason acceptable to an Academic Dean. The Academic Dean's written approval is required. Students will not be charged any additional fee for these credits. These courses MUST be completed by the end of the academic year (April), and under no circumstances can they be extended into the Spring session.

### 6.3.2 Continuing and Distance Education Courses as Overload

Full-time students registered at the Sackville Campus, who register for additional credits (i.e. more than 30) which have been approved in writing by an Academic Dean to be taken through the Department of Continuing and Distance Education, will be charged additional fees. (see Fees section 4.1.3).

### 6.3.3 Spring Intersession and Summer Course Loads

Students in Good Standing may register for a maximum 6 credits offered through the Department of Continuing and Distance Education in each of the Spring Intersession and Summer sessions for a maximum total of 12 credits. Exceptions must be approved in writing by an Academic Dean.

### 6.3.4 Withdrawal from Spring/Summer Session Courses

Students registered during spring or summer sessions may withdraw without academic penalty from a 3 credit course before the end of the third week of classes and from a 6 credit course before the end of the fourth week of classes. Students wishing to withdraw from these courses must notify the Office of Student Services in writing. "W" will be recorded on the transcript.

### 6.3.5 Distance Education Course Deadlines and Extensions

Full-time students who register for Distance Education (correspondence) courses as part of their course load during the September through April academic year MUST complete them BY THE END OF THE ACADEMIC YEAR (April) and under no circumstances can they be extended into the Spring session. Students who register for summer session Distance Education (correspondence) courses must complete them by September. Extensions to this deadline can be granted only by the Director of Continuing and Distance Education or by an Academic Dean. If approval is granted, additional fees will be charged.

### 6.3.6 Withdrawal from Distance Education Courses

Full-time students registered in a course offered through Distance Education (correspondence) as part of their course load during the September through April academic year must follow the registration and withdrawal deadlines indicated in 6.2.1 and 6.2.2.
All other students registered in a 6 or 3 credit course through correspondence may withdraw without academic penalty provided that:
a) such withdrawal occurs before not more than half the normal time limit for the course has elapsed AND
b) no more than half the course work has been completed. Students wishing to withdraw from a six or three credit course through correspondence must notify the Office of Student Services in writing. " W " will be recorded on the transcript.

### 6.4 ADVANCED PLACEMENT

Students who have received credit in a subject and who propose to register for a further course in that subject must at registration determine placement in consultation with the department concerned. Placement may be granted without credit. In cases of doubt applicants may be required to write one or more examinations upon entering the University.

### 6.5 TRANSFER CREDITS

### 6.5.1 Students Transferring from another Institution

Students transferring from recognized institutions may be considered for admission with advanced standing. Such students may receive credits for courses previously completed as determined by the Registrar in consultation with the appropriate Academic Department or Academic Dean. Credit will only be granted if the course(s) count on a programme at the original institution AND can be applied to programmes offered by Mount Allison. Transfer credit will normally be granted fro courses with passing grades for which credit has been earned. However, students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained. Transfer credits are recorded on the transcript with credit value only, no grade is recorded and they are excluded from the Grade Point Average. A maximum of 60 transfer credits may be credited toward a degree from Mount Allison. (See also Regulation 6.6.2 regarding transfer credit limitations). Students transferring credits from another institution must provide the following:
a) an official transcript pertaining to the credits, submitted directly to the Office of Student Services by the institution concerned.
b) detailed course descriptions from the transferring institution's calendar. (Notarized English translations should be included if applicable)

### 6.5.2 Taking Courses at another Institution

Students planning to take courses at another university for Mount Allison credit must first obtain the Registrar's approval, by completing an application for a Letter of Permission, available on the web at [http://www.mta.ca/administration/sas/form.html](http://www.mta.ca/administration/sas/form.html). If approval is granted, a Letter of Permission will be issued on payment of the requisite fee. A passing grade may be accepted for transfer credit, however students must obtain a grade of at least C- in all courses used to fulfil prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

### 6.6 DEGREE REQUIREMENTS

### 6.6.1 Credits Required for a Degree

All undergraduate degrees require completion of 120 credits.

### 6.6.2 Additional Requirements

Students must complete at Mount Allison at least half the credits required for a degree. Third and fourth year courses will normally be completed at Mount Allison.

### 6.7 DEGREE WITH DISTINCTION REQUIREMENTS

The degrees of Bachelor of Arts, Bachelor of Science, Bachelor of Commerce, Bachelor of Fine Arts and Bachelor of Music will be awarded with Distinction at the discretion of the Senate. To be considered for Distinction, a student should have maintained a Cumulative Grade Point Average (CGPA) of approximately 3.7 in all work undertaken at the University.

### 6.8 HONOURS DEGREE REQUIREMENTS

### 6.8.1 Total Credits

All degrees with Honours consist of at least 120 credits completed beyond the secondary school level. All candidates for these degrees must meet the average requirements outlined below.

### 6.8.2 Honours GPA and Overall GPA Requirements

A degree with First Class Honours requires attainment of a 3.7 Cumulative Grade Point Average in the prescribed Honours work; a degree with Honours requires attainment of a 3.0 Cumulative Grade Point Average in the prescribed Honours work. Unless a specific statement indicating otherwise appears after the Honours programme description, all courses specified in the programme are included in the calculation of the Honours average. When a thesis is part of the programme, a minimum grade of " B " is required in all cases. In addition, a cumulative Grade Point Average of approximately 3.0 must be earned by all Honours candidates on all work undertaken beyond the first year at Mount Allison. For those in full-time attendance at Mount Allison
for three years or fewer, this average will be calculated on all Mount Allison courses taken.

### 6.8.3 Submitting a Thesis

Bound copies of an Honours student's thesis must be submitted to the supervisor no later than the first day of the final examination period.

### 6.8.4 Falling Short of the Honours Requirements

Students failing to achieve the minimum standard for Honours as defined in 6.8.2, but who otherwise have satisfactorily completed all of the courses in the prescribed curriculum, will be awarded a degree in the Major area of study.

### 6.9 SECOND UNDERGRADUATE DEGREE REQUIREMENTS

Students who hold one undergraduate degree from Mount Allison may apply for re-admission to be a candidate for a second different undergraduate degree under the following regulations:
a) the student should have demonstrated strong academic ability and must be approved by an Academic Dean.
b) the student must fulfill all the requirements for the second degree
c) the student must complete at least 36 additional credits, beyond those required for the first degree. Students who wish to complete the requirements for two different Bachelor's degrees at the same time must apply to the appropriate Academic Dean for approval.

### 6.10 HONOURS CERTIFICATE

Recipients of a first degree from Mount Allison earned with a Cumulative Grade Point Average of approximately 3.0 in both the last three years of the degree programme and in the intended Honours discipline may apply to an Academic Dean to return as a candidate for an Honours Certificate. Application forms are available on the web at: [http://www.mta.ca/administration/sas/form.html](http://www.mta.ca/administration/sas/form.html)

### 6.11 GRADING SYSTEM

### 6.11.1 Grading Policies for Courses

In the first week of classes at the beginning of each academic term instructors shall provide each student in their courses with written information indicating the policy concerning assignments, tests, final examination, practical and laboratory work, class participation, attendance and supplemental examinations. The same information shall also be provided to the Department Head and the appropriate academic Dean.

### 6.11.2 Deadline for Course Work

Course work must be completed prior to the deadline for submission of the final grades.

### 6.11.3 Letter Grades and their Meanings

Letter grades are assigned. These grades, with descriptors and Grade Point Average equivalents as applicable, are as follows:

| Letter Grade | Descriptor | GPA Equivalent |
| :--- | :--- | :--- |
| A+ | Outstanding | 4.3 |


| Letter Grade | Descriptor | GPA Equivalent |
| :---: | :---: | :---: |
| A | Excellent | 4.0 |
| A- | Very Good | 3.7 |
| B+ |  | 3.3 |
| B | Good | 3 |
| B- |  | 2.7 |
| C+ |  | 2.3 |
| C | Satisfactory | 2.0 |
| C- |  | 1.7 |
| D+ | Conditional | 1.3 |
| D | (non-continuing) Pass | 1.0 |
| D- |  | 0.7 |
| F | Failure | 0.0 |
| FE | Failure; eligible to write a supplemental examination | 0.0 |
| P | Results reported on Pass/Fail basis (Supplemental/Special Exams, Transfer credits) | excluded from the GPA |
| CP | Conditional Pass - may not be used to fulfill prerequisite requirements | excluded from the GPA |
| Other | Descriptor | GPA Equivalent |
| Notations |  |  |
| AU | Audit | excluded from the GPA |
| CIP | course in progress | excluded from the GPA |
| CTN | continuing, full year course, final grade recorded in 2nd term |  |
| DE | Course results deferred | excluded from the GPA |
| E | Exemption from a course | excluded from the GPA |
| INC | Incomplete | 0.0 |
| W | Withdrawal from a course after course drop deadline, without academic penalty | excluded from the GPA |
| X | withdrawal from University | excluded from the GPA |
| * | indicates repeated course |  |

Note: A grade of $\mathrm{D}(\mathrm{D}+, \mathrm{D}, \mathrm{D}-)$ in any course will be considered a conditional (non-continuing) pass. In order for a course to be used to fulfill prerequisite requirements, a grade of C- or better must be obtained. Otherwise, written permission of the appropriate Department of Programme Coordinator must be obtained.

### 6.11.4 Grades Excluded from GPA

Results from Supplemental and/or Special Examinations are reported on a Pass/Fail basis and are excluded from Grade Point Average calculations. Transfer credits are excluded from the Grade Point Average.

### 6.11.5 Calculation of GPA and CGPA

A Semester Grade Point Average is calculated at the end of each term by dividing the total number of grade points obtained during the term (credit hours x grade points) by the number of credit hours attempted
per term. A Cumulative Grade Point Average is calculated at the end of each year by dividing the total number of grade points obtained on all courses (credit hours x grade points) by the total number of credit hours attempted.

### 6.11.6 Repeated Courses and CGPA

In the event that a course is repeated, only the higher grade will be used in the Cumulative Grade Point Average calculation and in calculating the total number of credit hours used for the Cumulative Grade Point Average calculation. In the event that a course is repeated by transfer credit, the transfer credit is excluded from Cumulative Grade Point Average calculations, but the failed attempt(s) that the transfer credit replaces will also be excluded from the Cumulative Grade Point Average calculations. All results from attempts at a course will remain on the transcript.

### 6.11.7 Reporting of Grades

Results are reported to students following each examination period, but grades are not released until all accounts with the University have been paid. "Posting" of student grades is prohibited.

### 6.11.8 Re-evaluation of a Grade

After final grades are released by the Office of Student Services, a student may apply in writing to that office for re-evaluation of a grade. The student may ask for a re-read of the final examination and/or any written material not returned to the class before the last day of the final examination period of the term in which the course is concluded. This request must specifically state what material is to be re- evaluated. The calculation of the final grade will be reviewed and the material in question will be re-read by the faculty member concerned as well as by another faculty member designated by the Department Head. If there is serious disagreement between the two readers, the Department Head, or Academic Dean where appropriate, will then review the material under re-evaluation. If the final mark is based on performance not evaluated by written material, the re-read by both participants will be confined to a review of the mark sheets compiled by the original instructor. Students should remind themselves of the value of these items in relation to the overall course mark before determining whether it is worthwhile to apply for a re-read.

### 6.11.9 Application for Re-Read

A student may request a re-read within 40 days of the release of final grades by the Office of Student Services. The results of the re-read will normally be conveyed to the student within 30 days of receipt of the application. Students should remember that a grade can be revised upwards or downwards. A fee must be submitted with the application (see the Financial Information section near the front of the calendar). If the grade is revised upwards, the fee will be refunded. Application forms are available on the web at:
[http://www.mta.ca/administration/sas/form.html](http://www.mta.ca/administration/sas/form.html).

### 6.11.10 Evaluating Written Work

Evaluation of students' written work includes evaluation of the quality of the written English as well as of the subject material.

### 6.11.11 Aegrotat Standing

Aegrotat Standing (pass standing granted for medical reasons, although all course requirements have not been completed) may be granted in certain exceptional cases by Senate.

### 6.12 STANDARDS OF PERFORMANCE

### 6.12.1 Assessment of Academic Standing

All references regarding standards of performance requirements are related to work attempted during the September through April academic year. When students have attempted at least 18 credits, they will be assessed at the end of that academic year.

### 6.12.2 Good Standing

Students remain in Good Standing if they pass 18 credits and attain a minimum grade point average (GPA) of 1.5 . Note: Students must be in Good Standing and have permission of the university for study abroad programmes in which the University participates. Note: Students must be in Good Standing if they wish to apply for a Letter of Permission to take courses at another institution or to register for courses offered by Mount Allison in the Spring and Summer Sessions through Continuing and Distance Education. Exceptions must be approved by the Academic Dean.

### 6.12.3 Unsatisfactory Standing

Students whose academic performance is such that they fail to achieve Good Standing will be placed on Academic Probation, Academic Suspension or Academic Dismissal. Students in these categories are in Unsatisfactory Academic Standing and the designated category will be recorded on their transcripts. Students on Academic Suspension or Academic Dismissal will be notified in a letter from the Chair of the Admissions and Re-admissions Committee of their academic standing and the procedures and deadlines for appeal. Those students seeking re- admission to the University must apply in a letter addressed to the Chair of the Admissions and Re-admissions Committee to be received by the Office of Student Services by the deadline specified (see 6.12.7 Procedures for Appeals and Re-Admissions). Letters of appeal for re-admission received after the deadline will not be considered by the Admissions and Re-admissions Committee. Note: A Letter of appeal will only be forwarded to the Admissions and Re-admissions Committee for consideration if there are no outstanding fees payable on the student's account (see 4.4.5 in the Fees section).

### 6.12.4 Academic Probation

Students who have been in Good Standing will be placed on Academic Probation if they:
a) pass fewer than 18 credits but obtain a grade point average (GPA) of at least 1.0, or
b) pass 18 or more credits but with a grade point average (GPA) of less than 1.5 .
With the exception of those in their senior year, students who are on Academic Probation are not permitted to register for more than the normal course load. To return to Good Standing, students on Academic Probation must pass 18 credits in their probationary period, and attain a minimum grade point average (GPA) of 1.5. Students on Academic Probation must obtain written permission from the Academic Dean to be eligible to apply to take courses on Letter of Permission during
the probationary period or to register for courses offered by Mount Allison through Continuing and Distance Education, including those offered during the Spring and Summer Sessions.

### 6.12.5 Academic Suspension

Students will be placed on Academic Suspension if in any academic year they pass fewer than 18 credits and obtain a grade point average (GPA) of less than 1.0. Students who are on Academic Probation will be placed on Academic Suspension if they obtain a grade point average (GPA) of less than 1.5 or pass fewer than 18 credits. Students on Academic Suspension may not register for any Mount Allison courses nor receive credit at Mount Allison for courses taken elsewhere during the suspension period. Students may apply for readmission at the end of the period of Academic Suspension. If accepted, students will re-enter on Academic Probation. The period of Academic Suspension is one full year; however, the terms of Academic Suspension are effective until such time as the student applies for and is granted re-admission to the university. To seek re-admission for the study session commencing in September, students must complete a Former Student Application form and the Supplementary Questionnaire. These must be received by the Office of Student Services no later than June 15 of that year. Application forms are available on the web at:
[http://www.mta.ca/administration/sas/form.html](http://www.mta.ca/administration/sas/form.html).

### 6.12.6 Academic Dismissal

Students who incur a second academic suspension are dismissed for three years. During dismissal, they may not register for any courses offered by Mount Allison, nor receive credit at Mount Allison for courses taken elsewhere during the dismissal period. Students may apply for readmission at the end of the period of Academic Dismissal. The terms of Academic Dismissal are effective until such time as the student applies for and is granted re-admission to the university. To seek re-admission for the study session commencing in September, students should complete a Former Student Application form and the Supplementary Questionnaire. These should be received by the Office of Student Services no later than June 15 of that year. Students returning after dismissal will be readmitted on Academic Probation. If they fail to achieve Good Standing, they will be refused further registration at Mount Allison.

### 6.12.7 Procedures for Appeals and Re-admissions

Students who have been notified that their academic performance is such that they have been placed on Academic Probation, Academic Suspension or Academic Dismissal may appeal their academic standing. A Letter of appeal with all supporting evidence must be submitted to the Office of Student Services by the deadline specified in the notification. Letters of appeal, which will be reviewed by the Admissions and Re-admissions Committee, should clearly and completely outline the factors that accounted for poor academic performance and explain why the applicant feels ready to commence studies again. The appeal will be directed to the Admissions and Re- admissions Committee; should it be rejected by that Committee, the student will be informed of the grounds and deadline by which s/he may appeal the Committee's decision to the Re-admissions Appeals Committee, whose decision is final.

### 6.12.8 Disciplinary Suspension or Dismissal

Disciplinary suspension or dismissal may be imposed by the University Judicial Committee or Academic Judicial Committee for infractions of the student discipline code as outlined in the document "Policies and Procedures for Student Governance". To seek re-admission following disciplinary suspension or dismissal, for the study session commencing in September, students should complete a Former Student Application form and the Supplementary Questionnaire. These should be received by the Office of Student Services no later than June 15 of that year: the Admissions and Re-admissions Committee will review the academic record only. Application forms are available on the web at [http://www.mta.ca/administration/sas/form.html](http://www.mta.ca/administration/sas/form.html).

### 6.12.9 Deans' List

To be placed on the Deans' List, a student must carry thirty credits during the regular academic year (September through April) and achieve a minimum GPA of 3.5 on that work. The Deans' List carries no financial award.

### 6.13 ACADEMIC OFFENCES

### 6.13.1 Academic Dishonesty

All students at Mount Allison are expected to conduct themselves in an ethical manner in their academic work. It is the policy of the University that academic dishonesty will not be tolerated. The following offences constitute major instances of academic dishonesty, and are subject to discipline:
a) plagiarism or the deliberate misrepresentation of another's work, whether ideas, or words, or creative works, published or unpublished, as one's own;
b) submission of any work for credit for which credit has previously been obtained or is being sought in another course, without the prior express written consent of the appropriate instructor;
c) falsification of results in laboratory experiments, field trip exercises or other assignments;
d) use of unauthorized aid or assistance including copying in tests and examinations;
e) impersonation of another student in a test, examination or assignment or knowingly permitting another to impersonate oneself;
f) alteration or falsification of transcripts or other academic records or submission of false credentials;
g) unauthorized access, use, or alteration of computer data sets; unauthorized use of another's computer account; use of computer accounts for unauthorized purposes;
h) willful or negligent damage to the academic work of another member of the university;
i) interference with the academic processes of the university;
j) any other form of misrepresentation, cheating, fraudulent academic behaviour or other improper academic conduct of comparable severity;
k) knowingly helping another to engage in academically dishonest behaviour (including, but not limited to providing questions and/or answers to a test or examination, providing an essay, lab report, etc. which is subsequently plagiarized or submitted by another student as his/her own work.)

### 6.13.2 Allegations of Academic Dishonesty

a) All allegations of academic dishonesty will be reported to the Chair of the Academic Judicial Committee.
b) Academic dishonesty may be alleged by a course instructor, with respect to a course or courses taught by him/her. If the student admits the allegation, a sanction or sanctions will be imposed by the instructor, who will inform the Department Head, the Dean and the Chair of the Academic Judicial committee of both the charge and the sanction(s). If the student disputes the allegation, $\mathrm{s} / \mathrm{he}$ OR the instructor may request that the Academic Judicial Committee hear the case. If the student admits the charge, but disputes the severity of the academic penalty, s /he may appeal to the Department Head and /or Academic Dean.
c) Academic dishonesty may be alleged by a member (or members) of the university community other than a course instructor (e.g. invigilator(s) in examinations, other students, Computing Services staff, etc.). If the allegation involves a course, it will be referred to the course instructor, who will follow procedures as in 6.13 .2 (a) and (b). If the allegation does not involve a specific course or courses, it will be referred to the appropriate Academic Dean(s), who will report it to the Chair of the Academic Judicial Committee and act as plaintiff(s). The Academic Judicial Committee will hear cases reported by the Academic Dean(s) and will determine sanctions if the charge is upheld.
d) All decisions of the Academic Judicial Committee may be appealed to the Academic Appeals Committee.
e) If the record shows that the student has previously been subject to academic discipline, the case will be referred by the Chair to the Academic Judicial Committee, which may impose additional sanctions.

### 6.13.3 Academic Sanctions

Academic sanctions imposed for course-related offenses may include, but are not limited to, the following: failure on the work about which the allegation has been made; failure on the course. Additional disciplinary sanctions which may be imposed by the Academic Judicial Committee include probation, suspension, dismissal or expulsion.

### 6.14 EXAMINATION REGULATIONS

Note: For information regarding examination re-read regulations see Regulation 6.11.8.

### 6.14.1 Scheduled Tests and Final Examinations

No in-class or take-home tests worth more than $10 \%$ of the final grade, and no final tests or examinations may be scheduled during the last five days of classes of either term, or between the last day of classes for the term and the first day of the examination schedule. All final tests and examinations (except laboratory examinations) will be scheduled in the final examination period. Requests for exemption from this regulation must be directed to the Vice-President (Academic) for authorization.

### 6.14.2 Viewing Examination Papers

Academic departments must retain all final examination papers on file for six months following the date of the examination. Students may review their own examination papers; however papers may not be removed from the department. For purposes of this regulation a final
examination shall be defined as one written in the regular examination period.

### 6.14.3 Deferred Final Examinations

The Registrar, after consultation with the instructor, may permit a student to write a deferred final examination as a result of illness or for compassionate reasons. In all cases of illness a doctor's certificate explicitly covering inability to write the examination on the day of writing must be submitted to the Registrar before the end of the examination period. Deferred examinations will be written at a time determined by the Registrar after consultation with the student and the instructor and will be given a letter grade. A deferred examination in a first term 3 credit course will normally be written during the first week of second term. A deferred examination in second term or full year courses must normally be written by the end of May, to be arranged by the Registrar in consultation with the instructor and the student. If the examination cannot be written by that time, the student's academic standing will remain as 'Non Assessed'. Students who do not clear their deferred status by the end of the supplemental examination period in September prior to the start of classes, will receive a non pro-rated final grade based on course work completed prior to the final examination.

### 6.14.4 Extended Deadlines for Completion of Course Work

If illness or compassionate reasons prevent a student from submitting all course work by the prescribed deadlines, the Registrar and the instructor may agree to extend the deadlines for completion of the work for up to four weeks beyond the original deadlines. In all cases of illness, a doctor's certificate explicitly covering the inability to complete the work must be submitted to the Registrar before the end of the examination period. If the work is not completed by the specified deadline, a notation of 'INC'- Incomplete, will be recorded on the transcript until a final grade is submitted. If no grade is submitted, the notation of 'INC' remains on the transcript with a grade point value of ' 0.0 ' and counts as a failing grade. If the student is unable to complete the work by the specified deadline, the student may request an extension to the deadline. An extension may be granted on recommendation of the instructor and with approval by the Registrar, on the condition that adequate medical or other documentation is provided to support such a request.

### 6.14.5 Supplemental Examinations

A supplemental examination or paper is intended to provide the instructor with additional information to determine whether or not the student may receive a passing grade for the course. Students who fail to pass a course may undertake supplementary work, provided:
a) such supplementary work is compatible with departmental policy with respect to the teaching, examining and marking methods adopted for the course;
b) such supplementary work could enable the student to pass the course;
c) the student has passed at least eighteen credits, in the regular session;
d) the instructor recommends that a supplemental be allowed.

Supplemental examinations must be written in the supplemental examination period immediately preceding the commencement of classes in the fall term following the unsuccessful examination. Upon
completion of such supplementary work the student will receive a grade of "Pass" or "Fail" for the course.

### 6.14.6 Special Examinations

Examinations which are exceptions to, or are not covered by, Sections 6.14 .3 or 6.14 .5 are special examinations. Application must be made in writing to the Registrar. Application forms are available on the web at [http://www.mta.ca/administration/sas/form.html](http://www.mta.ca/administration/sas/form.html).
A fee is charged for each special examination. The fee will be refunded if the application is not approved. Special examinations can be written at any time by agreement of the student, the instructor, and the Registrar. Normally special examinations are only permitted in the last year of the student's programme. Special examinations will receive a grade of "Pass" or "Fail" unless the Registrar, in consultation with the instructor, determines that a letter grade would be more appropriate.

### 6.15 WITHDRAWAL FROM UNIVERSITY

A student may withdraw from the University without academic penalty by submitting written notification to the Dean of Students prior to the deadline for withdrawals from 3 and 6 credit courses as outlined in the Calendar of Events. A student who withdraws from the University after this time, will remain registered and will receive grades, and Regulation 6.12 (Standards of Performance) will apply unless the student is granted permission by an Academic Dean to withdraw without academic penalty because of illness or for other sufficient reasons.

### 6.16 TRANSCRIPTS

### 6.16.1 Privacy of Transcripts

A student's transcript of record is privileged information to be provided to those outside the University with care and at the discretion of responsible officers of the University. Students may request that transcripts be revealed to no one outside the university without written permission.

### 6.16.2 Number and Letter Grades

Numerical percentages are provided on all transcripts up to the end of the 1993/94 academic year. Beginning with the 1994/95 academic year, letter grades and grade point average assessments are provided.

### 6.16.3 Transcript Requests

Students can have their transcripts sent outside the University on payment of a fee. All transcript orders must be placed in writing by the transcript holder. Application forms are available on the web at [http://www.mta.ca/administration/sas/form.html](http://www.mta.ca/administration/sas/form.html)
Telephone orders for transcripts cannot be accepted. Partial transcripts are not issued. Those requesting transcripts should be aware that at certain peak periods it may take approximately two weeks to process a transcript order.

### 6.17 REPLACEMENT/DUPLICATE DIPLOMAS

If a duplicate or replacement diploma is required the following procedure must be complied with:
a) If a duplicate is requested, evidence by affidavit or statutory declaration shall be furnished that the diploma has been destroyed or is no longer in existence. If a replacement diploma is requested
in a different name from that on the original diploma, the original diploma shall be returned.
b) If the present signing officers are the same as for the original diploma, a new diploma marked DUPLICATE or REPLACEMENT DIPLOMA may be issued.
c) If the signing officers have changed, the duplicate or replacement diploma may be issued, with the original signing officers' names printed in and a note added below to state the diploma is a duplicate or replacement. This note is to be signed by the President.
d) A fee is charged.

### 6.18 GRADUATION/CONVOCATION

### 6.18.1 Application for Graduation

All prospective graduates must complete an Application for Graduation by September 30 of the academic year in which they intend to graduate. Application forms are available on the web at [http://www.mta.ca/administration/sas/form.html](http://www.mta.ca/administration/sas/form.html)

### 6.18.2 Completed Degree Requirements

All prospective degree and/or certificate candidates are responsible for completing degree requirements according to the regulations pertaining to their programme. A list of prospective degree and/or certificate candidates for each May Convocation is posted by the Registrar approximately five months prior to Convocation. All prospective degree and/or certificate candidates are responsible for checking the accuracy of this list and reporting any errors or omissions to the Registrar. All work towards the degree and/or certificate must be completed and the results officially reported to the Registrar before the Senate meeting immediately preceding May Convocation. Students who complete degree and/or certificate requirements after May Convocation and who apply and are approved for graduation at the October Senate meeting, will receive their diploma and have their degree conferred at the following May Convocation.

### 6.18.3 Academic Costumes

Successful degree and/or certificate candidates who come to Convocation must wear proper academic costumes. Those who do not attend the ceremony will receive their diplomas in absentia. The diplomas will be mailed out after Convocation.

### 6.18.4 Authorized Hoods

The following hoods are authorized for holders of Mount Allison degrees:
a) Bachelor of Arts: a hood of black stuff edged with garnet and silk and with front of loop bordered with gold silk.
b) Bachelor of Science: a hood of black stuff edged on the inside with old gold silk.
c) Bachelor of Music: a hood of black stuff edged on the inside with royal blue silk.
d) Bachelor of Fine Arts: a hood of black stuff edged on the inside with green silk, and orange ornamentation.
e) Bachelor of Commerce: a hood of black stuff edged on the inside with light grey silk.
f) Bachelor of Teaching: a hood of black stuff edged on the inside with mauve silk.
g) Bachelor of Education: a hood of black stuff edged on the inside with light blue silk.
h) Bachelor of Music Education: a hood of black stuff edged on the inside with turquoise silk.
i) Master of Arts: a hood of black silk or stuff with a full lining of garnet silk
j) Master of Science: a hood of black silk or stuff with a full lining of old gold silk.
k) Master of Social Work: a hood of black silk or stuff with a full lining of fuchsia silk.

1) Master of Education: a hood of black silk or stuff with a full lining of light blue silk.
m) Doctor of Divinity, a hood of scarlet cloth lined with purple silk.
n) Doctor of Laws, a hood of scarlet cloth lined with blue silk.
o) Doctor of Civil Law, a hood of scarlet cloth lined with old gold silk.
p) Doctor of Literature, a hood of scarlet cloth lined with white silk.
q) Doctor of Music, a hood of scarlet cloth lined with blue silk lining and half-inch facings.
r) Doctor of Science, a hood of scarlet cloth lined with primrose yellow silk.
s) Doctor of Fine Arts, a hood of scarlet cloth lined with green silk.

### 6.18.5 Honorary Degrees

The Senate of the University has authorized the awarding of the following degrees Honoris Causa:
a) Doctor of Divinity (D.D.)
b) Doctor of Laws (LL.D.)
c) Doctor of Civil Law (D.C.L.)
d) Doctor of Literature (D.Litt.)
e) Doctor of Music (D.Mus.)
f) Doctor of Science (D.Sc.)
g) Doctor of Fine Arts (D.F.A.)

### 6.19 NOTIFICATION OF DISCLOSURE OF PERSONAL INFORMATION TO STATISTICS CANADA

Statistics Canada is the national statistical agency. As such, Statistics Canada carries out hundreds of surveys each year on a wide range of matters, including education.
It is essential to be able to follow students across time and institutions to understand, for example, the factors affecting enrolment demand at postsecondary institutions. The increased emphasis on accountability for public investment means that it is also important to understand 'outcomes'. In order to conduct such studies, Statistics Canada asks all colleges and universities to provide data on students and graduates. Institutions collect and provide to Statistics Canada, student identification information (student's name, student ID number, Social Insurance Number), student contact information (address and telephone number), student demographic characteristics, enrolment information, previous education, and labour force activity.
The Federal Statistics Act provides the legal authority for Statistics Canada to obtain access to personal information held by educational institutions. The information may be used for statistical purposes only, and the confidentiality provisions of the Statistics Act prevent the
information from being released in any way that would identify a student.
Students who do not wish to have their information used can ask Statistics Canada to remove their identifying information from the national database. To make such a request of for further information please contact Statistics Canada at:
[esis-siae_contact@statcan.ca](mailto:esis-siae_contact@statcan.ca) or by mail: Postsecondary Education and Adult Learning Section, Centre for Education Statistics, Statistics Canada, Jean Talon Building, 1-B-21 Tunney's Pasture, Ottawa, Ontario, K1A 0T6
Further details on the use of this information can be obtained from the Statistics Canada Web site
[http://www.statcan.ca/english/concepts/ESIS/index.htm](http://www.statcan.ca/english/concepts/ESIS/index.htm).

## 7 ACADEMIC PROGRAMMES

This section provides complete outlines of the specific requirements for all degrees and/or certificates, as well as information regarding pre-professional requirements. Students completing a B.Comm., B.Mus. or B.F.A. will find all of their overall degree requirements plus an outline of specific courses required in this section. Students completing B.A. or B.Sc. Minors, Majors or Honours programmes should consult the overall degree requirements outlined in this section plus the more specific Minor, Major and Honours requirements listed per programme in the Programmes/Courses of Instruction section which follows. Those students planning further study in Medicine, Law, Dentistry and other professional programmes should consult the information regarding pre-professional requirements at the end of this section and the calendars of professional schools.
7.0 Course Numbering and Credit Values
7.1 General Regulations
7.2 Bachelor of Arts Degree
7.3 Bachelor of Science Degree
7.4 Master of Science Degree
7.5 Bachelor of Commerce Degree
7.6 Bachelor of Music Degree
7.7 Bachelor of Fine Arts Degree
7.8 Certificate of Bilingualism
7.9 Certificat de bilinguisme
7.10 Pre-Professional Requirements
7.11 Study Abroad Programmes

### 7.0 Course Numbering and Credit Values

Each course is identified by a four-digit number, and carries a certain credit value.
The first digit indicates the year in which the course is normally taken. The second digit sometimes indicates a stream or category of courses within one department.
The third digit specifies a particular course within the department.
The fourth digit indicates the credit value of the course. A 6 credit course extends through both terms and has a fourth digit of zero; a 3 credit course usually lasts one term only and has a fourth digit of one. A few 3 credit courses last through the entire year and have a fourth digit of three. One credit Music Ensemble courses have a fourth digit of nine and last throughout both terms.
Note: Both fall and Winter terms must be completed to obtain credit for full year courses.
Requirements for degree programmes are stated in terms of such course numbers and their accumulated credit values. Typically, a degree requires a minimum 120 credits, earned by passing some combination of 6 credit (two term) and 3 credit (one term) courses. A typical Major requires 60 credits; a typical Minor requires 24 credits.
Note: A grade of D ( $\mathrm{D}+, \mathrm{D}, \mathrm{D}-$ ) in any course will be considered a conditional (non-continuing) pass. In order for a course to be used to fulfill prerequisite requirements, a grade of C- or better must be obtained. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

In any one year, it is only the University Timetable which specifies which courses are actually being taught that year, and in which terms. The listing of a course in the calendar is not a guarantee that the course is offered every year.

### 7.1 GENERAL REGULATIONS

### 7.1.1 B.A. and B.Sc. Degree Requirements

The Bachelor of Arts (B.A.) and Bachelor of Science (B.Sc.) degrees achieve a balance of breadth, depth and coherence by including these four features in each student's academic programme:
a) The Bachelor's degree requires the completion of 120 credits worth of course work.
b) Six credits (the equivalent of a full-year course) must be earned in each of the four distribution areas: Arts and Letters, Humanities, Social Science and Science. (see 7.2.2 and 7.3.2)
c) A specified minimum number of credits earned at an advanced level must be included. (see 7.2.3 and 7.3.5)
d) One of the following must be completed: a Major plus a Minor; a Double Major; a General degree of three Minors; or the most specialized degree an Honours programme. It is also possible for students to design a programme of their own. (See Regulations 7.2.12, 7.2.17, 7.3.15 and 7.3.20.)

### 7.1.2 Declaration of Programme

B.A. and B.Sc. students, in consultation with the designated Programme Advisor, must formally declare a Major Area of Study and a Minor by the end of their second year. Those opting to do a Double Major or Triple Minor must, in consultation with the designated Programme Advisor, declare their intention by the end of their second year. Students can change their choice of programme after further consultation with a Programme Advisor. A 'Declaration/Change of Major/Minor' form is available on the web at
[http://www.mta.ca/administration/sas/form.html](http://www.mta.ca/administration/sas/form.html).
Those opting to do an Honours Programme must declare their intention by December of year three by completing a 'Declaration of Intention to Pursue Honours' form available on the web at [http://www.mta.ca/administration/sas/form.html](http://www.mta.ca/administration/sas/form.html).
Students must consult with the Department Head or Programme Coordinator with respect to application processes and admission criteria.

### 7.2 BACHELOR OF ARTS

### 7.2.1 Requirements for a B.A. Degree

In order to qualify for a Bachelor of Arts degree, a student must complete:
a) 120 credits including
b) 6 credits (the equivalent of a full-year course) must be earned in each of the four distribution areas: Arts and Letters, Humanities, Social Science and Science, as listed in 7.2.2
c) A minimum of 36 credits from the $3 / 4000$ level
d) One of the following must be completed: a Major plus a Minor; a Double Major; a General degree of three Minors; or the most specialized degree an Honours programme. It is also possible for students to design a programme of their own, in consultation with
an Academic Dean. (See Regulations 7.2.4, 7.2.6, 7.2.7, 7.2.8, 7.2.12 and 7.2.17.)

### 7.2.2 Distribution Requirements

Six credits must be earned from each of the following lists:

## Arts and Letters

Drama
English
Fine Arts
French Studies
German Studies
Hispanic Studies
Japanese Studies
Linguistics
Music

## Humanities

Canadian Studies
Classics
Greek
History
Latin
Philosophy
Religious Studies
Women's Studies

## Social Science

Anthropology
Commerce
Economics
Environmental Studies
Geography
International Relations
Political Science
Sociology
Women's Studies

## Science

Biochemistry
Biology
Chemistry
Computer Science
Geoscience
Mathematics
Physics
Psychology
Note: For distribution requirement purposes, a maximum of 6 credits from the Women's Studies courses can be applied to meet the distribution requirements for either Humanities or Social Science, or a combination of those two disciplines.

### 7.2.3 3/4000 Level Courses

A minimum of 36 credits must be earned from courses at the 3000 and/or 4000 level,

### 7.2.4 Credits Required for a Major and Minor

The credits required for a B.A. include those required for a Major Area of Study [see list under 7.2.13], plus the credits required for a Minor from any other programme [see lists under 7.2.18 and 7.3.21]. No more
than 9 credits can be counted in common between the Major and Minor. Where there are more than 9 credits of requirements in common, the credit value of the combined programme will still be at least 15 credits greater than the total for the Major. The Major Area of Study and Minor are recorded on the student's transcript.
Although the combination of a Major and a Minor as called for in 7.2.4 is the usual means of achieving a B.A. degree, other combinations are possible, as outlined in 7.2.5 through 7.2.8.

### 7.2.5 Additional Minor

Students who satisfy the requirements for more than one Minor will have the additional Minor(s) recorded on their transcript.

### 7.2.6 Double Major

Students who (in lieu of the Minor required in 7.2.4) satisfy the requirements for a second Major Area of Study from any other programme [see lists under 7.2.13 and 7.3.16], will have achieved a B.A. with a Double Major, and will have both Majors recorded on their transcript. No more than 24 credits can be counted in common between the two Majors. Even where there are requirements in common, the credit value of the combined programme will be at least 36 credits greater than the total for the first Major.

### 7.2.7 Honours Degree

Students who (in lieu of 7.2.4) satisfy the requirements for an Honours degree [see 7.2.19] will have achieved a B.A. with Honours, and will have the Honours programme recorded on their transcript.

### 7.2.8 General Degree with Three Minors

Students who (in lieu of 7.2.4) satisfy the requirements for three Minors [see 7.2.14] will have achieved a B.A. General Degree, and will have this title plus all Minors recorded. A triple Minor will not total fewer than 72 credits, despite requirements in common. Students pursuing this option are reminded that Regulation 7.2.3 must still be fulfilled.

### 7.2.9 The Major Area of Study as Required for the B.A.

The Major Area of Study is designed to be approximately one half the course work a student completes toward a B.A. degree, providing the depth and rigour which can be achieved either by work within one discipline or through course work carefully planned under a theme. As called for in 7.2.4, this requirement can be satisfied by completing the courses specified in any one of the named Major Areas of Study listed in 7.2.13, according to one of the options outlined in 7.2.10 through 7.2.12

### 7.2.10 Disciplinary Major Area of Study

A Disciplinary Major Area of Study consists of a selection of courses worth 60 credits, with a minimum of 36 and a maximum of 42 credits required from a single discipline or department. This type of Major gains its coherence from the traditional discipline from which it is drawn. Provision is made within each Major Area of Study for 18 credits, usually drawn from outside the Major discipline, intended to complement and enrich the Major.

### 7.2.1 1 Interdisciplinary Major Area of Study

An Interdisciplinary Major Area of Study consists of a selection of courses worth 60 credits, in most cases. This type of Major gains its coherence from a theme, or approach held in common by its component courses. Such programmes are authorized in advance by Senate.

### 7.2.12 Specially Approved Major Area of Study

A Specially Approved Major Area of Study consists of a selection of courses worth 60 credits. This type of Major gains its coherence from a carefully thought-out combination of available courses which has not received prior authorization from Senate. Approval for this type of Major must be obtained from the appropriate Dean, in consultation with the Registrar, by the end of the third year.

### 7.2.13 Major Areas of Study Available for the B.A.

For the B.A., the following Major Areas of Study are available. For a complete list of courses required for each Major, see the appropriate heading under Programmes and Courses of Instruction.
Disciplinary
Anthropology
Art History
Classical Studies
Commerce
Computer Science
Economics
English
Fine Arts
French Studies
Geography
German Studies
Hispanic Studies
History
Mathematics
Music
Philosophy
Political
Science
Psychology
Religious Studies
Sociology
Interdisciplinary
American Studies
Canadian Public Policy
Canadian Studies
Drama
Environmental Studies
International Relations
Modern Languages
Sociology/Anthropology

### 7.2.14 The Minor as Required for the B.A.

The Minor is designed to be a minimum number of courses by which a student can achieve a modest sense of coherence in another field of study. As called for in 7.2.4, this requirement can be satisfied by completing the courses specified in any one of the named Minors listed in 7.2.18, (or under 7.3.21) according to one of the options outlined in 7.2.15 through 7.2.17.

### 7.2.15 Disciplinary Minor in Arts

A Disciplinary Minor consists of a selection of courses worth 24 credits, at least 6 of which must be completed at the 3000 and/or 4000 level. This type of Minor gains its minimum of coherence from the traditional discipline from which it is drawn.

### 7.2.16 Interdisciplinary Minor

An Interdisciplinary Minor consists of a selection of courses worth 24 credits, at least 6 of which must be completed at the 3000 and/or 4000 level. This type of Minor gains its coherence from a theme, or approach held in common by its component courses. Such programmes are authorized in advance by Senate.

### 7.2.17 Specially Approved Minor

A Specially Approved Minor consists of a selection of courses worth 24 credits, at least 6 of which must be completed at the 3000 and/or 4000 level. This type of Minor gains its coherence from a carefully thought-out combination of available courses which has not received prior authorization from Senate. Approval for this type of Minor must be obtained from the appropriate Academic Dean, in consultation with the Registrar, by the end of the third year.

### 7.2.18 Minors Available for the B.A.

For the B.A. the following Minors are available along with those listed under section 7.3.21 For a complete listing of courses required for each Minor, see the appropriate heading under Programmes and Courses of Instruction.

## Disciplinary

Anthropology
Art History
Classical Studies
Commerce
Computer Science
Economics
English
Fine Arts
French Studies
Geography
German Studies
Greek
Hispanic Studies
History
Latin
Mathematics
Music
Philosophy
Political Science
Psychology
Religious Studies
Sociology
Women's Studies

## Interdisciplinary

American Studies
Canadian Studies
Drama
Environmental Studies
International Economics and Business

Japanese Studies
Science, Technology and Society

### 7.2.19 Disciplinary and Interdisciplinary Honours Programmes

Honours programmes represent the most specialized selection of courses to gain depth and coherence within one discipline or thematic area. They have traditionally provided the preparation most appropriate for postgraduate work in that field. The requirements for Honours extend beyond that of the Major, and so the regulation requiring a Minor is waived (see 7.2.4 and 7.2.7), although any student who completes a Minor from another discipline or programme, will have this Minor recorded on his or her transcript. Academic regulation 6.8 governing the granting of Honours should be consulted. Students considering an Honours Programme should consult as early as possible with the designated Programme Advisor regarding the prescribed selection of courses.

### 7.2.20 Honours Programmes Available for the B.A.

Under the B.A. Degree, the following Honours Programmes are available. Each assumes that the student also meets the requirements of 7.2.2 and 7.2.3. For a complete listing of courses required for each Honours Programme, see the appropriate heading under Programmes and Courses of Instruction.

## Disciplinary

Anthropology
Classical Studies
Economics
English
French Studies
Geography
German Studies
History
Mathematics
Music
Philosophy
Political Science
Psychology
Religious Studies
Sociology
Interdisciplinary
American Studies
Canadian Studies
Computer Science and Mathematics
International Relations
Sociology/Anthropology

### 7.3 BACHELOR OF SCIENCE

### 7.3.1 Qualifications for a B.Sc. Degree

In order to qualify for a Bachelor of Science degree, a student must complete:
a) 120 credits including
b) 6 credits (the equivalent of a full-year course) must be earned in each of the four distribution areas: Arts and Letters, Humanities, Social Science and Science, as listed in 7.3.2
c) 6 credits must be earned in Chemistry, 6 credits in Mathematics or Computer Science, 6 credits in Physics as outlined in 7.3.3
d) 72 Science credits of which a minimum must be from Science courses at the $3 / 4000$ level (see 7.3.4 and 7.3.5)
e) One of the following must be completed: a Major plus a Minor; a Double Major; a General degree of three Minors; or the most specialized degree an Honours programme. It is also possible for students to design a programme of their own in consultation with the Academic Dean (See Regulations 7.3.6, 7.3.8, 7.3.9, 7.3.10, 7.3.15 and 7.3.20.)

### 7.3.2 Distribution Requirements

Six credits must be earned from each of the following lists:

## Arts and Letters

Drama
English
Fine Arts
French Studies
German Studies
Hispanic Studies
Japanese Studies
Music

## Humanities

Canadian Studies
Classics
Greek
History
Latin
Philosophy
Religious Studies
Women's Studies

## Social Science

Anthropology
Commerce
Economics
Geography
Political Science
Sociology
Women's Studies

## Science

Biochemistry
Biology
Chemistry
Computer Science
Environmental Science
Geoscience
Mathematics
Physics
Psychology
Note: For distribution requirement purposes, a maximum of 6 credits from the Women's Studies courses can be applied to meet the distribution requirements for either Humanities or Social Science, or a combination of those two disciplines.

### 7.3.3 Additional B.Sc. Requirements

Six credits must be earned in Chemistry, six credits in Mathematics or Computer Science, six credits in Physics as follows:
a) Chemistry: 6 credits from Chemistry 1001,1021
b) Math/Comp: 3 credits from Mathematics 1111 and 3 additional credits from Mathematics 1121, 1131, 2211, 2221, 2311, Computer Science 1711
c) Physics: 3 credits from Physics 1051, and 3 additional credits from Physics 1551, 3511, 3521
Students' choice should be made according to their Major or Honours requirements. Students having advanced placement should consult with the appropriate department regarding substitution for any of the courses listed above.

### 7.3.4 Minimum Number of Science Credits

A minimum of 72 credits in Science must be earned from the Science disciplines.

### 7.3.5 3/4000 Level Science Courses

A minimum of 30 credits in Science must be earned from the 3000 and/or 4000 level.

### 7.3.6 Credits Required for a Major and Minor

The credits required for a B.Sc. include those required for a Major Area of Study [see list under 7.3.16], plus the credits required for a Minor from any other programme [see lists under 7.3.21 and 7.2.18]. No more than 9 credits can be counted in common between the Major and Minor. Where there are more than 9 credits of requirements in common, the credit value of the combined programme will still be at least 15 credits greater than the total for the Major. The Major Area of Study and Minor are recorded on the student's transcript. Although the combination of a Major and a Minor as called for in 7.3.6 is the usual means of achieving a B.Sc., other combinations are possible, as outlined in 7.3.7 through 7.3.10..

### 7.3.7 Additional Minor

Students who satisfy the requirements for more than one Minor will have the additional Minor(s) recorded on their transcript.

### 7.3.8 Double Major

Students who (in lieu of the Minor required in 7.3.6) satisfy the requirements for a second Major Area of Study from any other programme [see lists under 7.3.16 and 7.2.13] will have achieved a B.Sc. with a Double Major, and will have both Majors recorded on their transcript. No more than 24 credits can be counted in common between the two Majors. Even where there are requirements in common, the credit value of the combined programme will be at least 36 credits greater than the total for the first Major.

### 7.3.9 Honours Degree

Students who (in lieu of 7.3.6) satisfy the requirements for an Honours degree [see 7.3.22] will have achieved a B.Sc. with Honours, and will have the Honours programme recorded on their transcript.

### 7.3.10 General Degree with Three Minors

Students who (in lieu of 7.3.6) satisfy the requirements for three Minors, at least two of which must be in Science (see 7.3.17) will have achieved a B.Sc. General Degree, and will have this title plus the three (or more) Minors recorded on their transcript. A triple Minor will not total fewer than 72 credits, despite requirements in common. Students pursuing this option are reminded that Regulations 7.3.4 and 7.3.5 must still be fulfilled.

### 7.3.11 Courses which Qualify as Science Credits

For purposes of Regulation 7.3.4, all courses offered in the following disciplines are considered as Science credits: Biochemistry, Biology, Chemistry, Computer Science, Environmental Science, Geoscience, Mathematics, Physics, and Psychology. The following courses outside of these disciplines may also count as Science credits: Commerce 3411, Economics 3821, 4700, 4801, 4811, Philosophy 2511, 3511.

### 7.3.12 The Major Area of Study in Science for the

 B.Sc.The Major Area of Study is designed to be approximately one half the course work a student completes toward a B.Sc. degree, providing the depth and rigour which can be achieved either by work within one discipline or through course work carefully orchestrated under a theme. As called for in 7.3.6, this requirement can be satisfied by completing the courses specified in any one of the named Major Areas of Study in Science listed in 7.3.16, according to one of the options outlined in 7.3.13 through 7.3.15.

### 7.3.13 Disciplinary Major Area of Study in Science

A Disciplinary Major Area of Study in Science consists of a selection of courses worth 60 to 72 credits, with a minimum of 36 and a maximum of 42 credits required from a single discipline or department. This type of Major gains its coherence from the traditional discipline from which it is drawn. Provision is made within each Major Area of Study for 18 credits, usually drawn from outside the Major discipline, intended to complement and enrich the Major.

### 7.3.14 Interdisciplinary Major Area of Study

An Interdisciplinary Major Area of Study consists of a selection of courses worth 60 to 84 credits. This type of Major gains its coherence from a theme, or approach held in common by its component courses. Such programmes are authorized in advance by Senate.

### 7.3.15 Specially Approved Major Area of Study

A Specially Approved Major Area of Study consists of a selection of courses worth 60 to 72 credits. This type of Major gains its coherence from a carefully thought out combination of available courses which has not received prior authorization from Senate. Approval for this type of Major must be obtained from the appropriate Academic Dean, in consultation with the Registrar, by the end of the third year.

### 7.3.16 Major Areas of Study available for the B.Sc.

For the B.Sc., the following Major Areas of Study are available. For a complete listing of courses required for each Major, see the appropriate heading under Programmes and Courses of Instruction.

## Disciplinary

Biology
Chemistry
Computer Science
Mathematics
Physics
Psychology
Interdisciplinary
Biochemistry
Cognitive Science
Environmental Science

### 7.3.17 The Minor as Required for the B.Sc.

The Minor is designed to be a minimum number of courses by which a student can achieve a modest sense of the coherence in another field of study. As called for in 7.3.6, this requirement can be satisfied by completing the courses specified in any one of the named Minors listed in 7.3.21 (or under 7.2.18), according to one of the options outlined in 7.3.18 through 7.3.20.

### 7.3.18 Disciplinary Minor

A Disciplinary Minor consists of a selection of courses worth 24 credits, at least 6 credits of which must be completed at the 3000 and/or 4000 level. This type of Minor gains its minimum of coherence from the traditional discipline from which it is drawn.

### 7.3.19 Interdisciplinary Minor

An Interdisciplinary Minor consists of a selection of courses worth 24 credits, at least 6 credits of which must be completed at the 3000 and/or 4000 level. This type of Minor gains its coherence from a theme, or approach held in common by its component courses. Such programmes are authorized in advance by Senate.

### 7.3.20 Specially Approved Minor

A Specially Approved Minor consists of a selection of courses worth 24 credits, at least 6 of which must be completed at the 3000 and/or 4000 level. This type of Minor gains its coherence from a carefully thought out combination of available courses which has not received prior authorization from Senate. Approval for this type of Minor must be obtained from the appropriate Academic Dean, in consultation with the Registrar, by the end of the third year.

### 7.3.21 Minors Available for the B.Sc.

For the B.Sc., the following Minors are available along with those listed under 7.2.18. For a complete listing of courses required for each Minor, see the appropriate heading under Programmes and Courses of Instruction.

## Disciplinary

Biology
Chemistry
Computer Science
Mathematics
Physics
Psychology

### 7.3.22 Disciplinary and Interdisciplinary Honours Programmes

Honours programmes represent the most specialized selection of courses to gain depth and coherence within one discipline or thematic area. They have traditionally provided the preparation most appropriate for postgraduate work in that field. The requirements for Honours extend beyond that of the Major, and so the regulation requiring a Minor is waived (see 7.3.6 and 7.3.9), although any student who completes a Minor from another discipline or programme will have this Minor recorded on his or her transcript. Academic regulation 6.8 governing the granting of Honours should be consulted. Students considering an Honours Programme should consult as early as possible with the designated Programme Advisor regarding a prescribed selection of courses.

### 7.3.23 Honours Programmes Available for the B.Sc.

Under the B.Sc. Degree, the following Honours Programmes are available. Each assumes that the student also meets the requirements of 7.3.2 through 7.3.5. For a complete listing of courses required for each Honours Programme see the appropriate heading under Programmes and Courses of Instruction.

## Disciplinary

Biology
Chemistry
Mathematics
Physics
Psychology
Interdisciplinary
Biochemistry
Computer Science and Mathematics
Mathematics and Physics

### 7.4 MASTER OF SCIENCE

Graduate work is approved for the Departments of Biology and Chemistry.

### 7.4.1 Committee on Graduate Studies

All graduate work is under the general supervision of the Committee on Graduate Studies. Upon receiving recommendations from the Department concerned, the Committee will decide upon admission, programme of study, and on receipt of satisfactory evidence of the completion of the studies, will recommend concerning the award of the degree.

### 7.4.2 Minimum Admission Requirements

a) An Honours Bachelor's degree in the intended field of study or its equivalent from a University of recognized standing (mature students will be given special consideration); and
b) Two letters of reference.

In situations where the candidate is close to fulfilling requirement (a), the Committee may admit the student to a qualifying year. In this case, the Department concerned will be asked by the Committee to suggest a course of study that will fulfill requirement (a) and that will build sufficient strength of background to carry on work at the graduate level. A passing grade must be obtained in each of these courses as well as a minimum overall Cumulative Grade Point Average of 3.0. Students
completing qualifying courses will register as special students and are not graduate students while pursuing these studies. They will be admitted to graduate studies when the committee decides that the qualifying conditions have been fulfilled.

### 7.4.3 Time Required

The minimum time required to complete graduate studies is one full year (two years is the normal situation). The programme of study must be completed within five years.

### 7.4.4 Course and Thesis Requirements

A research programme, a thesis based on this research, and at least four 3 credit graduate courses must be completed by all candidates. The format of the written thesis will follow the rules for the Honours thesis. Copies of the thesis must be made available to the members of the candidate's Supervisory Committee three weeks prior to public presentation.

### 7.4.5 Standards of Achievement

The candidate must achieve a grade of at least B- in each course required for the degree, and also must pass a public oral examination on the thesis and related material.

### 7.4.6 Supervisory Committee

A committee of three will be appointed for each candidate by the Committee on Graduate Studies on the recommendation of the research supervisor who will be its chair, a teaching member of the department concerned, and a qualified person from outside that department. It will be the responsibility of this committee to review periodically the progress of the candidate, read the thesis and conduct the oral examination which will be presided over by the Chair of the Committee on Graduate Studies. A grade of "Pass" or "Fail" will be assessed for the thesis and its defence by the candidate's committee. (The Chair of the Committee on Graduate Studies has no vote in this decision). If a "Fail" evaluation is rendered, the supervisory committee will decide if and what remedial measure must be undertaken to obtain a "Pass" grade. The candidate will have one year to meet these conditions.

### 7.4.7 Special Departmental Regulations

In addition to the above regulations, each department may have special requirements as to language, necessary qualifying or complementary courses, etc. Information about such matters may be obtained from the heads of departments or may appear elsewhere in the Calendar under the departmental list of courses.

### 7.4.8 Application Procedure

Candidates should submit a curriculum vitae, a set of official transcripts, and arrange to have two letters of reference forwarded to the Chair of the Committee on Graduate Studies. It is recommended that applicants also contact individual faculty members about the possibility of carrying on advanced study and research with them.

### 7.5 BACHELOR OF COMMERCE

### 7.5.1 Primary Objective

The primary objective of the Mount Allison University Commerce programme is to explore with students the nature of the business world,
and thus help them acquire administrative knowledge and skills. The studies focus on the process of effective problem solving and decision making in the business environment through the development of management systems which combine quantitative analysis and human judgement.

### 7.5.2 Majors

The Commerce programme is designed to enable students to study in depth a subject area (such as Accounting, Finance, Marketing) and, through elective courses from other programmes, to pursue interests which might not be immediately applicable to the study of commerce. Students may elect to major in Economics, Computing Information Systems, or in other approved disciplines (i.e., French, History, Chemistry, Political Science, etc.). The latter option is unique to Mount Allison and students are urged to give it very serious consideration.

### 7.5.3 Honours Programme

Honours programmes for the Commerce degree are available with approval of the Commerce Department. Students interested in pursuing Honours must apply to the Commerce Department by March 31, of year three. Students interested in pursuing Honours in Economics should contact the Economics Department. See regulations 7.5.12 and 7.5.13

### 7.5.4 Transferring to Commerce

Students applying for transfer into the Bachelor of Commerce programme must do so by APRIL 15 of their second year of study. Exceptions must be approved by the Head of the Commerce Department. To be eligible to transfer to the Bachelor of Commerce, students must meet the following two criteria:
a) The attainment of a CGPA of at least 2.0 by the end of their second year at the University.
b) Students must have successfully completed the following 27 credits: 12 credits from Mathematics 1111, Economics 1000 (or 1001 and 1011), 3 credits in Computer Science

15 credits from Commerce 2101, 2131, 2201, 2301, Mathematics 2311 (or Psychology 2001) and Mathematics 2321 (or Economics 2701 or Psychology 2011).

### 7.5.5 Commerce Degree Programme

In order to qualify for a B.Comm. degree, a student must complete:
a) 120 credits including
b) A minimum of 42 credits from the $3 / 4000$ level,
c) the Commerce Degree Core Programme requirements, and
d) courses which satisfy the requirements for one of the following:
i) one of the Major Areas of Study described below, or
ii) a Specially Approved non-Commerce Major Area of Study, or
iii) a general B.Comm. with no Major Area of Study.

### 7.5.6 Electives on Bachelor of Commerce Degree or on a Major or Minor in Commerce

Economics 3201, 3211, 3521, 3601, 3711, 3921, 4501, 4511, 4700, 4801, 4811, 4821, 4990, Computer Science 3851 and Religious Studies 3951,

3961 may be counted as Commerce electives for students taking a Bachelor of Commerce or a Major or Minor in Commerce.

### 7.5.7 Commerce Degree Core Requirements

The following Core Commerce courses (the equivalent of 42 credits, 24 of which are in Commerce) are required for all students completing a Commerce Degree:

24 credits from Commerce 2101, 2131, 2201, 2301, 3411, 3501, 4311, 4321
3 credits from Mathematics 1111
6 credits from Economics 1000 (or 1001 and 1011)
3 credits in Computing Science
3 credits from Mathematics 2311 or Psychology 2001
3 credits from Mathematics 2321 or Economics 2701 or Psychology 2011

Note: Psychology 2011 is not accepted as prerequisite for Commerce 4231

### 7.5.8 Bachelor of Commerce degree with No Major Area of Study

Students completing a Bachelor of Commerce with no Major area of Study may choose to study a Commerce discipline in depth, or they may opt for a broader selection of courses.
A Bachelor of Commerce with no Major area of Study is 120 credits earned as follows:

42 credits from the Commerce core requirements (see 7.5.7) plus: 27 additional Commerce credits (a minimum of 24 credits at the 3000/4000 level)
51 elective credits, no more than 6 credits in Commerce

### 7.5.9 Specially Approved non-Commerce Major Area of Study

Students may wish to complete a major in non-Commerce disciplines. Students wishing to complete a Bachelor of Commerce with a Specially Approved Major Area of Study must obtain written approval of the Head of the Department of Commerce in consultation with other appropriate Department Heads. This type of Major gains its coherence from a carefully thought out combination of available courses. A Bachelor of Commerce with a Specially Approved non-Commerce Major Area of Study is 120 credits earned as follows:

42 credits from the Commerce core requirements (see 7.5.7) plus:
18 additional credits in Commerce,
plus the list of courses in the Approved non-Commerce Major Area of Study, and electives as required to complete the Commerce degree requirements.

### 7.5.10 Bachelor of Commerce with Major Area of Study in Economics

A Bachelor of Commerce with Major Area of Study in Economics is 120 credits earned as follows:

42 from the Commerce core requirements (see 7.5.7) plus:

15 from Economics 2001, 2011, 2101, 2111, 3501
12 additional credits in Economics at the 3/4000 level.
15 additional credits in Commerce; and
36 elective credits, no more than 6 credits in Commerce.

### 7.5.11 Bachelor of Commerce with Major Area of Study in Computing Information Systems

A Bachelor of Commerce with Major Area of Study in Computing Information Systems is 120 credits earned as follows:

42 from the Commerce core requirements (see 7.5.7) plus:
15 from Computer Science 1711, 1721, 2611, 2711(or 2931), Mathematics 2211 (or 2221)
3 from Computer Science at the 3/4000 level
18 additional credits in Commerce, including Commerce 3431.
45 elective credits, no more than 6 credits in Commerce.
Note: 3 credits from Computer Science from those listed in line 2 may be counted toward the Core requirement

### 7.5.12 Commerce Degree with Honours

Honours in Commerce is 69 credits earned as follows:
42 from the Commerce core requirements (see 7.5.7)
6 from Commerce 4990
21 from Commerce at the 3/4000 levels

### 7.5.13 Commerce Degree with Honours in Economics

B.Comm. Honours in Economics is 90 credits earned as follows:

42 from the Commerce core requirements (see 7.5.7)
15 from Economics 2001, 2011, 2101, 2111, 3501
12 from Economics 4001, 4011, 4700, 4801, 4811, 4821 and 4990
9 from Economics at the 3/4000 levels
12 from Commerce or Economics at the 3/4000 level.

### 7.5.14 Minor from Other Disciplines

Students who complete a Minor from any other discipline as specified in the B.A. and B.Sc. regulations will have the Minor recorded on the student's transcript.

### 7.6 BACHELOR OF MUSIC

The Department of Music offers instruction leading to both the Bachelor of Music degree (B.Mus.) and the Bachelor of Arts in Music. The former is professionally oriented, whereas the latter (B.A. Major or Honours in Music) is designed for the student with a more general interest in music. A Minor in Music is available to students in any program. The Bachelor of Music degree is offered without designated majors, and allows the student considerable latitude to put emphasis on any of the subject areas: Music Theory and Composition; Music History and Literature; Music Education and Performance. The programme requires 57 core credits in Music, and 63 elective credits divided between Music and non-Music courses. It is designed to develop well-rounded musicians in practical, theoretical, and historical areas, as well as to provide a sound education in the liberal arts. This versatility of approach
is in keeping with the wide-ranging demands which are placed on the musician of today.

### 7.6.1 Financial Assistance

Students applying for studies in Music are eligible for University general entrance scholarships in addition to those specifically established for students in Music. For detailed information, refer to Section 5, Financial Assistance.

### 7.6.2 Entrance Requirements for the Bachelor of Music Degree

a) Each prospective student must meet the general admission requirements of Mount Allison.
b) In addition, all prospective Music majors (B.Mus.) must appear for an audition-interview as part of the application for admission. Each B.Mus. applicant should be prepared to play four pieces from different style periods of Music. Vocalists and instrumentalists may either provide their own accompanist or have one provided by the University for a nominal fee. In addition, each applicant will be asked to write a one-hour placement test in Music Theory. This test is designed to reflect the applicant's background and perception in aural and written skills, and will determine placement for Bachelor of Music and B.A. (Honours, Major or Minor) students in either Music 1001 or 1101. Music 1001/1011 cannot be used to fulfill the requirements for the Bachelor of Music Degree, or the Honours, Major, or Minor in Music. If the applicant cannot arrange to come to Sackville for a personal audition, an audition tape may be sent directly to the Department of Music, and a Theory Placement Test will be sent upon request to the applicant's teacher to be administered by him or her.
c) Prospective students should write to the Department of Music for information about audition dates.

### 7.6.3 Degree Requirements for Bachelor of Music Degree

The Bachelor of Music degree programme requires four years of University work after completion of high school. In order to qualify for the B.Mus. degree, a student must complete 120 credits, of which:
a) 57 are the required core
b) 30 to 33 are Music electives and
c) 30 to 33 are non-Music electives.
d) All B.Mus. and B.A. Honours/Major students must participate in a major ensemble during three of their four academic years of study. Students in these programmes may also complete up to three additional ensemble credits, for a maximum of six on their degree. Students in all other degree programmes are eligible to complete up to six credits on their degree through ensemble participation. Major ensembles include 1621-4621 Chamber Orchestra; 1631-4631 Symphonic Band; 1651-4651 Chamber Choir; 1661-4661 Choral Society. Other ensembles are 16414641 Instrumental Jazz Ensemble; 2671-4671 Opera Workshop; 1681-4681 Large Ensemble of Like Instruments; 1691-4691 Vocal Jazz Ensemble. Attendance and prompt arrival at all ensemble rehearsals and participation in all public performances are mandatory unless prior consent of the director of the ensemble has been obtained. Absenteeism, tardiness and preparedness for
and active participation in rehearsals and performances are principle factors in the determination of the mark that the student will receive. The details of the application of this policy will be provided by ensemble directors at the beginning of each academic year. The Department of Music reserves the right to assign students to an ensemble programme. Consideration will include both the needs of the student and the requirements of the ensemble programme.
e) All piano or organ students enrolled in Music 2500 must take Music 2601 as an elective course.

### 7.6.4 Group A. The Required Core

## 57 credits - all Music

a) 1101-1111 Materials of Music I-II

2101-2111 Materials of Music III-IV
3241-3251 Twentieth Century Music I-II
1201-1211 Music History and Literature I-II
2201-2211 Music History and Literature III-IV
1500-3500 Chief Practical I-III
b) Three to six credits from: *

4500 Chief Practical IV or 4590 Recital IV
4501 Chief Practical IV
4593 Recital IV or 4600 Accompaniment
c) Three credits from:

1629-4629 Chamber Orchestra
1639-4639 Symphonic Band
1659-4659 Chamber Choir
1669-4669 Choral Society
2679-4679 Opera Workshop

* With the permission of the Department and a grade of at least B- in Music 3500, students may substitute 3 to 6 credits at the $3 / 4000$ levels in other Music courses. Students enrolling in Music 4593 must attain at least an A- in Music 3500 and must have participated in at least two collegia concerts (or the equivalent) since enrolling in the Bachelor of Music programme. If only 3 credits are earned here, a minimum of 33 Music elective credits must be completed.


### 7.6.5 Group B. Music Electives

## 30-33 credits - all Music

The student may elect any combination from the following courses provided prerequisites are met.
a) Theory and Composition

2141-2151 Elementary Composition I-II
3121-3131 Orchestration I-II
3141-3151 Intermediate Composition III-IV
3161-3171 Arranging I-II
4141-4151 Advanced Composition V-VI
4181-4191 Analytical Techniques I-II
b) Music History and Literature

3001 Introduction to Music in Canada
3221 Selected Composer Study I-II*
3231 Selected Genre Study I-II*
4221 Seminar in Music History I-II*

* These courses may be repeated if topic differs
c) Music Education

The following three-credit electives may be offered in one term only or over two terms. Please consult the timetable for specific information.
3303 Vocal Methods
3311 Elementary Methods
3321 Brass Methods
3333 Woodwind Methods
3343 String Methods
4311 Secondary Methods
4353 Percussion Methods
4363 Keyboard Methods
d) Performance Electives

The following electives may be offered in one term only or over two terms. Please consult the timetable for specific information.
2603 Accompaniment I
3603 Accompaniment II
4603 Accompaniment III
2613 Chamber Music I
3613 Chamber Music II
4613 Chamber Music III
2521 Diction for Singers
3413 Choral Conducting
3423 Instrumental Conducting
1629-4629 Chamber Orchestra
1639-4639 Symphonic Band
1649-4649 Instrumental Jazz Ensemble
1659-4659 Chamber Choir
1669-4669 Choral Society
1689-4689 Large Ensemble of Like Instruments
1699-4699 Vocal Jazz Ensemble
2679-4679 Opera Workshop

### 7.6.6 Group C. Non-music Electives

(30-33 credits) The non-Music courses in a programme leading to a Bachelor of Music have a twofold objective:
a) to broaden the student's general knowledge; and
b) to allow students to develop a Minor area of study

Note: The Bachelor of Music may be awarded with Distinction. See Regulation 6.7.

### 7.6.7 Bachelor of Arts with Major in Music

This programme emphasizes the historical and theoretical aspects of the art of music. It is designed for the student who wishes a Major in Music along with more Arts and Science courses than the Bachelor of Music programme allows. Although no practical courses in Music are essential in this programme, it is highly desirable that the student have acquired some proficiency on an instrument or in voice prior to enrolling. Although this programme is not designed with a particular professional goal, it may lead to a career in music librarianship, music
journalism, music therapy, music production in television and radio, music publishing, instrument manufacturing, or graduate work in musicology. For a complete listing of courses required for the B.A. Major in Music Programme see the appropriate heading under Programmes and Courses of Instruction.

### 7.6.8 Minor in Music

A Minor in Music is available to students in any program. For a complete listing of courses required for the Minor in Music see the appropriate heading under Programmes and Courses of Instruction.

### 7.6.9 Bachelor of Arts with Honours in Music

Students considering an Honours Programme should consult as early as possible with the Head of the Department regarding the application process and admission criteria. See section 7.1.2 regarding declaration of intention to pursue Honours. For a complete listing of courses required for the B.A. Honours in Music Programme see the appropriate heading under Programmes and Courses of Instruction.

### 7.6.10 Recitals

In addition to performing on Collegium programs, qualified students are given the opportunity of presenting full-length solo recitals, mini-recitals, participating in half-recitals, or performing in shared recitals. To be eligible to participate in a half-recital, a student must be recommended by his/her Applied Music teacher, must have achieved a grade point average of 3.7 , or better, in Music 2500 (Chief Practical II), or 3500 (Chief Practical III) and must have participated in two Collegia or the equivalent, since enrolling in the Bachelor of Music program. Students enrolling in 4590 must attain at least A- in Music 3500, and must have participated in at least one half-recital. Students enrolling in 4593 must attain at least A- in Music 3500, and must have participated in at least two collegia concerts (or the equivalent) since enrolling in the Bachelor of Music programme. Full-length recitals are usually presented in fulfillment of Music 4590 (Recital).

### 7.6.11 Credit Courses on Other Degrees

The Department of Music also offers courses as electives for students outside the Bachelor of Music and B.A. (Honours or Major), or Minor in Music programs. Music 2001 and 2011 are basic courses in the study and appreciation of Music which are designed especially for non-Music students. Music 1101 and Music 1111 are available through a Placement Test. Other courses are open with Departmental permission and/or upon completion of the necessary prerequisite(s). Qualified students in any degree program may also enrol in ensembles. Successful completion of each ensemble earns one degree credit, to a maximum of six credits on any degree.

### 7.7 BACHELOR OF FINE ARTS

The Department of Fine Arts, located in the Gairdner Fine Arts Building, offers a unique opportunity for professional training in the Fine Arts in conjunction with all the benefits of a university campus. These include the stimulus of a broad intellectual environment, the facilities of a good library and a balanced programme of social activities.

### 7.7.1 The Bachelor of Fine Arts Degree

The curriculum in Fine Arts leading to the degree of Bachelor of Fine Arts is primarily intended to develop creative ability in drawing,
painting, photography, printmaking and sculpture. The major part of the programme consists of studio work under individual supervision, and includes instruction in the principles of design and the use of various media. In addition to the studio classes, attention is given to the artist's heritage through illustrated lectures and seminar courses in art history which are designed to improve the student's artistic judgement and assist in acquiring an ability to write and speak about works of art. Academic electives, which are chosen in consultation with the Fine Arts Department, are taken in other departments of the University. They are included in the curriculum with the aim of widening the student's understanding of the world, in the belief that the artist's domain pertains to all aspects of human endeavour.

### 7.7.2 Additional Admission Requirements

Each prospective student must meet the regular admission requirements of the University. While the course is designed so that it assumes no previous training on the part of the new student, applicants must give evidence of their suitability for work in this specialized field. Applicants are required to present a portfolio of their previous art work for assessment prior to admission to this programme. Instructions for the submission of this portfolio will be sent to all applicants for admission to the programme. All portfolios are reviewed each year in early April and late portfolios cannot be considered. Only a limited number of students can be accepted to the programme.

### 7.7.3 Advanced Status

A student may be admitted to the second year of the programme provided full entrance requirements are met and if the applicant presents evidence of having satisfactorily completed work, academic and artistic, equivalent to the prescribed work of the first year.

### 7.7.4 Course Requirements

The Bachelor of Fine Arts is a four-year, 120- credit degree. The programme is designed with maximum flexibility to allow student growth within various studio art study fields. The common first year of the programme is followed in years two to four by various studio art options.
a) A student who fails any studio course will not be allowed to take further courses in that studio area until the failed course is completed satisfactorily.
b) In either the third or fourth year of the programme students are required to travel to a major North American art centre (e.g. Boston, New York, Montreal/Ottawa), in the company of one or more professors, as part of a class field trip for the purpose of study and research at art museums and galleries.

## Year One:

a) 18 Studio Art credits - Fine Arts 1101, 1111, 1901, 1911, 1921, and 1931;
b) Fine Arts 2001 and 2011;
c) 6 credits from outside of Fine Arts.

## Year Two:

a) Fine Arts 2101 and 2111;
b) 12 additional studio credits selected from Fine Arts 2201, 2211, 2301, 2311, 2401, 2411, 2501, 2511
c) 6 credits from Classics $3601,3611,3701$ or 3711 or from Fine Arts History courses above the 2000 level
d) 6 credits from outside of Fine Arts (Classics 3601, 3611, 3701 or 3711 excluded)

## Year Three:

a) Fine Arts 3101 - Intermediate Drawing I
b) 12 additional studio credits from Fine Arts 3111, 3201, 3211, 3301, 3311, 3401, 3411, 3501, 3511, 3601, 3611
c) Fine Arts 3701 - Third Year Seminar
d) 6 credits from Classics $3601,3611,3701$, or 3711 or from Fine Art History courses above the 2000 level
e) 6 credits from outside of Fine Arts (Classics 3601, 3611, 3701 or 3711 excluded)

## Year Four:

a) 12 studio credits - Fine Arts $4801,4811,4821,4831$ and 3 additional credits from 2/3000 level studio courses.
b) Fine Arts 4701 - Fourth Year Seminar
c) 6 credits from Classics $3601,3611,3701$ or 3711 or from Fine Art History courses above the 2000 level
d) 6 credits from outside of Fine Arts (Classics 3601, 3611, 3701 or 3711 excluded)

### 7.7.5 Entrance Scholarship

The E.B. Pulford Scholarship is normally awarded to the top incoming BFA student, based on portfolio assessments.

### 7.8 CERTIFICATE OF BILINGUALISM

Mount Allison students who can demonstrate a high level of competence in both of Canada's official languages may qualify for a Certificate of Bilingualism. The Certificate, which is awarded upon graduation, attests to the student's ability to speak, understand, and write English and French with ease and proficiency. The formal recognition afforded by the Certificate could prove particularly valuable to graduates seeking employment in the many business and government careers where knowledge of both French and English is a requirement or an asset. Any student may apply to be examined for the Certificate, whether or not she or he has taken French or English courses at Mount Allison. The Department of Modern Languages and Literatures administers the Certificate programme and any inquiries should be directed to the Department.

### 7.8.1 Information and Regulations

Candidates may be of any linguistic background. Candidates must make formal application to take the tests no later than the end of the first term of their final year. Candidates will be examined in both French and English in the areas of listening, speaking, reading and writing. The examinations are comprehensive, and may include writing letters and essays or translations; reading literary or other complex texts; and conversation or oral discussion. There is no prescribed sequence of courses in either language leading to the examination for the Certificate. Candidates are invited to profit from the many possibilities offered by the University to improve their language skills.

### 7.8.2 Standards

Candidates must demonstrate their ability in both languages to:
a) follow and understand broadcasts, films and lectures,
b) understand the main ideas of a complex text (book, article, report) without using a dictionary, and also to understand such a text
thoroughly in a reasonable amount of time with the use of a dictionary,
c) write a letter or report that is free of grammatical and stylistic errors,
d) participate in conversation by expressing complex ideas, developing an argument, and answering questions.

### 7.9 CERTIFICAT DE BILINGUISME

Les étudiants de Mount Allison capables de montrer qu'ils possèdent une bonne connaissance des deux langues officielles du Canada peuvent se présenter au concours du Certificat de bilinguisme. Ce certificat décerné lors de la remise des diplômes, fait foi que les étudiants ont démontré leur capacité de lire, d'écrire, de parler et de comprendre le français et l'anglais avec facilitié et correction. L'attestation officielle que représente le Certificat pourrait s'avérer utile aux diplômés se proposant de poursuivre une carrière dans la fonction publique ou dans les affaires, où la connaissance de l'anglais et du français est exigée ou souhaitable. Tous les étudiants peuvent s'inscrire au concours, qu'ils aient suivi ou non des cours de français ou d'anglais à Mount Allison. Les candidats sont invités à s'adresser au Département de langues et litératures modernes, qui administre le Certificat de bilinguisme.

### 7.9.1 Renseignements

Le concours est ouvert à tous les étudiants, quelle que soit leur langue maternelle. Les candidats sont priés de s'inscrire au concours au plus tard en décembre de leur année terminale à Mount Allison. Tous les candidates devront passer un examen qui consistera à écouter, parler, lire et écrire en français et en anglais. Il s'agit d'un examen d'ensemble, qui pourra comprendre la rédaction de lettres, d'essais ou de traductions; la lecture de textes littéraires ou techniques; et la participation à une conversation ou à une discussion. La préparation du Certificat n'est sujette à aucune série préétablie de cours. Les candidats sont toutefois encouragés à profiter des nombreuses possibilitiés dont on dispose à Mount Allison pour l'acquisition des deux langues officielles du Canada.

### 7.9.2 Niveaux Requis

Les candidats doivent démontrer, dans les deux langues, qu'ils sont capables:
a) de suivre et de comprendre des émissions radiophoniques, des films, des conférences,
b) de comprendre sans dictionnaire, les idées principales d'un texte complexe (livre, article, compte rendu); et de comprendre à fond le même genre de texte avec l'aide d'un dictionnaire dans une période de temps raisonnable,
c) d'écrire une lettre ou un compte rendu sans fautes de grammaire et sans erreurs de style,
d) de prendre part à une conversation en exprimant des idées complexes, en élaborant et en développant un raisonnement, et en répondant à des questions.

### 7.10 PRE-PROFESSIONAL REQUIREMENTS

A degree from Mount Allison, or a few carefully selected courses or electives as part of a Mount Allison degree, may permit a student admission to a professional programme. Some of these programmes include medicine, dentistry, pharmacy, veterinary medicine, law, education, theology, social work, audiology and speech, occupational
therapy, physiotherapy, optometry, architecture and nutritional programmes as well as many others. These professional programmes may be accessed upon successful completion of courses and/or a degree from Mount Allison and in combination with other requirements as appropriate (e.g. LSAT, MCAT, GRE, etc.). All students contemplating applying to professional programmes should consult the academic calendars of the schools involved carefully and should be aware of any standardized tests required. Interested students should consult the Academic and Career Counsellor for advice on course selection and the process to enter these professional programmes after their undergraduate career at Mount Allison.

### 7.11 STUDY ABROAD PROGRAMMES

Mount Allison operates 10 programmes ( 8 reciprocal and 2 non-reciprocal) which allow qualified students to complete a period of study abroad for which students can be assessed for transfer of credit. Participants generally go abroad during their third year of study. Note: Students who wish to be considered must meet eligibility requirements set by the International Programmes Committee and must be in Good Standing. Students interested in studying abroad must consult an International Programme Advisor to ensure the term abroad will compliment their degree completion at Mount Allison. Some programmes vary in pre-requisites due to the need of language proficiency. There is an annual information session in late October for all students interested in learning more about these opportunities.
The universities with which Mount Allison currently have partnerships are:

\author{

University <br> Universite de Strasbourg, France <br> Universitat Tubingen, Germany <br> Universitat Marburg, Germany <br> Kwansei Gakuin University, Japan <br> Mid-Sweden University, Sweden <br> Odense University, Denmark <br> \section*{Programme Advisor} <br> Kathy Hamer <br> Rainer Hempel <br> Will Wilson <br> Anne Semple <br> Douglas Campbell <br> Rosemary Polegato <br> The Norweigan School of Management and Rosemary Polegato Marketing, Norway <br> | University of Otago, New Zealand | Rob Summerby-Murray |
| :--- | :--- |
| University of Zhejiang, China | Anne Semple |
| Universidad Autonoma de Madrid, Spain | Judith Weiss |

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## 8 PROGRAMMES AND COURSES OF INSTRUCTION

This section provides alphabetically ordered descriptions of all Minor, Major and Honours programmes, including those that are interdisciplinary and those that centre on one discipline, as well as course descriptions for all disciplines. The course listings by disciplines are not an indication in all instances that a separate department exists for that discipline or that all courses are offered each year.

## AMERICAN STUDIES

## Interdisciplinary B.A. Programmes

## MINOR in American Studies is 24 credits earned as follows:

6 from English 3711, 3721
9 from History $1601,1651,2510,3520$
9 from Art History 3061, 3071, English 4701, Geography 3301, History 3511, 3521, 3531, 3561, 4500, 4510, 4571 Philosophy 3421, 3451, Political 2201

## MAJOR AREA OF STUDY in American Studies is 60 credits earned as follows:

6 from English 3711, 3721
6 from Geography 2311, 3301
9 from History 1601, 1651, 2510, 3520
3 from Philosophy 3421, 3451
3 from Political Science 2201
33 from English 3871, 3881, 3921, 3931, 4701, Fine Arts 3061, 3071, History 3511, 3520, 3521, 3531, 3561, 4500, 4510, 4571 Religious Studies 2031

## HONOURS in American Studies is 78 credits earned as follows:

60 credits as in the Major, plus:
18 from History 4500, 4990, and 6 credits from Economics, English, Philosophy or Political Science chosen in consultation with the Programme Advisor.

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## ANTHROPOLOGY

Anthropology is the study of humans across space and time. It is essentially cross cultural, and attempts to understand the way of life of other peoples across the world, how they have attempted to solve pan human problems, food, shelter, and repopulation; and what worlds of meaning and explanation they have created. It is a comparative discipline seeking similarities and differences between societies and environments. Its study leads to a heightened awareness of the importance of culture and a sensitivity to cultural differences.

## Disciplinary B.A. Programmes

## MINOR in Anthropology is 24 credits earned as follows:

3 from Anthropology 1011
3 from Social Science at the $1 / 2000$ level
6 from Anthropology at the 2000 level
6 from Anthropology 2801, 3021, 3031, 3311, 3821, 3831, 3841, 3851, 3861, 4021, 4311
6 from Anthropology at the 3/4000 level, chosen in consultation with the Programme Advisor.

## MAJOR AREA OF STUDY in Anthropology is 60 credits earned as follows:

3 from Anthropology 1011
3 from Social Science at the $1 / 2000$ level
6 from Anthropology at the 2000 level
9 from Anthropology 3311, 3021, 3031
6 from Anthropology 3811, 3821, 3831, 3841, 3851, 3861
9 from Anthropology at the 3/4000 level
6 from Anthropology at the 4000 level
18 credits from complementary courses in Social Science, Humanities, Arts and Letters, and 2 chosen in consultation with the Programme Advisor.

## HONOURS in Anthropology (Thesis Option) is 66 credits earned as follows:

$$
\begin{array}{ll}
42 & \text { credits as in the eight lines of the Major, plus: } \\
3 & \text { additional credits from Anthropology 4021, } 4311 \\
15 & \text { from Anthropology at the 3/4000 levels chosen in consultation } \\
\text { with the Programme Advisor } \\
6 & \text { from Anthropology } 4990
\end{array}
$$

## HONOURS in Anthropology (Course Option) is 66 credits earned as follows:

42 credits as in the eight lines of the Major, plus:
3 from Anthropology 4021, 4311
21 from Anthropology at the 3/4000 level chosen in consultation with the Programme Advisor.

Note: The Honours Average will be calculated on all courses required for Honours that have been taken above the 1000 level.
Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.

Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## ANTHROPOLOGY COURSES

## ANTH 1011 (3CR) <br> INTRODUCTION TO ANTHROPOLOGY

The course is designed to introduce students to the major fields of anthropology (physical, archaeological, linguistic and cultural) and to the major domains of cultural and social anthropology (types of society, social change, and political, economic, kinship and religious institutions).
Exclusion: SOAN 1011

## ANTH 2401 (3CR) <br> ANTHROPOLOGY AND THE LIFE COURSE

This course examines the human life course in comparative perspective. It expands on many of the anthropological concepts introduced at the 1000 level, but centres on exploring the relationship between individuals and their ecological and sociocultural environments throughout the life cycle. It covers such topics as birth, infancy, childhood, adolescence, family relations, and work in different cultures.
Prereq: ANTH 1011 and 3 credits in Social Science; or permission of the Department.
Exclusion: SOAN 2401

## ANTH 2501 (3CR) <br> ENVIRONMENT AND SOCIETY

A study of the various types of society, both past and present, that have emerged or been transformed through their interaction with their environments. The course will explore features associated with the major forms of society from foraging, through horticultural and agrarian, to industrial and post-industrial societal types. It will explore such themes as demography, resource exploitation, ecological adaptation, energy access, and environmental impact, in the context of social organization and societal formation.
Prereq: Anthropology 1011 and 3 credits in Social Science; or permission of the Department.
Exclusion: SOAN 2501

## ANTH 2521 (3CR)

ANTHROPOLOGICAL PERSPECTIVES ON DEVELOPMENT
An examination of development issues at the global and local levels, with emphasis on gender and indigenous peoples. The focus will fall on such questions as "What is development?" and "Who benefits?" The course reviews the contribution of applied anthropology, participatory action research, and popular education to development models, theory, and praxis.
Prereq: ANTH 1011 and 3 credits in Social Science; or permission of the Department.
Exclusion: SOAN 2521

ANTH 2801 (3CR)
ABORIGINAL PEOPLES AND CULTURES OF CANADA
An introduction to traditional and contemporary aboriginal societies and cultures of Canada, with particular attention being paid to their major regional divisions and issues of modernization affecting each.
Prereq: ANTH 1011 and 3 credits in Social Science; or permission of the Department.
Exclusion: SOAN 2801
ANTH 3021 (3CR)

## PERSPECTIVES IN ANTHROPOLOGY

A review of the historical emergence of and major approaches taken to cultural and social anthropology. It will introduce the students to the major components of evolutionism, neo-evolutionism, particularism, functionalism, culture and personality, cultural materialism, and ecological anthropology.
Prereq: ANTH 1011 and 6 credits from 2000 level Anthropology courses; or permission of the Department

## Exclusion: SOAN 3021

## ANTH 3031 (3CR) <br> INDIGENOUS KNOWLEDGE SYSTEMS: THEORETICAL AND METHODOLOGICAL ISSUES

This course explores the epistemology of systems of knowledge of Indigenous Peoples throughout the world. We ask questions such as "How is knowledge constructed?" "What is embodied in the terms "science" and "ethnoscience?" "Does Indigenous Knowledge differ from Scientific Knowledge and are there possibilities for integration in education, development and research?"
Prereq: ANTH 1011 and 6 credits from 2000 level Anthropology courses; or permission of the Department
Exclusion: SOAN 3031
ANTH 3101 (3CR)
SOCIAL INEQUALITY
A critical and comparative analysis of social inequality, one of the original and central issues in social thought. The course will consider the major theoretical interpretations of the various forms of structured social inequality.
Prereq: ANTH 1011 and 6 credits from 2000 level Anthropology courses; or permission of the Department
Exclusion: SOAN 3101

## ANTH 3231 (3CR)

## CULTURE AND COMMUNICATION

This course presents an anthropological analysis of verbal and non-verbal systems of communication as well as the influence of language on human cognition. The aim is to develop an understanding of the role of bodily movements, facial expressions, and the use of personal space and symbolic gestures in the communicative process. Prereq: ANTH 1011 and 6 credits from 2000 level Anthropology courses; or permission of the Department
Exclusion: SOAN 2231, 3231

## ANTH 3311 (3CR) <br> ANTHROPOLOGICAL RESEARCH METHODS

This course introduces students to the central elements in
anthropological field research methods, past and present. Topics covered include: research goals and project design; participant-observation and related techniques for acquiring original data; practical and ethical considerations regarding the field experience.
Prereq: ANTH 1011 and 6 credits from 2000 level Anthropology courses; or permission of the Department
Exclusion: SOAN 3311

## ANTH 3321 (3CR)

## FIELD COURSE IN ANTHROPOLOGY

This course is designed to provide students with an intensive field experience, during which they pursue research on a topic to be chosen by the Instructor. As such, the course is not designed to be offered during normal semester time, but is available to students through Continuing and Distance Education. Completion of ANTH 3311
(Anthropological Research Methods) is recommended before registering for this course.
Prereq: Permission of the Department

## ANTH 3401 (3CR)

## BELIEF SYSTEMS

This course explores the relationship between ideas, beliefs and social/cultural context. It covers a wide range of phenomena, among which are magic, witchcraft, shamanism, initiation and other types of rituals, and religious movements.
Prereq: ANTH 1011 and 6 credits from 2000 level Anthropology courses; or permission of the Department
Exclusion: SOAN 3401
ANTH 3421 (3CR)
FOLKLORE
A survey of the various types of folklore - tale, song, rhyme, riddle, proverb, belief, and custom with particular attention to their form and function in relation to their contextual setting. Collection and analysis of examples by students will be combined with the use of materials from the Mary Mellish Archibald Memorial collection in the Library. Prereq: ANTH 1011 and 6 credits from 2000 level Anthropology courses; or permission of the Department

## Exclusion: SOAN 3421

ANTH 3531 (3CR)
FAMILY AND KINSHIP
A study of a central principle of social organization and a major institution in society. The course will investigate the forms and functions of kinship and the role of and changes in the family in relation to pre-industrial, industrial and post-industrial societies.
Prereq: ANTH 1011 and 6 credits from 2000 level Anthropology courses; or permission of the Department
Exclusion: SOAN 3531

## ANTH 3541 (3CR)

## ETHNOBOTANY

Ethnobotany is the systematic study of how people of a particular region use and relate to plants. The scope of the course is global with special emphasis on the ecosystems of the Atlantic Region. Each year focuses on a different ecosystem. This is a field course, incorporating field trips and site visits as a class and for independent study, and providing basic skills for carrying out ethnobotanical fieldwork - plant identification and description, taxonomies, applications of specific plants for food, technology and medicine in different cultural traditions, ethnobotanical research methods and ethical issues.
Prereq: ANTH 1011 and 6 credits from 2000 level Anthropology courses; or permission of the Department
Exclusion: SOAN 3541

## ANTH 3621 (3CR)

HEALTH AND CULTURE
A review of the relations between human health and culture, biology and environment, with reference to the social dimensions of health, sickness, disease, and treatment. Through cross cultural and historic comparisons, connections between mainstream and alternate medicine are explored, and the role of anthropology in clinical settings and international health is discussed.
Prereq: ANTH 1011 and 6 credits from 2000 level Anthropology courses; or permission of the Department
Exclusion: SOAN 3621

## ANTH 3811 (3CR)

CARIBBEAN ETHNOGRAPHY
An introduction to the peoples and cultures of the Caribbean region through both a general review of the region and a detailed and critical analysis of specific ethnographies.
Prereq: ANTH 1011 and 6 credits from 2000 level Anthropology courses; or permission of the Department
Exclusion: SOAN 3811
ANTH 3821 (3CR)

## MARITIME ABORIGINAL CULTURES IN ETHNOGRAPHIC PERSPECTIVE

This course focuses on the aboriginal cultures of Atlantic Canada, offering an overview of the region and critical appraisal of ethnographic materials relating to its various peoples. Topics covered include: oral tradition, language and identity, healing and traditional medicine, spirituality, relations with Euro-Canadians, political movements, and issues of resource management
Prereq: ANTH 1011 and 6 credits from 2000 level Anthropology courses; or permission of the Department
Exclusion: SOAN 3821
ANTH 3831 (3CR)

## AREAL ETHNOGRAPHY

An ethnographic study of an area other than those covered in other 3800 courses.
Prereq: ANTH 1011 and 6 credits from 2000 level Anthropology courses; or permission of the Department
Exclusion: SOAN 3831

## ANTH 3841 (3CR) <br> SOUTHEAST ASIAN ETHNOGRAPHY

A course addressing social, cultural, and political issues in Southeast Asia from historical and contemporary perspectives, and considering social change and culture persistence in the region and in particular countries. Current topics such as refugees, biodiversity, gender, trade and development, nationalism, the legitimization of power, and relations between ethnic minorities and the state will be examined.
Prereq: ANTH 1011 and 6 credits from 2000 level Anthropology courses; or permission of the Department
Exclusion: SOAN 3841

## ANTH 3851 (3CR)

## ARCTIC ETHNOGRAPHY

A survey course exploring the diversity of the circumpolar regions, Siberia, Alaska, Greenland, Scandinavia and the Canadian North. How indigenous cultures have flourished in the harshest environment on earth will be examined. In addition, current issues facing indigenous peoples today such as, land claims, self-government, intellectual property rights, and transnational linkages, will be discussed.
Prereq: ANTH 1011 and 6 credits from 2000 level Anthropology courses; or permission of the Department
Exclusion: SOAN 3851
ANTH 3861 (3CR)

## AFRICAN ETHNOGRAPHY

A course in which ethnographic studies of African peoples will be considered from a critical perspective. through course-readings and lectures and in extended class discussions covering a range of topics including art, ritual, gender, history, economy and world view. Students will be called upon to question the ways in which Africa and African people have been represented in anthropological, colonial and popular discourses. Current issues that dominate academic and popular writing on the continent and its inhabitants will be approached from this same critical stance.
Prereq: ANTH 1011 and 6 credits from 2000 level Anthropology courses; or permission of the Department

## ANTH 3911 (3CR)

## INTERMEDIATE SPECIAL TOPICS IN ANTHROPOLOGY

An intermediate course which focuses on topics not covered by current course offerings in Anthropology, or topics not covered in depth in the courses offered.
Prereq: ANTH 1011 and 6 credits from 2000 level Anthropology courses; or permission of the Department
Exclusion: SOAN 3911
ANTH 4021 (3CR)
ANTHROPOLOGICAL THEORY
This seminar course is an advanced consideration of twentieth century anthropology. It explores the emergence and impact of major national styles of anthropological thought as well as the contribution of key individuals.
Prereq: Anthropology 3021 or 3031, 3311; and three additional 3000 level credits in Anthropology; or permission of the Department.
Exclusion: SOAN 4021

ANTH 4311 (3CR)
CRITICAL ETHNOGRAPHY
An advanced seminar exploring the relationship between anthropological field research - fieldwork - and anthropological writing - ethnographies. This course deals with issues of form, content and purpose in contemporary ethnographies. The status of ethnographic 'facts' and 'truth' is a central concern.
Prereq: ANTH 3021 or $3031 ; 3311 ; 3811$ or 3841 or 3851 or 3861 or 3831; or permission of the Department.

## Exclusion: SOAN 4311

## ANTH 4401 (3CR)

## SYMBOLS AND SOCIAL CATEGORIES

This is an advanced course on the social construction of meaning and its structural and interactional consequences. It investigates the underpinnings of culture and the bases of human social action.
Prereq: ANTH 3021; or 3031; 3311; 3401 or 3421; or permission of the Department.
Exclusion: SOAN 4401

## ANTH 4521 (3CR)

## ECOLOGICAL ANTHROPOLOGY

An examination of the theoretical assumptions of ecological anthropology and its historical development, through case studies illustrating differing types of adaptions to the environment and differing relations between humans and nature. Current issues in land and resource management on the global and local levels will be examined, as will the role of anthropologists in environmental education and advocacy.
Prereq: ANTH 3021 or $3031 ; 3311 ; 3811$ or 3841 or 3851 or 3861 or 3831; or permission of the Department.

## Exclusion: SOAN 4521

## ANTH 4531 (3CR)

## CULTURAL ECOLOGY

This course explores the relationship amongst human groups and their social, symbolic and physical surroundings. It discusses cultural systems as the means by which humans adapt to, interact with, and invest meaning into, their environments. Students will become familiar with current theoretical, methodological and applied issues in cultural ecology with special emphasis on traditional plant knowledge.
Prereq: ANTH 3541; or permission of the Department
Exclusion: SOAN 4541

## ANTH 4901 (3CR)

## ISSUES IN ANTHROPOLOGY

A study of specific issues in Anthropology.
Prereq: ANTH 3021 or 3031; three additional 3000 level credits in Anthropology; or permission of the Department.

## Exclusion: SOAN 4901

## ANTH 4911 (3CR)

ADVANCED SPECIAL TOPICS IN ANTHROPOLOGY
An advanced course which focuses on topics not covered by current course offerings in Anthropology, or topics not covered in depth in the courses offered.
Prereq: ANTH 3021 or 3031; three additional credits in Anthropology; or permission of the Department.

ANTH 4990 (6CR)
HONOURS THESIS
Prereq: Permission of the Department.

## SOCIOLOGY/ANTHROPOLOGY

Note: Interdisciplinary Major Area of Study and Honours in Sociology/Anthropology are also available. See Sociology/Anthropology.

## ART HISTORY

## Disciplinary B.A. Programmes

## MINOR in Art History is 24 credits earned as follows:

6 from Art History 2001, 2011
18 from Art History at the 3/4000 level, chosen in consultation with the Programme Advisor (Classics 3601, 3611, 3701 and/or 3711 may be included)

MAJOR AREA OF STUDY in Art History is 60 credits earned as follows:

6 from Art History 2001, 2011
36 from Art History at the 3/4000 level, (Classics 3601, 3611, 3701 and/or 3711 may be included)
18 from complementary courses in Arts and Letters and Humanities, chosen in consultation with the Programme Advisor.

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## BIOCHEMISTRY

Biochemistry is the study of the chemicals and chemical processes associated with living organisms.

## Interdisciplinary B.Sc. Programmes

## MAJOR AREA OF STUDY in Biochemistry is 72 credits earned as follows:

6 from Biology 1001, 1501
6 from Math 1111, 1121, 1131
6 from Physics 1051, 1551, 3521
6 from Chemistry 1001, 1021
6 from Chemistry 2111, 2121
3 from Biology 2601
6 from Biology 2101, 2301, 2401
3 from Chemistry 2211, 2311, 3411
3 from Biochemistry 2001
9 from Biochemistry 3501, 3531, 4521
6 from Biochemistry at the 4000 level
6 from Biology at the 3/4000 level, chosen in consultation with the Programme Advisor.
6 from Chemistry at the 3/4000 level, chosen in consultation with the Programme Advisor.

## HONOURS in Biochemistry is 81 credits earned as follows:

72 credits as in the Major
9 from Biochemistry 4990 and Biochemistry 4903 or Biology 4903
Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## BIOCHEMISTRY COURSES

## BIOC 2001 (3CR)

INTRODUCTORY BIOCHEMISTRY
The structures, properties and reactions of the principal molecules present in living cells will be discussed. All of the major classes of biological molecules (carbohydrates, nucleic acids, lipids and amino acids) and their polymers (e.g. polysaccharides, proteins) will be discussed: there will be a major emphasis on the relationships between their structure and their function. The central place of water in biological systems will also be discussed. There will be a major emphasis on the structure/function relationships of the above molecules. The importance of acid-base equilibria, the principles of elementary bio-energetics and elementary enzyme kinetics will be explored. In addition basic primary metabolism (glycolysis, citric acid cycle, betaoxidation, electron transport, photosynthesis and fatty acid synthesis) will be introduced. Weekly 3-hour laboratory sessions will provide first hand experience in the study of biological molecules and biochemical techniques.
Prereq: BIOL 1501, CHEM 2101 or 2111; or permission of the Department

## BIOC 3501 (3CR)

## METABOLISM

Life depends on the coordinated biochemical transformations of matter, energy and information through metabolic pathways. Many of these paths are conserved in a wide range of organisms. We will cover the central metabolic strategies and pathways, including chemoautotrophic, respiratory and photosynthetic electron transport, chemiosmotic generation of ATP, the Calvin cycle and carbohydrate metabolism, glycolysis, gluconeogenesis, the pentose phosphate pathway, amino acid and nucleotide metabolism, fatty acid and lipid metabolism, along with selected topics in secondary metabolism. There is a strong emphasis on how organisms integrate the various metabolic paths, and how fluxes through the paths are balanced. Weekly 3-hour laboratory sessions will provide first hand experience in the study of metabolic biochemistry. Prereq: BIOC 2001, BIOL 1501; or permission of the Department.

## BIOC 3531 (3CR) <br> MOLECULAR BIOLOGY

This course will focus on the "central dogma" of molecular biology DNA makes RNA makes protein. Lectures and laboratory exercises will encompass a study of the nucleus and its relationship to gene expression, and the structure of eukaryotic and prokaryotic genes. The genetic code, replication and repair of DNA, synthesis and translation of RNA in to protein primary structure and the evolution and preservation of DNA sequences will be examined. Genetic recombination mechanisms and their application in biotechnology will also be explored.
Prereq: BIOL 2601 and 3101 and BIOC 2001; or permission of the Department.

## BIOC 4501 (3CR) <br> METABOLIC REGULATION

Intact biochemical systems are webs of reactions and interactions functioning both temporally and spatially: biochemical/physiological processes function through finite time, and are molded by distance and volume. The response of biochemical webs of reactions to internal and external information is referred to as metabolic regulation. These responses may take place in a time window measured in seconds or, in the case of seasonal effects, months, and even years. Biochemistry 4501 will examine 'traditional' theories and modeling of regulation, regulation at the substrate, enzyme (particularly phosphorylation networks), gene transcription and protein translation levels. This traditional approach will be compared to alternative systems-based approaches of metabolic control theory. In this light we will look at how animal systems adapt to drastic modification eg. gene knockout or protein over expression and how some of these recent observations pose a serious challenge to conventional biochemical/physiological thinking.
Prereq: BIOC 3501 or permission of the Department.

## BIOC 4511 (3CR)

## SPECIAL TOPICS IN BIOCHEMISTRY

This course provides an opportunity for a student to undertake the study of a topic in which she/he has a special interest. The course work will deal with different selected areas in modern Biochemistry. The programme of study will be jointly planned by the student and a faculty member. The content, format, and prerequisite will vary depending upon the particular area of Biochemistry to be covered, but generally will require the agreement of an instructor and permission of the Biochemistry programme director. The course can be carried out in one term or throughout the year for three credits.

## BIOC 4521 (3CR) <br> PROTEIN BIOCHEMISTRY

The topics covered in Biochemistry 4521 include protein structure (primary, secondary, tertiary and quaternary); the relationship between structure and biological function; enzyme catalysis and mechanism; isolation, purification and characterization of proteins; metabolism of proteins (synthesis and degradation) and recent trends in protein design. This course relies heavily on the internet resources that have become highly developed during the last decade. Students will become familiar with sequence comparison, motif searching and development of visual protein structures constructed from the protein structural data bases available over the web. The laboratory will give students practical experience with the fun and frustration of protein isolation, enzyme purfication and kinetics, and protein/ligand binding phenomena. Prereq: BIOC 3501; or permission of the Department.

BIOC 4541 (3CR)

## BIOCHEMICAL ADAPTATION OF ANIMALS

Recent findings in adaptational biochemistry will be discussed in a seminar format. Emphasis will be placed on the adaptation of organisms to the stresses of oxygen limitation, temperature, salinity and pressure extremes.
Prereq: BIOC 3501 or permission of the Department.

BIOC 4551 (3CR)

## PLANT BIOCHEMISTRY

This course will deal with the role of compartmentation in the regulation of plant metabolism. Following discussion of the plant cell and its organelles, the location of metabolic routes will be examined, including the synthetic and degradative metabolism of carbon and nitrogen compounds. Other topics to be examined will include; membrane structure and transport of metabolites, shuttles and photorespiration; symbiotic metabolism of lichens, root nodules; algal-invertebrate associations. Laboratory studies will complement classroom discussion. Prereq: BIOC 3501; or permission of the Department.

## BIOC 4903 (3CR)

## CURRENT ADVANCES IN BIOCHEMISTRY

A seminar course for Honours students in Biochemistry, which will critically evaluate a wide range of topics from the current literature. Students will be expected to deliver seminars on topics outside their thesis areas and present preliminary thesis results.
Coreq: Registration in BIOC 4990; or permission of the Department.
BIOC 4990 (6CR)
HONOURS THESIS
Prereq: Consent of supervising staff member prior to registration and permission of the Chair of the Biochemistry Programme.

## BIOLOGY

Biology is the scientific study of living things: their form, their function, their origin and their behaviour. The study of Biology can be an important part of a liberal education, for to understand it well requires knowledge of chemistry, physics, mathematics, and natural history; to describe it well requires a command of language and ability to present observations visually; to appreciate it requires an awareness of human nature, both past and present, and the interplay between humans and other living organisms and their common environment. For three thousand years this discipline has developed to describe living things in aid of the arts of healing, of gardening and of living. Today it abounds with exciting new knowledge and discoveries, so that wise people still read about it with amazement or pursue it with delight.
In this department three things are attempted: to give all students an understanding of the scope, techniques and general principles which underline Biology; to encourage independent study and self-learning where possible; to give those students who are seriously interested in advanced studies an opportunity of exploring the areas of special interest to faculty who are primarily concerned with the fields of ecology and physiology.
Students intending to take a Major or Minor or Honours in Biology should consult the Department Handbook and a Programme Advisor before completing registration.

## Disciplinary B.Sc. Programmes

## MINOR in Biology is 24 credits earned as follows:

| 6 | from Biology 1001, 1501 |
| :--- | :--- |
| 3 | from Chemistry 1001 |
| 6 | from Biology 2101, 2301, 2401, 2601 |
| 9 | from Biology at the 3/4000 level, chosen in consultation with the |
|  | Programme Advisor. |

## MAJOR AREA OF STUDY in Biology is 66 credits earned as follows:

[^0]Note: Courses with significant biological content offered by other departments may be approved as biology credits (to a maximum of 6 credits, by permission of the Biology Dept.)

## HONOURS in Biology is 84 credits earned as follows:

66 as in the Major (except divisional distribution in lines eight to ten not required), plus:
3 from Biology 3701, 4711
9 from Biology 4903, 4990
6 from Biology at the 3/4000 level, chosen in consultation with the Programme Advisor

Note: The thesis required will involve laboratory or field investigation, and unless the candidate shows satisfactory ability to carry on independent work, honours will not be recommended. With permission of the Biology Department, up to 6 credits from an approved list of courses given in other departments can be used as the equivalent of Biology courses in the Major or Honours.
Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## BIOLOGY COURSES

## BIOL 1001 (3CR) <br> INTRODUCTORY BIOLOGY

A lecture and laboratory course designed to present a general introduction to the biology of living organisms. A systems approach will be used to explore how living organisms respond to the complex problems encountered while obtaining nutrition, carrying out internal fluid transport and gas exchange, getting rid of wastes, and growing and interacting with the environment and other life.

## BIOL 1201 (3CR) <br> HUMAN BIOLOGY

A lecture and laboratory course based on the application of biological principles to practical human concerns. It will introduce the development, structure and function of the human body, and mechanisms involved in degenerative infectious diseases. This will be followed by a discussion of human reproduction and genetics. The impact of evolutionary theory on our understanding of the human species will be presented, as well as the interdependence between natural ecosystems and human activities. Threats to the environment through pollution and overpopulation will be discussed. This course is restricted to non-science majors. Science majors require the instructor's permission to enrol.

BIOL 1211 (3CR)

## WORLD ECOSYSTEMS

This course will introduce students to the basic concepts of population, community and ecosystem level ecology. Topics will include population growth, competition, succession, community composition and the cycling of energy. Field and laboratory work will stress direct measurement and observation of natural situations that illustrate these concepts. Students will take this course at a field station that offers adequate housing and laboratory facilities. These field stations may be anywhere in the world, but would most likely be in the Maritimes, the Caribbean or the Canadian Rockies. This course is offered only during the spring/summer session through Continuing and Distance Education and only to non-Science majors.

## BIOL 1501 (3CR) <br> CELL BIOLOGY

A course providing an introduction to the structure, organization and functions of the cell, which is the fundamental structural and functional unit of living organisms. Particular emphasis will be placed on eukaryotic cells. Topics to be discussed include membranes and organelles, communication within and between cells, membrane transport, the cell cycle, meiosis and mitosis. There is a laboratory component to this course.
Prereq: BIOL 1001, CHEM 1001; or permission of the Department.

## BIOL 2101 (3CR) <br> POPULATION AND COMMUNITY BIOLOGY

A course designed to introduce current concepts of population and community ecology through lectures, field trips and laboratory exercises, using local organisms whenever possible. Familiarity with these organisms, principally aquatic insects, will be obtained through field trip and laboratory exercises.
Prereq: BIOL 1501; or permission of the Department.

## BIOL 2301 (3CR) <br> PLANT BIOLOGY

An introductory course in botany designed to present the structure and function of plants with an emphasis on vascular plants. Topics considered will include comparative evolutionary history, and development and functional adaptations to the environment.
Prereq: BIOL 1501; or permission of the Department.

## BIOL 2401 (3CR)

## ANIMAL BIOLOGY

A lecture and laboratory course introducing students to the structure and function of major groups of invertebrate and vertebrate animals on a comparative basis. Topics to be covered in lectures will include comparative anatomy and phylogeny, and the evolution and function of locomotory, digestive, excretory, respiratory, nervous and reproductive systems. Laboratory exercises will be based on observation of both preserved and living material.
Prereq: BIOL 1501; or permission of the Department.

BIOL 2601 (3CR)

## GENETICS

An introduction to genetics which will address the seemingly paradoxical phenomena of genetic continuity and genetic variation of living beings. This will be achieved by examining the cellular and molecular basis of gene replication, recombination and mutation. Viruses, bacteria and eukaryotes of various levels of organismic complexity will serve as examples both in lectures and laboratories.
Prereq: BIOL 1501, CHEM 1021; or permission of the Department.

## BIOL 3011 (3CR) <br> EVOLUTION

A lecture-tutorial course investigating modern theories of biological evolution and natural selection. Discussion of these ideas requires an understanding of the types of evidence for biological change in organisms, of Mendelian genetics and mechanisms of inheritance, of sources of genetic variability in natural populations and of genetic equilibrium of populations.
Prereq: BIOL 2601; or permission of the Department.

## BIOL 3021 (3CR) <br> PALAEONTOLOGY

Life on earth did not always exist in the form we know it today. Both physical and biological aspects of the environment have changed repeatedly and dramatically over time. This course will provide an overview of the major fossil plant and animal taxa in the context of the history of life on Earth. Morphology and anatomy of organisms will be discussed in relation to accompanying changes in marinal and terrestrial environments. The diagnostic features of the organisms used as time (biostratigraphy) and/or environmental (paleoecology) indicators will be emphasized when appropriate. We will discuss macroscopic and microscopic forms of life.
Prereq: BIOL 2301 and 2401; or permission of the Department.

## BIOL 3101 (3CR)

## MICROORGANISMS

An introduction to the protists (algae, bacteria, fungi, protozoa) and to the viruses. The intent of this course is to make students familiar with the characteristics and nomenclature used to distinguish: (1) cells and viruses, (2) the major protists, and (3) sub-groups within each protist group. The natural and applied roles of these organisms will be discussed. Special emphasis will be placed on discussion of the bacteria because of the great diversity of habitats which are occupied as well as the equally great diversity of roles performed. Laboratory work will introduce the students to microbiological techniques and methods of identification.
Prereq: BIOC 2001; or permission of the Department.

## BIOL 311 (3CR)

## APPLIED MICROBIOLOGY

Discussion will centre on microorganisms as models to study interrelationships between physiology and ecology of the groups. Students will also be introduced to microorganism growth and the principles of co-ordinated regulation that achieve balanced growth and allow for transition from one environment to another.
Prereq: BIOL 3101; or permission of the Department.

## BIOL 3201 (3CR) <br> ANIMAL PHYSIOLOGY; ADAPTATION AND ENVIRONMENT

This course will focus on the physiological processes underpinning a monumental step in the evolution of the vertebrates, the transition from water to land. In lectures and laboratory exercises, the respiratory, circulatory, acid-base and osmoregulatory adaptations seen in fish to humans will be examined. The integration of animal physiology with the environment will also be studied by investigating metabolism and temperature.
Prereq: BIOL 2401 and BIOC 2001; or permission of the Department.

## BIOL 3211 (3CR) <br> ANIMAL CELL PHYSIOLOGY

This course will investigate physiological processes at the level of the animal cell. In lectures and laboratory exercises, we will examine major principles in neurophysiology, muscle function, sensory systems and endocrinology.
Prereq: BIOL 2401, BIOC 2001, or permission of the Department.

## BIOL 3311 (3CR) <br> ANIMAL DEVELOPMENT

An introductory lecture and laboratory course on animal development. Emphasis will be placed on the development of marine invertebrates, especially the sea urchins, from which a great deal of existing knowledge on development processes is derived. However, the development of selected vertebrates will be studied as well. Topics to be covered include gametogenesis and gametic structure, events at fertilization, mechanisms of cleavage and gastrulation, the organization of the early embryo as derived from experimental manipulation, pattern formation and regeneration.
Prereq: BIOL 2401; or permission of the Department.

## BIOL 3331/3341 (3CR)

## SELECTED TOPICS IN MARINE SCIENCE I AND II

The courses taken for these credits will be from among those offered in the Summer at the Huntsman Marine Science Centre in St. Andrews, N.B. Since course offerings will change yearly, students must obtain permission from the Department before enrolling for any course. All costs associated with the course must be borne by the student.
Prereq: BIOL 2101, 2301, 2401; or permission of the Department.
BIOL 3351 (3CR)
MARINE BOTANY
A lecture, laboratory, and field course summarizing recent advances in our understanding of macroscopic plant growth in the sea. This progress has been based upon studies involving morphology, development, physiology, and ecology. The following topics will be emphasized: the sea as an environment for plants to grow, production of marine plants, morphogenesis and geographic distribution of marine plants and use of marine plants.
Prereq: BIOL 2301 and one of 3361, 3371; or permission of the Department.

BIOL 3361 (3CR)

## MARINE BIOLOGY I: COASTAL SYSTEMS

Estuarine, intertidal and subtidal ecosystems exist at the interface of marine and terrestrial environments. In this course, students will study the ecology of these systems at the individual, population and community level. Topics will include community structure, food webs, reproductive biology of benthic organisms, and effects of physical and anthropogenic factors. The course will involve a field trip to the Huntsman Marine Sciences Centre in St. Andrews, N.B. Students will be expected to contribute to their accommodation costs.
Prereq: BIOL 2101, 2301, 2401; or permission of the Department. Credit cannot be obtained for both BIOL 3301 and 3361.

## BIOL 3371 (3CR) <br> MARINE BIOLOGY II: OPEN OCEAN

Two-thirds of the Earth surface is occupied by pelagic environment of an approximate mean depth of 3700 meters, the open ocean. The evolution of the oceanic basins and the physical and chemical properties of their waters will be discussed in the context of their biological significance. Emphasis will be placed on the functioning of major ecological groups (plankton, nekton and benthos) and on processes controlling their interactions. The course will involve a field trip to the Huntsman Marine Science Centre at St. Andrews where students will study populations and communities of local plankton, nekton and benthos. Students will be expected to contribute to their accommodation costs.
Prereq: BIOL 2101, 2301, 2401; or permission of the Department. Credit cannot be obtained for both BIOL 3301 and 3371.

BIOL 3401 (3CR)

## ANIMAL BEHAVIOUR

A course which will present the development, physiology, ecology and evolution of animal behaviour. Topics to be discussed will include basic concepts of behavioural organization; physiology of behaviour, learning and memory phenomena; behaviour of communication; reproductive behaviour and mating systems; spatial distribution patterns and social systems; migrations and orientation mechanisms; feeding and anti-predator behaviours. Field excursions and laboratory exercises will permit students to observe and to quantify different behaviours in a variety of animal species.
Prereq: BIOL 2101, 2401; or permission of the Department.

## BIOL 3411 (3CR)

## ICHTHYOLOGY

This course provides an overview of the general biology of fish-like chordates, with particular emphasis on the teleost fishes, the most diverse and abundant taxonomic group of living vertebrates. Lectures will focus on adaptations that have allowed fishes to occupy most aquatic habitats and to become the most evolutionary successful group of vertebrates. Lectures will cover aspects of form and function, ecology and behaviour of evolutionary relationships. Laboratory exercises will provide students with practical experience at identifying specimens and learning about their form, function, behaviour, ecology and evolution. Prereq: BIOL 2101 and 2401; or permission of the Department.

## BIOL 3451 (3CR)

## ENTOMOLOGY

Insects surpass all other organisms in their diversity and numbers, comprising over two thirds of the earth's known animals. This course will introduce students to this class of organisms by covering the following six areas: structure, function classification and phylogeny, behaviour and ecology. Throughout the course, evolutionary forces influencing the animals and systems involved will be stressed. Discussions will emphasize the use of the comparative methods to determine what these forces might be.
Prereq: BIOL 2401; or permission of the Department.
BIOL 3501 (3CR)
NATIVE FLORA (VASCULAR PLANTS)
A field-oriented course on identification, taxonomy, and ecology of vascular plants and bryophytes.
Prereq: BIOL 2301; or permission of the Department.

## BIOL 3551 (3CR)

## ECOLOGY OF THE MARITIME PROVINCES

Flora, vegetation and soils of forest, coastal and settlement areas in relationship to geological and climatic controls and to land-use history since European settlement. Ecological history of the Maritime Provinces from the late glacial epoch to the present.
Prereq: BIOL 2101; or permission of the Department. GEOS 1001 and 1021 and BIOL 3501 are recommended prerequisites.

## BIOL 3601 (3CR)

## ECOLOGICAL GENETICS

This course builds on the material presented in Introductory Genetics, presenting theoretical concepts used in investigating the genetic properties of populations. The basic concepts used to describe and measure the genetic variation within and between populations will be presented in a lecture format. Theoretical and observed consequences of population differences will be considered. Students will be expected to participate in discussions and debates focussing on topics related to population genetics. tutorials will provide opportunities to work through mathematical treatments of models and problem solving.
Prereq: Biology 2601, Math 1111, or permission of the department.
BIOL 3611 (3CR)

## MAMMALOGY

Mammals are a successful and diverse group of vertebrates which have long been of cultural, economic and scientific interest to humans. This course will outline the evolution, radiation and biogeography of mammals, followed by a detailed examination of all extant mammalian orders. A strong emphasis of the course will be on the biology, ecology and conservation of North American mammals; however, students will also gain an appreciation for the world-web diversity of mammals, their life history strategies, and related conservation issues.
Prereq: BIOL 2101, 2401; or permission of the Department.

BIOL 3651 (3CR)

## INTRODUCTION TO ORNITHOLOGY

An introduction to the study of birds through lectures, laboratories and field trips. All of the bird families represented in the Maritime region will be discussed, with special emphasis on anatomy, structural adaptations, behaviour and physiology. The species composing the bird communities of the Sackville area will be examined during field trips.
Prereq: BIOL 2101, 2401; or permission of the Department.

## BIOL 3701 (3CR)

BIOMETRICS
This lecture course will introduce data analysis, the principles of experimental design and the formulating and testing of hypotheses. Graphical and statistical (t-test, chi-square test, anova) analyses of laboratory and field collected data will be described, and their appropriate use in Biology discussed.
Prereq: BIOL 1501, the completion of the Mathematics/Computer Science requirement on the Bachelor of Science, and at least two second-year Biology courses; or permission of the Department.
Exclusion: With no more than one course from MATH 2311, MATH 2321, PSYC 2001, PSYC 2011, ECON 2701.

## BIOL 3711 (3CR)

CHEMICAL ECOLOGY
This course deals with the biochemistry of interactions between animals, plants and microorganisms that occur in the natural environment. Strong emphasis is placed on the role of so-called "secondary metabolites" or "natural products" such as alkaloids, flavonoids, terpenoids, etc., in the insect-plant, vertebrate-plant, plant-plant and vertebrate-vertebrate relationships.
Prereq: BIOL 2101, CHEM 2131; or permission of the Department.

## BIOL 3751 (3CR)

## COMPARATIVE CHORDATE ANATOMY

A lecture and laboratory course in which the structure, function and diversity of vertebrate animals will be examined and compared. It will discuss successive modifications of structural and functional systems found in vertebrates, and speculate on the survival value of these systems and on their relationships to contemporary environments.
Prereq: BIOL 2401; or permission of the Department.

## BIOL 3801 (3CR)

THEORETICAL AND EVOLUTIONARY ECOLOGY
This course begins with the classical growth curves, competition and predator-prey equations by Lotke, Volterra and others. The use of these simple mathematical models in niche and community theory is discussed, and the alternative approaches to interpreting natural communities are introduced (e.g. system analysis, neutral community models). The underlying assumptions are discussed in the light of modern neo-Darwinian and physiological approaches.
Prereq: BIOL 2101, either BIOL 2301 or 2401; MATH 1111, 1121; or permission of the Department.

## BIOL 3901 (3CR) <br> PLANT DEVELOPMENT

A lecture and laboratory course designed to explore the question of development of anatomical structures within vascular plants. The role of heredity and environment in signalling pattern development from a single fertilized seed to the multicellular reproductive plant will be discussed. Particular attention will be paid to the function of plant growth factors as signal devices.
Prereq: BIOL 2301 and BIOC 2001; or permission of the Department.

## BIOL 3911 (3CR) <br> PLANTS AND HUMAN SOCIETY

This course will deal with the interactions between plants and human societies from the time of the introduction of agriculture until the present. It will include the consideration of the evolution of vascular plants, especially those important to agriculture and forestry. It will emphasize the origins of agriculture on various continents; it will discuss economic botany and the present day commercial uses of plants. Consideration will be given to interrelations between plants and societies in their dietary, cultural and religious connotations. Finally, the course will consider world food shortages, either present or potential, and possible ways to alleviate these.
Prereq: First year level Biology; or permission of the Department.

## BIOL 3941 (3CR)

PLANT PHYSIOLOGY
A lecture and laboratory course designed to present a general introduction to the physiology of plants. Topics that will be discussed include photosynthesis, from the level of light entrapment to that of the fixation of carbon dioxide; translocation of sugars and the storage of energy rich food reserves; transpiration and water loss from leaves, as well as uptake and water transport within the plant; and mineral nutrition including uptake and transport of nutrients as well as their distribution and use.
Prereq: BIOL 2301 and BIOC 2001; or permission of the Department.

## BIOL 4001 (3CR) <br> LIMNOLOGY

An introduction to modern quantitative concepts of fresh water ecology. Emphasis will be placed on field and laboratory studies of local freshwater habitats.
Prereq: BIOL 2101, 2301, 2401; CHEM 2131; or permission of the Department.

## BIOL 4101 (3CR) <br> BEHAVIOURAL ECOLOGY

A course to explore the relationships between animal behaviour and ecology, emphasizing the behavioural strategies which animals have evolved to enhance their survival and to increase their reproductive success. Topics such as foraging, living in groups, resource defence, sexual selection, parental care, mating systems, altruism and communication will be discussed within a neo-Darwinian framework using optimality models and game theory.
Prereq: BIOL 3011, 3401; or permission of the Department.

BIOL 4141 (3CR)

## MYCOLOGY

This course will give an overview of true Fungi (Ascomycetes, Basidiomycetes, Zygomycetes and Chytridiomycetes), and of the fungus-like Oomycetes. Structure/function relationships will be emphasized, as well as the significance of the various groups in ecology, medicine, plant disease and their use in industry.
Prereq: BIOL 3101 (or as a co-requisite); or permission of the Department.

## BIOL 4151 (3CR) <br> VIROLOGY

This is an introductory course on virology that will cover the fundamental features of animal, bacterial, and plant viruses. Lectures will cover the biochemical genetic features of viral structure and replication, techniques used in studying viruses, the evolution of viruses, cell defence against viruses, the history of viruses as the causal agents of animal and plant disease, and current antiviral strategies. The role of viruses as agents of evolutionary change, and their use in modern molecular genetics will also be discussed.
Prereq: BIOL 2601, 3101 (Bio 3101 may also be taken as a co-requisite); or permission of the Department.

## BIOL 4201 (3CR)

## ENVIRONMENTAL PHYSIOLOGY

This advanced course in animal physiology will examine the physiological and biochemical strategies animals use to survive in diverse, often stressful environments. Using primary literature from scientific journals, this course will focus on animal responses to environmental conditions such as hypoxia/anoxia, high and low temperatures, overwintering, altitude, environmental pollutants, osmotic stress and UV radiation. Weekly discussion groups on recent topical papers will form a major component of this course.
Prereq: BIOL 3201, 3211; or permission of the Department.
Exclusion: BIOL 4201- Topics in Comparative Animal Physiology

## BIOL 4211 (3CR) ENDOCRINOLOGY

This is a course that will cover vertebrate hormone systems generally although some aspects of invertebrate systems may be examined. Lectures and seminars will discuss hormone synthesis, control of secretion, modes of secretion and general mechanisms of action. Also, specific hormone systems such as the hypothalamus-pituitary axis, renin-angiotensin system, pituitary-adrenal axis etc., will be examined.
Prereq: BIOL 3201 or 3211 ; or permission of the Department.
BIOL 4221 (3CR)

## EXERCISE PHYSIOLOGY

This advanced lecture-based course will explore the metabolic and systemic basis of exercise, the physiology of training and performance and exercise under special conditions (environment, disease). In addition to studying these fundamentals of exercise physiology, we will also delve into recent research and advancements in the field.
Prereq: BIOL 3201, 3211; or permission of the Department

## BIOL 4251 (3CR) <br> SELECTED TOPICS IN BIOLOGY

The course deals with different selected areas in Biology. The course content, format and prerequisites will vary depending on the particular area of biology to be covered.

## BIOL 4301 (3CR)

## PHYSIOLOGICAL PLANT ECOLOGY

The emphasis in this course will be on the ways plants respond to their environment. Topics include a discussion of transpiration and heat transfer, photosynthesis in nature, vernalization, photoperiodism and response to stress such as drought, temperature, salinity and pollutants.
Prereq: BIOL 2101 and 3941; or permission of the Department.

## BIOL 4371 (3CR)

## ADVANCED MARINE SCIENCE

This course provides students who are seriously interested in marine science with an opportunity for in depth study of selected topics from the most progressive areas of marine science. Depending on student interest all or some of the following areas will be addressed: advances in biological, geological, chemical and physical oceanography and methodology (e.g. application of remote technology in marine exploration, ultra-clean methods of measuring trace nutrients). Emphasis will be placed on specific topics whose progress carries global significance and may include ocean/atmosphere interactions, sustainable fisheries, integrative aquaculture, marine ecological engineering, etc. Prereq: Two of BIOL 3351, 3361 or 3371; or permission of the Department.

## BIOL 4511 (3CR)

## TOPICS IN INVERTEBRATE ZOOLOGY

A course allowing detailed study into several aspects of invertebrate zoology. Each student will be expected to research a specific group of invertebrates thoroughly, and to communicate this information to the other members of the class. In addition, the student will undertake a laboratory study of a topic of interest in invertebrate zoology.
Prereq: BIOL 2401; or permission of the Department.

## BIOL 4701 (3CR) <br> TROPICAL MARINE BIOLOGY

This lecture and field course will introduce students to the fauna, flora and complex interactions in tropical habitats and allow independent research in such habitats. Habitats explored will be coral reefs, reef lagoons, mangrove swamps and rocky shores. Ecological and behavioural interactions of organisms in those areas will be stressed. The field component of this course will take place at a field station in the Caribbean for twelve days that include the week of Independent Study. The course will include six, 3 hour lectures and two weeks at the Field Station. Students will pay all costs of transportation, room, board and lab fees for this expedition.
Prereq: BIOL 2101, 2401, and one of BIOL 3361, 3371; and permission of the Department.

BIOL 4711 (3CR)

## ADVANCED BIOMETRICS

This course deals with the collection and analysis of biological data. Throughout the course, the model-comparison approach will be used, using both parametric and non-parametric techniques. The different approaches to hypothesis testing as developed by Fisher,
Neyman-Pearson and Bayes, simple power calculations and an introduction to computer-intensive methods (Monte Carlo, Bootstrap, etc.) will be presented. Examples discussed during lectures or assignments will be analyzed with SYSTAT and Resampling Stats. Both programs will be available on Maclab computers. The course is intended for students who have taken an introductory course in statistics, and who are familiar with the basic assumptions of classical statistical analysis. The range of topics covered depends to some extent on the interest and experience of the participants.
Prereq: MATH 2311, or PSYC 2001, or BIOL 3701; or permission of the Department.

## BIOL 4903 (3CR)

CURRENT ADVANCES IN BIOLOGY
A seminar course for Honours students in Biology which will critically evaluate a wide range of topics from the current literature in all branches of biological science. Students will be expected to deliver seminars on topics outside their thesis area and present preliminary thesis results. Coreq: Registration in BIOL 4990; or permission of the Department.

## BIOL 4950 (6CR) <br> SPECIAL TOPICS IN BIOLOGY

A course to permit an advanced student to pursue a special field of study, or to take advantage of a different approach under the direction of an appropriate staff member. Each student's programme will be planned individually using lectures, reading, tutorials, laboratory work, etc.
Prereq: Permission of the Department. Each student must obtain, prior to registration, consent of a staff member who is willing to be a supervisor.

## BIOL 4990 (6CR) THESIS

The thesis requires a report on one or more laboratory, library or field investigations carried out by arrangement with and under the direction of an appropriate member of the staff. This course is open only to candidates for Honours in Biology in their senior year. A minimum grade of B is required in this course for successful completion of an honours degree.
Prereq: Consent of supervising staff member prior to registration and permission of the Department.

BIOL 5103 (3CR)
GRADUATE STUDIES IN BIOLOGY 1
BIOL 5113 (3CR)
GRADUATE STUDIES IN BIOLOGY II
BIOL 5203 (3CR)
GRADUATE STUDIES IN BIOLOGY III
BIOL 5213 (3CR)
GRADUATE STUDIES IN BIOLOGY IV
Prereq: Permission of the Department.
BIOL 5990 (6CR)
M.SC. THESIS IN BIOLOGY

## CANADIAN PUBLIC POLICY

## Interdisciplinary B.A. Programme

## MAJOR AREA OF STUDY in CANADIAN PUBLIC POLICY is 60 credits earned as follows:

18 from Commerce 1001, 2131, 2301, Computer Science 1711, or 1851 Math 1111, 2311
27 from Economics 1000, (or 1001 and 1011), 2301, 2311, 3101, 3111, Political Science 1000, 2101, 3101, 3111
6 from History 3431, 3441, 4420, 4440, Sociology 3521, Anthropology 3851
9 from courses at the 3/4000 levels in Canadian Studies, Commerce, Economics, French, Geography, Political Science, Philosophy, Sociology and Anthropology, chosen in consultation with the Programme Advisor.

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## CANADIAN STUDIES

With the establishment of the Edgar and Dorothy Davidson Chair of Canadian Studies in 1969, Mount Allison University developed its programme of Canadian Studies, at the time the only one of its kind in Canada. The programme was further strengthened in 1977 with the endowment of the Winthrop Pickard Bell Chair of Maritime Studies. The entire programme is designed for those students who wish to increase their knowledge of Canada, its history, institutions and culture. Unity in the Programme is achieved by concentrating on the interrelationships of disciplines within the Canadian context. Participating disciplines include Economics, English, Fine Arts, French, Geography, History, Linguistics, Music, Political Science, Religious Studies, Sociology, and Anthropology.
The comprehensive nature of the Programme and its innate flexibility prepare the student for entrance to a wide range of careers and activities, in post-graduate studies in many areas of concentration, as well as in business, government, journalism, law, library science and social work.

## Interdisciplinary B.A. Programmes

## MINOR in Canadian Studies is 24 credits earned as follows:

12 from Canadian Studies 2001, 2011, 4600
12 from Canadian Studies 3101, 3111, 3121, 3301, 3311, 3401, 3411, $4250 / 1,4651,4661,4950 / 4951$, chosen in consultation with the Programme Advisor

## MAJOR AREA OF STUDY in Canadian Studies is 60 credits earned as follows:

12 from Canadian Studies 2001, 2011, 4600
12 from Canadian Studies 3101, 3111, 3121, 3301, 3311, 3401, 4250/4251, 4651, 4661, 4950/4951
6 from French 1700, 2401, 2501, 2601 or any third year course on the language or literature of French Canada
12 from English 1/2000 series, Economics 1000, (or 1001 and 1011), Fine Arts 2001, 2011, Music 2000, Political Science 1000, History 2410, Geography 1201, 2311, Sociology 1001, Anthropology 1011
18 from Options A, B, C, or D below, chosen in consultation with the Programme Advisor

## A. Multidisciplinary Overview:

Economics 2301, 2311, 3101, 3111, 3201, 3211, 3611, 36213721
English 2801, 3801, 3811, 3821, 3831, 4801
Fine Art History 3021, 3031,3501
French 2601, 3711, 3751, 3771
Geography 3301, 3511, 4311
History 3401, 3411, 3421, 3431, 3441, 3451, 3461, 3501, 4420, 4440,

## 4450

Linguistics 3011
Music 3001
Political Science 2101, 3101, 3111, 3121, 3131, 4100, 4300
Sociology 3111, 3121, 3211, 3521, 3701, 4531
Anthropology 2801, 3821, 3851

## B. Arts and Literature:

English 2801, 3801, 3811, 3821, 3831, 4801

Fine Art 3021, 3031
French 2601, 3711, 3751, 3771
Music 3001

## C. Historical Perspectives:

Economics 3611, 3721
English 2801
Fine Art 3021, 3031
Geography 3301, 3511
History 3401, 3411, 3421, 3431, 3441, 3451, 3461, 3501, 4420, 4440,
4450
Political Science 2101, 3101, 3111, 3121, 4100, 4300

## D. Social Perspectives:

Economics 2301, 2311, 3101, 3111, 3201, 3211, 3611, 3621, 3721
Geography 3201, 3301, 3511
History 3501
Linguistics 3011
Political Science 2101, 3101, 3111, 3121, 3131, 4100, 4300
Sociology 3111, 3121, 3211, 3521, 3701,4531
Anthropology 2801, 3821, 3851

## HONOURS in Canadian Studies is 72 credits earned as follows:

60 credits as in the Major, plus
6 further from Canadian Studies 3101, 3111, 3121, 3301, 3311, 3401, 4250/4251, 4651, 4661, 4950/4951
6 from Canadian Studies 4990
Courses chosen in consultation with the Programme Advisor
Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## CANADIAN STUDIES COURSES

CANA 2001 (3CR)
CANADA AND THE MODERN AGE: AN INTRODUCTION TO THE CANADIAN COMMUNITY
This course provides students with an introduction to contemporary Canada, with a particular focus on politics and economics. It examines the nature of the Canadian economy, the nature and organization of the Canadian state, current political issues, and Canada's place in world affairs.
Exclusion: CANA 2000

## CANA 2011 (3CR)

## AN INTRODUCTION TO CANADIAN CULTURE

This course provides an introduction to Canadian culture and identity. It examines key Canadian symbols and myths and various forms of cultural expression, including film, the arts, literature, and music in relation to Canadian national identity.
Exclusion: CANA 2000

CANA 3101 (3CR)
NATIVE PEOPLES OF CANADA: HISTORICAL PERSPECTIVES
This interdisciplinary course examines the historical, social, and cultural development of the Indian and Inuit peoples of Canada.
Prereq: CANA 2000 or CANA 2001 and 2011, or permission of the Coordinator of the Canadian Studies teaching programme.
Exclusion: CANA 3100

## CANA 3111 (3CR)

## NATIVE PEOPLES OF CANADA: CONTEMPORARY ISSUES

This course explores the dynamics of contemporary First Nations culture in Canada from an interdisciplinary perspective. Among the key issues it seeks to explore are: the development of Native arts and culture in modern Canada, contemporary First Nations philosophy and ethics, and the politics of self-government among various First Nations.
Prereq: CANA 2000 or CANA 2001 and 2011, or permission of the Coordinator of the Canadian Studies teaching programme.
Exclusion: CANA 3100

## CANA 3121 (3CR)

MULTICULTURALISM, IMMIGRATION, AND DIVERSITY IN CANADA
This course will explore the historical development of multiculturalism, its policy framework, alternative conceptions of plurality and diversity within Canada, demographic trends, and current controversies surrounding multiculturalism. It will conclude by looking at future developments in ethno-cultural diversity within Canada and where they might take the Canadian nation.
Prereq: CANA 2001, 2011 or (CANA 2000)

## CANA 3301 (3CR)

CANADIAN WOMEN: CRITICAL PERSPECTIVES
This course provides an interdisciplinary perspective on the role and status of women in contemporary Canada. It focuses on the history of women's political movements, the changing status of women, the impact of the "second wave" of Canadian feminism, Native women, and recent immigrants.
Prereq: CANA 2000 or CANA 2001 and 2011, or permission of the Coordinator of the Canadian Studies teaching programme.
Exclusion: CANA 3300
CANA 3311 (3CR)
CANADIAN WOMEN'S CULTURAL EXPRESSION
This course develops a critical, interdisciplinary perspective on women's cultural expression in contemporary Canada. It examines the role and status of women in contemporary Canadian culture and representations of women in the media, as well as contemporary women's literature, music, and plastic arts.
Prereq: CANA 2000 or CANA 2001 and 2011, or permission of the Coordinator of the Canadian Studies teaching programme.
Exclusion: CANA 3300

## CANA 3401 (3CR)

CONTEMPORARY CANADIAN ISSUES
This course explores contemporary Canadian issues in light of the evolution and development of Canadian institutions, belief systems and social relations.
Prereq: Second-year standing, including at least 6 credits in Humanities and/or Social Sciences, or permission of the Coordinator of the Canadian Studies programme.
Exclusion: CANA 3400

CANA 3411 (3CR)

## SPORT IN CANADIAN SOCIETY

Sport occupies a central role in Canadian culture that extends beyond the mythological popularity of hockey. The sporting culture of Canada affects the lived experiences of Canadians in ways ranging from physical education to Canada's international reputation to gender roles. Sport has become an important part of the service sector economy and has long been a source of local community and national pride. This course explores the role of sport in Canadian society.
Prereq: CANA 2001, 2011(or CANA 2000)
CANA 4250/4251 (6/3CR)
SPECIAL TOPICS IN CANADIAN STUDIES
This course allows a group of students the opportunity to pursue a topic of special interest, not covered in other Canadian Studies offerings Prereq: CANA 2000 or CANA 2001 and 2011, or permission of the Coordinator of the Canadian Studies teaching programme.

## CANA 4600 (6CR)

## INTERDISCIPLINARY SEMINAR ON MAJOR CANADIAN ISSUES

An interdisciplinary seminar on questions of national importance.
Prereq: CANA 2000 or CANA 2001 and 2011, or permission of the Coordinator of the Canadian Studies teaching programme.

## CANA 4651 (3CR)

REGIONAL PROTEST IN ATLANTIC CANADA
This course explores the dynamics of political protest in Atlantic Canada as a response to regional economic underdevelopment. It looks specifically at the origins of Atlantic economic disparity, relations between Ottawa and the Atlantic region, the ways in which Atlantic Canadians have politically responded to disparity, and potential futures for the Atlantic economy.
Prereq: CANA 2000 or CANA 2001 and 2011, or permission of the Coordinator of the Canadian Studies teaching programme.
Exclusion: CANA 4650

CANA 4661 (3CR)
SELECTED TOPICS IN MARITIME CULTURE
This course examines the distinctive attributes of Maritime regional culture. It looks, in particular, at the historical development of Maritime culture, music, literature, painting and other forms of regional cultural expression, and the different cultures in Maritime Canada.
Prereq: CANA 2000 or CANA 2001 and 2011, or permission of the Coordinator of the Canadian Studies teaching programme.
Exclusion: CANA 4650

CANA 4950/4951 (6/3CR)
A PROGRAMME OF INDEPENDENT STUDY
A fourth year tutorial course in a well defined subject area. The syllabus must be planned at the end of the student's third year, in consultation with the Director and, where applicable, with the professor with whom the student will work. Programmes of Independent Study cannot duplicate subject matter covered through regular course offerings. Prereq: CANA 2001 and 2011 (or CANA 2000) Permission of the Coordinator of the Canadian Studies teaching programme.

## CANA 4990 (6CR)

## HONOURS THESIS

Supervised by the Coordinator and with one or more members of the faculty associated with the Programme. The subject must be approved by the Coordinator. The candidate will receive instruction in the techniques of research methods and thesis writing.
Prereq: Permission of the Coordinator of the Canadian Studies teaching programme.

## Courses in Other Disciplines

The following courses also may be taken for credit in the Canadian Studies programme. Please note that courses asterisked only count for credit if the topic is Canadian in the year in which the course is completed. For further details, please contact the Coordinator of Canadian Studies.

## Anthropology

2801 Aboriginal Peoples and Cultures of Canada
3821 Maritime Aboriginal Cultures
3851 Arctic Ethnography

## Economics

1000 Principles of Economics
or
1001 Principles of Microeconomics
and
1011 Principles of Macroeconomics
2301 Issues in Canadian Public Policy
2311 Current Debates in Canadian Public Policy
3201 Money, Banking, and the Canadian Financial System:
Macroeconomic Perspectives
3211 Money, Banking, and the Canadian Financial System:
Microeconomic Perspectives
3401 Canadian Economic History to 1914
3411 Canadian Economic History after 1914
3511 Regional Economics in Canada
3611 Industrial Organization and Policy in Canada
3721 Labour Economics
4950 Directed Readings on Special Topics *
4980 Special Topics in Economics *

## English

2801 Introduction to Canadian Literature
3801 Canadian Literature from the Beginnings to 1914
3811 Canadian Modernism
3821 The Canadian Postmodern
3831 Aspects of Canadian Literature
4801 Selected Topics in Canadian Literature
4901 Special Topics *

## Fine Arts

3021 Canadian Art from its beginnings to the 1960's
3031 Canadian Art from the 1960's to the present. 4951 Independent Study *

## French

1600 Preparatory French
1700 Intermediate French
2401 Langue et Lectures
2501 Initiation a la Composition
2601 Initiation a L'analyse Litteraire
3711 Roman et Nouvelle du Canada Français
3751 La Poésie du Canada Français
3771 Théâtre du Canada Français
4901 Selected Topics *

## Geography

1201 Human Geography
2311 Cultural Geography
3201 Geography and Public Policy
3301 Historical Geography of North America
3511 Rural and Small Town Canada
4311 Canadian Regionalism
4950 Special Topics in Geography *

## History

2410 Canada from the Prehistoric to the Present
3411 Colonial New France
3420 The Atlantic Region
3421 Canada from Conquest to Confederation
3431 Quebec from Confederation to Separatism
3441 Modern Canada
3461 Canadian External Relations
3501 Social and Political History of Food in North America
4401 Canada and the Pacific Rim
4420 The Atlantic Provinces
4440 Modern Canada
4450 Canadian Courts and the Constitution 4950 Special Topics *

## Linguistics

3011 Language and Society

## Music

3000 Introduction to Music in Canada 4951 Special Topics *

## Political Science

2101 Canadian Government and Politics
3101 Political Leadership in Canada
3111 Current Topics in Canadian Federalism
3121 Canadian Electoral Studies
3031 Women and Politics
4100 Advanced Topics in Canadian Federalism
4300 Canadian Foreign Policy
4950 Directed Reading on Special Topics *

## Religious Studies

4950/1 Directed Study on Special Topics *

## Sociology

3111 Inequality in Canadian Society
3121 Language and Ethnicity in Canada

3521 Communities
3701 Law in Canadian Society
4531 Education and Society

* Acceptable when a Canadian topic involved.


## CHEMISTRY

Chemistry is the branch of physical science involving the study of the composition of substances, the ways in which their properties are related to their composition, and the interaction of substances to produce new materials. This subject occupies a central place among the sciences - it draws on the facts and theories of physics, and on mathematics for the tools necessary to evaluate and express quantitative chemical information. Chemistry in turn, provides terminology, facts, principles and methods that are essential to many aspects of biology and geology. The applications of chemistry in fields such as agriculture, medicine, pharmacology, pharmacy, engineering and oceanography are numerous. The undergraduate programme is designed to provide students with an education in the main branches of the subject, namely, analytical, inorganic, organic and physical chemistry. The broad objectives of the Department are summarized in the following definition of education: Education is learning to appraise data critically, to try to think up an intellectual framework, to be able to test it, to be able to marshal facts, to be able to write about them, to be able to communicate with people who may - and almost certainly will - have less knowledge of those facts than you have, because they will be asking you questions about them with a view to taking some action. (F. Dainton)

Students interested in pursuing a Major or Minor in Chemistry or Chemistry Honours, should consult the Departmental Handbook and a faculty member of the department before completion of registration.

## Disciplinary B.Sc. Programmes

## MINOR in Chemistry is 24 credits earned as follows:

6 from Chemistry 1001, 1021
3 from Mathematics 1111
9 from Chemistry at the 2000 level $^{*}$
6 from Chemistry at the 3/4000 levels
*Where insufficient Chemistry courses are available at the 2000 level to fulfill this requirement, Chemistry courses at the 3/4000 levels may be substituted

## MAJOR AREA OF STUDY in Chemistry is 60 credits earned as follows:

6 from Chemistry 1001, 1021
9 from Math 1111, 1121, 2111
3 from Math or Computer Science
6 from Physics 1051, 1551
12 from Chemistry 2111, 2121, 2211, 2311
12 from Chemistry 3231, 3321, 3411, 3421
12 from Chemistry at the 3/4000 level, chosen in consultation with the Program Advisor.

## THE CHEMISTRY HONOURS PROGRAMME

Students with a special interest in Chemistry and those who, after obtaining the B.Sc. degree, wish to continue their studies at the post-graduate level, should consider following the Chemistry Honours programme. The courses required for the B.Sc. Chemistry Honours degree are all listed below. The required chemistry credits are ones that
provide for study of the main branches of Chemistry in some depth. The required twelve credits from Mathematics and the six credits from Physics give minimum background essential for work in Chemistry. Honours students are given a special opportunity to participate in chemical research with faculty members in the Thesis (C4990) course. This research is normally carried out in the summer months following the third year.

## HONOURS in Chemistry is 84 credits earned as follows:

36 credits as in first 5 lines of Major except that the 3 from Math or Computer Science referred to in line 3 is restricted to Math 2221
24 from Chemistry 3111, 3121, 3231, 3241, 3321, 3331, 3411, 3421
6 from Chemistry 4990
18 from Chemistry 3/4000 level or Biochemistry 3/4000 levels (no more than 3 credits from Biochemistry)

## CHEMISTRY LABORATORY WORK

All Chemistry courses have laboratory classes of about three hours duration each week, unless otherwise indicated. In the fourth year, only Chemistry 4011, 4021 and 4990 have formalized laboratory components.

## GRADUATE STUDIES IN CHEMISTRY

The Department of Chemistry offers a programme of research courses leading to the Master of Science degree. The research interests in the Department are varied and further information can be obtained from the Department Head or from individual faculty members. The requirements for the M.Sc. degree are given in Section 7.4. Individual programmes are arranged, depending on the student's background and interests.
Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## CHEMISTRY COURSES

## CHEM 1001 (3CR)

## INTRODUCTORY CHEMISTRY 1

Atomic theory will be introduced followed by discussion about the periodic table. Chemical bonding will be developed leading to the three-dimensional nature of matter. Thermodynamics, intermolecular forces and solution properties will be covered.
Prereq: None.
CHEM 1021 (3CR)

## INTRODUCTORY CHEMISTRY II

The quantitative nature of chemistry will be developed through a discussion of gases followed by consideration of kinetics and equilibrium. The thermodynamics introduced in the first term will be expanded together with a brief discussion of redox properties and electrochemistry.
Prereq: CHEM 1001; or permission of the Department.

CHEM 1501 (3CR)

## CHEMISTRY IN MODERN SOCIETY

Chemistry topics that have bearing on modern living and the environment will be discussed. Fundamental notions of modern chemistry will be developed and links with other disciplines identified. Prereq: None.

## CHEM 2101 (3CR)

ORGANIC CHEMISTRY FOR THE BIOLOGICAL SCIENCES
An introduction to the structure, reactivity and biological relevance of a variety of functional groups is presented. There will also be an introduction to spectroscopy.
Prereq: CHEM 1021; or permission of the Department.
Exclusion: CHEM 2111, 2121, 2131, 2141, 2151
CHEM 2111 (3CR)
ORGANIC CHEMISTRY I
Structural basics including aromaticity, resonance, and stereochemistry will be emphasized and developed. An appreciation of the link between structure, mechanism and reactivity will be explored.
Prereq: CHEM 1021; or permission of the Department.
Exclusion: CHEM 2101, 2131, 2141
CHEM 2121 (3CR)

## ORGANIC CHEMISTRY II

Functional group chemistry will be used to develop more sophisticated mechanistic skills. Problems in organic synthesis will be studied within a mechanistic context. An introduction to the interpretation of first order proton nmr spectra will be included.
Prereq: CHEM 2111; or permission of the Department.
Exclusion: CHEM 2101, 2131, 2151
CHEM 2211 (3CR)

## PHYSICAL CHEMISTRY I: THERMODYNAMICS

An introduction to the laws of thermodynamics and their application to ideal systems, mixtures and chemical reactions, will be provided.
Thermochemistry, chemical and phase equilibria and electrochemistry will be discussed.
Prereq: CHEM 1021, MATH 1121 or 1131; or permission of the Department.
Exclusion: CHEM 2221
CHEM 2311 (3CR)
INORGANIC CHEMISTRY I: COORDINATION CHEMISTRY
Lewis acid-base chemistry and applications to transition metals will be discussed. Concepts covered will include structure and bonding, ligand field theory, magnetism and electronics.
Prereq: CHEM 1021; or permission of the Department.
Exclusion: CHEM 3311

## CHEM 2511 (3CR) <br> ENVIRONMENTAL CHEMISTRY I: INTRODUCTION TO THE CHEMISTRY OF THE ENVIRONMENT

An introduction to environmental chemistry designed for students in a life sciences program will be given. The subject matter will primarily deal with the chemistry of the atmosphere and hydrosphere at an introductory level. Problem solving skills will be stressed.
Prereq: CHEM 1021, MATH 1121 or 1131; or permission of the Department.
Note: CHEM 2511 credit will not fulfill any Chemistry requirements for a minor, major or honours degree in Chemistry.

## CHEM 3111 (3CR) <br> ORGANIC CHEMISTRY III

The common spectroscopic techniques will be introduced in the context of structure elucidation. An introduction to Frontier MO theory, will be described. The application of synthetic reactions to total synthesis will be presented.
Prereq: CHEM 2121; or permission of the Department.
Exclusion: CHEM 3141
CHEM 3121 (3CR)

## ORGANIC CHEMISTRY IV

Earlier coverage of spectroscopic techniques will be extended so that more interesting structural deductions can be made. Mechanistic and synthetic discussions will be integrated into the lecture material.
Prereq: CHEM 3111; or permission of the Department.
Exclusion: CHEM 3151
CHEM 3231 (3CR)
PHYSICAL CHEMISTRY II: KINETICS
Physical and chemical applications of kinetics will be discussed. A variety of topics related to reaction mechanisms and dynamics will be covered. Specific topics will include the prediction of kinetic behaviour of different mechanisms, the deduction of mechanisms and the interpretation of activation parameters from experimental data. The effects of varying solvents and catalysts will also be considered.
Prereq: CHEM 2211; or permission of the Department.
Exclusion: CHEM 3221
CHEM 3241 (3CR)
PHYSICAL CHEMISTRY III: QUANTUM CHEMISTRY
The quantum chemistry of atomic and molecular structures will be introduced.
Prereq: CHEM 1021, MATH 1121 or 1131; or permission of the Department.
Exclusion: CHEM 3211
CHEM 3251 (3CR)
PHYSICAL CHEMISTRY IV: SPECTROSCOPY
Practical applications of quantum chemistry will be discussed. A survey of the principles of electronic, vibrational and rotational spectroscopy will be presented. Magnetic resonance methods will also be addressed. Prereq: CHEM 2211, 3241; or permission of the Department.

CHEM 3321 (3CR)

## INORGANIC CHEMISTRY II: MAIN GROUP ELEMENTS

The structure and bonding in main group compounds will be examined. Ionic and covalent bonding will be discussed with respect to Lewis, valence shell electron pair repulsion, valence bond and molecular orbital theories. Periodic trends and a survey of the properties and reactions of the elements of groups 1,2 and 13-18 will also be examined.
Prereq: CHEM 1021, or permission of the Department.
Exclusion: CHEM 2321
CHEM 3331 (3CR)
INORGANIC CHEMISTRY III: ORGANOMETALLICS
The structure, bonding and reactivity of organotransition metal complexes will be examined. Concepts covered will include the 18-electron rule, the isolobal analogy, catalysis, and the role metals play in organic synthesis.
Prereq: CHEM 2311; or permission of the Department.
CHEM 3361 (3CR)
INORGANIC CHEMISTRY IV: ADVANCED MAIN GROUP ELEMENTS
Topics in fundamental main group chemistry will be presented. Discussion will focus on synthetic approaches, spectroscopic analysis and structural aspects. An overview of the industrial application of main group chemistry will also be presented. Techniques required for the manipulation of air-sensitive materials will be considered.
Prereq: CHEM 3321; or permission of the Department.

## CHEM 3411 (3CR)

## ANALYTICAL CHEMISTRY I

Topics involve the treatment of errors and statistics of measurements, aqueous solutions, complex equilibria (including acid/base and buffer systems), and electrochemistry theory, involving; redox, electrode potentials (ion selective electrodes), and electrogravimetry. Problem solving will be stressed.
Prereq: CHEM 1021, MATH 1121 or 1131; or permission of the Department.

CHEM 3421 (3CR)
ANALYTICAL CHEMISTRY II: INSTRUMENTAL METHODS OF ANALYSIS
The theoretical basis, scope and limitations of various instrumental methods of analysis, especially in the areas of Spectroscopy and Chromatography will be introduced, including GC/MS and HPLC for organic compounds, Atomic Absorption Spectroscopy for metals and UV/VIS for organic and inorganic compounds.
Prereq: PHYS 1551 and CHEM 3411; or permission of the Department.
CHEM 4131 (3CR)
ORGANIC CHEMISTRY: SYNTHETIC CHEMISTRY
The synthesis of complex organic molecules will be discussed. Topics covered will include conformational analysis, stereoselectivity, transition metal mediated reactions, radical reactions, mechanism and synthetic strategy.
Prereq: CHEM 3121; or permission of the Department.
Exclusion: CHEM 4101

## CHEM 4141 (3CR) <br> ORGANIC CHEMISTRY: PHYSICAL ASPECTS

The principles of bonding, structure and mechanisms in organic chemistry will be examined. Topics covered will include models of bonding, acid/base catalysis, linear free-energy relationships, dynamic NMR, concerted reactions and orbital symmetry, transition-state theory and intramolecular dynamics, thermodynamics and molecular motors.
Prereq: CHEM 3111, 3241, 3231; or permission of the Department. Exclusion: CHEM 4111

## CHEM 4151 (3CR)

## ORGANIC CHEMISTRY: BIOORGANIC

The principles of organic chemistry as they apply to biochemical problems will be presented. Topics covered include enzymic reaction mechanisms, enzyme cofactors, peptide and nucleic acid synthesis, enzymes in organic synthesis.
Prereq: CHEM 3111; or permission of the Department.
CHEM 4161 (3CR)
ORGANIC CHEMISTRY: THEORETICAL APPROACHES
Zeroth order symmetry - simplified Hückel and molecular orbital calculations will be developed. Calculations are extended to heteroatom - substituted and Möbius structures. An introduction to chemical graph theory will be included.
Prereq: MATH 1121 or 1131, CHEM 3121; or permission of the Department.
Exclusion: CHEM 4121

## CHEM 4211 (3CR)

PHYSICAL CHEMISTRY: STATISTICAL THERMODYNAMICS
The theory of statistical thermodynamics will be developed from the statistical distribution of energy using the Maxwell-Boltzmann distribution law. Partition functions and degeneracy will be calculated from the various contributions to the total energy for simplified models of actual systems. Thermodynamic quantities will then be derived in terms of partition functions.
Prereq: CHEM 2211, 3241, MATH 2111; or permission of the Department.

## Exclusion: CHEM 4201

## CHEM 4241 (3CR)

## PHYSICAL CHEMISTRY: COMPUTATIONAL

A basic knowledge of the methods currently used in computational chemistry will be discussed. Approximations involved in the application of quantum mechanics to chemical systems, and how these approximations can be systematically improved, will be addressed. Practical aspects of computational chemistry programs will also be considered.
Prereq: CHEM 3241, MATH 2111; or permission of the Department.

## CHEM 4261 (3CR)

## PHYSICAL CHEMISTRY: MODERN TOPICS

Current topics in physical chemistry will be discussed. Topics include solid-state chemistry, polymer chemistry, colloids and liquid crystals. Experimental techniques currently employed in physical chemistry research will also be addressed.
Prereq: CHEM 3231; or permission of the Department.

CHEM 4341 (3CR)
INORGANIC CHEMISTRY: PHYSICAL ASPECTS
A significant component will involve applications of group theory in inorganic chemistry for molecular bonding, reaction mechanisms, and IR and Raman spectroscopic transformations for small molecules and ions. Interpretation of multinuclear NMR, EPR, IR and Raman spectra will be explored, while the fundamental aspects of X-ray crystallography will also be discussed.
Prereq: CHEM 3321; or permission of the Department.
Exclusion: CHEM 4311
CHEM 4351 (3CR)

## INORGANIC CHEMISTRY: BIOINORGANIC

The roles metals play in biochemical systems will be examined. An overview of bioinorganic chemistry and a discussion of metals in medicine will be included.
Prereq: CHEM 3321; or permission of the Department.
CHEM 4431 (3CR)
ANALYTICAL CHEMISTRY: ADVANCED TOPICS IN CHROMATOGRAPHY
The theory and current practical application of the techniques of GC/MS, LC/MS, and capillary electrophoresis (CE) and CE/MS will be surveyed.
Prereq: CHEM 3421; or permission of the Department.
CHEM 4521 (3CR)
ENVIRONMENTAL CHEMISTRY
The chemical aspects of the environment will be examined and will draw heavily upon physical, organic, inorganic and analytical chemistry background. The natural chemical compositions and anthropogenic effects on the air, water and soil will be explored. Some of the specific topics that will be covered include, ozone chemistry, smog, acid rain, global climate, DOM, metals, colloids, $\mathrm{pE} / \mathrm{pH}$, soil chemistry and wastes.
Prereq: CHEM 2111 or 2101, 2211, 3411; or permission of the
Department.
Exclusion: CHEM 3011
CHEM 4701 (3CR)
SELECTED TOPICS IN CHEMISTRY
An advanced treatment of a topic not covered by the current course offerings.
Prereq: Permission of the Instructor.
CHEM 4800/4801 (6CR/3CR)
SPECIAL TOPICS IN EXPERIMENTAL CHEMISTRY
Individual experimental projects designed by the student and the supervisor.
Prereq: Permission of the Supervisor.
CHEM 4990 (6CR)
HONOURS THESIS
This will involve an extensive experimental or theoretical study culminating in the writing of a thesis. The research will be conducted under the supervision of a faculty member and will usually be carried out during the summer and the following year.
Prereq: Permission of the Department.

## CHEM 5101 (3CR)

GRADUATE LECTURES AND SEMINARS IN ORGANIC CHEMISTRY
I
CHEM 5111 (3CR)
GRADUATE LECTURES AND SEMINARS IN ORGANIC CHEMISTRY
II
CHEM 5201 (3CR)
GRADUATE LECTURES AND SEMINARS IN PHYSICAL CHEMISTRY I

CHEM 5213 (3CR)
GRADUATE LECTURES AND SEMINARS IN PHYSICAL CHEMISTRY
II

CHEM 5301 (3CR)
GRADUATE LECTURES AND SEMINARS IN INORGANIC CHEMISTRY I

CHEM 5313 (3CR)
GRADUATE LECTURES AND SEMINARS IN INORGANIC CHEMISTRY II
Prereq: for Graduate Courses: Registration in the M.Sc. Program
CHEM 5990 (6CR)
M.SC. THESIS IN CHEMISTRY

## CLASSICS

Classical Studies is concerned primarily with the cultures of Greece and Rome and their contributions to Western civilization. It is unique among modern academic disciplines in the breadth of its approach to its subject. In an age when undue specialization threatens the student in so many areas of learning, Classics is a field in which the specialist must be simultaneously linguist, literary critic, anthropologist, sociologist, and historian, not only of politics, but also of religion and art.

The cultures of Greece and Rome are fascinating and important in themselves, but seen in the context of their legacy the very special value that we attach to them comes to light. For many elements of our own culture - its language and literature, its social and political patterns, and its ideals - are deeply rooted in the experience and achievement of Greece and Rome.
The Department of Classics at Mount Allison offers the opportunity to study these ancient cultures through courses in history, mythology, art, archaeology, language, and literature. The history and literature of Greece and Rome can be approached either in the original languages or through courses using English translation. The study of ancient literature in translation makes it possible to gain an acquaintance with the thought and literary art of antiquity without studying Greek and Latin. But those deeply interested in the subject should bear in mind the importance of the languages themselves; the direct experience of the ancients through study of Greek and Latin, in order to be fruitful, should begin as early as possible in the university career.
Further information on courses, facilities, and special activities is available in the Curriculum Handbook issued annually by the Department of Classics.
The Humanities 1600 series is intended to provide an introduction to Humanities disciplines. These three-credit courses offered by the participating disciplines of Classics, History, Philosophy and Religious Studies are designed to acquaint beginning students with the methodologies typical of these disciplines and to familiarize them with the approaches taken, as well as the sorts of themes pursued and questions raised in those disciplines.

## Disciplinary B.A. Programmes

## MINOR in Classical Studies is 24 credits earned as follows:

24 from Classics, Latin, Greek, of which 12 must be at the 3/4000 level, chosen in consultation with the Programme Advisor. Students may choose a minor programme with an emphasis on Ancient History, Classical Literature or Art and Archaeology.

## MINOR in Greek is 24 credits earned as follows:

18 from Greek at the 1000, 2000, and 3000 levels
6 from Latin 1001, 1101, or Greek at the 4000 level, chosen in consultation with the Programme Advisor

## MINOR in Latin is 24 credits earned as follows:

18 from Latin at the 1000, 2000, and 3000 levels
6 from Greek 1001 and 1101 or Latin at the 4000 level, chosen in consultation with the Programme Advisor

MAJOR AREA OF STUDY in Classical Studies is 60 credits earned as follows:

6 from Latin 1001, 1101, or Greek 1001 and 1101
36 from Classics, Greek, Latin, of which 24 must be from the 3/4000 level
18 from complementary courses in Arts and Letters and Humanities (or others), chosen in consultation with the Programme Advisor

## HONOURS in Classical Studies is 72 credits earned as follows:

12 from Latin 1001, 1101, Greek 1001, 1101
6 from Latin 2001, 2101, Greek 2001, 2101
6 from Greek/Latin at the 3000/4000 level OR Classical Studies 4950/4951
48 from Classics/Greek/Latin, of which 33 must be at the $3 / 4000$ level.

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## CLASSICAL STUDIES COURSES

## CLAS/HIST 1631 (3CR) <br> GREECE AND ROME: THE FOUNDATIONS OF WESTERN CIVILIZATION

The political and social history of ancient Greece and Rome will be surveyed with a focus on the themes of Law, Politics, War, and Society. Special attention will be paid to Athens in the fifth and fourth centuries B.C.E. and to Rome under Caesar Augustus.

Note: This course is cross-listed as HIST 1631 and may therefore count as 3 credits in either discipline.

CLAS 1641 (3CR)
CLASSICAL MYTHOLOGY: THE HERO'S QUEST
An introduction to the heroes and heroines of classical myth through the literature and art of ancient Greece and Rome. The course will examine the major cycles of Greek heroic saga, including stories about the Trojan War, the Wanderings of Odysseus, the exploits of Hercules, and the Voyage of Jason and the Argonauts, as well as the adventures of Aeneas and the foundation myths of Rome.

## CLAS 1651 (3CR)

CLASSICAL MYTHOLOGY: GODS, GODDESSES, AND THE CREATION OF ORDER
An introduction to the gods and goddesses of classical myth in the literature, art, and religion of ancient Greece and Rome. The course will examine cosmogonies and divine myths in order to shed light on the views held by the Greeks and Romans about the nature of the relationship between mortal and immortal.

## CLAS/HIST 2021 (3CR) <br> ALEXANDER THE GREAT AND THE HELLENISTIC WORLD

An examination of the career of Alexander the Great and the Hellenistic era that followed his conquest of the eastern Mediterranean. Among the main themes included will be the goals of Alexander, the new political climate of kingship and patronage that he helped create, the interaction of the Greeks with the civilizations of Egypt and the East, and the integration of new cultural ideas into Greek society.
Note: This course is cross-listed as HIST 2021 and may therefore count as 3 credits in either discipline.
Exclusion: CLAS/HIST 3011
CLAS/HIST 2051 (3CR)
WOMEN IN ANTIQUITY
Using written and material evidence, this course will explore the economic, social and political roles of women in the societies of ancient Greece and Rome, as well as the development of the Western idea of the female in antiquity. Secondarily, it will introduce and explore the social theories commonly applied to the study of gender in history.
Note: This course is cross-listed as HIST 2051 and may therefore count as 3 credits in either discipline.

## CLAS 2501 (3CR)

## INTRODUCTION TO ARCHAEOLOGY

An introduction to the methods of archaeological excavation. This course aims to acquaint the student with the theory and basic techniques of archaeology. Examples showing both past and present archaeological research done in the Old and New Worlds will be used to illustrate the topics under discussion.

CLAS 2521 (3CR)
THE ARCHAEOLOGY OF DAILY LIFE IN THE GREEK AND ROMAN WORLD
An examination of the evidence used by archaeologists to recreate the social history of ancient Greece and Rome. The course will consider how archaeology can shed light on such topics as the lives of men, women, and children; the home; government; the economy; the army; and entertainment.

## CLAS 2531 (3CR) <br> THE ARCHAEOLOGY OF RELIGION IN THE GREEK AND ROMAN WORLD

An examination of the evidence used by archaeologists to recreate the religions of the ancient Greeks and Romans. The course will consider how archaeology reveals ancient views and practices involved in the worship of the Olympian Gods; the religions of Egypt and the Near East; Royal and Emperor cults; Mithraism and mystery cults; Judaism; and early Christianity.

## CLAS/HIST 3001 (3CR) <br> DEMOCRACY AND IMPERIALISM IN CLASSICAL GREECE

An examination of archaic and classical Greek history and civilization from the emergence of the polis to the fall of the Athenian empire. Main themes include the development of political institutions, warfare, and gender relations. Emphasis is placed on historical methods and the interpretation of ancient evidence.
Prereq: Second year standing and three credits from any Classics or History course at the 1000 or 2000 level; or permission of the Department.
Note: This course is cross-listed as HIST 3001 and may therefore count as 3 credits in either discipline.

## CLAS/HIST 3021 (3CR) <br> CONQUEST AND EXPANSION: THE RISE AND FALL OF THE ROMAN REPUBLIC

An examination of the development of Rome from a small city-state into the leading power in the Mediterranean. Main themes include the conflict between Rome and Carthage, the conquest of the Hellenistic East, and the political and social changes in Roman society. There will be an emphasis on the analysis and interpretation of primary sources in translation. CLAS/HIST 3031 3CR THE ROMAN EMPIRE: CENTRE AND PERIPHERY An examination of the history of imperial Rome from the age of Augustus to that of Constantine. Main themes include the imperial form of government, the Roman army, urban development and its impact on society, and the conflicts between Romans and other cultures. There will be an emphasis on the analysis and interpretation of primary sources in translation.
Prereq: Second year standing and three credits from any Classics or History course at the 1000 or 2000 level; or permission of the Department.
Note: This course is cross-listed as HIST 3021 and may therefore count as 3 credits in either discipline.

## CLAS/HIST 3031 (3CR) <br> THE ROMAN EMPIRE: CENTRE AND PERIPHERY

An examination of the history of imperial Rome from the age of Augustus to that of Constantine. Main themes include the imperial form of government, the Roman army, urban development and its impact on society, and the conflicts between Romans and other cultures. There will be an emphasis on the analysis and interpretation of primary sources in translation.
Prereq: Second year standing and three credits from any Classics or History course at the 1000 or 2000 level; or permission of the Department.
Note: This course is cross-listed as HIST 3031 and may therefore count as 3 credits in either discipline.

## CLAS/HIST 3051 (3CR)

HEALTH AND MEDICINE IN THE ANCIENT WORLD
Employing both material and literary evidence, this course surveys the conditions of life and common ailments and treatments of the inhabitants of the Greek and Roman world from ca. 1000 B.C.E. to ca. 500 C.E.. It also examines the origins of Western medicine in Greek
and Roman science, alongside its alternatives, such as magic.
Prereq: Second year standing and three credits from any Classics, History, or Philosophy course; or permission of the Department.
Note: This course is cross-listed as HIST 3051 and may therefore count as 3 credits in either discipline.

## CLAS 3201 (3CR)

## GREEK TRAGEDY

A study of Greek tragic drama as it developed in Athens of the fifth century B.C.E. The course will examine (in translation) the main surviving plays of Aeschylus, Sophocles, and Euripides.
Prereq: Second year standing and three credits from any Classics or History course at the 1000 or 2000 level; or permission of the Department.

## CLAS 3211 (3CR)

## GREEK AND ROMAN COMEDY

A study of Greek and Roman comic drama (in translation) as represented by the work of Aristophanes, Menander, Plautus, and Terence.
Prereq: Second year standing and three credits from any Classics or History course at the 1000 or 2000 level; or permission of the Department.

CLAS 3401 (3CR)
THE LYRIC POETRY OF GREECE AND ROME
A study of Greek and Roman poetry that expresses universal feelings of love and fear, celebration and personal aspiration. The course will examine the themes and forms of lyric poetry, as well as the role of the poet in society. The poems of Sappho, Archilochus, Pindar, Catullus, Propertius, Ovid, and others will be read in English translation.
Prereq: Second year standing and three credits from any Classics or History course at the 1000 or 2000 level; or permission of the Department.

CLAS 3411 (3CR)

## THE EPIC POETRY OF GREECE AND ROME

An examination of the epic genre as it developed in ancient Greece and Rome. The focus of the course will be on Homer's Iliad and Odyssey and Virgil's Aeneid, with attention given to other representative works. The poems will be studied (in translation) both as products of their respective societies and in light of their influence on later European literature.
Prereq: Second year standing and three credits from any Classics course at the 1000 or 2000 level; or permission of the Department.

CLAS 3601 (3CR)

## THE BIRTH OF GREEK ART

A study of the art and archaeology of the Greek world from the Bronze Age to the end of the Persian invasion. This period saw the rise and fall of two Bronze Age civilizations, and the emergence of Athens as the cultural and political leader of the Mediterranean world. The architecture, painting, sculpture, and minor arts will be studied with attention to their historical and cultural contexts.
Prereq: Second year standing and three credits from any Classics course at the 1000 or 2000 level or FINA 2001 or 2011; or permission of the Department.

CLAS 3611 (3CR)
THE SPLENDORS OF CLASSICAL AND HELLENISTIC GREEK ART
A study of the art and archaeology of the Greek world from the Persian invasion to the coming of the Romans. This period saw the achievements of Athenian democracy, the subsequent dissolution of Athenian power, the domination of the Macedonians under Alexander, and the spread of Greek culture throughout the Mediterranean and beyond. The architecture, painting, sculpture, and minor arts will be studied with attention to their historical and cultural contexts.
Prereq: Second year standing and three credits from any Classics course at the 1000 or 2000 level or FINA 2001 or 2011; or permission of the Department.

## CLAS 3701 (3CR)

## ETRUSCAN AND EARLY ROMAN ART AND ARCHAEOLOGY

A study of the art and archaeology of peninsular Italy from the Iron Age to the period of the Julio-Claudian emperors. It will examine Etruscan culture and its interaction with the Greeks and Romans, the rise of Rome, and the transitions from republic to empire. The material culture of Italy will be explored through the architecture, sculpture, painting, and minor arts.
Prereq: Second year standing and three credits from any Classics course at the 1000 or 2000 level or FINA 2001 or 2011; or permission of the Department.

## CLAS 3711 (3CR)

## THE ART OF IMPERIAL ROME AND ITS EMPIRE

A study of the art and archaeology of the Roman world from the reign of the emperor Nero to the time of Constantine. It will examine the development of art and architecture in Rome, the connections between this development and imperial policy, and the use and adaptation in other parts of the Roman world of ideas which originated in Rome. Prereq: Second year standing and three credits from any Classics course at the 1000 or 2000 level or FINA 2001 or 2011; or permission of the Department.

## CLAS 4950/4951 (6/3CR)

## SPECIAL PROJECT IN CLASSICAL CIVILIZATION

Directed reading and study of a special topic in classical civilization.
Prereq: Permission of the Department.

## LATIN COURSES

## LATI 1001 (3CR) <br> INTRODUCTORY LATIN I

An introduction to basic Latin grammar and vocabulary for students with no previous knowledge of the language. This course is based on readings which present not only the fundamentals of Latin but also the Roman world in which it was used. Some effort is made to show the connections between Latin and modern languages (English, French, Spanish).Three class periods per week, plus a fourth hour to be arranged after classes have begun.
Exclusion: LATI 1000

## LATI 1101 (3CR) <br> INTRODUCTORY LATIN II

A continuation of the study of the Latin language. While adding new grammar, this course concentrates on reading comprehension and vocabulary building. Three class periods per week, plus a fourth hour to be arranged after classes have begun.
Prereq: LATI 1001; or permission of the Department.
Exclusion: LATI 1000

LATI 2001 (3CR)
INTERMEDIATE LATIN
This course introduces students to the reading of unadapted passages from ancient authors. While the emphasis is on developing a fluency in reading Latin, it also reviews basic Latin grammar and presents some more advanced grammar and syntax.
Prereq: LATI 1101; or permission of the Department.

## LATI 2101 (3CR) <br> INTRODUCTORY READINGS IN LATIN LITERATURE

A reading of selected works by Latin authors. This course will acquaint the student with some of the forms of ancient prose and poetry.
Prereq: LATI 2001; or permission of the Department.

## LATI 3001 (3CR) <br> READINGS IN LATIN PROSE

The translation and study of the work of one or more Latin prose authors.
Prereq: LATI 2101; or permission of the Department.
LATI 3101 (3CR)
READINGS IN LATIN POETRY
The translation and study of the work of one or more Latin poets.
Prereq: LATI 2101; or permission of the Department.

LATI 4001 (3CR)
DIRECTED READINGS IN LATIN
Detailed study of one or more Latin authors.
Prereq: Permission of the Department.

LATI 4950/4951 (6/3CR)

## SPECIAL PROJECT IN LATIN

Directed readings and study of a special topic in Latin language or literature, or in Roman history.
Prereq: Permission of the Department.

## GREEK COURSES

GREK 1001 (3CR)
Introductory Ancient Greek I
An introduction to the grammar and vocabulary of ancient Greek for students with no previous knowledge of the language. Through grammatical exercises, composition, and the reading of prescribed texts, the student will develop a basic understanding of the language of classical Athens. Three class periods per week, plus a fourth hour to be arranged after classes have begun.
Exclusion: GREK 1000

## GREK 1101 (3CR)

## Introductory Ancient Greek II

A continuation of the study of the ancient Greek language. This course adds new grammar and continues to build vocabulary, while concentrating on the development of a reading facility in ancient Greek. Three class periods per week, plus a fourth hour to be arranged after classes have begun.
Prereq: GREK 1001; or permission of the Department.

## Exclusion: GREK 1000

GREK 2001 (3CR)
INTERMEDIATE GREEK
This course introduces students to the reading of unadapted passages from ancient authors. While the emphasis is on developing a fluency in reading Greek, it also reviews basic Greek grammar and presents some more advanced grammar and syntax.
Prereq: GREK 1000 or GREK 1101; or permission of the Department.
GREK 2101 (3CR)
INTRODUCTORY READINGS IN GREEK LITERATURE
A reading of selected works by Greek authors. This course will acquaint the student with some of the forms of ancient prose and poetry.
Prereq: GREK 2001; or permission of the Department.
GREK 3001 (3CR)
READINGS IN GREEK PROSE
The translation and study of the work of one or more Greek prose authors.
Prereq: GREK 2101; or permission of the Department.
GREK 3101 (3CR)
READINGS IN GREEK POETRY
The translation and study of the work of one or more Greek poets.
Prereq: GREK 2101; or permission of the Department.
GREK 4001 (3CR)
DIRECTED READINGS IN GREEK
Detailed study of one or more Greek authors.
Prereq: Permission of the Department.
GREK 4950/4951 (6/3CR)
SPECIAL PROJECT IN GREEK
Directed reading and study of a special topic in Greek language or literature, or in Greek history.
Prereq: Permission of the Department.

## COGNITIVE SCIENCE

## Interdisciplinary B.Sc. Programme

## MAJOR AREA OF STUDY in Cognitive Science is 69 credits earned as follows:

18 from Psychology 1001, 1011, 2201, 2101, 3111, 3201, 3211
9 from Computer Science 1711, 1721, 2611
3 from Computer Science 2711, 2931
6 from Mathematics 1111, 1121
3 from Biology 1001
6 from Chemistry 1001, 1021
6 from Physics 1051, 3511
6 from Psychology 2001 (or Math 2311), 2011 (or Math 2321)
6 from Philosophy 2511, 3511
6 from Computer Science 3651, 3851, Linguistics 3001, 3011, Math 2211, Philosophy 2611, 2621, 3631, 3641, Psychology 3221

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.

Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## COMMERCE

Note: The Minor and Major in Commerce on a B.A. programme are outlined below. For a description of programme requirements for completion of a B.Comm. Please see Section 7.5.

## Disciplinary B.A. Programmes

## MINOR in Commerce is 24 credits earned as follows:

9 from Commerce 2101, 2131, 2201, 2301
15 from Commerce, including at least 6 at the 3/4000 level, chosen in consultation with the Programme Advisor

## MAJOR AREA OF STUDY in Commerce is 60 credits earned as follows:

from Commerce 2101, 2131, 2201, 2301
3 from Computer Science
6 from Economics (not including Economics 2701)
6 from Math (not including Math 1011)
21 from Commerce at the $3 / 4000$ level
12 from complementary courses, chosen in consultation with the Programme Advisor

## Note:

1. Commerce $3411,3501,4501,4511$ and 4521 may be designated as Economics electives for students taking a Bachelor of Commerce or a Major, Minor or Honours in Economics.
2. Economics $3201,3211,3601,3611,3621,3711,3921,4501,4511$, 4700, 4801, 4811, 4821, 4990 Computer Science 3851, and Religious Studies 3951, 3961 are Commerce electives for students taking a Bachelor of Commerce or a Major or Minor in Commerce.

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## COMMERCE COURSES

COMM 1001 (3CR) INTRODUCTION TO BUSINESS
This course provides the student with an introduction to the nature of business and its functional areas. The topics covered include: the environment of business; forms of business ownership; entrepreneurship and small business; financing, financial management, and financial institutions; marketing; operations management; accounting; and managing human resources.

COMM 2101 (3CR)

## INTRODUCTORY FINANCIAL ACCOUNTING I

This course introduces the accounting model and analysis of Financial Statements and the important concepts associated with them.
Prereq: 9 credits from any combination of the following 12 credits: MATH 1111, ECON 1000 (or ECON 1001 and 1011), 3 credits in Computer Science; or permission of the Department.

## Exclusion: COMM 1111

COMM 2121 (3CR)

## INTRODUCTORY FINANCIAL ACCOUNTING II

This course examines in greater detail the principles, practices and techniques of financial accounting first introduced in Commerce 2101.
Prereq: COMM 2101; or permission of the Department.
Exclusion: COMM 1121

## COMM 2131 (3CR) <br> MANAGEMENT ACCOUNTING

An introduction to the principles and practices of management accounting, with a concentration on the decision making process. Topics include the use of accounting data in short-run and long-run decision making; managerial planning, control, and internal performance evaluation; and an introduction to variance analysis.
Prereq: COMM 2101; or permission of the Department.
Exclusion: COMM 2111

## COMM 2201 (3CR)

## FUNDAMENTALS OF MARKETING

A consumer orientation is essential for effective marketing decision making. In this course, the meaning of products and services to the consumer is stressed. Students have the opportunity to develop fundamental skills in analysis, report writing, and presentations.
Prereq: 9 credits from any combination of the following 12 credits: MATH 1111, ECON 1000 (or ECON 1001 and 1011), 3 credits in Computer Science; or permission of the Department.

COMM 2211 (3CR)

## MARKETING MANAGEMENT

The development and implementation of marketing strategy is the primary concern of marketing management. This course covers the key elements of a marketing strategy: competitive positioning, product/service strategy, pricing strategy, distribution strategy and marketing communications strategy. Students are provided with opportunities to develop analytical, decision-making and communication skills.
Prereq: COMM 2201; or permission of the Department.

## COMM 2301 (3CR)

## ORGANIZATIONAL BEHAVIOUR I

This course focuses on the micro aspects of organizational behaviour. It emphasizes human needs, motivation, perception, individual differences, personality, job design, work attitudes, performance appraisal, and stress management. The objective is to ensure that potential managers interact more effectively with subordinates, peers and superiors in the organizational setting. Teaching methodology includes lectures, discussions, and case analysis.
Prereq: 9 credits from any combination of the following 12 credits: MATH 1111, ECON 1000 (or ECON 1001 and 1011), 3 credits in Computer Science; or permission of the Department.

COMM 2311 (3CR)

## ORGANIZATIONAL BEHAVIOUR II

This course focuses on the macro aspects of organizational behaviour. Topics include group processes in the organization and their relationship to effectiveness, intergroup conflict, cooperation, leadership, communication, team dynamics, and organizational change.
Prereq: COMM 2301; or permission of the Department.
Exclusion: COMM 3331

## COMM 2361 (3CR)

## INTRODUCTION TO ENTREPRENEURSHIP

An introduction to issues relating to the planning and launching of one's own small enterprise startup. Topics covered include business planning, market opportunity assessment, competitive environment, cash management, debt financing, legal organization of a business, taxation of a small business, legal and regulatory framework, operational planning, and managing employees. This is a course intended as an elective for students in degree programmes other than the Bachelor of Commerce or the Bachelor of Arts with a Major or Honours in Commerce.
Prereq: Second year standing in the university or two years of prior full time work experience.
Exclusion: COMM 1001, 3361
COMM 3111 (3CR)
INTERMEDIATE ACCOUNTING I
This course expands basic accounting concepts learned in Commerce 2101 and 2121. It develops the general accounting theory of assets, liabilities, income, equity, and funds flow. Particular emphasis will be placed on the conceptual framework of accounting, revenue and expense recognition, asset and liability recognition, and measurement and disclosure.
Prereq: COMM 2121; or permission of the Department.

## COMM 3121 (3CR) <br> INTERMEDIATE ACCOUNTING II

The following topics are discussed: shareholders' equity, dilutive securities, investments, and a series of special topics, including: corporate income taxes, pension costs, leases, and accounting changes and error analysis.
Prereq: COMM 3111; or permission of the Department.

## COMM 3131 (3CR) <br> COST ACCOUNTING

A study of the principles, procedures and techniques of analysis used in cost accounting. This course will cover operating budgets, product costing, predetermined costs, planning and control, relevant costs, and variance analysis.
Prereq: COMM 2131; or permission of the Department.

## COMM 3141 (3CR)

ACCOUNTING THEORY
This course examines the historical development of accounting theory and practice with particular emphasis on the theory of income and asset valuation. Topics include the theoretical basis for past and present accounting principles and current issues and developments in accounting practice.
Prereq: COMM 2121; or permission of the Department.

## COMM 3151 (3CR)

TAXATION
The course will explore the basic principles of taxation in Canada, with emphasis on Canadian Income Tax. It stresses the effects of taxation on business decisions by individuals and corporations.
Prereq: COMM 2131 and ECON 1000, (or 1001 and 1011); or permission of the Department.
Exclusion: COMM 4111

## COMM 3161 (3CR)

INTRODUCTION TO AUDITING
This course introduces the role of auditing in society and the ethics and standards of professional conduct expected of auditors. It develops a conceptual understanding of key decisions made by auditors when examining and reporting on financial statements. It develops an appreciation of the complex environment in comprehensive or value-for-money audit on corporations and public institutions.
Prereq: COMM 2121; or permission of the Department.
Exclusion: COMM 4151

## COMM 3211 (3CR)

## CONSUMER BEHAVIOUR

The course examines social, psychological, situational, and economic influences on the consumer decision-making process of individuals and families. It emphasizes new product adoption, marketing communications, and consumer research applications.
Prereq: COMM 2211; or permission of the Department.

## COMM 3231 (3CR) <br> MARKETING CHANNELS OF DISTRIBUTION

Marketing strategy is implemented within the context of channels of distribution. This course studies distribution issues faced by manufacturers, wholesalers, retailers, and specialized institutions. It emphasizes inventory issues, product assortment decisions, channel negotiations, and channel change.
Prereq: COMM 2211; or permission of the Department.

## COMM 3251 (3CR)

## INTERNATIONAL MARKETING

Markets are becoming increasingly global. This course explores the managerial aspects of exporting and importing companies, multi-national firms, and small to large businesses serving global markets.
Prereq: COMM 2211; or permission of the Department.

## COMM 3261 (3CR) <br> INTEGRATED MARKETING COMMUNICATIONS

This course provides a broad exposure to the promotional mix concentrating on integrated marketing communications and its key elements: advertising, personal selling, sales promotion, public relations, direct marketing, and other forms of communications. Canadian advertising institutions, government legislation and industry regulations are considered in relation to social and economic concepts. Emphasis is placed on understanding the marketing communications process and its place in an organization's planning process.
Prereq: COMM 2211; or permission of the Department.
Exclusion: COMM 4251

COMM 3321 (3CR)

## HUMAN RESOURCE MANAGEMENT

This course examines human resource management functions in formal organizations, both public and private. Topics covered include human resource planning, recruitment, selection, performance appraisal and employment equity; training and development; compensation systems and the management of employee benefits; and the role of the human resource manager.
Prereq: COMM 2301; or permission of the Department.

## COMM 3341 (3CR)

## ORGANIZATIONAL THEORY

This course examines current theory and research on the design of effective organizations. It focuses on interrelationships among an organization's formal and informal structures, culture, technology, and competitive environment and the different types of organizations resulting from different configurations of these elements. Topics may include power and politics in and about the organization, goal setting, organizational effectiveness and efficiency, and organizational renewal. Prereq: COMM 2311; or permission of the Department.

## COMM 3351 (3CR)

## SMALL BUSINESS MANAGEMENT

This course examines the structure of the small and micro-business sector in Canada and the United States and the most significant management issues characteristic of small enterprise. These include business opportunity assessment for small enterprises, competitive advantage, ownership and management structure, government/small business relations, planning, data-base management, financing, financial management, and marketing.
Prereq: COMM 2131 and 2201 or COMM 1001 and registration in third year; or permission of the Department.

## COMM 3361 (3CR) <br> ENTREPRENEURSHIP AND NEW VENTURE CREATION

An examination of the process of business venture creation and start-up and of the role of the entrepreneur in this process. Topics include business opportunity assessment, the structure and function of the business plan, new venture financing, and the legal and regulatory aspects of start-up. The course will centre on the students' projects, calling for the development of business ideas and authorship of business plans.
Prereq: COMM 2131 and 2201 or COMM 1001 and registration in third year; or permission of the Department.
Exclusion: COMM 4341
COMM 3371 (3CR)
ISSUES IN BUSINESS AND SOCIETY
This course examines problems in managing relations between the firm and its many stakeholders, including shareholders, government, public interest groups, employees, other firms with which it does business, consumers, and society at large. Such topics as business ethics, the social responsibility of business, business and the environment, pluralism, foreign ownership, consumerism, and the multi-national organization are examined.
Prereq: COMM 2131 and 2301; or permission of the Department. Exclusion: COMM 4371

COMM 3411 (3CR)

## QUANTITATIVE ANALYSIS FOR BUSINESS DECISIONS

An introduction to formalized methods of arriving at business decisions. Topics will be selected from constrained optimization models, decision models, game theory, Markovian processes, network models, forecasting, and dynamic programming.
Prereq: MATH 1111, 3 credits in Computer Science and MATH 2321
(or ECON 2701 or PSYC 2011) or permission of the Department.
Note: Counts as an Economics elective for students taking a Major, Minor or Honours in Economics.

## COMM 3421 (3CR)

## PRODUCTION AND OPERATIONS MANAGEMENT

An introduction to issues and problems in the area of operations management. Topics include: productivity, product design and process selection (manufacturing and services), quality control, capacity planning, facility layout, work measurement, just-in-time inventory systems, synchronized manufacturing, and automation.
Prereq: COMM 2131 and MATH 2311; or permission of the Department.

## COMM 3431 (3CR)

## MANAGEMENT INFORMATION SYSTEMS

This course covers the information systems approach to the decision-making process. Such methods as Critical Path Planning, Electronic Data Processing and others will be studied in reference to a total information system. The student will be involved in identifying, evaluating, and designing information flows.
Prereq: 3 credits in Computer Science and COMM 2131; or permission of the Department.
Exclusion: COMM 4411
COMM 3441 (3CR)

## INTRODUCTION TO ELECTRONIC COMMERCE

This course is designed to introduce students to concepts and practices in e-commerce. Topics include Internet security and the transference of data information, using the Internet for creating management information systems, organizational issues associated with e-commerce, the World Wide Web as a strategic business tool, marketing products, services and ideas through Internet based media, and supplier/customer communication issues.
Prereq: Third year standing plus twelve credits in Commerce; or permission of the Department.

## COMM 3501 (3CR)

## INTRODUCTION TO FINANCE

Important topics in this course include value, capital budgeting, the relationship of risk and expected return, market efficiency, capital structure and dividend policy. Other topics such as option theory, hedging, the theory of interest, and international finance may be introduced. The institutional setting of financial management in North America, and specifically in Canada, will be discussed.
Prereq: ECON 1000, (or 1001 and 1011), MATH 1111, 3 credits in Computer Science and MATH 2321 (or ECON 2701 or PSYC 2011) and COMM 2101; or permission of the Department.
Note: Counts as an Economics elective for students taking a Major, Minor or Honours in Economics.

COMM 3611 (3CR)
COMMERCIAL LAW
An introductory course in commercial law, providing background for general business. Topics dealt with are: the essentials of a contract, general contract law, sale of goods, employment and agency, business associations, credit transactions.
Prereq: Third or fourth year standing; or permission of the Department. Exclusion: COMM 4611

## COMM 4101 (3CR)

## ADVANCED ACCOUNTING I

This course concentrates on advanced accounting theory and relates it to the business reality this theory reflects. Topics will include partnerships, government and not-for-profit accounting, corporate liquidation and bankruptcies, price level and current value accounting, trusts and estates, and standard setting.
Prereq: COMM 3121; or permission of the Department.
Exclusion: COMM 4121
COMM 4131 (3CR)
ADVANCED ACCOUNTING II
An introduction to business combinations, consolidated financial statements, joint ventures, and accounting for transactions and operations conducted in foreign currencies.
Prereq: COMM 3121; or permission of the Department.

## COMM 4201 (3CR)

MARKETING STRATEGY
The course provides an in-depth treatment of how marketing strategy is formulated and implemented. This capstone course in the marketing major integrates knowledge obtained from other marketing courses, and selected courses such as finance, policy, and management. The focus is on strategic decisions which have a long-term impact on the organization and which are difficult and costly to reverse. The strategic decision making process is supported by an external analysis (an analysis of the organization's environment) and an internal (firm) analysis.
Prereq: Fourth year standing in Commerce Program, plus six credits in the 3200/4200 series; or permission of the Department.

## COMM 4211 (3CR)

## SERVICES AND NON-PROFIT MARKETING

This course provides an integrated perspective on how to improve customer satisfaction in a society which has become increasingly demanding of service providers. It emphasizes managing information flow, demand fluctuations, employees, and elements of marketing strategy.
Prereq: COMM 3211; or permission of the Department. Exclusion: COMM 3241

## COMM 4231 (3CR)

## MARKETING RESEARCH

Marketing management decisions often require the collection and processing of information, either from primary or secondary sources. In this course, the marketing research process problem definition, data collection, data analysis, and data interpretation is applied to a current marketing issue. Emphasis is placed on basic aspects of research methodology, particularly the survey approach. A group project involving computer laboratory time is required.
Prereq: MATH 2321 or ECON 2701 and fourth year standing in the Commerce Programme, plus 6 credits in the 3200/4200 series; or permission of the Department.
Note: PSYC 2011 will not be considered as a prerequisite for this course. Counts as an Economics elective for students taking a Bachelor of Commerce or a Major, Minor or Honours in Economics.

## Exclusion: COMM 3221

## COMM 4241 (3CR) <br> CURRENT CHALLENGES IN MARKETING

This course addresses emerging issues in marketing decision-making. Topics may include recent research related to buyer behaviour, multidimensional scaling for positioning strategies, marketing mistakes and controversies, advertising research issues, pricing policy issues, distribution problems, product development issues, and social marketing approaches.
Prereq: Fourth year standing in Commerce Program, plus six credits in the 3200/4200 series; or permission of the Department.

## COMM 4311 (3CR)

## BUSINESS POLICY I

This course integrates the concepts and techniques developed in prior Commerce courses. It introduces the student to strategic management and the perspective of the senior manager of either a business or a non-profit organization. It examines the process of strategy formulation and implementation including the following topics: strategic planning, competitive advantage, business, government relations, and generic strategies.
Prereq: COMM 2201, 2301, and 3501; or permission of the Department. Note: This course is open only to Commerce students in their last year of studies for a Commerce degree.

COMM 4321 (3CR)

## BUSINESS POLICY II

Topics include the role of personal values in strategy, the organization's history as a strategic constraint, the relationships between organizational structure and strategy, strategic control, and managing strategic change. Prereq: COMM 4311; or permission of the Department.

COMM 4331 (3CR)

## MANAGEMENT OF ORGANIZATIONAL CHANGE

A study of organizational change from two perspectives: planned change and evolutionary change. In discussing planned change the focus is on the planning and implementation process for introducing innovation, restructuring, continual learning, and other types of organizational change. Topics include overcoming resistance to change and embedding the desired change. In discussing evolutionary change the focus is on the patterns of change in the cultures, structures, systems and processes in different types of organizations over extended periods of time in response to management initiatives, competitive pressures and changes in other organizational variables.
Prereq: COMM 3341; or permission of the Department.

## COMM 4341 (3CR)

BUSINESS ETHICS
This course deals with principles and practices of business ethics, with particular reference to Canada and North America. Issues investigated may include: the question of moral and legal responsibilities of corporations, ethics in business (including the various elements of ethics programmes such as codes of conduct, telephone hotlines, training, the use of ethics officers and of ethics consultants), different control styles (integrity vs compliance programmes), the problems associated with the prisoner's dilemma, the existence of implicit moral theory in economics and finance, the theory of the firm and agency theory, the problem of reputation, virtue ethics, ethical investment theory and practice, and the modelling of ethical problems, mainly using game theory.
Prereq: COMM 3501 or COMM 3411, ECON 1000 (or ECON 1001 and 1011); or permission of the Department.

## COMM 4441 (3CR) <br> MANAGEMENT OF TECHNOLOGY

An examination of theories of technological innovation and technology diffusion in the industrial sector as background for a study of the strategic possibilities open to the firm's senior management for shaping its product and process technology. Topics include: invention and the commercialization of invention, organization of the $R$ and $D$ function, protection of new technology, importation and adoption of technology new to the firm, incremental innovation, shopfloor innovation and tinkering, and monitoring the technological environment.
Prereq: COMM 3421; or permission of the Department.

## COMM 4501 (3CR)

## INVESTMENTS AND PORTFOLIO MANAGEMENT

Topics include theories of security valuation, portfolio selection, stock markets and economic efficiency, and capital market equilibrium. The behaviour of prices of stocks, bonds, and money market instruments will be investigated. Derivative securities will be introduced. Problems of evaluating the investment performance of individuals and investment management institutions will be discussed.
Prereq: COMM 3501; or permission of the Department.
Note: Counts as an Economics elective for students taking a Bachelor of Commerce or a Major, Minor or Honours in Economics.

## COMM 4511 (3CR) <br> CAPITAL MARKETS AND FINANCIAL INSTITUTIONS

An examination of the functions of financial intermediaries operating in our capital markets. Topics are selected from financial intermediation theory, capital markets, security and financial market regulations, risk and return in financial markets, and ethical considerations.
Prereq: COMM 3501; or permission of the Department.
Note: Counts as an Economics elective for students taking a Bachelor of Commerce or a Major, Minor or Honours in Economics.

## COMM 4521 (3CR)

CORPORATE FINANCE
Financial concepts and techniques applied to problems such as working capital management, financial planning, capital budgeting, capital structure, cost of capital, and mergers and acquisitions.
Prereq: COMM 3501; or permission of the Department.
Note: Counts as an Economics elective for students taking a Bachelor of Commerce or a Major, Minor or Honours in Economics.

COMM 4800/4801 (6/3CR)

## SPECIAL TOPICS IN BUSINESS

This course is devoted to business topics not covered by the other courses offered. The course content, format and prerequisites will vary depending on the particular area of business to be covered.
Prereq: Permission of the Department.
COMM 4950/4951 (6/3CR)
INDEPENDENT STUDY
This course is offered to students who wish to study in depth a subject introduced in a previous course or a business area which is not currently covered by our present course offerings. It usually involves independent study in a programme planned by the student and approved by the Department; however, it is possible that some projects may involve several participants working together in groups.
Prereq: Permission of the Department.
COMM 4990 (6CR)
HONOURS THESIS
This course requires a major paper on a business topic and is carried out in close consultation with a thesis director.
Prereq: Permission of the Department.

## COMPUTER SCIENCE

The study of computing ranges from hands-on applications to pure theory, and includes the analysis of algorithms, the study of computer architectures, compilers and operating systems, networks, and software engineering. Our goal is to introduce students to all facets of the discipline, and to give them an appreciation of the historical, ethical, and social context of computing, and the responsibility of the computer professional and casual computer user in a modern society.
The Department offers a broad variety of courses and programs in Computer Science. Introductory courses may teach programming and theories of computing or offer a general overview of the use and application of popular microcomputer software; more advanced courses deal with topics ranging from artificial intelligence and the role of computers in society to the design and implementation of advanced hardware or software systems. All courses in the computing curriculum offer a blend of theory and practical application, with many of the offerings having a significant project component in which students are given the opportunity to apply the classroom material to real-world problems. Courses are designed to address the needs of a wide variety of users, from the casual to the professional. Some students may enrol in a course to familiarize themselves with the microcomputer and application software, while others may choose to pursue a minor or a major in Computer Science. Students may choose to select Computer Science in combination with areas such as English, Economics, Philosophy, or Physics. Mount Allison has been quite successful in placing its students in graduate programs in Computer Science, while many others have found employment after graduation in one of the many computer-related fields.

## Disciplinary B.A. and B.Sc. Programmes

## B.A. MAJOR AREA OF STUDY in Computer Science is 60 credits earned as follows:

18 from COMP 1711, 1721, 2211*, 2611, 2711, 2931
9 from COMP 3611, 3911, 4721
15 from COMP at the 3/4000 levels
$6^{*}$ from MATH 1111, 2221
3 from MATH 1121, 1131, 2311
9 from complementary courses in Arts and Letters, Humanities and Social Science chosen in consultation with the Programme Advisor.

## B.A. or B.Sc. MINOR in Computer Science is 24 credits earned as follows:

15 from Computer Science 1711, 1721, 2211*, 2611, 2931
6 from Computer Science at the 3/4000 levels
3 from Mathematics 1111

## B.Sc. MAJOR AREA OF STUDY in Computer Science is 63 credits earned as follows:

18 from COMP 1711, 1721, 2211*, 2611, 2711, 2931
9 from COMP 3611, 3911, 4721
15 from COMP at the 3/4000 levels
$6^{*}$ from MATH 1111, 2221

3 from MATH 1121, 1131, 2311
12 from Chemistry 1001, 1021, Physics 1051, 1551

## B.A. OR B.Sc. HONOURS in Computer Science and Mathematics is 75 or 87 credits earned as follows:

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18 from COMP 1711, 1721, 2211*, 2611, 2711,2931
15* from MATH 1111, 1121, 2111, 2121, 2221
9 from MATH 3111, 3211, 3311
3 from MATH 3011, 3221, 3231, 3251, 4221
3 from MATH at the 3/4000 levels
15 from COMP 3351, 3411, 3611, 3911, 4721
12 from CHEM 1001, 1021; Physics 1051, }1551\mathrm{ (only for B.Sc.)
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* COMP 2211 was formerly listed as MATH 2211

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## COMPUTER SCIENCE COURSES

## COMP 1611 (3CR)

SURVEY OF COMPUTING AND ITS APPLICATIONS
An introduction to computing providing a broad survey of the discipline. Topics will be chosen from: origins of computers, data representation and storage, computer architecture, assemblers and compilers, operating systems, networks and the internet, theories of computation, artificial intelligence, and trends in internet commerce and use. Laboratory work and assignments will offer experience with the use of application software and programming. The course is designed primarily for students who want a one-semester introduction to the field and have little or no previous computing background. Exclusion: Any COMP 2000 level or higher.

## COMP 1711 (3CR) <br> INTRODUCTION TO COMPUTER SCIENCE I

This course introduces the student to the techniques of algorithm development and structured programming and their implementation using a modern high-level language. The course is intended for students who wish to take further courses in Computer Science. The topics covered are: problem analysis, algorithm design, pseudocode, implementation of structured solutions, applications to both numerical and non-numerical problems. The programming concepts include: data representation, control structures, arrays and sub-programs, testing and debugging programs.
Prereq: Students enrolling in COMP 1711 should normally have completed a university preparatory level course in Mathematics.

COMP 1721 (3CR)

## INTRODUCTION TO COMPUTER SCIENCE II

In the context of solving several larger problems, the techniques of topdown problem solving will be emphasized in order to further develop good programming style. Topics include: documentation, debugging and testing, string processing, internal searching and sorting, elementary data structures, recursion and algorithmic analysis. Further high-level languages may be introduced.
Prereq: COMP 1711; or permission of the Department.

## COMP 1751 (3CR)

## INTRODUCTION TO SCIENTIFIC PROGRAMMING

An introduction to computer systems and the FORTRAN programming language. Special attention is given to the development and implementation of algorithms for solving computational problems.
Prereq: MATH 1111; or permission of the Department.

## COMP/MATH 2211 (3CR)

## DISCRETE STRUCTURES

An introduction to the terminology and concepts of discrete mathematics, covering such topics as: sets, functions, induction, enumeration, graphs and trees, boolean algebras, semigroups and groups, and the design of algorithms.
Prereq: MATH 1111; or permission of the Department.
Note: This course is cross-listed as MATH 2211 and may therefore count as three credits in either discipline.
Exclusion: MATH 2211 Discrete Mathematics

## COMP 2611 (3CR)

## DATA AND FILE STRUCTURES

Effective methods of data organization, focussing on data structures and their algorithms via abstract data types with use of recursive procedures. Design of flexible file structures and related methods e.g. indexes, system file structures, hashed access. Object oriented programming techniques are used in depth.
Prereq: COMP 1721; or permission of the Department.

## COMP 2711 (3CR)

## OBJECT-ORIENTED DESIGN AND METHODOLOGY

Continues the introduction to object-oriented programming begun in earlier CS courses, emphasizing further development of algorithms, data structures, software engineering, and the social context of computing.
Prereq: COMP 2611; or permission of the Department.
Exclusion: COMP 2621 (Data and File Structures II), 2811
COMP 2931 (3CR)

## INTRODUCTION TO SYSTEMS PROGRAMMING

This course is an introduction to programming at the systems level. Topics include: basic machine organization, assembly language, the UNIX environment, shell scripting, and C/C++ programming.
Prereq: COMP 1721; or permission of the Department.
Exclusion: COMP 2911

## COMP/PHYS 3361 (3CR) <br> DIGITAL SIGNAL PROCESSING AND ELECTRONICS

This course introduces students to both digital electronic circuits and digital signal processing, and would be valuable both for those planning to go on in technical careers in computer science or in physics, and for scientists who wish to develop tools for the collection and analysis of data. Topics to be covered include digital logic gates, Boolean algebra, counting circuits, digital signal conditioning, sampling considerations such as the Nyquist criterion, analog to digital and digital to analog conversion, Fourier Transform theory and application as FFT, correlation and convolution, digital filtering using finite impulse response and infinite impulse response circuits including the ztransform and filter design, and digital image processing including two dimensional FFT techniques, microprocessors, microcontrollers and digital signal processing integrated circuits.
Prereq: PHYS 2251 and PHYS 2801 and COMP 1711; or permission of Department
Note: This course is cross-listed with PHYS 3361 and may therefore count as three credits in either discipline

## Exclusion: COMP/PHYS 3351

## COMP/MATH 3411 (3CR)

## NUMERICAL ANALYSIS

This course is an introduction to numerical methods for solving a variety of problems in mathematics, the natural sciences, and engineering. Topics to be studied include numerical solution of linear and nonlinear systems of equations, Gauss elimination, pivoting strategies, numerical stability, PLU factorization, tridiagonal matrices, polynomial and cubic spline approximation and interpolation.
Prereq: MATH 1121, 2221, COMP 1711; or permission of the Department.
Note: This course is cross listed as MATH 3411 and may therefore count as three credits in either discipline.

## COMP/MATH 3511 (3CR)

## LINEAR PROGRAMMING

Among the topics covered are linear and integer programming, the simplex and revised simplex methods, duality theory and sensitivity analysis, and various applications.
Prereq: MATH 2221, 3 credits in Computer Science; or permission of the Department.
Note: This course is cross listed as MATH 3511 and may therefore count as three credits in either discipline.

## COMP/MATH 3531 (3CR)

SIMULATION AND MODELING
An introduction to the simulation technique for studying mathematical models. Specific topics to be considered include: systems theory and system models, continuous system simulation, discrete system simulation, Monte Carlo methods, random number generators, and simulation languages. Emphasis will be placed upon computer implementation of the methods studied.
Prereq: MATH 1111; one of MATH 2311, 3311, PSYC 2001 and 2011; 3 credits in Computer Science; or permission of the Department.
Note: This course is cross listed as MATH 3531 and may therefore count as three credits in either discipline.

COMP 3611 (3CR)

## ALGORITHM ANALYSIS

The purpose of this course is to apply analysis and design techniques to nonnumeric algorithms which act on data structures. Designing efficient algorithms for internal and external sorting/merging/searching leads to notions of complexity (e.g. NP-hard problems) and to memory management techniques. Projects will involve system design of data management systems incorporating the theoretical aspects studied.
Prereq: COMP 2611, COMP/MATH 2211; or permission of the Department.

## COMP 3651 (3CR)

## ARTIFICIAL INTELLIGENCE

This course introduces general problem solving methods associated with automated reasoning and simulated intelligence. Topics include: state space heuristic search theory, mechanical theorem proving, game playing, natural language processing, propositional logic, learning and cognitive models and expert systems.
Prereq: COMP 2611, COMP/MATH 2211; or permission of the Department.

## COMP 3711 (3CR)

## PRINCIPLES OF PROGRAMMING LANGUAGES

An introduction to the principles of design and implementation of procedural and functional programming languages; modular, object and logic programming. Topics include language syntax and processors and semantic models of data and control structures.
Prereq: COMP 2611, 2931; or permission of the Department.
COMP 3811 (3CR)

## DATABASE SYSTEMS

An introduction to major types of database systems, and experience with at least one database model. The theoretical and practical aspects of the relational model are emphasized, including database query systems and database design.
Prereq: COMP 2611, 2931, COMP/MATH 2211; or permission of the Department.

## COMP 3831 (3CR)

## COMPUTER GRAPHICS

This course introduces the principles and tools of interactive computer graphics: implementation of device drivers, 3D transformations, clipping, perspective views, input routines, user interface design, data structures, hidden lines, surface removal, colour shading and ray tracing.
Prereq: COMP 2611, 2931, MATH 2221; or permission of the Department.

## COMP 3851 (3CR)

## COMPUTERS AND SOCIETY

This course examines the historical development and growth of the computer and related digital technology. The impact of the computer and the digitalization of society are discussed, including ethical issues related to the modern information age. Privacy and data protection, computer crime, data theft, and legal issues in software creation and use are examined. The responsibilities of the computer professional and computer user are examined from the technical, personal, and societal perspectives.
Prereq: 6 credits from the Science division, including 3 credits from Computer Science, and third or fourth year standing; or permission of the Department.
Note: Counts as a Commerce elective for students taking a Bachelor of Commerce or a Major or Minor in Commerce.

COMP 3911 (3CR)

## OPERATING SYSTEMS

This course includes the major concepts underlying the design of operating systems. Topics include: process management, scheduling, memory management, device management, system programming, security, and network structures.
Prereq: COMP 2931; or permission of the Department.
COMP 3971 (3CR)
COMPUTER ORGANIZATION AND ARCHITECTURE
This course provides an introduction to modern computer design and its relation to system architecture and operating system functionality. Topics include: system bus design, memory organization, I/O device access, instruction set design, RISC computers, and parallel organization.
Prereq: COMP 2931, 3351; or permission of the Department.

## COMP/MATH 4631 (3CR)

THEORY OF COMPUTATION
This course is an introduction to theoretical aspects of Computer Science such as formal language and automata theory and complexity theory.
Prereq: COMP 1721, COMP/MATH 2211; or permission of the Department.
Note: This course is cross listed as MATH 4631 and may therefore count as three credits in either discipline.

## COMP/MATH 4651 (3CR)

CRYPTOGRAPHY
This course is an introduction to cryptographic algorithms and to the cryptanalysis of these algorithms, with an emphasis on the fundamental principles of information security. Topics include: classical cryptosystems, modern block and stream ciphers, public-key ciphers, digital signatures, hash functions, key distribution and agreement.
Prereq: COMP1711, 1721, COMP/MATH 2211; or permission of the Department.

COMP 4721 (3CR)

## SOFTWARE DESIGN

This course includes the study of software design topics such as software life cycle, requirements specification, and quality ensurance. Software design topics such as strategies, intractable problems, concurrent systems, and data modeling are included. This course will include a large software project.
Prereq: COMP 2611, 2711, 2931, 6 credits in Computer Science at the 3000/4000 level, and third or fourth year standing; or permission of the Department.

## COMP 4911 (3CR)

## COMPUTER NETWORKS

An introduction to computer network applications and design. Topics will include: layered models, data transmission protocols, network topology, and security.
Prereq: COMP 2611, 2931, and 3 credits from Computer Science at the $3 / 4000$ levels; or permission of the Department.

## COMP 4951 (3CR)

## SPECIAL TOPICS IN COMPUTER SCIENCE

This course enables students to pursue their interests in areas not covered by other classes at the 4000 level. It usually involves independent study in a programme planned by the student and approved by the Department.

## DRAMA

Students at Mount Allison with an interest in drama have several options open to them. In all cases, the programmes are designed to provide an education in drama rather than professional training for the theatre.

## Interdisciplinary B.A. Programmes

## INTERDISCIPLINARY MINOR in Drama is 24 credits earned as follows:

12
from Drama/English 2021; Drama 3001, 3051, 3061
12
from Classics 3201, 3211; Drama 4011, 4021; English 2211, 3211, 3311, 3431, 3551, 3561,3611, 3621; French 3271,3371, 3471, 3671, 3771; Spanish 3001, 3011

## INTERDISCIPLINARY MAJOR in Drama is 60 credits earned as follows:

## Drama Core

18 from Drama/English 2021; Drama 3001, 3051, 3061, 4011, 4021

## Dramatic Literature

24 to 30 from Classics 3201, 3211; English 2211, 3211, 3311, 3431, 3551, 3561, 3611 or 3621; French 3271, 3371, 3471, 3671, 3771; Spanish 3001, 3011, 3321 and from the following when their topic is dramatic literature: English 4000 series; French 4811; German 3231, 3301, 3311,4030,4950/4951 and Spanish 4950/51
12 to 18 from Complementary courses to be chosen in consultation with the Drama Programme Advisor. The following are particularly recommended: Anthropology 3231; Canadian Studies 2011, 3311; 3 English credits at the 1000 level, English 3621, 3871, 3850, 3881; Fine Arts 1901, 1911, 1921, 1931, 2001, 2011; French 2201, 2601, 3151, 3161, 3801; German 2701; Music 1001, 1011, 1101, 1111, 2000, 2679-4679, 3303; Sociology 3451; Women's Studies 3001

Note: Students may allow up to 6 credits in English for: Drama 3051 "Acting and Directing", Drama 3061 "Principles of Methods of Interpretation", and Drama 3001 "Dramatic Theory".
Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## DRAMA COURSES

With the exceptions below, all descriptions of Drama courses available are given in the appropriate course description section. The only interdisciplinary drama courses offered are described below.

## DRAM/ENGL 2021 (3CR) <br> INTRODUCTION TO DRAMA

This course introduces students to conventions, forms, and devices of drama as they emerge under, and respond to, specific theatrical and cultural conditions.
Prereq: ENGL 1001 or 1201 or enrolment in the Interdisciplinary Major or Minor in Drama; or permission of the Department.
Note: This course is cross-listed as ENGL 2021 and may be taken as three credits in either discipline.
Exclusion: DRAM/ENGL 2200

## DRAM 3001 (3CR) <br> DRAMATIC THEORY

This course studies ways in which theatre practitioners have understood their art and the ways in which it reflects their world. Among topics to be explored are theories of representation, performance theory, tragic theory, comic theory, Naturalism, Expressionism, and Political Theatre. Prereq: DRAM/ENGL 2021; or permission of the instructor.
Exclusion: DRAM 3000
DRAM 3051 (3CR)
ACTING AND DIRECTING
This course exposes students to theory and practice of acting and directing, exploring the spatial and temporal means by which actors and directors interpret a script on the stage. The class will study the themes, structure, rhythms, subtext, and visual dimensions of three or four dramatic texts, culminating in the production of one of them. The course is offered once every second year, in an alternating rotation with 3061.

Prereq: DRAM/ENGL 2021; or permission of the instructor.
Exclusion: DRAM 3050
DRAM 3061 (3CR)
PRINCIPLES AND METHODS OF PRODUCTION
This course introduces students to the means by which dramatic texts are given life in time and space on the stage. Principles and methods of set design and construction, costuming, lighting and sound design, and stage and theatre management are all explored, with special attention to three or four dramatic texts, one of which will receive production. The course is offered once every second year, in an alternating rotation with Drama 3051.
Prereq: DRAM/ENGL 2021; or permission of the instructor.
Exclusion: DRAM 3050

## DRAM 4011 (3CR)

## SPECIAL TOPICS IN THEATRICAL INTERPRETATION I

Individual projects in areas such as acting, directing, writing, and design as assigned within the Windsor Theatre's season by the Director of Drama. Practical results will be supported by written and/or visual materials as appropriate. Prereq or co-req: DRAM 3051, or 3061, or FREN 3151 and 3161, and permission of the Director of Drama.

DRAM 4021 (3CR)
SPECIAL TOPICS IN THEATRICAL INTERPRETATION II
Individual projects in areas such as acting, directing, writing and design as assigned within the Windsor Theatre's season by the Director of Drama. Practical results will be supported by written and/or visual materials as appropriate. Prereq or co-req: DRAM 4011 and permission of the Director of Drama.

## ECONOMICS

To survive, a man must eat - the first rule of continued existence. 'On a decent diet, man can produce just about one horsepower hour of work daily, and with that he must replenish his exhausted body. With what is left over, he is free to build a civilization.' (R.L. Heilbroner, The Economic Problem, p. 8). An economic system is what society relies upon to provide for the material well-being of its members.
Every society must in some way determine what material goods and services its members will produce, (the question of production) and to what extent each person can claim a portion of this flow of output (the question of distribution). There are no divinely correct answers to these unavoidable questions. Each society seeks its own social arrangements. Our Canadian society relies primarily, although not completely, upon a system of variable money prices, a market economy, to resolve the questions of production and distribution.
Much of the study of economics consists of examining the operation of market economies to discover regularities of behaviour, ultimately in the expectation that through better understanding society will be able to remedy undesirable results and achieve better ones. Such a study logically includes looking at the historical evolution of modern economies (economic history), the evolution of man's thinking about economic systems (economic thought), the operation of markets (microeconomics), the aggregate flows of output (macroeconomics), the operation of the money system (money and banking), economic relationships with other societies (international economics) and so on. Instruction on such topics emphasizes understanding.
To achieve understanding means moving into the seemingly abstract realm of theory, analysis and technical terms. Little attention is paid to description or factual memorization. Courses in economics are not designed for social chitchat about current economic problems. The courses do provide a foundation for a better understanding of such problems. Students planning to concentrate on economics will find mathematics a valuable complementary study. Those who dislike mathematics or who do poorly in it usually encounter difficulties in economics.

## Disciplinary B.A. Programmes

## MINOR in Economics is 24 credits earned as follows:

6 from Economics 1000, (or 1001 and 1011)
18 from Economics, including 6 from the 3/4000 level, chosen in consultation with the Programme Advisor

## MAJOR AREA OF STUDY in Economics is 60 credits earned as follows:

24 from Economics 1001 and 1011 (or 1000), 2001, 2011, 2101, 2111, 2701, 3501
6 from Mathematics 1111, 2311
6 from Commerce 2101, Computer Science 1711 or 1611, Math 1121 (or 1131), Math 2221
15 from Economics at the 3/4000 level
9 from complementary courses, chosen in consultation with the Programme Advisor.

## Note:

1. Commerce $3411,3501,4501,4511$ and 4521 may be designated as Economics electives for students taking a Bachelor of Commerce or a Major, Minor or Honours in Economics.
2. Economics $3201,3211,3601,3611,3621,3711,3921,4501,4511$, 4700, 4801, 4811, 4821, 4990 Computer Science 3851, and Religious Studies 3951, 3961 are Commerce electives for students taking a Bachelor of Commerce or a Major or Minor in Commerce.
Note: See also the Interdisciplinary Minor in International Economics and Business.

## HONOURS PROGRAMME

Honours in Economics may be completed in both Arts and Commerce Degree Programmes. For Honours under the B.A. please see the section below; for Honours under the B.Comm. please see section 7.5.16. Students who plan to pursue graduate studies in Economics are advised to include Economics 4700, 4801, 4811, 4821 and courses in Calculus, Linear Algebra (MATH 2221) and Statistics (MATH 3311, 3321) from the Mathematics Department. Other courses in Mathematics are also valuable. Students should seek advice from a member of the Department of Economics when deciding on a programme of study.

## HONOURS in Economics is 72 credits earned as follows:

51 credits as in the first four lines of the Major, plus:
12 from Economics 4001, 4011, 4700, 4801, 4811, 4821, 4990
9 from Economics at the 3/4000 level or Mathematics and Computer Science (except Mathematics 1001 and 2321; and Computer Science 1611 and 1711) chosen in consultation with the Economics Programme Advisor.

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## ECONOMICS COURSES

## ECON 1000 (6CR)

PRINCIPLES OF ECONOMICS
This course introduces economic theory and its application in the analysis of economic policy. A wide range of topics is covered including the role of market prices in resource allocation decisions, business cycles (unemployment and inflation), the economic behaviour of firms, sustainable development and the environment, international economic relations, and government debts and deficits. This course is normally the prerequisite for all other courses in Economics.
Prereq: Students should normally have completed a university preparatory level course in Mathematics.
Exclusion: ECON 1001, 1011

## ECON 1001 (3CR) <br> PRINCIPLES OF MICROECONOMICS

A general introduction to the study of Economics and the nature of economic problems. Of primary concern is the behaviour of consumers and firms in different markets, and the results of their actions as manifested in production, costs, and prices. Market efficiency and market failure are also examined.
Prereq: Students should normally have completed a university preparatory level course in Mathematics.

## Exclusion: ECON 1000

## ECON 1011 (3CR)

## PRINCIPLES OF MACROECONOMICS

A general introduction to the study of Economics and the nature of economic problems. Of primary concern is the determinants of the level of national income, employment, and the accompanying stabilization problems and policies. Topics also include money and banking. international trade, exchange rates, and the problems of inflation.
Exclusion: ECON 1000

## ECON 2001 (3CR)

## INTERMEDIATE MICROECONOMICS I

A course in microeconomic theory and its applications. Topics include: scope and method of microeconomics; market interactions; supply and demand; consumer behaviour; choices under uncertainty; theory of production and cost; profit maximization and competitive supply; and the analysis of competitive markets and effects of government policies. Prereq: ECON 1000; or ECON 1001; or permission of the Department.

## ECON 2011 (3CR)

## INTERMEDIATE MICROECONOMICS II

Microeconomic theory and its applications continued. Topics include: market power; monopoly and monopsony; pricing with market power; monopolistic competition and oligopoly; game theory and competitive strategy; markets for inputs and income distribution; investment, time and capital markets; general equilibrium and economic efficiency; markets and asymmetric information; and externalities and public goods.
Prereq: ECON 2001; or permission of the Department.

## ECON 2101 (3CR)

## INTERMEDIATE MACROECONOMICS 1

Theories of national income, employment, inflation, balance of payments, and stabilization policy within the framework of macroeconomic models of a open economy. The focus of the course will be on short-run macroeconomic analysis and policy.
Prereq: ECON 1000; or ECON 1011; or permission of the Department.

## ECON 2111 (3CR)

## INTERMEDIATE MACROECONOMICS II

A continuation of macroeconomic analysis in the context of the long-run. Topics include long-run consumption functions, investment and real business cycles, economic growth and productivity, and the monetary theories of the classical economists, Keynes, and Friedman. Prereq: ECON 2101; or permission of the Department.

## ECON 2301 (3CR)

## ISSUES IN CANADIAN PUBLIC POLICY

This course is designed to introduce students to analytical methods used by social scientists examining Canadian social and economic policy. Students will be exposed to these analytical methods while studying issues which perennially arise in discussions of Canadian social and economic policy. Specific topics covered will vary from year to year and might include the following: unemployment and government policy; Canada and the global economy; social security reform; regionalism; education policy; health policy; and inflation and public policy.
Prereq: Six credits from the following departments: Anthropology, Commerce, Economics, Geography, Political Science, or Sociology; or permission of the Department.

## ECON 2311 (3CR)

## CURRENT DEBATES IN CANADIAN PUBLIC POLICY

This course is a critical study of current debates on economic and social policy in Canada. Specific debates covered will vary from year to year, and will be chosen to ensure no overlap with Economics 2301.
Prereq: Six credits from the following departments: Anthropology, Commerce, Economics, Geography, Political Science, or Sociology; or permission of the Department.

## ECON 2521 (3CR)

## COMMUNITY ECONOMIC DEVELOPMENT

This course examines the mobilization of economic resources at the community level. Topics may include: goals and objectives of community development, theories of community development, the role of entrepreneurship in the private, public, and voluntary sectors in community development, and techniques for economic analysis at the community level.
Prereq: ECON 1001 and 1011(or 1000), or permission of the Department.

## Exclusion: ECON 3521

Note: This course counts as a Commerce elective for students taking a Bachelor of Commerce or a Major or Minor in Commerce.

## ECON 2701 (3CR)

## STATISTICS FOR BUSINESS AND ECONOMICS

The application of statistical methods to economic data. Topics include: descriptive statistics, hypothesis testing, analysis of variance, simple regression, multiple regression, non-parametric statistics chi-square tests, index numbers, sampling designs, and time series.
Prereq: ECON 1000, (or 1001 and 1011), Math. 2311; or permission of the Department.
Note: Students may take MATH 3311 and 3321 instead of this course. Honours students are strongly encouraged to do so.
Exclusion: MATH 2321

## ECON 3101 (3CR)

## LAW AND ECONOMICS

An introduction to the economic analysis of law, the role of economics in legal debates, and the role of law in economic exchange. The course examines economic aspects of social and legal issues and policies in regional, national and international contexts. Topics may include: property, contracts, torts, environmental law, and the economics of crime and punishment.
Prereq: ECON 1001 and 1011,(or ECON 1000); or permission of the Department.

## ECON 3111 (3CR) <br> HEALTH ECONOMICS

An introduction to economic issues in the health care system. The course examines applications of economic principles and empirical analysis to the study of health and health policies in Canadian and International contexts. Topics may include: the demand for health care, the supply of health services through health practitioners and hospitals, the economic effects of health insurance, pharmaceutical markets, economic evaluation techniques for health, health technology assessment and public policy formulation.
Prereq: ECON 1001 and 1011,(or ECON 1000); or permission of the Department.

ECON 3201 (3CR)
MONEY, BANKING, AND THE CANADIAN FINANCIAL SYSTEM: MICROECONOMIC PERSPECTIVES
This course covers microeconomic aspects of the Canadian financial system. One main focus of the course is on financial instruments, the markets in which they are traded, and the economic role that these markets play. The other main focus is on Canadian financial institutions, the activities in which they engage, and the economic roles they play.
Prereq: ECON 1000, (or 1001 and 1011); or permission of the Department.
Note: Counts as a Commerce elective for students taking a Bachelor of Commerce or a Major or Minor in Commerce.

## ECON 3211 (3CR) <br> MONEY, BANKING, AND THE CANADIAN FINANCIAL SYSTEM: MACROECONOMIC PERSPECTIVES

This course covers macroeconomic aspects of the Canadian financial system. These include central banking, and the conduct and mechanics of monetary policy. The international financial system is also covered.
Prereq: ECON 1000, (or 1001 and 1011); or permission of the Department.
Note: Counts as a Commerce elective for students taking a Bachelor of Commerce or a Major or Minor in Commerce.

## ECON 3501 (3CR)

ECONOMIC GROWTH AND TECHNOLOGICAL CHANGE
This course covers economic theories of economic growth and technological change and their application in the study of the historical evolution of the world economy. Historical sections of the course will selectively cover materials on Canada, the US, Europe, Asia, and the developing world.
Prereq: ECON 1001 and 1011 (or ECON 1000), or permission of the Department

ECON 3531 (3CR)
ECONOMIC GROWTH AND DEVELOPMENT: JAPAN AND EAST ASIA
This course focuses on the economic performance of the economies of Japan, China, and other areas of eastern Asia. Economic history and major current events will be covered.
Prereq: ECON 3501; or permission of the Department.

## ECON 3551 (3CR)

INTERNATIONAL DEVELOPMENT
This course focuses on differences in the patterns of economic development in the world economy. The primary focus is the developing world and on national and international policies designed to improve the global distribution of income. The economic development policies of the World Bank, the International Monetary Fund, and the United Nations will be critically examined.
Prereq: ECON 3501; or permission of the Department.

## ECON 3601 (3CR)

## PRINCIPLES OF COST-BENEFIT ANALYSIS

This course examines the use of economic theory in the assessment of public sector regulations and projects. Topics include the measurement of social costs and social benefits, shadow pricing, and the choice of discount rate. The course will rely heavily on concrete examples such as transportation infrastructure, medical services, environmental protection and hydro development.
Prereq: ECON 2001; or permission of the Department.
Note: Counts as a Commerce elective for students taking a Bachelor of Commerce or a Major or Minor in Commerce.

## ECON 3611 (3CR)

## INDUSTRIAL ORGANIZATION: THEORY

An overview of central theories of industrial organization, examining market power, the theory of the firm, and strategic behaviour, within classic and dynamic oligopoly theoretical frameworks. The course makes explicit use of game theoretic techniques where appropriate. Topics may include: collusive and competitive behaviour, non-linear pricing, commitment and repeated games, and entry deterrence.
Prereq: ECON 2001 and ECON 2011; or permission of the Department. Exclusion: ECON 3611 (Industrial Organization and Policy in Canada)

## ECON 3621 (3CR)

## INDUSTRIAL ORGANIZATION: POLICY

The economics of vertical and horizontal restraints. The course provides an introduction to regulatory economics and Canadian and International competition policy. Topics may include policy issues concerning the control of mergers, monopoly, predatory pricing, collusion, resale price maintenance, exclusive dealing, tying, and other contractual agreements including restrictions on contracting agents.
Prereq: ECON 2001 and ECON 2011; or permission of the Department.

ECON 3711 (3CR)

## LABOUR MANAGEMENT RELATIONS

An introduction to the history and institutions of the North American industrial relations system. Topics include: labour management techniques used by firms; unions and union strategies; government regulation of pay and working conditions; and the structure of collective bargaining.
Prereq: ECON 1000, (or 1001 and 1011); or permission of the Department.
Note: Counts as a Commerce elective for students taking a Bachelor of Commerce or a Major or Minor in Commerce.

ECON 3721 (3CR)

## LABOUR ECONOMICS

An introduction to labour economics. Topics covered include: the demand and supply of labour, the Canadian labour market and income distribution, unemployment, poverty, and discrimination in Canada. Prereq: ECON 2001 and 2011; or permission of the Department.

## ECON 3801 (3CR)

## ENVIRONMENTAL ECONOMICS

The application of economic analysis in the study of environmental problems. Students will examine when and why markets often fail to allocate sufficient resources to environmental conservation, and will critically assess different policy instruments available to correct for the fundamental "market failure". Using the analytical methods developed in this course, the following type of policies will be examined: measures to control air and water pollution, the disposal of hazardous wastes, the protection of endangered species, and the control of cross border pollution, including the Canadian "Green Plan".
Prereq: ECON 1000, (or 1001 and 1011); or permission of the Department.

## ECON 3821 (3CR)

## NATURAL RESOURCE ECONOMICS

The application of economic analysis to questions of management, use, and/or conservation of natural resources. Students will be exposed to economic theories used in the study of renewable and non renewable resource industries. Particular attention will be given to resource industries important to the Atlantic Canadian economy (the fishery, forestry, agriculture, mining, and energy).
Prereq: ECON 2001 and 2011, MATH 1111; or permission of the Department.

## ECON 3901 (3CR) INTERNATIONAL TRADE

Issues examined will include the pure economic theory of international trade and important institutions (the FTA, NAFTA, the EC, GATT, etc.), plus problems and policies associated with trade in goods and services. Students will examine issues such as free trade and protectionism and the gains and losses resulting from globalization. Prereq: ECON 1000, (or 1001 and 1011); or permission of the Department.

## ECON 3921 (3CR)

## INTERNATIONAL FINANCE

This course examines the financial side of international trade. The focus is on exchange rates, the balance of international payments, alternative means of adjustment to shocks in the international economy, and international monetary arrangements.
Prereq: ECON 1000, (or 1001 and 1011); or permission of the Department.
Note: Counts as a Commerce elective for students taking a Bachelor of Commerce or a Major or Minor in Commerce.

## ECON 4001 (3CR) <br> MODES OF CLASSICAL ECONOMIC THOUGHT

This course focuses on the work of classical economists (especially Adam Smith, David Ricardo, Thomas Malthus) and the economic theories of Karl Marx.
Prereq: 6 credits from ECON 2001, 2011, 2101 and 2111; or permission of the Department.

## ECON 4011 (3CR)

## MODES OF ECONOMIC THOUGHT

This course examines the historical origins of neo-classical, Austrian and Keynesian economics thought.
Prereq: ECON 2001, 2011, 2101 and 2111; or permission of the Department.

## ECON 4501 (3CR)

## PUBLIC FINANCE: TAXATION AND FISCAL FEDERALISM

This course examines positive and normative approaches to taxation and fiscal federalism with special emphasis on issues in Canadian Public Finance.
Prereq: ECON 2001 and 2011; or permission of the Department.
Note: Counts as a Commerce elective for students taking a Bachelor of Commerce or a Major or Minor in Commerce.

## ECON 4511 (3CR)

PUBLIC FINANCE: EXPENDITURES AND DEBT MANAGEMENT
This course examines positive and normative approaches to public expenditures and debt management with special emphasis on issues in Canadian Public Finance.
Prereq: ECON 2001, 2011 and 2101; or permission of the Department. Note: Counts as a Commerce elective for students taking a Bachelor of Commerce or a Major or Minor in Commerce.

## ECON 4700 (6CR)

ECONOMETRICS
An introduction to the measurement of economic relationships. Prereq: MATH 2221, ECON 2701 or MATH 3311 and 3321; or permission of the Department.
Note: Counts as a Commerce elective for students taking a Bachelor of Commerce or a Major or Minor in Commerce.

## ECON 4801 (3CR)

## ADVANCED ECONOMIC THEORY I

The course is primarily concerned with developing tools and techniques for analyzing problems in microeconomics. These include modern theories of the consumer and of the firm, general equilibrium, and the welfare theorems. Honours students who wish to pursue graduate studies in economics are strongly advised to take this course.
Prereq: ECON 2001, 2011, 2101, 2111, MATH 1121; or permission of the Department.
Note: Counts as a Commerce elective for students taking a Bachelor of Commerce or a Major or Minor in Commerce.

ECON 4811 (3CR)
ADVANCED ECONOMIC THEORY II
The course is primarily concerned with developing tools and techniques for analyzing dynamic macroeconomic problems. Topics include growth models, overlapping generation models, and real business cycle models. Honours students who wish to pursue graduate studies in economics are strongly advised to take this course.
Prereq: ECON 4801; or permission of the Department.
Note: Counts as a Commerce elective for students taking a Bachelor of Commerce or a Major or Minor in Commerce.

## ECON 4821 (3CR)

## UNCERTAINTY AND STRATEGY IN ECONOMICS

The course examines the roles played by uncertainty and asymmetric information in the allocation of resources. The course also introduces the tools of the game theory, and demonstrates their use in analyzing strategic behaviour in economics. Honours students who wish to pursue graduate studies in economics are strongly advised to take this course.
Prereq: ECON 2001, 2011, 2101, 2111; or permission of the Department.
Note: Counts as a Commerce elective for students taking a Bachelor of Commerce or a Major or Minor in Commerce.

ECON 4950/4951 (6/3CR)
DIRECTED READINGS ON SPECIAL TOPICS
This course permits a senior student, under the direction of a faculty member, to pursue a program of independent study in the form of directed readings or directed research on topics not usually covered in other course offerings or permits a more intensive study of topics covered in regular course offerings.
Prereq: Written permission of the Department.
ECON 4980/4981 (6/3CR)
SPECIAL TOPICS IN ECONOMICS
A senior course which focuses on topic(s) not covered by current course offerings in Economics or topic(s) not covered in depth by the courses offered.
Prereq: Permission of the Department.

ECON 4990 (6CR)
HONOURS THESIS
A student fulfilling requirements for an Honours degree may elect to undertake a research and writing project of acceptable scope and quality under the supervision of faculty members in Economics. The student must submit a formal proposal to the Department prior to registration. Prereq: Written permission of the Department.
Note: Counts as a Commerce elective for students taking a Bachelor of Commerce or a Major or Minor in Commerce.

## ENGLISH LITERATURES

The majority of students take at least one English course during their undergraduate career. While the curriculum focuses on literary study, students are encouraged to develop an appreciation for the English language that will stand them in good stead in all other fields of academic and professional endeavour. English is, in fact, a central study. The language is every student's essential instrument of understanding and expression and the subject - matter of the literature touches on every area of human knowledge and experience. More and more, under the increasing threat in our society to the Humanities and the values they embody, the vital importance of English must be stressed. With urgent reason, English has become "the central humanity."

## GENERAL DESCRIPTION OF THE ENGLISH PROGRAMME

The 1000- level series courses offer an introduction to a variety of approaches to the reading of and writing about literature, using texts from a range of genres and periods. At the 2000 level, students may choose from an introduction to literary periods course, genre courses, Shakespeare courses, and a Canadian literature course. These courses provide foundation for the 3000-level courses. At the 3000 level students are offered courses in traditional periods of English literature, various national literatures including Canadian and American, Postcolonial literature, dramatic literature, creative writing, film, genre and cultural studies.
Normally taken only in the fourth year when students are best equipped to benefit from them, the "Selected Topics" courses of the 4000 -series provide an opportunity for students and faculty to develop their special interests. While various topics are offered from year to year at the 4000 level, students can pursue individual study and research under supervision (4951: Independent Study).

## Disciplinary B.A. Programmes

## MINOR in English is 24 credits earned as follows:

3 from English 1201
up to 12 from English at the 2000 level
9 to 15 from English at the 3/4000 level, chosen in consultation with the Programme Advisor

## MAJOR AREA OF STUDY in English is 60 credits earned as follows:

3 from English 1201
6 to 12 from English at the 2000 level including 2201 and 2301.
27 to 33 from English at the 3/4000 level ( 3 credits each chosen from at least five of the eleven subject areas listed below: at least 9 credits must be chosen from the 4 subject areas prior to 1800 - that is from the 18th Century, the 17th Century, the Renaissance, and the Medieval periods)
18 credits from complementary courses in Arts and Letters and Humanities, chosen in consultation with the Programme Advisor

## HONOURS PROGRAMME

Students with a strong interest in and aptitude for the subject may wish to seek an Honours Degree in English. The requirements are sixty-six English credits, as outlined below. Students must apply to the Honours Coordinator to do Honours in January of their junior year. In the senior year Honours candidates must take English 4990, the Honours Thesis, in which a grade of at least $B$ must be achieved for Honours.

## HONOURS in English is 66 credits earned as follows:

42 credits as in the first three lines of the Major, including English 2211.

6 from English 4990
18 from English at the 3/4000 level, including 3 credits each from two additional subject areas (for a total in the Honours programme of seven subject areas), chosen in consultation with the Honours Coordinator

Students are encouraged to take more than the minimal number of English courses required; this will give them a wider coverage of the subject. ("Core" selections often include the Shakespeare courses and one course in Canadian literature.)

1. The subject areas and corresponding courses are as follows:

## Medieval:

$$
3011,3021,3241 \text { (if appropriate), } 4221 \text { (if appropriate) }
$$

## Renaissance:

3211, 3231,3241 (if appropriate), 3311, 4221 (if appropriate)

## 17th Century:

3351, 3361, 4221 (if appropriate)

## 18th Century:

3411, 3421, 3431, 4221 (if appropriate)

## 19th Century:

$$
3451,3461,3481,3491,4231 \text { (if appropriate) }
$$

## Modern:

 3511, 3521, 3551, 4231 (if appropriate)
## Contemporary and Theoretical Studies:

 3561, 3611, 3621, 3850, 3871, 3881, 3911, 3921, 3931, 4231 (if appropriate), 4901 (if appropriate), 4921, 4931, 4941
## American:

 3711, 3721, 4701, 4231 (if appropriate)
## Canadian:

3801, 3811, 3821, 3831, 4801

## Postcolonial:

 3751, 3761, 3771, 3781, 4231 (if appropriate), 4801 (if appropriate), 4941 (if appropriate)
## Literature by Women:

 3651, 3661, 4921 (if appropriate)Note: 4951 and 4990 fall outside the subject areas.
2. Each year the English Department prints a Handbook which includes a detailed syllabus and the texts prescribed for each course offered in the English programme in the current year, together with information on classes and assignments. Since it is impossible to offer in any one year all the courses listed here at the 2000, 3000 and 4000 levels, students must use the Department's Handbook as their guide for the coming year.
3. Students may allow up to 6 credits in English for: Drama 3051
"Acting and Directing," Drama 3061 "Principles of Methods of Interpretation," and Drama 3001 "Dramatic Theory."
4. The Major or Minor in Drama. See Drama Entry.

## SPECIAL REGISTRATION PROVISIONS 1000 AND 2000 SERIES

English 1111 and 1121 are companion classes that will fulfill the Arts and Letters distribution requirement for the Bachelor of Arts and Bachelor of Science degrees. Students who wish to pursue courses in English at the 2000 level and above, are required to take English 1201.

## DEPARTMENTAL ADVICE

At registration, students should consult with Departmental Programme Advisors in the selection of courses.
Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## ENGLISH COURSES

ENGL 1111 (3CR)

## LITERATURE, THE ARTS AND HUMANITIES

English 1111 provides an introduction to the interrelationship between literature and social issues, focusing on the intersection of the discipline of English with other fields in the Arts and Humanities. The course will acquaint beginning students with many of the major forms of English literature as encountered through discussions related to subjects such as the fine arts, religion, philosophy, history, and other fields in the Arts and Humanities.

ENGL 1121 (3CR)
LITERATURE, SCIENCE AND TECHNOLOGY
Like its companion course English 1111, English 1121 provides an introduction to the interrelationship between literature and social issues, in this case focusing on topics related to the fields of Science and Technology. The material will introduce beginning students to English Literature and its interaction with scientific and technological subjects in past and present societies.

## ENGL 1201 (3CR)

## INTRODUCTION TO PRINCIPLES OF LITERARY ANALYSIS

This course, offered in several sections each year, introduces students to critical approaches to the reading of, and writing about, literature. Each section has its own reading list, set by the individual instructor and including a balanced representation of prose, fiction, poetry and drama, taken from a range of historical periods.
Note: Students who wish to pursue courses in English at the 2000-level and above must take ENGL 1201.
Exclusion: ENGL 1001

## 2000 SERIES

ENGL 2011 (3CR)
INTRODUCTION TO POETRY
This course will acquaint students with the materials of the poet's art and survey out-standing achievements in the English tradition of poetry.
Prereq: ENGL 1001 or 1201; or permission of the Department.
Exclusion: ENGL 2100
ENGL/DRAM 2021 (3CR)
INTRODUCTION TO DRAMA
This course introduces students to conventions, forms, and devices of drama as they emerge under, and respond to, specific theatrical and cultural conditions.
Prereq: ENGL 1001 or 1201, or enrolment in the Interdisciplinary Major or Minor in Drama; or permission of the Department
Note: This course is cross-listed as DRAM 2021 and may be taken as three credits in either discipline.
Exclusion: ENGL/DRAM 2200
ENGL 2031 (3CR)
INTRODUCTION TO PROSE FICTION
This course will examine the two major prose genres of the novel and the short story; selected examples of representative forms will be chosen to illustrate the range and variety of both genres.
Prereq: ENGL 1001 or ENGL 1201; or permission of the Department. Exclusion: ENGL 2031 (Introduction to the Novel) and/or ENGL 2041 (Introduction to Short Fiction).

## ENGL 2201 (3CR) <br> LITERARY PERIODS TO 1800

This course presents an intensive survey of English literary history from Anglo-Saxon times to the late eighteenth century. Along with its companion course, English 2301, it is specially designed for students with a strong interest in the discipline of English.
Prereq: ENGL 1001 or 1201; or permission of the Department.
Note: ENGL 2201 is mandatory for the Majors and Honours degrees. Exclusion: ENGL 2001

## ENGL 2211 (3CR)

INTRODUCTION TO SHAKESPEARE
This course introduces students to a wide range of Shakespeare's plays.
Prereq: ENGL 1001 or 1201; or second-year standing in the
Interdisciplinary Programme in Drama; or permission of the Department.
Exclusion: ENGL 2311, 2321, 3300

## ENGL 2301 (3CR)

LITERARY PERIODS, 1800-PRESENT
This course presents an intensive survey of English literary history from the Romantic period to the present. Along with English 2201, it is specially designed for students with a strong interest in the discipline of English. Students are strongly advised to take English 2201 before enrolling in this course.
Prereq: ENGL 1001 or 1201
Note: ENGL 2301 is mandatory for the Majors and Honours degrees

ENGL 2801 (3CR)

## INTRODUCTION TO CANADIAN LITERATURE

This course presents an introductory overview of Canadian literature from its beginnings to the present.
Prereq: ENGL 1001 or 1201; or permission of the Department.
Exclusion: ENGL 2800

## 3000 SERIES

## ENGL 3011 (3CR)

## SURVEY OF MEDIEVAL LITERATURE

A study of selected literary texts produced in England from the fifth century to the fifteenth century. Anglo-Saxon, Anglo-Norman and Celtic texts will be read in modern translations, Middle-English texts will be read in the original. Major texts and authors such as Beowulf, the Anglo-Saxon elegies, Chaucer, Lydgate and Malory will be included along with anonymous texts.
Prereq: ENGL 2201 and 3 other credits of English at the 2000 level, or permission of the Department.
Exclusion: ENGL 3011 (Anglo-Saxon and Medieval Literature).
ENGL 3021 (3CR)
MIDDLE-ENGLISH LITERATURE
This course will concentrate on Middle-English literature produced in the twelfth to the fifteenth centuries. Prose and poetry genres, including lyrics, romances, dream visions and frame narratives may be studied in conjunction with a specific theme or subject. The texts will be read in the original Middle-English language.
Prereq: ENGL 3011 or permission of the Department.
Exclusion: ENGL 3021 (Later Medieval Literature)
ENGL 3211 (3CR)

## ADVANCED STUDIES IN SHAKESPEARE

A study of a selected number of Shakespeare's plays at an advanced level, requiring students' engagement with current issues in Shakespearean scholarship and criticism.
Prereq: ENGL 2211 or ENGL 3311 and three more English credits at the 2000 level or permission of the Department.
Exclusion: ENGL 3300
ENGL 3231 (3CR)

## SIXTEENTH CENTURY LITERATURE

This course will examine development of literary forms and genres in the English Renaissance. It will provide an overview to the non-dramatic literary developments in the 16th Century, and will provide samples of the tremendous range of literature being produced in the Tudor period.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.

ENGL 3241 (3CR)

## MAJOR TEXTS IN EARLY ENGLISH LITERATURE

This course will examine a major text, genre or theme from the Medieval and Renaissance periods. Topics will rotate from a selection of long texts and long text-based genres. Examples of such texts are: Beowulf, The Canterbury Tales, Piers Plowman, Morte D'Arthur, Sir Gawain and the Green Knight, The Faerie Queene, and Arcadia.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.
Note: Please contact the English Department for the specific subject for each year.

ENGL 3311 (3CR)
ENGLISH DRAMA TO 1642
A study of English dramatic literature and production, excluding Shakespeare, from the Middle Ages to the closing of the theatres in 1642.

Prereq: Either ENGL/DRAM 2021 and 3 more English credits at the 2000 level or permission of the Department, or English/Drama 2021 and third year standing in the Interdisciplinary Drama Programme.
Exclusion: ENGL 3100, 3111, 3121

## ENGL 3351 (3CR)

LITERATURE OF THE EARLY SEVENTEENTH CENTURY
A study of the poetry and prose of the early seventeenth century, focusing on the work of authors such as Donne, Jonson and Herbert. Prereq: 6 credits of English at the 2000 level; or permission of the Department.
Exclusion: ENGL 3350
ENGL 3361 (3CR)
LITERATURE AND THE ENGLISH REVOLUTION
A study of the poetry and prose which emerged from the political, religious and social revolutions of the mid-seventeenth century, including the work of Marvell, Milton and Bunyan.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.
Exclusion: ENGL 3350

## ENGL 3411 (3CR)

## RESTORATION AND AUGUSTAN LITERATURE

This course examines British writing of the Restoration and early Augustan periods (1660-1720). The variety of genres and authors to be studied includes early novels by Behn, Defoe, and Swift, formal verse satire by Rochester and Pope, verse epistles and lyrics by Philips and Finch, and diaries and memoirs by Pepys and Manley.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.
Exclusion: ENGL 3400

ENGL 3421 (3CR)

## LITERATURE IN THE AGE OF ENLIGHTENMENT

This course examines British writing from the Age of Reason to the Age of Sensibility (1720-1780). The range of genres and authors to be studied includes satires by Pope and Johnson, novels by Haywood, Fielding, Sterne, and Burney, lyric odes by Carter, Collins, and Gray, and the first Gothic novel by Walpole.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.

## Exclusion: ENGL 3400

## ENGL 3431 (3CR)

## RESTORATION AND EIGHTEENTH CENTURY DRAMA

This courses examines the major British playwrights and dramatic forms emerging between the time of the Restoration of the Monarchy (1660) and the end of the eighteenth century. Works will be assessed both in light of their contemporary theatrical conditions and as cultural artifacts of their respective ages.
Prereq: Either ENGL/DRAM 2021 and 3 more English credits at the 2000 level or permission of the Department, or English/Drama 2021 and third year standing in the Interdisciplinary Drama Programme.

## Exclusion: ENGL 3430

ENGL 3451 (3CR)

## LITERATURE IN THE AGE OF ROMANTICISM

This course examines British writing from 1780 to 1810, a period of profound cultural transformation under the impact of the American, French, and Industrial Revolutions. Romanticism was one response to this context, and the course will explore representative examples from the poetry of Blake, Smith, Coleridge, and William Wordsworth. Other genres to be studied will include the Gothic novel, the Jacobin novel, diaries, and epistolary essays.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.
Exclusion: ENGL 3451 (Literature in the Age of Revolution)
ENGL 3461 (3CR)

## LITERATURE OF THE REGENCY

This course examines British writing of the early nineteenth century from the Regency through the reign of George IV (1810-1830). The literary genres to be studied will include Romantic poetry, Regency satire, the historical novel, and the novel of manners, written by such authors as Byron, Austen, Keats, the Shelleys, Scott, Hemans, and Landon.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.
Exclusion: ENGL 3450
ENGL 3481 (3CR)

## EARLY VICTORIAN LITERATURE

This course examines British writing from the 1830s to the 1860s. Genres and authors to be studied include the novels, essays, and poems of such authors as Carlyle, the Brontes, Tennyson, Gaskell, Dickens, Elizabeth Barrett Browning and Robert Browning.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.
Exclusion: ENGL 3450

ENGL 3491 (3CR)

## LATE VICTORIAN LITERATURE

This course examines British writing at the zenith of the British Empire (1867-1900). The variety of genres and authors to be studied includes novels by Eliot, Thackeray and Hardy, essays by Arnold, Ruskin, and Pater, and poems by Webster, Field, Arnold, Hopkins, the pre-Raphealites, Christina Rossetti, and Wilde.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.
Exclusion: ENGL 3450

## ENGL 3511 (3CR)

## THE RISE OF MODERNISM

This course will examine the roots of Modern British Literature in the 1890's, and follow its progress through the mid 1920's. Among the authors to be considered will be Oscar Wilde, W.B. Yeats, Arthur Conan Doyle, Virginia Woolf, Wyndham Lewis, James Joyce and T.S. Eliot. Prereq: 6 credits of English at the 2000 level; or permission of the Department.
Exclusion: ENGL 3500

## ENGL 3521 (3CR)

## LATER TWENTIETH CENTURY BRITISH LITERATURE

This course will look at developments in British literature from the mid-1920's to the present. Among the authors to be considered will be Wilfred Owen, Stevie Smith, T.S. Eliot, W.H. Auden, Samuel Beckett, Philip Larkin, Seamus Heaney, Martin Amis, and A.S. Byatt.
Prereq: ENGL 3511; or permission of the Department.
Exclusion: ENGL 3500
ENGL 3551 (3CR)

## THE DEVELOPMENT OF MODERN DRAMA

A study of representative modern plays including works by Pirandello, Brecht and Beckett chosen to illustrate the major developments in dramatic literature and production in the twentieth century.
Prereq: Either English/Drama 2021 and 3 more English credits at the 2000 level or permission of the Department or English/ DRAM 2021 and third-year standing in the Interdisciplinary Drama Programme.
Exclusion: ENGL 3500
ENGL 3561 (3CR)

## CONTEMPORARY DRAMA

A study of selected contemporary plays and playwrights.
Prereq: Either English/Drama 2021 and 3 more English credits at the 2000 level; or permission of the Department or English/ DRAM 2021 and third-year standing in the Interdisciplinary Drama Programme.
Exclusion: ENGL 3500

ENGL 3611 (3CR)

## DRAMA, THEATRE, AND SOCIETY

This course examines ways in which drama may both reflect and influence society, using as examples the complex relationship between Restoration comedy and its society, efforts at social engineering in Eighteenth-Century bourgeois tragedy, the role of melodrama in reflecting nineteenth century society and culture, and the "birth" of social drama late in the nineteenth century. In addition, it carries these ideas forward to include study of political theatre of the 1920's and 1930's, as well as works by contemporary social playwrights.
Prereq: Either English/Drama 2021 and 3 more English credits at the 2000 level; or permission of the Department or English/ DRAM 2021 and third-year standing in the Interdisciplinary Drama Programme.

ENGL 3621 (3CR)
READING FILMS
This course focuses on affinities between printed and cinematic narrative forms, introducing students as well to some of the principles of semiotics, and to the place of film theory within the context of cultural studies more generally.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.

ENGL 3651 (3CR)

## LITERATURE BY WOMEN TO THE TWENTIETH CENTURY

A study of literature by women before the twentieth century. This course employs a variety of critical approaches to define a tradition of writing by women. Works by such writers as Mary Godwin Shelley, Charlotte Brontë, Christina Rossetti, and Elizabeth Barrett Browning will be examined.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.
Exclusion: ENGL 3650
ENLG 3661 (3CR)

## LITERATURE BY WOMEN IN THE TWENTIETH CENTURY

A study of literature by women in the twentieth century. The course attempts to identify the major developments in the literature, using contemporary critical approaches. Works by such writers as Virginia Woolf, Jean Rhys and Margaret Atwood will be examined.
Prereq: 6 credits of English at the 2000 level or permission of the Department.
Exclusion: ENGL 3650
ENGL 3711 (3CR)

## EARLY AMERICAN LITERATURE

A study of American Literature from its beginnings to 1900. Works by such authors as Poe, Emerson, Hawthorne, Dickinson, James and Wharton will be examined.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.
Exclusion: ENGL 3700

ENGL 3721 (3CR)

## TWENTIETH CENTURY AMERICAN LITERATURE

A study of American Literature in the twentieth century. Authors such as Faulkner, Morrison, Barth, Pynchon, and Oates will be examined.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.
Exclusion: ENGL 3700

## ENGL 3751 (3CR)

## POST-COLONIAL AFRICAN LITERATURE

This course examines African literature in English from 1950, covering the novel, drama, and poetry and relating the literature to both Post-Colonial theory and to the historical developments in African politics and cultures.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.
Exclusion: ENGL 3751 (Literatures of the South Pacific and Africa).
ENGL 3761 (3CR)
LITERATURES OF AUSTRALIA, NEW ZEALAND AND THE SOUTH PACIFIC
This course traces the development, from their beginnings in the 1800's, of the literatures of Australia and New Zealand, and introduces the more recent literature from the South Pacific and island states.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.
Exclusion: ENGL 3751 (Literatures of the South Pacific and Africa).

## ENGL 3771 (3CR)

CARIBBEAN LITERATURE
This course offers an introduction to the literature of the Caribbean Islands since 1945.
Prereq: 6 credits of ENGL at the 2000 level; or permission of the Department.
Exclusion: ENGL 3761 (Literatures of South East Asia and Caribbean).
ENGL 3781 (3CR)
THE LITERATURE OF INDIA AND SOUTHEAST ASIA
This course examines the 20th century literature of India and Southeast Asia against the history of the various independence movements and other ideological movements important to the cultures of the area.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.

ENGL 3801 (3CR)
CANADIAN LITERATURE FROM THE BEGINNINGS TO 1914
A study of representative works of Canadian literature from the beginnings to the First World War. The development of Canadian literature from the exploration and settlement stage to Confederation and the beginnings of modernism will be presented. Works by such authors as Richardson, Moodie, Roberts and Duncan will be examined.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.
Exclusion: ENGL 3810

ENGL 3811 (3CR)

## CANADIAN MODERNISM

This course will examine the developments in Modernism found in Canadian literature from 1910 to 1950.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.
Exclusion: ENGL 3820
ENGL 3821 (3CR)

## THE CANADIAN POSTMODERN

This course will examine the proliferating innovations in the forms and themes of Canadian literature since 1950.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.
Exclusion: ENGL 3820
ENGL 3831 (3CR)

## ASPECTS OF CANADIAN LITERATURE

A study of a selected aspect of Canadian literature.
Prereq: 6 credits of ENGL at the 2000 level; or permission of the Department.
Exclusion: ENGL 3810
ENGL 3850 (6CR)
CREATIVE WRITING
This course will offer workshops in creative writing, concentrating primarily on poetry and short fiction; it may also include some work in other forms such as drama and the personal essay. Admission to the course is based on acceptance of a portfolio of original creative work. Note that portfolios are due by the end of Reading Week in the winter term previous to the course.
Prereq: Third and fourth year standing and permission of the department based on acceptance of a writing portfolio.
Exclusion: ENGL 3851, 3861
ENGL 3871 (3CR)

## CONTEMPORARY LITERARY THEORY I

This course offers an introduction to various contemporary theories of literature; diverse approaches, such as structuralist, semiotic, post-structuralist and "deconsturctive" will be examined.
Prereq: 6 credits of English at the 2000 level and minimum third-year standing or permission of the Department.
Exclusion: ENGL 3880
ENGL 3881 (3CR)

## CONTEMPORARY LITERARY THEORY II

This course will draw upon the literary theories introduced in English 3871 while introducing further theoretical approaches such as psychoanalytic, feminist, and Marxist theories.
Prereq: ENGL 3871 or permission of the Department.
Exclusion: ENGL 3880

ENGL 3911 (3CR)

## STUDIES IN LITERARY GENRE

This course will address one or more popular genres of literature, paying attention to the emergence and rise of the genre(s) and to the narrative conventions of the genre(s). Generic literatures examined could include, but need not be limited to, autobiography, mystery, romance, speculative fiction, utopia or dystopia, etc.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.

## ENGL 3921 (3CR)

CULTURAL STUDIES
This course offers an introduction to the broad field of contemporary cultural studies, paying particular attention to current theoretical models of 'reading' the texts of popular culture. Diverse forms of texts will be examined.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.

## ENGL 3931 (3CR)

## ASPECTS OF POSTMODERNISM

This course will examine various aspects of the postmodern aesthetic by exploring post-modern writing, such as that by Barth, Eco, Carter, Calvino, or Acker, within the context of recent theories of postmodernism; the course will explore implications of postmodernism as both a cultural and an aesthetic phenomenon.
Prereq: 6 credits of English at the 2000 level; or permission of the Department.

## 4000 SERIES

These courses are designed to give opportunity for special study of a chosen topic within a specific area. They may be devoted to a major author, a group of authors, or thematic or stylistic developments. The topic selected by the Department will be announced in the Spring preceding the year in which it is to be offered.
Note: All 4000-level courses may be taken only by permission of the instructor.

ENGL 4221 (3CR)
SELECTED TOPICS IN PRE-1800 LITERATURE
ENGL 4231 (3CR)
SELECTED TOPICS IN POST-1800 LITERATURE
ENGL 4701 (3CR)
SELECTED TOPICS IN AMERICAN LITERATURE
ENGL 4801 (3CR)
SELECTED TOPICS IN CANADIAN LITERATURE
ENGL 4901 (3CR)
SPECIAL TOPICS
A seminar course devoted to topics either too broad in scope to be offered in the area-defined selected topics courses or in a special subject not covered by the courses offered.

ENGL 4921 (3CR)
SELECTED TOPICS IN SEX, GENDER AND LITERATURE
ENGL 4931 (3CR)
SELECTED TOPICS IN TEXT AND TECHNOLOGY

ENGL 4941 (3CR)

## SELECTED TOPICS IN LITERARY REPRESENTATIONS OF RACE, CULTURE AND NATION

ENGL 4951 (3CR)
INDEPENDENT STUDY
Supervised by Members of the Department, this course offers independent research and study in which students pursue a planned programme of their choice approved by the Department and supervised by a member of the department. To be accepted for the Independent Study, students must have achieved an overall English average of B.

ENGL 4990 (6CR)
HONOURS THESIS
Supervised by members of the Department, candidates for an Honours degree must complete an Honours thesis of acceptable scope and quality. The subject of the Honours thesis is to be approved by the Department at the end of the student's junior year. The candidate is to be directly responsible to a supervisor and a department committee.

## ENVIRONMENTAL SCIENCE

## Interdisciplinary B.Sc. Programme

## MAJOR in Environmental Science is 84 credits earned as follows:

## Core Program

24 from Biology 1001, 1501, Chemistry 1001, 1021, Geography 2101, Geoscience 1011, Mathematics 1111, Physics 1051
3 from Mathematics $1121^{*}$, 1131
3 from Physics 1551, 3521**
3 Biology 2101
3 from Chemistry 2101, 2111
3 Biology 3701, Geography 2711, Mathematics $2311^{*}$
9 from Economics 1000, (or 1001 and 1011), 3801
3 from Geoscience 2031
3 from PHIL 1651, 2701
3 from PHIL 3511, 3721
3 from Environmental Science 4901

Note: * Students in the Physical Sciences Stream or Chemical Sciences Stream should select Physics 1551, Math 1121 and Math 2311 as part of the core.

Note: ** Physics 3521 may not be counted for credit in both the Core Program and the Physical Sciences Stream.

## Natural Sciences Stream

3 from Biology 2301, 2401
9 from Biology 3331, 3341, 3351, 3361, 3371, 3551, 3711, 4001, 4701 or other Group 1 or Group 3 Biology courses with permission of the Department
9 from Geography 3101, 3711, Geoscience 1001, 2101, 2401, 3111
3 from any Biology, Geoscience or Geography at the 3/4000 level

## Physical Sciences Stream

12 from Computer Science 1711, Math 2111, 3531, Physics 2801
1212 from MATH 2121, PHYS 3321, 3361, 3521*, 3601, 3701, 3751 or, with permission of the Head of the appropriate Department, other third or fourth year Physics or Mathematics courses with significant environmental relevance.

Note: * PHYS 3521 may not count for credit in both the Core programme and the Physical Sciences stream.

## Chemical Sciences Stream

6 from Chemistry 2211, 2311
9 from Chemistry 3411, 3421, 4521
9 from any other Chemistry at the 3/4000 level.
Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## ENVIRONMENTAL SCIENCE COURSES

ENVS 4901 (3CR)

## ENVIRONMENTAL ISSUES

This course will examine current issues in environmental science. Students will be required to prepare case studies of specific problem areas in environmental science and present these in a seminar format. Prereq: This course is restricted to Majors in their final year of Environmental Science.

## ENVIRONMENTAL STUDIES

## Interdisciplinary B.A. Programme

## MINOR in Environmental Studies is 24 credits earned as follows:

3 from Environmental Studies 1001
9 from Economics 1000 (or 1001 and 1011), 3801
3 from Biology 1211, Geoscience 1001, 1011, 2031, 2101
9 from Economics 3821, Environmental Studies 4000, 4951, Geography 2101, 3101, 3201, 3531, 4101, Philosophy 1651, 3721, Anthropology 2501, Anthropology 3541 or 4531, 4521, Sociology 3611

Note: At least 6 of the 9 credits must be from courses at the 3/4000 level.

## MAJOR in Environmental Studies is 72 credits earned as follows:

21 from Biology 1001, Chemistry 1001 or Physics 1051 or Physics 2401, Economics 1000 (or 1001 and 1011), Environmental Studies 1001, Geoscience 1011, Sociology 1001 or Anthropology 1011
24 from Economics 3801, Geography 2101, 2221, 3101, Geography 3201 or Political Science 2101, Geography 4101, Geoscience 2031, Philosophy 1651 or 2701 or 3511, Philosophy 3721, Sociology 1001 or Anthropology 1011, 2501 Note: At least 12 of the 24 credits must be from courses at the $3 / 4000$ level.
3 from Geography 2711 or Mathematics 2311
6 from Environmental Studies 4000
6 from Biology 1211, 1501, 2101,3501*, 3911, Chemistry 1501, 2511* Geoscience 1001, 2101, 2401, 3111, Physics 3751*
12 from Commerce 1001, $3371^{*}$, Economics 2001, 3601, 3821, Environmental Studies 4951, Geography 1201, 3531, 3711, 4521, History 1621, Philosophy 1651, 3511, Anthropology 2521, 3031, 3621, 4521, Anthropology 3541 or 4531, Sociology 2601, 3601, 3611 Note: At least 6 of the 12 credits must be from courses at the 3/4000 level.

Note: * indicates courses which have prerequisites that are not listed in the requirements for the Environmental Studies Major.
Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## ENVIRONMENTAL STUDIES COURSES

## ENST 1001 (3CR)

INTRODUCTION TO ENVIRONMENTAL STUDIES
This course will review a range of topics and academic disciplines that contribute to our understanding of environmental issues and contribute to the resolution of environmental problems. Topics ranging from environmental history \& ethics to the role of science and economics will be examined.

## ENST 4000 (6CR)

## ISSUES IN ENVIRONMENTAL STUDIES

This is a senior, seminar-project course exploring issues in Environmental Studies. Individually or collectively students are encouraged to explore a topic of their own choice, approved by a faculty member in the Environmental Studies program, and to present their findings both in seminars and in written assignments.
Prereq: Fourth year standing in the Environmental Studies programme; or permission of the supervising instructor and the Environmental Studies Coordinator.

ENST 4951 (3CR)
SPECIAL TOPICS IN ENVIRONMENTAL STUDIES
A course to permit an advanced student to pursue a special topic of environmental study under the supervision of an appropriate instructor. Prereq: Permission of the supervising instructor and the Environmental Studies Coordinator.

## FINE ARTS

The teaching of art at Mount Allison University can be traced back to the opening of the Women's Academy in 1854. It has been an important part of the curriculum since that time. In 1941 Mount Allison was the first university in Canada to give a B.F.A. degree in the visual arts. Much of the Department's history was, and is, directly related to the Owens Art Gallery. Until 1965, when the Department moved to its own quarters in the Gairdner Fine Arts Building, the department was housed in the gallery. Since that time the gallery has been extensively remodelled into one of the largest in the Maritimes, serving both the university and community. We enjoy one of the best student/staff ratios of any art department in the country. The department not only occupies its own building but has excellent facilities in other parts of the campus. We are proud of our tradition but prouder still of our ability to keep up with the changing needs of our students.

## THE B.F.A. PROGRAMME

A description of the programme leading to the B.F.A. degree is given in Section 7.7 of the Calendar. Studio courses are offered in the following areas: Drawing, Painting, Photography, Printmaking, Sculpture and Open Media.
Students completing a B.A. may earn a Minor or Major in Art History. These programmes are outlined under Art History at the beginning of the section. A Minor or Major in Fine Arts which includes a combination of Art History and Studio Art courses may also be completed on a B.A. degree. Students should submit a portfolio of artwork for assessment by April 1, to be considered for a Major or Minor in Fine Arts. The B.F.A. programmes are outlined as follows:

## MINOR in Fine Arts is 24 credits earned as follows:

6 from Fine Arts 2001 and 2011; or other Art History with permission of the Department
6 from 1000 level Fine Arts studio courses
6 from 2000 level Fine Arts studio courses
6 from 3000 level Fine Arts studio courses
Note: Students must have appropriate pre-requisites for 2/3000 level courses or permission of the department

## MAJOR AREA OF STUDY in Fine Arts is 60 credits earned as follows:

12 from Art History, (Fine Arts 2001 and 2011 must be included)
9 from Fine Arts 1101, 1111, 2101
6 from Fine Arts 1921 and 1931 or Fine Arts 1901 and 1911
24 from 1000/2000/3000 level Fine Arts studio courses (9 credits must be at the 3000 level
6 from 4000 level Fine Arts Advanced studio courses
3 from Fine Arts Seminar 3701, 4701 or Art History Seminar 4091
Note: Students must have appropriate pre-requisites for 2/3/4000 level studio courses or permission of the department
Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of
the appropriate Department or Programme Coordinator must be obtained.

## STUDIO COURSES

The pre-requisite for 2000 level studio courses is the successful completion of the appropriate 1000 level course; i.e. 1101, 1111, 1901, 1911, 1921, 1931. Any first year studio course that is failed will have to be passed by the end of the next academic year in which the student is enrolled.

## Studio Courses Open to Non-Fine Arts Students

Six credits chosen from FA 1101, 1111, 1901, 1911, and FA 1921, 1931
are open to students from other degree programmes, dependent on
available space, and by written permission of the Department only.
Preference will be given to students with a major in Art History or Drama.
Students who have no background or previous training in visual art should be advised that these courses are required for the Bachelor of Fine Arts degree programme and that standards are set accordingly.
Upper level studio courses will be open to students from other programmes on a space available basis, provided that the student has met the prerequisite requirement, or been granted the permission of the department.

FINA 1101 (3CR)

## FUNDAMENTALS OF DRAWING I

This course will introduce the student to drawing as a common language of expression in the visual arts. A variety of drawing media will be used.

FINA 1111 (3CR)
FUNDAMENTALS OF DRAWING II
This course is a continuation of Fine Arts 1101. It is required of all students enrolled in the BFA programme.
Prereq: FINA 1101; or permission of the Department.
FINA 1901 (3CR)

## ELEMENTS OF ART I

This course focuses on elements of two dimensional design in black and white and colour. It also surveys theories of composition in the visual arts and provides an introduction to art theory and media.

FINA 1911 (3CR)

## ELEMENTS OF ART II

This course surveys elements of three dimensional design and composition, alternate media and processes, and non-conventional and lateral thinking in the visual arts. The course is required of all students in the BFA programme.
Prereq: FINA 1901; or permission of the Department. .
FINA 1921 (3CR)

## INTRODUCTION TO MEDIA I

This course is designed to introduce the studio areas of printmaking and photography. It is required of all B.F.A. students.

## FINA 1931 (3CR)

## INTRODUCTION TO MEDIA II

This course is designed to introduce the studio areas of painting and sculpture. It is required of all B.F.A. students.

FINA 2101 (3CR)

## DRAWING I

This course emphasizes drawing from the figure and also includes various other projects related to drawing. It is required of all BFA students.
Prereq: FINA 1101 and 1111; or permission of the Department.

## FINA 2111 (3CR)

## DRAWING II

This course is a continuation of Drawing I. It is required of all B.F.A. students.
Prereq: FINA 2101; or permission of the Department.

## FINA 2201 (3CR)

PRINTMAKING I
This course introduces intaglio and relief printmaking techniques.
Prereq: FINA 1921; or permission of the Department.
FINA 2211 (3CR)
PRINTMAKING II
This course introduces lithography printmaking techniques.
Prereq: FINA 1921; or permission of the Department.
FINA 2301 (3CR)

## PAINTING I

This course uses traditional media to focus on the fundamentals of basic painting. Colour and techniques will be explored. It emphasizes observational painting, from various subjects including the figure.
Prereq: FINA 1931; or permission of the Department.

## FINA 2311 (3CR)

## PAINTING II

This is an exploration of painting materials and means, pictorial elements, and issues fundamental to expressive painting. Both traditional and contemporary painting will be considered.
Prereq: FINA 2301; or permission of the Department.
FINA 2401 (3CR)
SCULPTURE I
This course addresses the human figure through a variety of media, including wire, wood, mesh, scavenged or natural materials and clay. Prereq: FINA 1931; or permission of the Department.

FINA 2411 (3CR)
SCULPTURE II
This course is a continuation of FINA 2401 and as such emphasizes the human figure and its senses, as well as more formal geometric structure in an experimental approach to sculpture. This course investigates how the shape and form of a structure is imposed by the materials used.
Prereq: FINA 2401; or permission of the Department.

FINA 2501 (3CR)

## PHOTOGRAPHY I

Fine Arts 2501 is intended to give the fine arts photography student a firm background both aesthetically and technically in the uses of photography as a fine art medium. The following will be covered: conceptualization of the image/technical review, exposing film for optimum results (slide \& B\&W), processing and proofing, storage and editing, introduction to the fine print portfolio presentation, evaluation criticism, and an historical perspective. Each student is required to own a 35 mm camera with manual metering.
Prereq: FINA 1921; or permission of the Department.
FINA 2511 (3CR)
PHOTOGRAPHY II
Fine Arts 2511 addresses itself both aesthetically and technically in small format photography as a component of your development as an artist. This course will deal with notions of the black and white "fine print", social, political and personal issues in the work and portfolio development as well as a number of other studio techniques.
Assignments dealing with portraiture, self portraiture, landscape and photo fabrication will allow for personal investigation of a number of given subjects that may or may not contribute to the conceptualization of the final portfolio.
Prereq: FINA 2501; or permission of the Department.

## FINA 3101 (3CR) <br> INTERMEDIATE DRAWING I

Through completing a variety of projects, students will develop their skills with traditional and non-traditional drawing media, and gain a deeper understanding of the issues and potentials of drawing. Students will explore approaches to representation and abstraction, and work toward developing personal imagery. This course is required of all students in the B.F.A. programme.
Prereq: FINA 2101 and 2111; or permission of the Department.
FINA 3111 (3CR)
INTERMEDIATE DRAWING II
This course emphasizes individual direction and style in drawing, using a variety of traditional and non-traditional media.
Prereq: FINA 3101; or permission of the Department.
FINA 3201 (3CR)
INTERMEDIATE PRINTMAKING I
Prereq: FINA 2201 and 2211; or permission of the Department.
FINA 3211 (3CR)

## INTERMEDIATE PRINTMAKING II

Fine Arts 3201 and 3211 survey traditional and non-traditional printmaking for students with a background in printmaking.
Prereq: FINA 3201; or permission of the Department.
FINA 3301 (3CR)
INTERMEDIATE PAINTING I
This course focuses on the study of figurative and non-figurative painting, using various painting methods and mixed media.
Consideration will be given to contemporary artists and to the cultural context of painting.
Prereq: FINA 2301 and 2311; or permission of the Department.

FINA 3311 (3CR)

## INTERMEDIATE PAINTING II

Students will explore uses of various painting and mixed media, and work from figurative and non-figurative sources as they complete projects with diverse formal, thematic or conceptual objectives.
Prereq: FINA 3301; or permission of the Department.

## FINA 3401 (3CR)

## INTERMEDIATE SCULPTURE I

This course emphasizes contemporary attitudes, theory, and non-traditional approaches to sculpture. A mixed media approach, kinetic sculpture, and outdoor or environmental art will be addressed.
Prereq: FINA 2401 and 2411; or permission of the Department.

## FINA 3411 (3CR)

## INTERMEDIATE SCULPTURE II

This course investigates student initiated work, public sculpture proposals, and model making which combines and/or extends approaches from previous courses and which lead into the fourth year tutorial programme.
Prereq: FINA 3401; or permission of the Department.

## FINA 3501 (3CR) <br> INTERMEDIATE PHOTOGRAPHY I - THE VIEW CAMERA

This course covers the use of medium and large format cameras in the context of landscape and studio work, through use of colour and black and white materials.
Prereq: FINA 2501 and 2511; or permission of the Department.

## FINA 3511 (3CR) <br> INTERMEDIATE PHOTOGRAPHY II - COLOUR AND PHOTOFABRICATION

A continuation of 3501 with colour printmaking and photo fabrication assignments. Processes covered include RA4 and Ilfochrome colour printmaking, Platinum, Cyanotype, Van Dyke and other alternate printing methods. Further exploration will include advanced view camera and studio technique.
Prereq: FINA 3501; or permission of the Department.

## FINA 3601 (3CR)

## INTERMEDIATE OPEN MEDIA I

Fine Arts 3601 and 3611 will offer the opportunity to integrate various media with which the student is already familiar. They will also introduce technical skills and a conceptual framework to facilitate this investigation. Performance and installation may be components of the course. Either or both courses may be taken for credit.
Prereq: Completion of at least 4 of the following courses: FINA 2101, 2111, 2201, 2301, 2311, 2401, 2411, 2501, 2511; or permission of the Department.

## FINA 3611 (3CR)

## INTERMEDIATE OPEN MEDIA II

Prereq: Completion of at least 4 of the following courses: FINA 2101, 2111, 2201, 2301, 2311, 2401, 2411, 2501, 2511; or permission of the Department.

FINA 3701 (3CR)

## THIRD YEAR SEMINAR IN FINE ARTS

A seminar course on contemporary art issues in Fine Arts, usually taught in the second term of each year. Students will lead seminar discussions on selected topics and produce research papers. The course is required of all third year B.F.A. students.
Prereq: Open to only B.F.A. students and open to other students on a space available basis with preference given to students in the BA degree programme with a Major or Minor in Art History or Fine Arts, or Permission of the Department.

## FINA 4701 (3CR)

## ADVANCED SEMINAR IN FINE ARTS

An advanced seminar on contemporary art issues in Fine Arts, taught in the first term of each year. Students will lead seminar discussions on selected topics and produce research papers. The course is required of all fourth year B.F.A. students.
Prereq: Open to only B.F.A. students and open to other students on a space available basis with preference given to students in the BA degree programme with a Major or Minor in Art History or Fine Arts, or Permission of the Department.

FINA 4801/4811/4821/4831 (3CR)
ADVANCED STUDIO I TO IV
Students will take all of these tutorial courses in their final year. Courses are arranged with one or more faculty members on an individual basis. Students in fourth year must have more than one tutor. The courses are designed to meet students needs and may be in a single medium or in various media.

## ART HISTORY COURSES

Fine Arts 2001 and 2011 are given every year; six or more additional courses are offered each year from Fine Arts 3021, 3031, 3141, 3241, 3051, 3061, 3071, 4041, 4051, 4091, or Classics 3601, 3611, 3701, 3711.

## FINA 2001 (3CR) <br> WORLD ART FROM THE FIRST PEOPLES TO THE END OF THE MIDDLE AGES

This course surveys art and architecture from the Americas, Africa, Asia, and Europe within their historical and cultural context. The course will emphasize how works of art are produced in a variety of media. This introductory course is designed for students with no previous background in the history of art and architecture.

FINA 2011 (3CR)
WORLD ART FROM THE RENAISSANCE TO THE PRESENT
This course surveys art and architecture from the Americas, Africa, Asia, and Europe within their historical and cultural context. The course will emphasize how works of art are produced in a variety of media.

FINA 3021 (3CR)
CANADIAN ART FROM ITS BEGINNINGS TO THE 1960 S
A survey of the history of Canadian art from its beginnings in the 17th century to the 1960's. The emphasis will be on painting, including the Canadian landscape and the Group of Seven; the Atlantic Realist School; modernism in Canadian art; and the development of abstraction in Ontario, Quebec and the West.
Prereq: FINA 2001 and 2011; or permission of the Department.

## FINA 3031 (3CR)

CANADIAN ART FROM THE 1960 S TO THE PRESENT
An examination of Canadian art from the late 1960's to contemporary practice, including painting, sculpture, mixed media, installation, video and performance. The course will take advantage of the Visiting Artist's Programme and local exhibitions of contemporary art.
Prereq: FINA 2001 and 2011; or permission of the Department.

## FINA 3141 (3CR) <br> NINETEENTH CENTURY ART, PART ONE

This course examines art and architecture during the first half of the nineteenth century in the United States and Western Europe (particularly Belgium, England, France, Germany and Spain). This course includes art in a variety of media and will pay particular attention to the inventions of lithography and photography during this time. Artistic movements such as Neo-Classicism, Romanticism and Realism will be considered in this course along with artists who worked independently from these movements.
Prereq: FINA 2001 and 2011; or permission of the Department.

## FINA 3241 (3CR)

## NINETEENTH CENTURY ART, PART TWO

This course examines art and architecture during the second half of the nineteenth century in the United States and Western Europe (particularly Belgium, England, France, Germany and Spain). This course includes art in a variety of media and will pay particular attention to innovations in the production of photographs, etchings, and posters during this time. Artistic movements such as Realism, Impressionism, Post-Impression and Art Nouveau will be considered in this course.
Prereq: FINA 2001 and 2011; or permission of the Department.

## FINA 3051 (3CR)

## TWENTIETH CENTURY ART TO 1940

This course examines art and architecture in Europe and North America from 1900 to 1940. It covers schools and movements including the Secession, Expressionism, The Fauves, Cubism, Futurism, Constructivism, Abstraction, Dada, Surrealism, and Social Realism, as well as artists working independently of any formal group. The architectural movements covered include Art Nouveau, Bauhaus, De Stijl, Prairie style, and International style. Issues addressed in this course include gender, psychoanalysis, "primitivism," and the politics of colonialism and international warfare.
Prereq: FINA 2001 and 2011; or permission of the Department.

## FINA 3061 (3CR)

MODERN ART FROM 1940 TO 1970
This course examines art and architecture in Europe and the United States from 1940 to 1970. It considers schools and movements including Abstract Expressionism, CoBrA, Pop Art, Junk Art, Minimalism, Kinetic Art, Op Art, Land Art, Process Art, Conceptual Art, Arte Povera and Performance Art, as well as artists and architects working independently of any formal group. Issues addressed in this course include notions of modernism and the avant-garde, gender, international warfare, post-WWII consumerism, internationalism, and the role of art critics in shaping a "canon" for twentieth-century art.
Prereq: FINA 2001 and 2011; or permission of the Department.

## FINA 3071 (3CR)

## CONTEMPORARY ART SINCE 1970

This course examines contemporary art and architecture since 1970 and focuses on themes including the body and identity. Topics include naturally, and culturally, constructed bodies, gender identity, sexual identities, ethnic bodies, abject bodies, and political and religious identities. This course will include art in a variety of media including the bodies of humans and animals, painting, sculpture, assemblage, installation, photography, printmaking, architecture, textiles, film, video, and performance art.
Prereq: FINA 2001 and 2011; or permission of the Department.
FINA 4041 (3CR)

## PRINCIPLES OF ART CRITICISM I

A survey of art criticism from ancient times to 1945, with emphasis on the writings of critics, artists and philosophers.
Prereq: FINA 2001 and 2011 plus two further semester courses in Art History at the 3/4000 level; or permission of the Department.

FINA 4051 (3CR)
PRINCIPLES OF ART CRITICISM II
A survey of art criticism from 1945 to the present, with emphasis on the writings of critics, artists and philosophers.
Prereq: FINA 2001 and 2011 plus two further semester courses in Art History at the $3 / 4000$ level; or permission of the Department.

FINA 4091 (3CR)
ADVANCED SEMINAR IN ART HISTORY
This course is a research seminar on key issues in nineteenth and twentieth century art, with topics to vary from term to term. Emphasis will be placed on contemporary, theoretical, methodological and critical approaches to the art of the recent past.
Prereq: FINA 2001 and 2011 plus two further semester courses in Art History at the $3 / 4000$ level; or permission of the Department.

FINA 4950/4951 (6/3CR)

## SPECIAL TOPICS IN ART

Directed reading and study of a well-defined subject in art which would result in a major research paper or major written paper. Study will be carried out on a tutorial basis. The course will be adjudicated by a committee consisting of the tutor and one other faculty member either from within or outside the Fine Arts Department.
Note: The following courses within the Classics Department also continue to count as Art History offerings:

CLAS 3601 (3CR)
THE BIRTH OF GREEK ART
CLAS 3611 (3CR)
THE SPLENDOURS OF CLASSICAL AND HELLENISTIC GREEK ART

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CLAS 3701 (3CR)
ETRUSCAN AND EARLY ROMAN ART AND ARCHAEOLOGY
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CLAS 3711 (3CR)
THE ART OF IMPERIAL ROME AND ITS EMPIRE

## FRENCH STUDIES

See Modern Languages and Literatures

## GEOGRAPHY

The Department of Geography offers courses in both Geography and Geoscience. The Department offers a Major and a Minor in Geography and provides many courses that are integral to the Environmental Studies and Sciences programmes at Mount Allison.
Geography is about the study of 'place' at various spatial and temporal scales. An understanding of 'place' involves questions about the physical and environmental, social, cultural, economic, and political processes that have acted together to shape the complex 'place' structures that exist on our landscape. Geographers are particularly concerned with the linkages that bind 'places' together. These questions can be investigated at a variety of scales; local, regional national, and global, and they can be assessed from both contemporary and historical perspectives.
Geoscience is concerned with the study of the planet Earth; its history, composition and structure, and the physical processes that shape it are considered. Because Geoscience embraces the realms of physics, chemistry, mathematics, and biology, it is one of the most wide-ranging of the sciences. The earth is the 'stage' upon which all biologic activity takes place, including human activity, thus an understanding of Geoscience is fundamental to Geography and Environmental Studies or Sciences Programmes.
Through a system of intensive semester length courses, the Geography programme at Mount Allison aims to expose students to the approaches and substance of the academic disciplines of Geography and Geoscience. Teaching approaches integrate lab work, field study, library and archival searching, as well as the employment of computer technologies as research tools. The Department of Geography is part of the Faculty of Social Sciences and its programmes connect very well with the disciplines in this group (Economics, Political Science, Sociology and Anthropology, and Commerce). There are also strong links to disciplines in other Faculties including Biology, History, and Religious Studies, as well as to the interdisciplinary programmes in Environmental Studies and Sciences. In addition, students interested in Area Studies (e.g. American Studies, Canadian Studies, Hispanic Studies, French Studies, Japanese Studies, International Relations, etc.) will find it useful to explore Geography as a foundation for understanding these 'places'.

## Disciplinary B.A. Programmes

## MINOR in Geography is 24 credits earned as follows:

3 from Geoscience 1001, 1011, 1021, 2101, 2031, 2401
15 from Geography 1201, 2101, 2201, 2221, 2311, 3101, 3201, 3211, 3301, 3811
6 from Geography at the 3/4000 level, chosen in consultation with the Programme Advisor

## MAJOR AREA OF STUDY in Geography is 60 credits earned as follows:

6 from Geoscience 1001, 1011, 1021, 2101, 2031, 2401
15 from Geography 1201, 2101, 2711, 3701, 3711
6 from Geography 2201, 2311, 2221
18 from Geography at the $3 / 4000$ level, including 6 from the 4000 level

15 credits from complementary courses in Social Science, History, Environmental Studies, Environmental Sciences, International Relations, Women's Studies, Canadian Studies, Biology and Geoscience, chosen in consultation with the Programme Advisor

## HONOURS in Geography is 72 credits earned as follows:

60 credits as in the Major, plus:
6 from Geography 4990
6 from Geography at the 3/4000 level, including 3 from the 4000 level, chosen in consultation with the Programme Advisor

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## GEOGRAPHY COURSES

## GEOG 1201 (3CR) <br> INTRODUCTION TO HUMAN GEOGRAPHY

This lecture and laboratory course is an introduction to the general principles of analysis in human geography at a variety of spatial scales. City, regional and global environments are considered.
Prereq: None.

## GEOG 2101 (3CR)

## NATURAL RESOURCES MANAGEMENT

This course introduces key concepts and issues in natural resources management. Resource sectors of importance to the Canadian economy will be examined, including forestry, fisheries, wildlife, energy, mining, water, and agriculture. Particular emphasis will be placed on understanding the varied influences that environmental, socio-economic, and political factors have on patterns of resource utilization and resource management decision-making.

## Prereq: None.

## GEOG 2201 (3CR)

## GEOGRAPHY OF ECONOMIC ACTIVITY

This course examines the changing spatial organization of the world industrial map since 1945 by comparing British and North American de-industrialization with the rapid growth of some sectors of newly industrialized countries. The effects of new production technology, changes in industrial organization and transnational corporations and new regional trading blocs on those changing patterns are discussed.

## Prereq: None.

GEOG 2221 (3CR)

## THE DEVELOPING WORLD

This course surveys the changing geography of the developing world. It examines the decline in traditional land systems and resource use, surveys current economic development strategies, and reviews the role of international aid and non-governmental organizations in these strategies.
Prereq: None.

GEOG 2311 (3CR)
INTRODUCTION TO CULTURAL GEOGRAPHY
This survey of the main themes and approaches of cultural geographers evaluates concepts such as cultural area, ecology and landscape in the context of North American and European settlement patterns.

## Prereq: None.

## GEOG 2711 (3CR)

## DATA ANALYSIS FOR GEOGRAPHERS

This is one of three techniques courses for Geography students. It develops basic skills in data collection, analysis, and presentation. Through lecture and laboratory components, basic statistical and hypothesis testing procedures will be introduced, along with relevant software.
Prereq: None.

## GEOG 3101 (3CR) <br> ENVIRONMENT AND DEVELOPMENT

This course will examine and synthesize current thinking on environment and development. Topics may include: rural land use change, forest management, community-based conservation, sustainable development, trade and environment, and the role of multi-lateral development banks and international environmental agreements.
Prereq: GEOG 2101 and 2221; or permission of the Department.

## GEOG 3201 (3CR) <br> GEOGRAPHY AND PUBLIC POLICY

By centering on policy formulation at all government levels, this course investigates the geo-political structures influencing Canadian society. The relevance of geographers' skills to policy environments is highlighted by considering such topics as the role of experts and consultants in the public policy process.
Prereq: Third year standing and at least 6 credits in Social Science; or permission of the Department.

## GEOG 3211 (3CR)

GEOGRAPHY OF TRANSPORT AND COMMUNICATION
This course investigates the impact of changing transport and communication technologies on spatial organization. It surveys overseas shipping and colonial enterprise, the development of road systems, the rise of mass transportation, the evolution of the "global village", time-space convergence and electronic information exchange in the later 20th century, and the role of power structures in control of transport and communications technology.
Prereq: GEOG 1201 or HIST 1621; GEOG 2201; or permission of the Department.

GEOG 3301 (3CR)
HISTORICAL GEOGRAPHY OF NORTH AMERICA
This course surveys the role of pre-twentieth century historical processes in shaping past and present North American landscapes. Significant writings in the evolution of historical geography are identified and analyzed.
Prereq: Third year standing and either GEOG 1201 or 3 credits from the HIST 1600 series; GEOG 2311; or permission of the Department.

## GEOG 3321 (3CR)

## GEOGRAPHY OF JAPAN

This course examines Japan's geography since 1860, emphasizing the importance of international trade and new technologies and their roles in forming new geographic relationships for Japan with other parts of East Asia and with the West.
Prereq: Third year standing, and at least one of GEOG 1201, 2311, HIST 1611, 1621; or permission of the Department.

## GEOG 3511 (3CR)

## RURAL AND SMALL TOWN CANADA

This course will examine land use patterns as well as the environmental, social, economic and political structures of Canadian rural areas and small towns. An integrated approach to resolving rural and small town development issues is used.
Prereq: GEOG 1201; one of GEOG 2101, 2201, 2311; or permission of the Department .

## GEOG 3531 (3CR)

## THE PLANNING PROCESS

An examination of community responses to the necessity and challenge of growth. Discussion focuses on the contributions of planning to the process of development and to the outcomes and opportunities which parallel this process.
Prereq: GEOG 1201 and one of GEOG 2101, 2201, 2311; or permission of the Department.

## GEOG 3701 (3CR)

## FIELD METHODS IN GEOGRAPHY

This is one of three 'techniques' courses for Geography students. After a critical examination of modern research techniques, students design, complete, and evaluate a field project. The course requires an off-campus field trip. Students will be liable for some field trip costs.
Prereq: Third year standing and GEOG 2711; or permission of the Department.
Coreq: GEOG 3711.
GEOG 3711 (3CR)
CARTOGRAPHY AND GEOGRAPHIC INFORMATION SYSTEMS
This is one of three 'techniques' courses for Geography students.
Through lectures and laboratories it surveys several aspects of traditional cartography, examines one or more evolving Geographic Information Systems, and explores the role of maps in conveying geographic information.
Prereq: Third year standing and GEOG 2711; or permission of the Department.

## GEOG 3811 (3CR)

## GEOGRAPHY OF URBANIZATION

An investigation of the evolution of the modern city through historic phases of mercantile, industrial, corporate, and post-industrial growth. Urbanization processes are highlighted in the development of urban economies, urban society, the social geography of cities, political reform, urban planning, and the creation of new urban forms in the late twentieth century post-industrial economy.
Prereq: Third year standing plus GEOG 1201 and 2311; or permission of the Department.

## GEOG 4101 (3CR)

## SEMINAR IN ENVIRONMENTAL ISSUES

This course examines the current state of scientific knowledge related to various contemporary environmental issues and the public policy implications of these issues.
Prereq: Geoscsience 2031 and GEOG 2101; or permission of the Department.

## GEOG 4301 (3CR) <br> SEMINAR IN AREA STUDIES

A study of a selected world region through a combination of directed reading, seminar presentation, and individual research.
Prereq: Any two of GEOG 2201, 2311, 3201, 3211 or 3301; or permission of the Department.

## GEOG 4311 (3CR)

## CANADIAN REGIONALISM

A seminar in Canadian regionalism that includes a combination of directed reading, presentations, and individual research.
Prereq: GEOG 3201 or 3301 ; or permission of the Department.

## GEOG 4321 (3CR)

SEMINAR IN CULTURAL AND LANDSCAPE STUDY
A seminar that explores contemporary cultural geography and cultural landscape study through directed readings, presentations and individual research.
Prereq: GEOG 2311 and 3301 or 3811 ; or permission of the Department.

## GEOG 4521 (3CR)

## COMMUNITY PLANNING RESEARCH SEMINAR

A research seminar applying community planning theory and techniques to an actual case developed in concert with a local community. Students clarify client objectives, develop a research and analysis program, conduct fieldwork, analyze data, prepare recommendations, and present results to the client.
Prereq: GEOG 2711 and 3531; or permission of the Department.

## GEOG 4701 (3CR)

## ADVANCED FIELD COURSE

This is an extended field course to be completed outside the September-May academic year in which students complete a supervised original research project at an off-campus location.
Prereq: GEOG 3701 and 3711; or permission of the Department.

## GEOG 4711 (3CR) <br> CARTOGRAPHIC REPRESENTATION: CRITICAL PERSPECTIVES ON MAPPING AND GIS

This seminar course investigates the manner in which cartography has been used as a means of codifying space, place and territory over the past millennium. The course considers agency and motive in historical and contemporary cartography, including GIS, paying particular attention to a critique of scientific method and the mapping of modernity. Alternative map spaces and other media are considered also. Using a combination of directed readings and practical project work, the course develops critical perspectives on our use of various forms of cartographic representation.
Prereq: GEOG 3711 and third year standing; or permission of the Department.

## GEOG 4811 (3CR)

## GENDER, CULTURE AND THE CITY

In this course students will examine the relationship between socially constructed gender relations and the nature and form of urban areas. We will consider how the production of urban space is shaped by social and cultural categories and historical processes, how we shape it and in turn are shaped by it.
Prereq: GEOG 3811; or permission of the Department .
GEOG 4950/4951 (6/3CR) SPECIAL TOPICS IN GEOGRAPHY
A programme of independent study which provides an opportunity for intensive reading and empirical analysis of topics not usually covered in basic course offerings.
Prereq: Permission of the Department. Students should obtain in the preceding year the consent of a staff member who is willing to supervise such a programme.

GEOG 4990 (6CR)
HONOURS THESIS
Prereq: Permission of the Department.

## GEOSCIENCE

## GEOSCIENCE COURSES

## GEOS 1001 (3CR) <br> INTRODUCTORY OCEANOGRAPHY

A study of the oceans and their relationship to our land environment. An inter-disciplinary approach is emphasized, including geological, physical, chemical and biological aspects of offshore and deep-water oceanography. Topics include: history of oceanography, exploration techniques, instruments and vessels, structure of Earth, origin of oceans and ocean basins, physiography of ocean basins, marine sediments, submarine volcanism, waves, tides, ocean currents, climatology and sea level changes, marine ecology and marine resources. Three lectures and one 3 -hour laboratory per week.

## Prereq: None.

## GEOS 1011 (3CR)

DYNAMICS OF THE EARTH
(An Introduction to Physical Geoscience) An introductory course in Physical Geoscience which provides a basis for further courses in Geoscience. Main topics of study are the origin, evolution and structure of the Earth; the origin and dynamics of ocean basins, continents and mountain ranges are dealt with in a consideration of plate tectonics; organization of matter - into minerals, crystals and gems; the nature and distribution of sedimentary, igneous and metamorphic rocks; the work of water and ice and air in erosion and the transportation of sediment. Three lectures and one 3-hour laboratory per week.
Prereq: None.

## GEOS 1021 (3CR) <br> EARTH HISTORY

(The Record of Global Change \& Life on Earth) An introductory half course in Historical Geoscience which emphasizes the geological evolution of the earth as well as its plants and animals. This half course is complementary to Geoscience 1011 and ideally should be taken after completion of the half course of Physical Geoscience. However, it can be taken independently. The principles of Stratigraphy (historical Geoscience) and Palaeontology (the study of ancient life through fossils) are covered briefly as well as various aspects of Paleogeography, Paleoclimatology, Paleoecology and the Evolution and Extinction of life. Palaeontological and stratigraphic evidence for "Continental Drift" is presented and the interrelationship of the concepts of Continental Drift, Ocean Floor Spreading, and Plate Tectonics is covered along with their historical development. The record of "global change" in climate, faunal and floral distribution and the distribution of present and past continents and oceans is covered. The historical development of the Geological Time Scale or Time Order Scale and its calibration is an integral part of the course. Three lectures and one 3-hour laboratory period per week.
Prereq: None, but GEOS 1011 is highly recommended.

## GEOS 2031 (3CR)

## GLOBAL ENVIRONMENTAL CHANGE

(Perspectives on Environmental Geoscience) An introductory level course dealing with the interactions of the environment and the Earth - particularly those aspects of the environment influenced by civilization and vice versa. The course gives an overview of major natural processes and geologic hazards which influence civilization, with detailed consideration of natural flooding, landslides, coastal processes and erosion, earthquakes and volcanoes as well as hydro Geoscience and groundwater. It also deals with the effect of civilization on the physical environment - particularly on surficial deposits and near surface crystal rocks or bedrock e.g. the contamination of groundwater and surface waters by waste disposal (including nuclear waste); Acid Rain, Radon gas and the "Greenhouse Effect." Three lectures and one 3-hour laboratory period per week.
Prereq: Any 1000 level Geoscience course; or permission of the Department.

GEOS 2101 (3CR)
COASTAL OCEANOGRAPHY
A 2000 level three unit course complementary to Geoscience 1001 (Introductory Oceanography) in which the focus is the offshore and deep sea oceanography. The course emphasizes North American Atlantic coastal and near shore environments and the interactions among chemical, geological, physical and biological phenomena. Included are methods of study, estuarine systems, sediment regimes, waves, beaches, tides, marshes, deltas, rocky shores, mudflats, barrier islands, reefs and coastal classifications. Special attention is given to sea level changes, erosion and pollution problems.
Prereq: GEOS 1001; or permission of the Department.
GEOS 2401 (3CR) GEOMORPHOLOGY
Geomorphology is the science that explores the general configuration of the Earth's surface. It deals with the description, classification, nature, origin, and development of present landforms and their relationships to underlying geological structures and the history of geologic events recorded by these surface features. A thorough appreciation of Geomorphology is essential to anyone engaged in Environmental Geoscience. The introductory part of the course deals with the large-scale relief features of the earth (e.g., mountains) and how they are shaped by the processes of weathering, erosion, and sedimentary deposition. The latter part of the course introduces the types of landforms/landscapes that exist in glacial, fluvial, coastal, and desert environments and explores the geomorphic agents (e.g., running water) which control the formation and evolution of these landforms/landscapes.
Prereq: Any 1000 level Geoscience course; or permission of the Department.

GEOS 2501 (3CR)

## HYDROGEOLOGY

This course introduces the student to the science that deals with subsurface waters (groundwater) and with related geological aspects of surface water hydrology. The course will deal with hydrogeologic principles as well as concepts and processes that control the occurrence, movement, storage and chemical character of groundwater. It will also describe the basic relation of hydrogeology to other sub-disciplines of Geoscience such as geomorphology, stratigraphy and structure and will deal briefly with problems of groundwater pollution resulting from waste disposal and salt-water intrusion and contamination in coastal areas.
Prereq: GEOS 1011 and 2401; or permission of the Department.

## GEOS 3111 (3CR) <br> COASTAL GEOMORPHOLOGY

This lecture, laboratory, and field course introduces coastal geomorphology by emphasizing current theories of coastal processes set in the context of natural systems.
Prereq: GEOS 2401; or permission of the Department.

## GEOS 4950 (6CR)

## SPECIAL TOPICS IN GEOSCIENCE

A course to permit an advanced student to pursue a special field of study, or to take advantage of a different approach under the direction of an appropriate staff member. Each student's programme will be planned individually using lectures, reading, tutorials, laboratory work, etc.
Prereq: Permission of the Department. Each student must obtain, prior to registration, consent of a staff member who is willing to supervise his/her work.

## GEOS 4951 (3CR) SPECIAL TOPICS IN GEOSCIENCE

Up to two of these three credit courses (all similar to 4950) may be taken in lieu of Geoscience 4950 . The same regulations apply to them as to Geoscience 4950 .

## GERMAN STUDIES

See Modern Languages and Literatures

## GREEK

See Classical Studies

## HISPANIC STUDIES

See Modern Languages and Literatures

## HISTORY

As both a literary art and social science, History is an ideal instrument of liberal education. Defined as "the rational study of the significant past", it develops analytical and communication skills, fosters knowledge and understanding of the institutions, ideas, groups and individuals which have shaped our political, social and cultural world and contributes to reflective, articulate citizenship in a free, tolerant and humane society. History is also an excellent preparation for a large number of career choices as well as a pleasurable intellectual pursuit that will last a lifetime.

Without attempting to study all the people and places of the significant past, the Mount Allison History Department offers a rich variety of both subject matter and interpretive approach through individualized programmes designed to achieve both coherence and depth. Courses are regularly available at all levels in most major periods of Canadian, American and European history and are complemented when staffing permits by introductions to China and Japan. Together, they reflect a wide range of faculty interest - from politics, constitutional development and relations between nations to social, cultural and intellectual movements.

## BASIC COURSES

The Humanities 1600 series is intended to provide an introduction to Humanities disciplines. These three-credit courses offered by the participating disciplines of Classics, History, Philosophy and Religious Studies are designed to acquaint beginning students with the methodologies typical of these disciplines and to familiarize them with the approaches taken, as well as the sorts of themes pursued and questions raised in these disciplines.
Students will normally take courses in sequential order from first through fourth years. Further information about specific courses, faculty members and special programs is available in the Department of History Handbook. Students should also be familiar with the university requirements for the B.A. degree, outlined in section 7.2 of the academic calendar.

## Disciplinary B.A. Programmes

## MINOR in History is 24 credits earned as follows:

6 from the Humanities 1600 Series
18 from History above the 1600 level, including 6 from the 3/4000 level, chosen in consultation with the Programme Advisor.

## MAJOR AREA OF STUDY in History is 60 credits earned as follows:

6 from the Humanities 1600 Series
126 credits each chosen from two of the following subject areas:

1. European History 2000 or 2010
2. North American History 2410 or 2510
3. Asia Pacific History 2700

24 additional credits in History at the 2/3/4000 levels
18 credits from complementary courses in other departments, chosen in consultation with the Programme Advisor

## HONOURS in History is 66 credits earned as follows:

42 credits from the first three lines of the major, plus:
6 from History 4990
18 from History at the 4000 level, chosen in consultation with the Programme Advisor

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## HISTORY COURSES

HIST 1601 (3CR)
NEW NATIONS IN NORTH AMERICA
This course will examine the transfer of European ideas, institutions, political and economic structures to North America, and consider the reshaping of these by the North American experience. Particular emphasis will be placed on the transition from the colonial experience to the realization of new states.

## HIST 1611 (3CR)

## THE EXPANSION OF EUROPE ABROAD

This course will focus on the expansion of Europe after the 15th century and the impact of that expansion on both Native peoples and on European civilization. Themes to be considered are the creation of a world economy, racial relations, the rise and fall of European power, the impact of technology, the growth of indigenous nationalism, and the legacy of European expansion.

HIST/CLAS 1631 (3CR)

## GREECE AND ROME: THE FOUNDATIONS OF WESTERN CIVILIZATION

The political and social history of ancient Greece and Rome will be a surveyed with a focus on the themes of Environment, Politics, War, Art and Architecture, and Society. Special attention will be paid to Athens in the fifth and fourth centuries B.C.E. and to Rome under Caesar Augustas.
Note: This course is cross-listed as CLAS 1631 and may therefore count as 3 credits in either discipline.

HIST 1651 (3CR)

## NATIVE AMERICAN VOICES

This course will focus on the experience of Native Americans as they come to terms with living in the post-Colombian world. Emphasis will be given to Native American voices as preserved in primary materials.

HIST 2000 (6CR)
EARLY WESTERN CIVILIZATION, circa 300 to circa 1650
This course surveys the history of western civilization from late antiquity through the Middle Ages, the Renaissance and the Reformation. By investigating the diverse ways the peoples of western Eurasia organized their political and social relationships and pursued their ambitions and beliefs, it offers also an introduction to the methods historians use to construe the past, giving particular attention to the close reading and interpretation of original sources.
Exclusion: HIST 2000 (The Evolution of Western Civilization to 1700).

## HIST 2010 (6CR) <br> WESTERN EUROPE FROM THE REFORMATION TO THE EVE OF WORLD WAR I

This course analyzes the major social, economic, political, and cultural developments which transformed Western Europe from 'medieval' into 'modern'. Its central unifying theme is the creative tension between the opposing ideologies which characterize the modern West: individual freedom and state authority; scientific rationalism and revealed religion; hereditary privilege and equality: co-operation and competition as organizing principles of society and culture.
Exclusion: HIST 2500
HIST/CLAS 2021 (3CR)

## ALEXANDER THE GREAT AND THE HELLENISTIC WORLD

An examination of the career of Alexander the Great and the Hellenistic era that followed his conquest of the eastern Mediterranean. Among the main themes included will be the goals of Alexander, the new political climate of kingship and patronage that he helped create, the interaction of the Greeks with the civilizations of Egypt and the East, and the integration of new cultural ideas into Greek society.
Note: This course is cross-listed as CLAS 2021 and may therefore count as 3 credits in either discipline.
Exclusion: HIST/CLAS 3011
HIST/CLAS 2051 (3CR)
WOMEN IN ANTIQUITY
Using written and material evidence, this course will explore the economic, social and political roles of women in the societies of ancient Greece and Rome, as well as the development of the Western idea of the female in antiquity. Secondarily, it will introduce and explore the social theories commonly applied to the study of gender in history.
Note: This course is cross-listed as CLAS 2051 and may therefore count as 3 credits in either discipline.

HIST/GERM 2351 (3CR)
GERMAN CULTURE AND SOCIETY FROM 1870 TO THE PRESENT
Starting with the founding of the German Empire during the Franco-Prussian War, this course will trace the political, economic, social, cultural and scientific developments in German-speaking countries through the Bismarck period, the era of Wilhelm II, the Weimar Republic, the Third Reich and the post-World War II period, ending with a vision of the "New Europe". Language of instruction: English
Note: This course is cross-listed as GERM 2351 and may therefore count as three credits in either discipline.
Exclusion: HIST/GERM 2601

## HIST 2410 (6CR) <br> CANADA FROM THE PREHISTORIC TO THE PRESENT

This course introduces students to the main events, themes and issues of Canadian history from the pre-European period to the present.
Coverage is broad and particular emphases may vary from year to year.
Exclusion: HIST 3100, 3250
HIST 2510 (6CR)

## THE AMERICAN EXPERIENCE

This course introduces students to the main events, themes and issues of American history from the colonial period to the present. Coverage is broad and particular emphases may vary from year to year.
Exclusion: HIST 3650

## HIST 2700 (6CR)

## MODERN ASIA PACIFIC HISTORY

This course will focus on the ways in which the countries of the Asia Pacific Region have interacted with each other through the 20th century, and how they have struggled to understand and adapt to a rapidly changing modern world.

## HIST 2711 (3CR) <br> CHINA TO MODERN TIMES

A historical survey of the major political, economic and social structures, as well as the legal, moral, philosophical and religious ideas of traditional China from the beginnings to the "meeting with the West".

## Exclusion: HIST 2701

HIST 2721 (3CR)

## CHINA IN THE MODERN WORLD

An historical analysis of China's reaction to the West since 1800, her evolution into a modern state, her revolutions of the twentieth century and her prospects for the future, with special emphasis on the theme of continuity and change in the transformation of a traditional society.
Exclusion: HIST 2801

## HIST/CLAS 3001 (3CR) <br> DEMOCRACY AND IMPERIALISM IN CLASSICAL GREECE

An examination of archaic and classical Greek history and civilization from the emergence of the polis to the fall of the Athenian empire. Main themes include the development of political institutions, warfare, and gender relations. Emphasis is placed on historical methods and the interpretation of ancient evidence.
Prereq: Second year standing and three credits from any Classics or History course at the 1000 or 2000 level; or permission of the Department.
Note: This course is cross-listed as CLAS 3001 and may therefore count for three credits in either discipline.

HIST/CLAS 3021 (3CR)
CONQUEST AND EXPANSION: THE RISE AND FALL OF THE ROMAN REPUBLIC
An examination of the development of Rome from a small city-state into the leading power in the Mediterranean. Main themes include the conflict between Rome and Carthage, the conquest of the Hellenistic East, and the political and social changes in Roman society. There will be an emphasis on the analysis and interpretation of primary sources in translation.
Prereq: Second year standing and three credits from any Classics or History course at the 1000 or 2000 level; or permission of the Department.
Note: This course is cross-listed as CLAS 3021 and may therefore count for three credits in either discipline.

## HIST/CLAS 3031 (3CR)

THE ROMAN EMPIRE: CENTRE AND PERIPHERY
An examination of the history of imperial Rome from the age of Augustus to that of Constantine. Main themes include the imperial form of government, the Roman army, urban development and its impact on society, and the conflicts between Romans and other cultures. There will be an emphasis on the analysis and interpretation of primary sources in translation.
Prereq: Second year standing and three credits from any Classics or History course at the 1000 or 2000 level; or permission of the Department.
Note: This course is cross-listed as CLAS 3031 and may therefore count for three credits in either discipline.

## HIST/CLAS 3051 (3CR)

## HEALTH AND MEDICINE IN THE ANCIENT WORLD

Employing both material and literary evidence, this course surveys the conditions of life and common ailments and treatments of the inhabitants of the Greek and Roman world from ca. 1000 BC.E. to ca. 500 C.E.. It also examines the origins of Western medicine in Greek and Roman science, alongside its alternatives, such as magic.
Prereq: Second year standing and three credits from any Classics, History, or Philosophy course; or permission of the Department.
Note: This course is cross-listed as CLAS 3051 and may therefore count as 3 credits in either discipline.

## HIST 3121 (3CR)

## RENAISSANCE EUROPE

Set against the political, social and economic history of Europe from the mid-thirteenth through the early sixteenth centuries, this course treats the remarkable cultural flowering that began in the wealthy, politically and socially volatile city-states of northern Italy before spreading to the courts, print-shops, monasteries, and schools of northern Europe.
Prereq: Second year standing and at least 6 credits from History at the 1/2000 level; or permission of the Department.
Exclusion: HIST 3110

## HIST 3131 (3CR) <br> REFORMATION, REVOLUTION AND ABSOLUTISM

This course treats the history of Europe from the late fifteenth through the early eighteenth centuries. Topics covered include the fragmenting of medieval Christendom by the Reformation of the sixteenth century, the resulting wars of religion, the emergence of territorial states under constitutional and absolutist governments, European colonial and commercial expansion, witch-hunting, and the Scientific Revolution.
Prereq: Second year standing and at least 6 credits from History at the 1/2000 level; or permission of the Department.

HIST 3141 (3CR)
CELTIC AND GERMANIC EUROPE TO THE AGE OF

## CHARLEMAGNE

This course examines the society and culture of the pre-Christian Irish, Frankish, Anglo-Saxon Norse and other Celtic and Germanic peoples and traces the impact of Christian-Roman civilization on their political, social and cultural development. Particular attention is given to the reign of Charlemagne.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.
Exclusion: HIST 3050
HIST 3151 (3CR)

## EUROPE IN THE AGE OF CHIVALRY

This course traces the growth of feudal society and chivalric culture from the collapse of the Carolingian Empire through the age of the crusades and analyses the role of feudalism in the formation of the major European states. Particular attention is paid to the inherent tensions between feudal principles, Christian monarchy and papal political theory and to the resulting struggles between them which shaped the differing political traditions of France, England and Germany down to early modern times.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.
Exclusion: HIST 3050

## HIST 3210 (6CR)

## TUDOR AND EARLY STUART ENGLAND

This course explores England's transformation from a weak and divided feudal kingdom at the end of the Wars of the Roses, (1485) into a united national state and nascent imperial power by the death of James I (1625). Major constitutional, socioeconomic and cultural developments are approached through the lives of the principal actors, from kings, queens and courtiers to poets, prelates and scholars.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.
Exclusion: HIST 3000

HIST 3211 (3CR)
REVOLUTION AND STABILITY: POLITICS AND SOCIETY IN EARLY MODERN BRITAIN 1603-1820
This course explores the ideological and socio-economic roots of the seventeenth century constitutional struggles which established the sovereignty of Parliament in Stuart Britain and traces the re-establishment of social and political stability from the Glorious Revolution through the Hanoverian Period.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.
Exclusion: HIST 3400
HIST 3221 (3CR)

## MODERN BRITAIN

This course traces the development of those institutions, movements and ideas which are an integral part of the texture of modern Britain, and which have been shaping influences on the direction and pace of social, intellectual, economic and political growth.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.

## HIST 3231 (3CR)

PAX BRITANNICA: BRITAIN'S GLOBAL HEGEMONY 1815-1918
This course examines Britain's rise to world power during the nineteenth century with special reference to foreign policy, naval supremacy, international economic influence and the acquisition of empire, together with its impact on both governors and governed.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.

## HIST 3241 (3CR)

IMPERIAL SUNSET: BRITAIN'S RETREAT FROM WORLD POWER 1918 TO THE PRESENT
This course analyses Britain's decline as a world power, its replacement in that role by the United States, its relations with the emerging nation states of the Third World and its uneasy participation in the European Community. Topics to be examined include: interwar development policies for Africa, Indian nationalism, World War II and the decolonization of Asia and Africa, the 'special relationship' with the USA, the evolution of the European Community and continued underdevelopment in the Third World.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.

## HIST 3251 (3CR) <br> CLASS AND CAPITALISM: THE TRANSFORMATION OF THE BRITISH SOCIAL STRUCTURE 1750-1850

This course traces the decline of the aristocracy, the triumph of the middle classes and the making of the working class in Britain during the early stages of capitalism and industrialization. Particular attention is paid to the controversies among historians surrounding the nature of social transformation in Britain.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.
Exclusion: HIST 3400

## HIST 3301 (3CR)

## EUROPE IN THE TWENTIETH CENTURY, 1900-1945

This course examines the major political, social, cultural and economic developments in Europe from the beginning of the century to the end of World War II.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.
Exclusion: HIST 3390
HIST 3311 (3CR)
EUROPE SINCE 1945
This course examines the major political, social, cultural and economic developments in Europe from the post-war era of reconstruction to the present.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.
Exclusion: HIST 3390
HIST 3361 (3CR)
CULTURE AND SOCIETY IN MODERN EUROPE
This course examines major themes and issues in Continental European social and cultural history from the seventeenth century to the present. Selection, emphases and time frame may vary from year to year but may include such topics as: identity formation; class and gender; community and nation; family, work and leisure; myth and memory; popular and high culture; the emergence of mass consumer society.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.
Exclusion: HIST 3360
HIST 3371 (3CR)
FRANCE IN THE AGE OF REVOLUTION 1750-1815
This course explores the origins, nature and impact of the political, social, ideological and cultural revolution that toppled the ancient regime in France and inaugurated the modern search for liberty, equality, social justice and popular sovereignty.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.

## HIST 3380 (6CR)

WAR AND SOCIETY
This course analyzes the interrelationships between war and society, with particular reference to the European experience. Major themes include war and technological change, social mobilization, the transformation of war aims, and the ethics of warfare. Some attention is given to ancient and medieval examples, but the main emphasis is on the modern period.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.
Exclusion: HIST 3600
HIST 3381 (3CR)
FASCISM IN EUROPE 1870-1945
This course undertakes a comparative analysis of the origins, theory and nature of fascism in France, Italy and Germany from about 1870 to 1945.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.

HIST 3401 (3CR)

## THE ATLANTIC REGION PRIOR TO CONFEDERATION

This course traces the major political, socio-economic and intellectual themes in the history of Canada's Atlantic region from pre-European times to the Confederation period.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.
Exclusion: HIST 3420
HIST 3411 (3CR)

## COLONIAL NEW FRANCE

This course examines the 'pre-history' and history of the colony of New France, with particular emphasis on the colony's socio-economic and cultural ethos, France's colonial polices, and the response and fate of the indigenous peoples.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.
Exclusion: HIST 3100

## HIST 3451 (3CR)

## THE ATLANTIC REGION SINCE CONFEDERATION

This course examines the role of the Atlantic region in the modern Canadian nation
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.

## Exclusion: HIST 3420

## HIST 3421 (3CR)

## CANADA FROM CONQUEST TO CONFEDERATION

This course examines the socio-economic, intellectual and political-constitutional development of Lower Canada, Upper Canada and the Canadian West from 1760 to the achievement of Confederation in 1867.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.
Exclusion: HIST 3100

## HIST 3431 (3CR)

## QUEBEC FROM CONFEDERATION TO SEPARATISM

This course examines the political, religious, economic and cultural development of Quebec since Confederation with particular emphasis on the growth of nationalism and the emergence of separatism.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.

## HIST 3441 (3CR)

## MODERN CANADA

This course traces the development of those institutions, movements and ideas which are an integral part of the texture of modern Canada, and which have been shaping influences on the direction and pace of social, intellectual, economic and political growth.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.

## HIST 3461 (3CR) <br> CANADIAN EXTERNAL RELATIONS

This course examines Canada's diplomacy and external relations from the formative years to the present, with emphasis on the twentieth century. Throughout, attention is paid to the Canadian domestic political background and the role of public opinion in determining foreign policy.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.
Exclusion: HIST 3200, 3460
HIST 3501 (3CR)

## A SOCIAL AND POLITICAL HISTORY OF FOOD IN NORTH

## AMERICA

This course will examine the way in which the need to eat has shaped the political and social environment in North America over the course of the last one thousand years. The general focus will be on changing patterns of food acquisition and the changing rituals of consumption. Particular attention will be paid to how changing technologies, demographic change and crises such as war have influenced the North American diet and the cultural significance of various types of foods. Prereq: Second year standing; or permission of the Department.

HIST 3511 (3CR)
COLONIAL AMERICA
This course examines the development of the Anglo-American colonies and their eventual revolution. Sectional studies of New England, the middle colonies and the southern colonies will be supplemented by close attention to the lives of patriot and loyalist leaders.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.
Exclusion: HIST 3510
HIST 3521 (3CR)

## THE AMERICAN SOCIAL AND CULTURAL EXPERIENCE

This course explores American social and cultural development. Themes may include immigration, slavery, race relations, abolitionism, the roots of modern American feminism, assimilation and the emergence of a common American culture.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.
Exclusion: HIST 3520

## HIST 3531 (3CR)

## AMERICAN WOMEN'S HISTORY

This course will explore theoretical approaches to women's history through an examination of the role and experience of women in the United States from the Revolution to the present.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 levels; or permission of the Department.

HIST 3561 (3CR)
UNITED STATES FOREIGN RELATIONS
This course surveys American diplomacy and foreign relations from colonial times through the twentieth century. Throughout, attention is paid to American domestic policies and the role of public opinion in determining foreign policy.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.

## Exclusion: HIST/POLS 3560

## HIST/RELG 3611 (3CR)

## CHRISTIANITY IN THE ROMAN EMPIRE

This course examines the crucial, defining crises of the ancient Christian communities in the social, political, and cultural context of Late Antiquity (roughly, 2nd to 6th centuries CE/AD) and the Roman Empire. Early Christianity is analyzed as a social movement, as a religious movement with a developing belief system, and as an historical phenomenon embedded within historical events and processes.
Prereq: RELG 2801 or 2821 or 3601 or third or fourth year History
Major; or permission of the Department.
Note: This course is cross-listed as RELG 3611 and may therefore count as three credits in either discipline.
Exclusion: HIST/RELG 3601
HIST/RELG 3621 (3CR)
CHRISTIANITY IN CHRISTENDOM
A consideration of Christianity at the height of its political power in the middle ages.
Prereq: RELG 3601 or 3611 or third or fourth year History Major; or permission of the Department.
Note: This course is cross-listed as RELG 3621 and may therefore count as three credits in either discipline.
Exclusion: HIST/RELG 3620
HIST/RELG 3631 (3CR)

## CHRISTIANITY IN THE REFORMATION ERA

A consideration of the reasons for and impact of the divisions in Christianity instituted by the Protestant Reformation.
Prereq: RELG 3601 or 3611 or 3621 or third or fourth year History Major; or permission of the Department.
Note: This course is cross-listed as RELG 3631 and may therefore count as three credits in either discipline.

## HIST/RELG 3641 (3CR)

## CHRISTIANITY AND MODERN STATES

A consideration of how secularization has occurred in various modern states and of the sphere of influence that remains for religion in these circumstances.
Prereq: RELG 3601 or 3611 or 3621 or third or fourth year History Major; or permission of the Department.
Note: This course is cross-listed as RELG 3641 and may therefore count as three credits in either discipline.
Exclusion: HIST/RELG 3641 (The Modern Church)

## HIST 3710 (6CR)

## CHINA SINCE 1949

This course will deal with the contemporary history of China, focusing on six topics: the role of ideology; foreign policy goals and practicalities; intellectuals and student activists; religion, the rural-urban continum; and economic changes since 1949.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department or as for RELG 3641.

## HIST/POLS 3731 (3CR)

## JAPAN IN THE MODERN WORLD

This course will examine Japan's relations with the international community in the years following renewed contact with the West in the 1860 's. Particular emphasis will be placed on the expanding intellectual, diplomatic and economic interchange and the impact of that interchange on the shaping of modern Japan.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.
Note: This course is cross-listed as POLS 3731 and may therefore count as three credits in either discipline.
Exclusion: HIST/POLS 3321

## HIST 4001 (3CR)

## HISTORY THROUGH FILM

This course is a thematic study of topics in modern history through the medium of film, both feature and documentary. These films will be critically read both as an art form and as historical documents. While specific course content will vary according to the instructor, particular emphasis will be placed on what films tell us about the particular historical context in which they are created.
Prereq: Permission of the instructor (normally third-year standing, and at least 12 credits in History at the 2/3000 level are required)

## HIST 4110 (6CR)

## MEDIEVAL CIVILIZATION

Seminar in Medieval Civilization.
Prereq: Third year standing and at least six credits from among HIST 3141, 3151, 3620; or permission of the Department.
Exclusion: HIST 4200
HIST 4210 (6CR)
ADVANCED TOPICS IN TUDOR/ STUART HISTORY
Seminar in selected issues of 16th and 17th century British history.
Prereq: Third year standing and HIST 3210; or permission of the Department.
Exclusion: HIST 4000

## HIST 4250 (6CR)

BRITAIN AND EUROPE IN THE TWENTIETH CENTURY
Seminar in twentieth century British and European history.
Prereq: Third year standing and at least six credits from among HIST $3211,3221,3231,3241,3251$, POLS 3400; or permission of the Department.
Exclusion: HIST 4600

HIST 4260 (6CR)

## THE LIBERAL IDEA IN WESTERN HISTORY

This senior seminar analyses the development of Western liberalism, the controversies it has created and the changes it has undergone during several historical periods.
Prereq: Third year standing and at least six credits from among HIST 3110, 3210, 3211, 3221, 3251, 3361, 3371, 3381, POLS 3001, 3011; or permission of the Department.

## HIST 4300 (6CR)

## THE BIRTH OF THE MODERN AGE

This senior seminar explores some of the profound social, cultural, political and economic changes that transformed European life during the late nineteenth and early twentieth centuries. Topics will vary from year to year.
Prereq: Third year standing and at least six credits from among HIST 3301, 3311, 3361, 3371, 3381; or permission of the Department.

## HIST 4401 (3CR)

## CANADA AND THE PACIFIC RIM

This senior seminar explores the relationship between Canada and the countries and peoples of the Pacific Rim.
Prereq: Third year standing and at least six credits from among HIST 3441, 3461, 3710, 3731, GEOG 3321; or permission of the Department.

## HIST 4420 (6CR)

## THE ATLANTIC PROVINCES

Seminar in the history of Canada's Atlantic region.
Prereq: Third year standing and at least six credits from among HIST 3411, 3401, 3421, 3451 3431, 3441; or permission of the Department.

## Exclusion: HIST 4100

## HIST 4440 (6CR)

## ADVANCED TOPICS IN MODERN CANADA

Seminar in Twentieth century Canada.
Prereq: Third year standing and at least six credits from among HIST 3441, 3461, CANA 3301, 3311, 3400; or permission of the Department. Exclusion: HIST 4150

## HIST 4450 (6CR)

## CANADIAN COURTS AND THE CONSTITUTION

This senior seminar examines the Canadian courts and the private and public factors that are taken into consideration in the determination of constitutional change and legal rights and responsibilities.
Prereq: Third year standing and at least six credits from among HIST 3401, 3431, 3441, 3451 POLS 2101, 3111; or permission of the Department.

## HIST 4500 (6CR)

ADVANCED SEMINAR IN SELECTED TOPICS IN MODERN AMERICAN HISTORY
A seminar in selected topics in modern American history.
Prereq: Third year standing and at least six credits from among HIST 2510, 3511, 3521; or permission of the Department.
Exclusion: HIST 4800

HIST 4510 (6CR)

## THE AMERICAN WEST

This course examines the history of the American West during the nineteenth and twentieth centuries. It juxtaposes the real West to the mythic West and emphasizes the importance of each in American society and culture.
Prereq: Third year standing and at least six credits from among HIST 2510, 3501, 3511, 3521, 3531 and 3561.

HIST 4571 (3CR)
HISTORY OF THE MODERN AMERICAN WOMEN'S MOVEMENT
This course will focus on the history of the modern American women's movement, beginning with a brief examination of the history of feminism in the pre-World War II United States and continuing through to an examination of responses and backlashes to the women's movement. Emphasis will be given to the revolutionary character of that movement and the experience of American women as influenced by the movement.
Prereq: Third year standing and at least six credits from HIST 2510, WOST 2001 or HIST 3531; or permission of the Department.

## HIST 4700 (6CR)

## ADVANCED SEMINAR IN ASIA PACIFIC HISTORY

This course examines the development of Chinese and Japanese societies from the 19th through the 20th centuries. It will focus on the emergent national and individual consciousness in the two countries, and the rapidly changing political context in which they were constructed.
Prereq: Third year standing and three credits from HIST 2721 or HIST 3731; or permission of the Department

HIST/POLS 4550 (6CR)
ADVANCED TOPICS IN UNITED STATES FOREIGN RELATIONS
Seminar in main currents of United States foreign relations.
Prereq: Third year standing and at least six credits in History at the 3000 level; or permission of the Department.
Note: This course is cross-listed as POLS 4550 and may therefore count as six credits in either discipline.

HIST 4950/4951 (6/3CR)
SPECIAL TOPICS - DIRECTED STUDY
Prereq: Permission of instructor and Department required.
HIST 4990 (6CR)
HONOURS THESIS
Independent research and study under direction of a member of the department; for students in History Honours programme.

## INTERNATIONAL ECONOMICS AND BUSINESS

## Interdisciplinary B.A. Programme

## MINOR in International Economics/Business is 24 credits earned as follows:

12 from Economics 1000, (or 1001 and 1011), Commerce 1001, 2201
12 from Economics 3501, 3531, 3551, 3901,3921, Commerce 2211, 3211, 3251, chosen in consultation with the Programme Advisor.

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## INTERNATIONAL RELATIONS

The study of International Relations has traditionally focussed on the competition for power among rival states. Today, however, non-state and intergovernmental actors, such as non-governmental organizations, multinational corporations, transnational diasporas, and organizations like the United Nations also exert important influence in international affairs. The multiple dimensions of power go beyond the distribution of economic and military capabilities and include class, gender, culture, and discourse. The "international" in International Relations is moreover inseparable from domestic concerns and is as much about cooperation and compromise among international actors as it is about competition and conflict. The International Relations programme provides students with a multidisciplinary foundation for understanding the complexities of today's international affairs.

## Interdisciplinary B.A. Programme

## INTERDISCIPLINARY MAJOR AREA OF STUDY in

 International Relations is 72 credits as follows:
## Core ( 48 credits as follows):

6 from POLS 1000
6 from INLR/POLS 2301, INLR 3001
6 from HIST 1601, 1611, 2010, 2700, 2701, 2721
9 ECON 1001 and 1011 (or 1000), 3501
12 from a second language offered by the Department of Modern Languages and Literatures. Normally students will take German 1000, 2000 or French 1600, 1700 or Spanish 1100, 2100 or Japanese 1000, 2000 (Students may substitute other courses dependent on placement by the Department of Modern Languages and Literatures or another language subject approved by the International Relations Programme Coordinator or by transfer. If exempted, they must take the equivalent number of credits from elsewhere in the programme).
6 from GEOG 1201, 2201, 2221, 2311
3 from an Intercultural area at the 1000 or 2000 level including ANTH 1011, 2521; ENGL 1111, 1121, 1201; FREN 1801; GERM 2351; SPAN 2001, 2011; RELG 2401, 2801; SOCI 1001; WOST 2001

## Interdisciplinary electives at the 3/4000 level:

24 from 3/4000 level courses chosen in consultation with the International Relations Programme Coordinator from the following courses, of which a maximum 12 credits can be taken from any one discipline:
Anthropology $3811^{*}, 3831^{*}, 3841^{*}, 3861^{*}$
Commerce 3251*
Economics 3531, 3551, 3901, 3921
English $3751^{*}, 3761^{*}, 3771^{*}, 3781^{*}, 3921^{*}$
Geography 3101*, 3301*, 3321*, 4301*
History 3231, 3241, 3381, 3380, 3390, 3461, 3561, $3641^{*}, 3710$, 3731, 4250*, 4401*, 4550*
International Relations 3101, 3201, 3301, 3401
Political Science $3021^{*}, 3200,3310,3731,4200,4211,4300,4550$
Religious Studies 3001*, 3101*, 3301*, 3311*, 3311*, 3501*, 3601*, $3641^{*}, 3701^{\star}, 3891^{*}, 3900^{*}, 3941^{\star}, 4401^{*}, 4411^{\star}, 4421^{*}, 4821^{*}$ Sociology $3121^{*}, 3431^{*}, 3611^{*}, 4511^{*}$

Note: Not all these courses may be available in any given year.
Note: ${ }^{*}$ Courses marked with an asterisk require additional prerequisites.

## HONOURS in International Relations is 84 credits as follows:

72 credits as in the Major (48 from Core, 24 from 3/4000 level electives), plus
6 from 4000 level Anthropology, Economics, English, Geography, History, Political Science, Religious Studies, or Sociology, chosen in consultation with the International Relations Programme Coordinator
6 from INLR 4101, 4301, 4950/1, 4701
Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## INTERNATIONAL RELATIONS COURSES

## INLR/POLS 2301 (3CR)

## TOPICS IN INTERNATIONAL RELATIONS

A study of the major issues and themes in international relations, including the nature of war and the conditions of peace.
Prereq: POLS 1000; or permission of the Department.
Note: This course is cross-listed as POLS 2301 and may count as 3 credits in either discipline.

## INLR 3001 (3CR) <br> GENDER AND INTERNATIONAL RELATIONS

This course sensitizes students to the highly gendered nature of international relations. Topics include the seeming invisibility of women in the study of international affairs and within international decision-making, the existence of differential international "packages of expectations" concerning the roles of men and women, competing dominant and subordinate masculinities and femininities, the struggle for women's empowerment, and the gendered impact of globalization processes.
Prereq: INLR/POLS 2301, or permission of the instructor

## INLR 3101 (3CR)

## GLOBAL GOVERNANCE

This course examines the role of international organizations in International Relations with a focus on the United Nations. It addresses the challenges of multilateral diplomacy in the age of globalization and U.S. supremacy.

Prereq: INLR/POLS 2301, or permission of the instructor

## INLR 3201 (3CR) <br> PROBLEMS IN INTERNATIONAL DEVELOPMENT

This course focuses on leading issues in international development from an international relations perspective. The themes covered may vary from year to year.
Prereq: INLR/POLS 2301, or permission of the instructor

## INLR 3301 (3CR)

## LATIN AMERICAN POLITICS AND SOCIETY

This course provides students with a critical, interdisciplinary introduction to the study of the social, political, economic, and cultural problems of Latin America and the Caribbean. It begins with an overview of the region's history and the contending paradigms used to analyze its development. The course then turns to a series of case studies of enduring developmental problems in the region.
Prereq: INLR/POLS 2301, or permission of the instructor

INLR 3401 (3CR)

## INTERNATIONAL POLITICAL ECONOMY

This course is a survey of the critical International Political Economy (IPE) tradition in the study of International Relations, from Marx and Polanyi to Cox and Strange. As a critique of realism and liberalism, IPE posits the inseparability of the domestic and international realms, of the political and economic spheres, as well as state and society. The course examines the impact of globalization and environmental change on states in the global order.
Prereq: INLR/POLS 2301, or permission of the instructor

## INLR 4101 (3CR)

## GLOBAL GOVERNANCE SIMULATION

This course engages students in an innovative and intensive semester-long simulation of an international conflict or crisis in order to highlight the challenges of international decision-making in multilateral forums. Case studies are drawn from the United Nations, other international organizations, or disputes among states and non-state actors.
Prereq: INLR/POLS 2301, INLR 3101. Enrolment is restricted to Honours students or by permission of the instructor.

INLR 4301 (3CR)
THE INTER-AMERICAN SYSTEM
This interdisciplinary seminar focuses on contemporary problems in the Inter-American System. It looks at the intersection of international diplomacy and the internal social, political, and economic dynamics of the countries that make up the Americas. As a continuation of INLR 3301, it examines the inter-actions of governments, non-state actors, and intergovernmental actors like the Organization of American States. Prereq: INLR/POLS 2301, INLR 3301, or permission of the instructor

## INLR 4701 (3CR)

## SPECIAL TOPICS IN INTERNATIONAL RELATIONS

This seminar is open to upper-level students and addresses an advanced topic of current importance in International Relations. Topics may vary from year to year.
Prereq: INLR/POLS 2301, restricted to Honours students in International Relations or by permission of the instructor

INLR 4950/51 (6CR/3CR)

## DIRECTED READING IN INTERNATIONAL RELATIONS

These courses enable an advanced student to pursue a special field of study in International Relations.
Prereq: Permission of the Programme Coordinator.

## JAPANESE STUDIES

See Modern Languages and Literatures

## LATIN

See Classical Studies

## LINGUISTICS

See Modern Languages and Literatures

## MATHEMATICS

Mathematics is a discipline which has been said to be the Queen of the Sciences, and is the foundation of most modern quantitative and qualitative studies. The permanence and universality of mathematics throughout the ages is a consequence of its very nature. Mathematics is cumulative, developing from the earliest use of numbers by prehistoric civilizations to the highly deductive nature of geometry as developed by the Greeks, from the practical applications of calculus developed in the seventeenth century to the modern use of number theory in computer cryptography. Mathematics has many faces, from practical uses of its statistical tools to theoretical studies of abstract relationships. Our goal is to introduce students to all facets of the discipline, and to give them an appreciation of the historical, theoretical and applied nature of the discipline, as well as a full understanding of the beauty of the subject.
The Department offers a broad variety of courses and programs in Mathematics. Beginning courses may introduce students to the applications to which Calculus may be applied or the practical uses of statistics; more advanced courses deal with topics ranging from geometry to game theory. All courses in the Mathematics curriculum offer a blend of theory and practical applications. Many of the courses offered include a substantial computational component, and students are encouraged to use the mathematical software tools available. Courses are designed to address the needs of a wide variety of users, from the casual to the professional. Some students may enrol in a course to familiarize themselves with university level mathematics, while others will take a series of courses related directly to their chosen study area. Those choosing to pursue a minor or major in mathematics will be exposed to more advanced courses which blend Mathematical theory and practice.

Mount Allison has been very successful in placing many of its students in graduate programmes in Mathematics, while many others have found employment after graduation in one of many fields for which mathematical understanding is an asset. Teaching, actuarial work, law and medicine are all areas requiring the ability to think and reason logically and for which a mathematical background can prove beneficial.

## Disciplinary B.A. and B.Sc. Programmes

## B.A./B.Sc. MINOR in Mathematics is 24 credits earned as follows:

6 from Mathematics 1111, 1121
12 from Mathematics 2111, 2121, 2211, 2221, 2311, 2321.
6 from Mathematics at the 3/4000 level.

## B.A. MAJOR AREA OF STUDY in Mathematics is 60 credits earned as follows:

15 from Mathematics 1111, 1121, 2111, 2211, 2221
3 from Mathematics 2121, 2311
6 from Mathematics 3311, 3321
18 from Mathematics at the 3/4000 level
6 from Computer Science 1711, 1721
12 credits from complementary disciplines chosen in consultation with the Programme Advisor

## B.A. HONOURS in Mathematics is 72 credits earned as follows:

18 from Mathematics 1111, 1121, 2111, 2121, 2211, 2221
6 from Computer Science 1711, 1721
24 from Mathematics 3011, 3111, 3121, 3211, 3311, 3321, 4131, 4221
3 from Mathematics 3411
15 from Mathematics at the 3/4000 levels
6 from Mathematics or Computer Science at the 3/4000 levels

## B.A./B.Sc. HONOURS in Computer Science and Mathematics is 75 credits (B.A.) or 87 credits (B.Sc.) earned as follows:

15 from Computer Science 1711, 1721, 2611, 2621, 2911
18 from Mathematics 1111, 1121, 2111, 2121, 2211, 2221
9 from Mathematics 3111, 3211, 3311
3 from Mathematics 3011, 3221, 3231, 3251, 4221
3 from Mathematics at the 3/4000 level
6 from Computer Science 3411, 4721
12 from Computer Science 3351, 3611, 3711, 3911, 3971, 4631
9 from Computer Science or Mathematics at the 3/4000 levels.
12 from Chemistry 1001, 1021, Physics 1051, 1551 (B.Sc. Only)

## B.Sc. MAJOR AREA OF STUDY in Mathematics is 60 credits earned as follows:

18 from Mathematics 1111, 1121, 2111, 2121, 2211, 2221
6 from Mathematics 3311, 3321
18 from Mathematics at the 3/4000 level
6 from Computer Science 1711, 1721
6 from Chemistry 1001, 1021
6 Physics 1051, 1551

## B.Sc. HONOURS in Mathematics is 84 credits earned as follows:

18 from Mathematics 1111, 1121, 2111, 2121, 2211, 2221
6 from Computer Science 1711, 1721
27 from Mathematics 3011, 3111, 3121, 3211, 3311, 3321, 3411, 4131, 4221
15 from Mathematics at the 3/4000 level
6 from Mathematics or Computer Science at the 3/4000 level
6 from Chemistry 1001, 1021
6 from Physics 1051, 1551

## Interdisciplinary B.Sc. Programme

## B.Sc. HONOURS in Mathematics and Physics is 90 credits earned as follows:

18 from Mathematics 1111, 1121, 2111, 2121, 2211, 2221
3 from Computer Science 1711
6 from Chemistry 1001, 1021
12 from Physics 1051, 1551, 2251, 2801
9 from Mathematics 3111, 3211, 3311
4151, 421
18 from Physics 3101, 3201, 3401, 3701, 3811, 3821
from Physics at the 4000 level
from Physics 4990

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## MATHEMATICS COURSES

## MATH 1011 (3CR)

## SETS, FUNCTIONS AND RELATIONS

This course will focus on the real number system, inequalities, plane analytic geometry (lines and conics), functions, inverse functions, polynomials, rational functions, trigonometric functions, exponential and logarithmic functions. Fundamental methods of graphing functions, using non-calculus based techniques, will be emphasized. This course is primarily intended for non-science majors. Science majors require the permission of the Department of Mathematics and Computer Science to enrol in this course. This course cannot be used to satisfy the Bachelor of Science degree requirement of a course in Mathematics. Credit will not be given for this course if credit has already been granted for MATH 1111 .

## MATH 1111 (3CR) <br> INTRODUCTION TO CALCULUS I

Derivatives of the algebraic and exponential functions are developed. Applications include curve sketching, related rates, and optimization problems.
Prereq: Students enrolling in Mathematics 1111 should normally have completed a university preparatory course in Mathematics designed to prepare them for University calculus; or MATH 1011.

## MATH 1121 (3CR) <br> INTRODUCTION TO CALCULUS II

The derivatives of trigonometric functions are introduced, various techniques of integration studied and some applications presented. Among these applications are: area between curves, volume work and elementary differential equations.
Prereq: MATH 1111; or permission of the Department.

## MATH 1131 (3CR)

MATHEMATICS FOR LIFE AND ENVIRONMENTAL SCIENCE
An application-oriented continuation of the study of calculus and an introduction to other topics of interest to students in the life and environmental sciences.
Prereq: MATH 1111; or permission of the Department.
Exclusion: MATH 1121, 1251

MATH 1251 (3CR)
FINITE MATHEMATICS
This course introduces students at all levels to the most applicable branches of finite mathematics and is particularly suitable for students in the social and behavioural sciences and commerce. Topics discussed include Markov chains, linear programming and game theory.

## Exclusion: MATH 1131

## MATH 2111 (3CR) <br> MULTIVARIABLE CALCULUS

Topics include: Sequences and series, power series, Taylor and MacLaurin series; conic sections, quadric surfaces, cylindrical and spherical coordinates in three space; functions of several variables: continuity, partial derivatives, tangent planes, chain rule, maximum and minimum values, Lagrange multipliers, double and triple integrals.
Prereq: MATH 1121; or permission of the Department.
Exclusion: MATH 2111 (Vector Calculus)

## MATH 2121 (3CR)

## ELEMENTARY DIFFERENTIAL EQUATIONS

This is an introduction to the techniques and applications of first and second order differential equations. Included will be: applications of first order equations to areas such as growth and decay, cooling and diffusion, mixture problems, chemical reactions, the logistic equation, orthogonal trajectories, higher order differential equations and applications, and power series solutions of differential equations.
Prereq: MATH 2111; or permission of the Department.

## MATH/COMP 2211 (3CR) <br> DISCRETE STRUCTURES

An introduction to the terminology and concepts of discrete mathematics, covering such topics as: sets, functions, induction, enumeration, graphs and trees, boolean algebras, semigroups and groups, and the design of algorithms.
Prereq: MATH 1111; or permission of the Department.
Note: This course is cross-listed as COMP 2211 and may therefore count as three credits in either discipline.
Exclusion: MATH 2211 Discrete Mathematics
MATH 2221 (3CR) LINEAR ALGEBRA
An introductory course in linear algebra covering such topics as linear equations, matrices, determinants, vector spaces, linear transformations, inner products, eigenvalues, and eigenvectors. Whenever possible, concepts are given a geometric interpretation in two and three-dimensional space.
Prereq: MATH 1111; or permission of the Department.

## MATH 2311 (3CR) <br> STATISTICS I

This course is designed to introduce students to some of the concepts and techniques of probability and statistics. Attention is focused on some special probability distributions including binomial, normal, Student's $t$, chi-square, and F. Some basic statistical ideas are developed and the testing of statistical hypotheses is introduced. Examples are drawn from a wide variety of sources. A statistical software package is introduced.
Prereq: University preparatory level Mathematics or MATH 1011 and either MATH 1111, or registration in second year or higher; or permission of the Department.
Exclusion: PSYC 2001
MATH 2321 (3CR)

## STATISTICS II

Further applications of hypothesis testing. Topics selected from analysis of variance, linear and nonlinear regression, correlation estimation and prediction, independence, Wilcoxon and goodness-of-fit tests.
Prereq: MATH 2311 or 3311; or permission of the Department.
Exclusion: PSYC 2011, ECON 2701

## MATH 3011 (3CR)

## SET THEORY AND MATHEMATICAL LOGIC

This course provides a mathematical introduction to the basic ideas of set theory and logic. Topics covered may include: axiom of choice, cardinal and ordinal numbers, Boolean algebras and their applications, completeness, decidability, philosophies of mathematics.
Prereq: MATH 2211; or permission of the Department.

## MATH 3031 (3CR)

## HISTORY OF MATHEMATICS

A survey of the history of Mathematics. Topics include: the achievements of early civilizations, the developments in Europe leading to the calculus and its consequences, the growth of rigor in the 18th and 19th centuries, the axiomatic method in the 20th century.
Prereq: MATH 1121 (or 1131) and 6 credits from MATH 2111, 2121, 2211 and 2221.

MATH 3111 (3CR)

## REAL ANALYSIS I

A systematic and rigorous study of the real numbers and functions of a real variable, emphasizing limits and continuity.
Prereq: MATH 2111, 2121, 2211; or permission of the Department. Exclusion: MATH 3110

MATH 3121 (3CR)
REAL ANALYSIS II
A continuation of Mathematics 3111 including the study of concepts from the Calculus, including differentiation and integration.
Prereq: MATH 3111; or permission of the Department.
Exclusion: MATH 3110

MATH 3131 (3CR)
MATHEMATICAL METHODS FOR DIFFERENTIAL EQUATIONS
This course is designed primarily for students in mathematics, physics, or engineering. It covers systems of 1st and 2nd order ordinary differential equations, Laplace and Fourier transforms, power series solutions for equations with singular points, and Fourier series.
Prereq: MATH 2121 and 2221; or permission of the Department.

## MATH 3141 (3CR) <br> VECTOR CALCULUS

Topics covered include vectors in the plane and in three space, vector functions, curves, tangent and normal vectors, velocity and acceleration; curvature and arc length, directional derivatives and the gradient, vector fields, line integrals, the Fundamental Theorem of line integrals, divergence and curl, Green's Theorem, parametrized surfaces, surface area and surface integrals, flux, Stokes' Theorem, and the Divergence Theorem.
Prereq: MATH 2111; or permission of the Department.

## MATH 3151 (3CR)

## AN INTRODUCTION TO MATHEMATICAL MODELLING

This course provides an introduction to the nature of theoretical mathematical modelling illustrated by examples drawn from the physical and engineering sciences, pursuit and conflict problems, population dynamics (mathematical ecology), traffic flow, sociological problems (voting, kinship, cultural stability) and other areas depending on the interests of the class.
Prereq: MATH 2121 and 2221; or permission of the Department.
MATH 3211 (3CR)
MODERN ALGEBRA I
An introduction to the theory of groups and rings.
Prereq: MATH 2211 and MATH 2221; or permission of the Department.

## MATH 3221 (3CR)

## ADVANCED LINEAR ALGEBRA

An advanced course in linear algebra, covering selected topics from: change of basis and similarity of matrices; multilinear forms and determinants; canonical forms, Primary Decomposition Theorem, Jordan form; semisimple and normal operators; spectral theory; quadratic forms; applications to geography, electrical networks, linear programming, differential equations, or the geometry of conic sections. Prereq: MATH 2221; (MATH 2211 is recommended); or permission of the Department.

MATH 3231 (3CR) NUMBER THEORY
An introductory half-course in the theory of numbers covering such topics as: Euclidean algorithm, Fundamental Theorem of Arithmetic, congruences, diophantine equations, Fermat and Wilson Theorems, quadratic residues, continued fractions, Prime number theorem.
Prereq: MATH 2211; or permission of the Department.

## MATH 3251 (3CR) <br> INTRODUCTION TO COMBINATORICS AND GRAPH THEORY

Topics covered include enumeration (permutations and combinations, inclusion-exclusion and pigeonhole principles, recurrence relations and generating functions), algorithmic graph theory (minimum-weight spanning trees and minimum-weight paths) and combinatorial design theory (latin squares and finite geometries, balanced incomplete block designs, triple systems).
Prereq: MATH 2211, 2221; or permission of the Department.

## MATH 3311 (3CR)

## PROBABILITY AND STATISTICS I

An introduction to the mathematical theory of probability. Topics covered include: sample space, events, axioms, conditional probability, Bayes Theorem, random variables, combinatorial probability, moment generating functions, transformations of random variables, univariate and jint distributions with reference to the binomial, hypergeometric, normal, Gamma, Poisson, and others; convergence of sequences of variables, central Limit Theorem.
Prereq: MATH 2111; or permission of the Department.
Exclusion: MATH 3310

MATH 3321 (3CR)

## PROBABILITY AND STATISTICS II

An introduction to mathematical statistics. Topics covered include: Estimation, unbiasedness, efficiency, Cramer-Rao lower bound, consistency, sufficiency, maximum likelihood estimators, hypothesis testing, power of tests, likelihood ration, regression analysis and analysis of variance.
Prereq: MATH 3311; or permission of the Department.
Exclusion: MATH 3310

## MATH/COMP 3411 (3CR) <br> NUMERICAL ANALYSIS

This course is an introduction to numerical methods for solving a variety of problems in mathematics, the natural sciences, and engineering. Topics to be studied include numerical solution of linear and nonlinear systems of equations, Gauss elimination, pivoting strategies, numerical stability, PLU factorization, tridiagonal matrices, polynomial and cubic spline approximation and interpolation.
Prereq: MATH 1121, 2221, and COMP 1711 or 1751; or permission of the Department.
Note: This course is cross listed as COMP 3411 and may therefore count as three credits in either discipline.

## MATH 3431 (3CR)

## ORDINARY DIFFERENTIAL EQUATIONS

This course utilizes both numerical and theoretical techniques to study ordinary differential equations. Topics include numerical, integration, Runge-Kutta and multistep methods, stability, introduction to qualitative methods, phase-plane analysis, stability of non-linear systems, Lyapunov's method, chaos theory.
Prereq: MATH 2121and MATH/COMP 3411; or permission of the Department.

## MATH/COMP 3511 (3CR) LINEAR PROGRAMMING

Among the topics covered are linear and integer programming, the simplex and revised simplex methods, duality theory and sensitivity analysis, and various applications.
Prereq: MATH 2221, 3 credits in Computer Science, or permission of the Department.
Note: This course is cross listed as COMP3511 and may therefore count as three credits in either discipline.

## MATH/COMP 3531 (3CR) <br> SIMULATION AND MODELLING

An introduction to the simulation technique for studying mathematical models. Specific titles include: systems theory and system models, continuous system simulation, discrete system simulation, Monte Carlo methods, random number generators, and simulation languages. Emphasis will be placed upon computer implementation of the methods studied.
Prereq: MATH 1111; one of MATH 2311, 3311, PSYC 2001 and 2011; three credits in Computer Science; or permission of the Department. Note: This course is cross listed as COMP 3531 and may therefore count as three credits in either discipline.

## MATH 4111 (3CR)

TOPOLOGY
An introduction to the study of metric and topological spaces, convergence, and continuous functions.
Prereq: MATH 3111; or permission of the Department.
Exclusion: MATH 4110
MATH 4121 (3CR)
TOPICS IN ANALYSIS
This course covers selected topics in Analysis, depending on the background and interests of the students involved.
Prereq: MATH 3111; or permission of the Department.
Exclusion: MATH 4110

## MATH 4131 (3CR)

## COMPLEX VARIABLES WITH APPLICATIONS

This course is designed primarily for students in mathematics, physics, or engineering. It covers analytic functions, Cauchy-Riemann equations, conformal mapping, complex integrals, Cauchy's integral theorem, Taylor and Laurent Series, residues, evaluation of real integrals, and inverse transforms.
Prereq: MATH 2111, 2121; or permission of the Department.
MATH 4141 (3CR)
MEASURE AND INTEGRATION
Topology of Rn, Lebesque Measure, Measurable Functions, the Lebesque integral, the convergence theorems and products measures. As time permits, other topics such as abstract measure theory, Lp-spaces and absolute continuity will be covered.
Prereq: MATH 3110 or 3121; or permission of the Department.

## MATH 4151 (3CR)

## BOUNDARY AND EIGENVALUE PROBLEMS

This course is designed primarily for students in mathematics, physics, or engineering. It extends the material studied in Mathematics 3131.
Topics include separation of variables (product method), generalized Fourier series, Sturm-Liouville theory, Legendre polynomials, Bessel Functions, Green's functions, and calculus of variations.
Prereq: MATH 3131; or permission of the Department.

## MATH 4161 (3CR)

## TOPICS IN CLASSICAL APPLIED MATHEMATICS

This course covers selected topics in Classical Applied Mathematics, depending on the back-ground and interests of the students involved.
Prereq: MATH 4131 and 4151; or permission of the Department.
MATH 4211 (3CR) TOPICS IN ALGEBRA
This course covers selected topics in Algebra, depending on the background and interests of the students involved.
Prereq: MATH 3221; or permission of the Department.
MATH 4221 (3CR)

## MODERN ALGEBRA II

The classical theory of fields and rings and their applications.
Prereq: MATH 3211; or permission of the Department.
MATH 4311 (3CR) TOPICS IN PROBABILITY AND STATISTICS
This course covers selected topics in Probability and Statistics, depending on the background and interests of the students involved.
Prereq: MATH 3311 and 3321; or permission of the Department.

## MATH/COMP 4631 (3CR)

 THEORY OF COMPUTATIONThis course is an introduction to theoretical aspects of Computer Science such as formal language and automata theory and complexity theory.
Prereq: MATH 2211 and COMP 1721; or permission of the Department.
Note: This course is cross listed as COMP 4631 and may therefore count as three credits in either discipline.

## MATH 4951 (3CR)

## SPECIAL TOPICS IN MATHEMATICS

This course enables students to pursue their interests in areas not covered by other classes offered at the 4000 level. It usually involves independent study in a programme planned by the student and approved by the Department.

## MODERN LANGUAGES AND LITERATURES

Courses offered by the Department of Modern Languages and Literatures include French, German, Japanese, Spanish and Linguistics. Linguistics, cinema, and some literature and civilization courses are offered in English. Students can also benefit from our exchange programs in France, Germany, Spain and Japan. The courses offered in each of these disciplines, as well as the Majors, Minors and Honours programmes available, are outlined under each discipline heading. An interdisciplinary Major in Modern Languages is also offered, as outlined below.
Students who plan to specialize in one or more languages by electing a Minor, Major, or Honours programme should declare their specialization to the Office of Student Services by the end of their first year of University studies. They should also visit the programme advisor in the Department of Modern Languages and Literatures before registering for second year, since most programmes require the advisor's approval of optional courses.

## MODERN LANGUAGES

## Interdisciplinary B.A. Programme

## MAJOR AREA OF STUDY in MODERN LANGUAGES is 60 credits earned as follows:

3 from Linguistics 2001
3 from Linguistics 3001, 3011 or Latin
36 twelve credits in each of French, German and Spanish, including at least 6 language credits at the 3000 level in each (the current offerings are French 3101, 3111, 3151, 3161, 4001, 4011, German 3000, Spanish 3101, 3111)
18 additional credits in language and literature, given in those same three languages and Linguistics. Linguistics 3001 is especially recommended. (Students entering at the elementary level will count their 1000 level courses in this group, while those entering with advanced standing will add courses at the 3000 level.)

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## FRENCH STUDIES

Mount Allison offers an extensive French Studies programme, within the Department of Modern Languages and Literatures, with a variety of language and literature courses which increase the students' awareness of the French and French-Canadian cultures while developing their ability to function in the second language. To this end, all courses (with the exception of FREN 1801) are taught in French.
The courses at first and second year levels provide the opportunity to establish a sound foundation in oral and written French. The study of grammar, at these levels, is reinforced by practice in the language laboratory. Several of the courses at the 3000 and 4000 levels are specifically intended to refine the students' command of spoken and written French, while the other courses deal with the various areas of French literature, French-Canadian literature and the theories of literary
criticism. A series of prizes and medals are awarded each year to students who distinguish themselves in French Studies.
The Department sponsors other programmes and activities which support and enrich the course programme:

- Le Cercle français
- Le Ciné-Club
- Guest speakers (Jean Bousquet Lecture Series)
- Tintamarre, a bilingual theatrical troupe
- La Maison française (a French-language residence)
- French programming, CHMA-FM Radio
- Study Abroad Programme at Université de Strasbourg, France
- Certificate of Bilingualism (see Section H under Degrees and Certificates)


## PLACEMENT IN FRENCH

Placement of students in their first French course will be decided on the basis of a French Language Skills Assessment given by the Department. All students who have not studied French at Mount Allison previously must complete this assessment before registering for a course in French. The Skills Assessment is available on-line at
[http://www.mta.ca/frenchplacement/](http://www.mta.ca/frenchplacement/). Alternatively, a paper copy may be obtained by mail or fax from the Secretary of the Department of Modern Languages and Literatures, (506) 364-2478 Students completing Majors, Minors, or Honours programmes in French should be aware that any exemptions from 1/2000 level courses obtained through the placement process must be replaced on their programmes by credits at the upper levels.

## Disciplinary B.A. Programmes

Important note for advanced students: Students who have completed FREN 2401 or who have been placed in FREN 2501 may enrol for FREN 2501 and 2601 concurrently.

## MINOR in French is 24 credits earned as follows:

6 French 1700, if required by placement;
9 French 2401, 2501, 2601
3 French 3101
6 from French language and/or literature at the 3/4000 level.
Note: French 1801 and 2201 may only be included in the requirements for a minor if French 1700 is not required by placement. If an exemption is granted from any of the language courses, replacement credits must be obtained in other French courses at the 3/4000 levels.

## MAJOR AREA OF STUDY in French is 60 credits earned as follows:

9 from French 2401, 2501, 2601 ( 3 courses)
15 from French language courses at the 3/4000 level ( 5 courses)
18 from French literature chosen from at least 2 centuries (series 3200 through 3600 ) and including 3 credits from the 3700 series and 3 credits from 3700 or 3800 series ( 6 courses)
18 from complementary courses in Arts \& Letters and/or Humanities, including French 1700, if required by placement, French 1801 and 2201

Note: All complementary courses must be chosen in consultation with the Programme Advisor.

## HONOURS in French is 66 credits earned as follows:

9 French 2401, 2501, 2601
15 from French language at $3 / 4000$ levels
18 from French 3200, 3300, 3400, 3500, 3600 series, including at least 3 credits in four of the five series
3 from French 3700 series
3 from the 3700 or 3800 series (other than 3801)
3 French 3801 (Critique Littéraire);
6 in French 4990 (Mémoire)
9 from French at the 3/4000 level and Linguistics, chosen in consultation with the Programme Advisor

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## FRENCH COURSES

## FREN 1100 (6CR)

## COMMUNICATING IN FRENCH I

(for Continuing and Distance Education Students Only) A study of fundamental structures and vocabulary, emphasizing the development of basic speaking, reading and writing skills. In addition to the three hours of class per week, students will be responsible for at least an hour of independent oral language study.

## FREN 1600 (6CR) <br> PREPARATORY FRENCH

Intended for those who have previous familiarity with basic French but need substantial reinforcement. Intensive study of the fundamental structures and vocabulary of French, with emphasis on speaking and writing correctly, using simple sentences and basic complex sentences. Practice in reading for comprehension. Three class periods per week, plus a fourth hour to be arranged after classes have begun. Instruction will be in French.
Prereq: Placement by the Department. A minimum standard of achievement on the Placement Test is required.

## FREN 1700 (6CR)

## INTERMEDIATE FRENCH

An intensive approach to the development of communication skills through the integration of grammar study, writing practice, and oral exercises. The study of written and oral language will be reinforced by analysis and discussion of readings. Three class periods per week, plus a fourth hour to be arranged after classes have begun. Instruction will be in French.
Prereq: FREN 1600, or placement by the Department.

## FREN 1801 (3CR) <br> ASPECTS OF MODERN FRENCH CULTURE

Presented in English, this course aims to acquaint students with some of the issues and debates that help us to understand French culture, its changing nature and its place in the modern world. Although some attention is paid to French history, politics and society, the primary goal of the course is to explore the multitude of voices that both define and divide modern France. There is no placement test requirement for this course.
Prereq: None. Reading knowledge of French is desirable but not essential.

FREN 2100 (6CR)

## COMMUNICATING IN FRENCH II

(for Continuing and Distance Education Students Only) An extensive study of grammar and idiomatic constructions, with emphasis on the development of vocabulary, speaking and writing. In addition to the three hours of class per week, students will be responsible for at least one hour of independent oral language study. Instruction will be in French.
Prereq: FREN 1100, or permission of the Department.

## FREN 2201 (3CR)

## LE CINÉMA DU MONDE FRANCOPHONE

A study of films and film makers of the French speaking world, ranging from screen adaptations of literary works to an exploration of cultural issues, and an introduction to film theory and aesthetics. This course is taught in French. Written work may be submitted in English.
Prereq: FREN 1700 or equivalent by placement.
FREN 2401 (3CR)
LANGUE ET LECTURES
This course requires that students already have a good command of the fundamental aspects of French in both its spoken and written forms. Its objectives are: (1) to enhance the expression of more complex thought through the study and practice of appropriate sentence structures, such as hypothetical statements, subordinate constructions and sentences requiring the subjunctive; (2) to improve skills in reading works of literature by examining themes, characters and techniques; (3) to practice oral expression. Students will read short fiction, poetry and a play, and there will be written exercises designed to integrate language practice and appreciation of literature. Three class periods per week, plus a fourth hour to be arranged after classes have begun.
Prereq: FREN 1700; or placement by the Department.

## FREN 2501 (3CR)

## INITIATION A LA COMPOSITION

This course provides an introduction to composition in French. It includes practice in writing letters and short narrative, descriptive and expository texts. It also provides practice in writing longer compositions, with emphasis on introduction, conclusion and organization of content. The study of model texts, both literary and non-literary, will familiarize students with grammatical structures and composition techniques in written French.
Prereq: FREN 2401 (FREN 2100 for Continuing and Distance Education Students); or placement by the Department.

## FREN 2601 (3CR)

## INITIATION A L'ANALYSE LITTÉRAIRE

This course continues the studies begun in French 2401 by further developing skills in reading and analysis. It provides an introduction to literary interpretation and various current approaches to literature. These approaches are applied to selected literary works from different periods and genres.
Prereq: FREN 2501 and 2601 may be taken concurrently, or permission of the Department

## FREN 3000 SERIES

Prereq: FREN 2501 for 3101 and 3151; FREN 2601 for literature courses (3201 through 3881); or permission of the Department.

## FREN 3101 (3CR)

LE FRANÇAIS ÉCRIT (AVANCÉ) I
Intensive review of French grammar with particular attention to features of special difficulty for anglophones. Practice in both grammatical structures and idiomatic usage.
Prereq: FREN 2501; or permission of the Department
FREN 3111 (3CR)
LE FRANÇAIS ÉCRIT (AVANCÉ) II
Writing practice and composition; the idiomatic use of French in a variety of contexts: informal prose, expository writing, technical language, literary language. Vocabulary and style exercises.
Prereq: FREN 3101; or permission of the Department
FREN 3151 (3CR)

## EXPRESSIVITÉ I

A course designed for students at the advanced level who have a serious desire to speak French with enhanced clarity, spontaneity and colour. A systematic study of phonological and prosodic features of French, both international and Canadian.
Prereq: FREN 2501; or permission of the Department

## FREN 3161 (3CR)

## EXPRESSIVITÉ II

The objectives are similar to those of Expressivité I, but special emphasis will be placed on the acquisition of specific and varied vocabularies, on the study of Canadian variants, and on a variety of exercises designed to help students speak French with greater confidence.
Prereq: FREN 3151; or permission of the Department

## FREN 3201 (3CR)

MOYEN-AGE ET RENAISSANCE: ÉPOPÉE, ROMAN ET POÉSIE
Selected works from the 11th to the 16th centuries representative of diverse narrative and lyrical traditions: epic poetry, novel, lyric poetry, fabliaux and satire. Works and authors studied may include, but are not limited to: La Chanson de Roland, Chrétien de Troyes, Marie de France, Rabelais, Marguerite de Navarre, François Villon, Louise Labé, Pierre Ronsard, and others.
Prereq: FREN 2601; or permission of the Department.

FREN 3271 (3CR)

## LES DÉBUTS DU THÉATRE EN FRANCE

Study of the origins of modern French theatre from the 12th to the 17th centuries including religious drama, miracle plays, mystery plays, farce, comedy and tragedy. Representative works and authors will be chosen from among: Le Jeu d'Adam, Adam de la Halle, Rutebeuf, La Farce de Maître Pathelin, La Farce du Cuvier, Gréban, Bèze, Garnier, Jodelle, Larivey, Corneille: L'Illusion comique.
Prereq: FREN 2601; or permission of the Department.
FREN 3321 (3CR)

## BAROQUE ET CLASSICISME

Selected works from the lyrical, humanists, moralist and prose fiction currents from the end of the 16th century through the 17th century. Authors studied may include Montaigne, Descartes, Pascal, Scarron, Mlle de Scudéry, Furetière, Mme de Lafayette, Mme de Sévigné, La Fontaine et La Bruyère.
Prereq: FREN 2601; or permission of the Department.
FREN 3371 (3CR)
LE THÉATRE CLASSIQUE
A study of comedy and tragedy in the seventeenth century concentrating on selected works of Molière, Corneille and Racine.
Prereq: FREN 2601; or permission of the Department.
FREN 3401 (3CR)

## LE ROMAN DU DIX-HUTIEME SIECLE

A study of the birth of the modern novel, drawing on the works of Lesage, Marivaux, Prévost, Montesquieu, Voltaire, Rousseau, Laclos, Sade, Diderot.
Prereq: FREN 2601; or permission of the Department.
FREN 3421 (3CR)
LES PHILOSOPHES
Study of the development of the philosophical movement in literature during the 18th century and concentrating on representative works of Montesquieu, Voltaire, Diderot, Rousseau and the Encyclopaedists.
Prereq: FREN 2601; or permission of the Department.

## FREN 3471 (3CR)

## LE THÉATRE DU DIX-HUITIEME SIECLE

A study of the principal developments in the theatre during the 18th century. Representative works of playwrights, from among: Voltaire, Marivaux, Beaumarchais, La Chaussée, Sedaine, Lesage, Diderot.
Prereq: FREN 2601; or permission of the Department.
FREN 3501 (3CR)

## LE ROMANTISME

Study of the Romantic movement during the first half of the 19th century in the novel, theatre and poetry. Representative authors and works from among: Chateaubriand, Stendhal, Balzac, Hugo, Lamartine, Vigny, Musset, Gautier.
Prereq: FREN 2601; or permission of the Department.

## FREN 3521 (3CR)

## LE RÉALISME ET LE NATURALISME

Study of the novel and short fiction during the second half of the 19th century. Representative authors and works from among: Flaubert, Zola, les frères Goncourt, de Maupassant and Daudet.
Prereq: FREN 2601; or permission of the Department.

## FREN 3551 (3CR)

## LA POÉSIE DE BAUDELAIRE A VALÉRY

The major currents in lyric poetry during the second half of the 19th century. Representative authors and works from among: Baudelaire, Nerval, Lautréamont, Verlaine, Rimbaud, Mallarmé, Moréas, Laforgue and Valéry.
Prereq: FREN 2601; or permission of the Department.

## FREN 3601 (3CR)

## LE ROMAN DE 1900 A 1945

Study of the major currents in the novel through the Second World War. Representative authors and works from among: Proust, Gide, Mauriac, Malraux, Saint Exupéry, Colette, Céline, Breton, and Leiris.
Prereq: FREN 2601; or permission of the Department.

## FREN 3611 (3CR)

LE ROMAN DE 1945 JUSQU'AU PRÉSENT
Study of the major currents in the novel since the Second World War. Representative authors and works from among: Sartre, Camus, Butor, Beckett, Sarraute, Robbe-Grillet, Tournier, Duras, and Ernaux.
Prereq: FREN 2601; or permission of the Department.

## FREN 3651 (3CR)

LA POÉSIE DU VINGTIEME SIECLE
Study of the major currents in lyric poetry of the 20th century.
Representative authors and works from among: Apollinaire, Breton, Char, Michaux, Prévert, St.-John Perse, Eluard, Ponge, Guillevic, Bonnefoy, Boucher, Dupin, Jaccottet, Supervielle.
Prereq: FREN 2601; or permission of the Department.

## FREN 3671 (3CR)

## LE THÉATRE DU VINGTIEME SIECLE

Study of the major currents of 20th century theatre. Representative authors and works from among: Anouilh, Arrabal, Camus, Genet, Grumberg, Ionesco, Jarry, Koltès, Schmitt, Tilly, and Vitrac.
Prereq: FREN 2601; or permission of the Department.

## FREN 3711 (3CR)

## ROMAN QUÉBECOIS

Study of the main currents in the novel of Québec. Representative authors and works from among: Roy, Lemelin, Thériault, Besette, Blais, Carrier, Godbout, Hébert, Aquin, and others.
Prereq: FREN 2601; or permission of the Department.

## FREN 3751 (3CR)

LA POÉSIE DU CANADA FRANÇAIS
Study of the main currents and works of poetry of French Canada in the 19th and 20th centuries. Representative poets and works from among: Nelligan, les poètes de l'Hexagone, Saint-Denys Garneau, Hébert, Miron, Giguère, Vigneault, and others.
Prereq: FREN 2601; or permission of the Department.

FREN 3771 (3CR)
THÉATRE DU CANADA FRANÇAIS
Study of the principal currents and works of the theatre of French Canada. Representative authors and works from among: Bouchard, Dubé, Garneau, Gélinas, Germain, Ducharme, Laberge, Tremblay and Maillet.
Prereq: FREN 2601; or permission of the Department.

## FREN 3801 (3CR)

## LA CRITIQUE LITTÉRAIRE FRANÇAISE

An introduction to the principal methods of modern and contemporary French literary criticism. The course includes representative approaches from among structuralism, feminism, hermeneutics, socio-marxism, and post-structuralism.
Prereq: FREN 2601; or permission of the Department.

## FREN 3821 (3CR)

L'ÉCRITURE AU FÉMININ: ÉCRIVAINES D'EXPRESSION FRANÇAISE
Study of literary works by women writers of French expression chosen from any time period(s) from the Middle Ages to the present. The focus, to be determined by the instructor, may be as narrow as works from
one geographical region written during a well defined and limited time frame or as broad as a comparative study of works from different time periods and different geographical areas. The approach and
methodology will be based on feminist theory and reflect feminist perspectives.
Prereq: FREN 2601; or permission of the Department.

## FREN 3831 (3CR)

## LITTÉRATURE DU MONDE FRANCOPHONE

Selected works from the French-speaking world outside Metropolitan France and Québec. The syllabus will be chosen by the instructor and may be comparative or focus on one or more geographic areas such as Acadia, other Canadian regions, the Caribbean, North Africa, Central and West Africa, Asia or French-speaking Europe.
Prereq: FREN 2601; or permission of the Department.
FREN 3881 (3CR)

## ÉCRIVAINS ET ÉCRITURES

A study of French writers who have written on the dialectic of writing and reading. Texts studied will be from different periods and may include theoretical treatises, as well as creative works (novels, poems, plays) which embody the development of the dialectic.
Prereq: FREN 2601; or permission of the Department.

## FREN 4001 (3CR)

STYLISTIQUE
An advanced study of written French, concentrating on the following: the peculiarities of French style, the nature of idiomatic expression and levels of language, "faux amis" and Canadianisms. Written exercises are required on a regular basis.
Prereq: FREN 3111; or permission of the Department.

## FREN 4011 (3CR)

TRADUCTION
The course includes detailed study and written exercises dealing with the following: comparative stylistics (French/English), technical problems of translation, literal translation, transposition and equivalence. Written exercises in both translation and composition are required.
Prereq: FREN 3111; or permission of the Department.
Exclusion: FREN 4001 (Stylistique II)

## FREN 4901 (3CR)

## SELECTED TOPICS

A seminar course available to students who have completed at least two courses in French literature at the 3000 level and at least in two period or theme series (e.g: series of courses whose numbers begin with 32 to 38)

Prereq: Permission of the Department.

## FREN 4990 (6CR) MÉMOIRE

(Honours Essay) The subject and programme of research will be established at the end of the student's third year, and submitted for approval to the Department. The essay must show evidence of scholarly investigation and will be written in French.
Prereq: Permission of the Department.

## GERMAN STUDIES

The German language is spoken by approximately 120 million people in Germany, Austria, Switzerland, Luxembourg and Liechtenstein, and by more than one million Canadians. German is one of the official languages of the United Nations and is the second most widely used foreign language in Europe.
German has a long tradition at Mount Allison University, having been taught here at least since 1870. Today, Mount Allison offers a small but comprehensive and rigorous programme in German Language, Literature and Culture within the Department of Modern Languages and Literatures. Students may select courses and programmes from beginners' language courses to various Minor, Major, or Honours combinations.
Students graduating with a minor or major in German will be prepared for several types of jobs, such as teaching, translating and interpreting, or careers in External Affairs and International Trade and various government agencies and NGOs, the news media, publishers, airlines, shipping companies and firms involved in international trade, to name a few. In many other professions, knowledge of German is an asset.

## LANGUAGE COURSES

The German language programme is designed to impart to the student a good working knowledge of German. Students will also gain insight into the culture and mode of life of the German-speaking countries. In addition, as experience shows, students of foreign languages generally show significant improvement in their primary language skills.

## LITERATURE COURSES

German literature is rich and varied. While the programme presents an overall picture of German literature, particular emphasis is placed on representative authors and movements. The language of instruction in all courses at the 3000 and 4000 levels is German.

## Programmes and Activities

The Department sponsors other programmes and activities which support and enrich the course programme:
Der Deutsche Klub, a student-run club which supplements the academic programmes.
Das Deutsche Haus, the German-language section of the Pavillon Bousquet, a tri-lingual residence.
Tübingen Exchange, between Mount Allison University and the Universität Tübingen which permits students to complete an academic year abroad.
Students are encouraged to participate in various programmes which allow them to spend some part of the year in Germany, on scholarships, working, or enrolled in a summer school, such as German Academic Exchange Service (DAAD) <http://www. DAAD.org/>, Work-Student-Programme, Canadian Summer School in Kassel/German. [http://web.uvic.ca/german/cssg/](http://web.uvic.ca/german/cssg/).

## Disciplinary B.A. Programmes

## MINOR in German is 24 credits earned as follows:

18 from German 1000, 2000, 3000
3 from German 3/4000 level literature courses
3 from German 2351, 2701 and German 3/4000 level literature courses, chosen in consultation with the Programme Advisor

## MAJOR AREA OF STUDY in German is 60 credits earned as follows:

18 from German 1000, 2000, 3000
3 from German 2351, 2701
21 from German 3/4000 level literature courses
18 credits from complementary courses in Arts and Letters and Humanities, chosen in consultation with the Programme Advisor

## HONOURS in German is 72 credits earned as follows:

42 credits as in the first three lines of the Major, plus:
12 from the second and fourth lines of the Major
18 from German 4030, 4950/4951, 4990, chosen in consultation with the Programme Advisor

Note: A major in Modern Languages (French, German and Spanish), is also available.
Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## SUMMER PROGRAMMES IN GERMANY

There is a possibility of taking summer courses for credit in Germany at the second, third and fourth year levels. Students interested should contact the Modern Languages and Literature Department before Christmas. Prereq: GERM 1000

## GERMAN COURSES

## GERM 1000 (6CR)

## ELEMENTARY GERMAN

An intensive course designed for students with no previous knowledge of German. Acquisition of basic proficiency in comprehension, speaking, reading, and writing. Three class periods and one period of oral practice in the language laboratory to be arranged after classes have begun.

## GERM 2000 (6CR)

INTERMEDIATE GERMAN
Review of grammar and syntax. Expansion of vocabulary to about 2000 words. Composition and conversation. Introduction to literary analysis. Three class periods, and one discussion/practice period to be arranged after classes have begun.
Prereq: GERM 1000; or permission of the Department. Students entering from high school with advanced credit should see the Department before enrolling.

## GERM/HIST 2351 (3CR)

GERMAN CULTURE AND SOCIETY FROM 1870 TO THE PRESENT Starting with the origins of the German 'Angst' and the founding of the German Empire during the Franco-Prussian War, this course will trace the political, economic, social, cultural and scientific developments in German-speaking countries through the Bismarck period, the era of Wilhelm II, the Weimar Republic, the Third Reich and the post-World War II period, ending with a vision of the "New Europe". Language of instruction: English 2351 and as such may count for credit in either German or History.
Note: This course is cross-listed as HIST 2351 and therefore count as three credits in either discipline.

GERM 2701 (3CR)
THE NEW GERMAN FILM: HISTORY, THEORY, AND PRACTICE. A REVIEW OF THE DEVELOPMENT OF GERMAN CINEMA AFTER WWII
After a brief history of German film making from its beginnings, and a discussion of the "grammar of film", the course follows the development of the New German Cinema after 1945, examining selected works against the social, economic, and political background. The course will be conducted as a lecture/seminar course, with screenings and discussions of relevant films (screen/video). Language of instruction: English.

## GERM 3000 (6CR)

## ADVANCED GERMAN

Advanced grammar and syntax, further expansion of the active vocabulary, introduction to stylistics. Frequent compositions and oral reports. Three class periods, and one discussion/practice period to be arranged after classes have begun.
Prereq: GERM 2000, or permission of the Department.

## GERM 3101 (3CR)

## ROMANTIC POETRY

This course will place its main emphasis on the genre of romantic poetry and poetics, including German Lieder, to show the close relationship between music and literature of the period. Also the continuation of Romantic concepts of poetry within the twentieth century will be examined. This course is also designed to develop students' reading and writing ability in German. Special emphasis will be placed on oral skills by frequent poetry reading.
Prereq: GERM 2000, or permission of the Department.
GERM 3111 (3CR)

## ROMANTIC PROSE

Representative works of the romantic period in German literature, including short stories, Märchen and dramas will be read. Wherever possible, contemporary works of other European literatures will be drawn on so that a definition of Romanticism in its European context will emerge. This course is also designed to develop students' reading and writing ability as well as aural and oral skills through frequent discussions.
Prereq: GERM 2000; or permission of the Department.

## GERM 3211 (3CR) <br> NINETEENTH CENTURY GERMAN LITERATURE

Representative works of "Biedermeier" and poetic realism will be examined as a reaction to earlier German idealistic literature and as a reflection of a more scientific, objective view of the world. The more radical realism of "Naturalismus" toward the end of the 19th century will be contrasted to the symbolistic movement, impressionism and neo-romanticism. This course will also expose students to various approaches to literary interpretations as well as develop their reading, aural and oral skills in German.
Prereq: GERM 2000; or permission of the Department.

## GERM 322 (3CR)

## EARLY TWENTIETH CENTURY GERMAN LITERATURE

This course traces German literature as a reflection of political, sociological, economic, and scientific developments from a period of optimism before World War I to the turbulent twenties, through years of oppression during the Third Reich to the immediate post-war period dominated by attempts to come to terms with Germany's war-time experiences. This course is also designed to develop the students' reading, aural, and oral skills in German.
Prereq: GERM 2000; or permission of the Department.

## GERM 3231 (3CR)

## MODERN GERMAN LITERATURE

Selected works of writers from German speaking countries will be read. These works will reflect on the partition of Germany after World War II into politically opposing camps, the economic miracle in West Germany with its social implications, and the continued pre-occupation of a united Germany with its fascist and communist past. This course is designed to develop the student's reading ability and aural and oral skills in German.
Prereq: GERM 2000; or permission of the Department.

## GERM 3301 (3CR) <br> ENLIGHTENMENT LITERATURE

A study of representative works of those authors who helped shape the period generally known as the German Enlightenment, the first age in German cultural history which recognized the instrumental role people can play in determining their own destiny in this world (cf. Kant's definition of "Aufklärung"). Authors to be studied include Brockes, Haller, Gellert, Lessing, and Wieland.
Prereq: GERM 2000; or permission of the Department.

## GERM 3311 (3CR)

## LITERATURE OF THE LATE 18TH CENTURY

It is the aim of this course to demonstrate the underlying unity in the varied patterns which constitute this period. Terms such as Empfindsamkeit and Sturm und Drang will all be shown to be contributing to, and be manifestations of, the complex nature of Enlightenment from which German Classicism, Romanticism and Realism emerge as resulting alternatives. Authors to be studied include Lenz, Herder and the young Goethe and Schiller.
Prereq: GERM 2000; or permission of the Department.

## GERM 4030 (6CR)

## GOETHE AND SCHILLER

A close reading of major works of Goethe and Schiller. The course traces the intellectual and literary development in Germany from the Storm and Stress period of the young Goethe to German Classicism which coincides with the friendship and interaction between Goethe and Schiller. In addition to several dramas by both authors, their major poems will be discussed. The last eight weeks or so will be devoted to a close study of Faust I and II. The course will be conducted as a seminar involving class discussion and lectures. Two essays and two examinations will be required.
Prereq: Six 3000 level German credits; or permission of the Department.

## GERM 4040 (6CR)

## SURVEY OF EARLY GERMAN LITERATURE

The development of German literature from the Middle Ages to the Age of Enlightenment will be traced through detailed analysis and discussion of selected works from each period. Texts chosen will be examined within their cultural and social context, as well as with regard to their relation to the other European Literatures. The ultimate aim of the course is the furthering of an understanding of the forces (cultural, social, economic) which helped create the Weimar Classicism of Goethe and Schiller. The course will be conducted as a seminar (two 75 -minutes periods per week). Two essays and two examinations will be required

## GERM 4950/4951 (6/3CR) SEMINAR

Detailed study of individual authors or literary themes. The content of the course must be approved by the Department and arrangements made during the preceding Spring.
Prereq: Six 3000 level German credits; or permission of the Department.

## GERM 4990 (6CR) <br> HONOURS ESSAY

The subject and program of research must be submitted to the Department for approval, normally at the end of the student's third year; and the candidate is to be directly responsible to a supervisor and the Department. The essay must be written in German.
Prereq: Six 3000 level German credits; or permission of the Department.

## HISPANIC STUDIES

Spanish is one of the most widely spoken languages of the western world and is an official language of the United Nations' Organization. Canada's interest in the Spanish-speaking world is reflected in organizations such as CIDA, CUSO, WUSC and the Canadian Association of Latin-American Studies.
Courses in Spanish, offered within the Department of Modern Languages and Literatures, offer the student a two-fold goal: the first, to learn to speak, understand, read and write this important language - particular attention is directed towards the students' achieving oral-aural proficiency, both in class and in the language laboratory; the second, to become familiar with the culture of the Hispanic world through study of its literary and artistic works. Prizes are offered by the Department for excellence in Spanish Studies.
The study of Spanish can be very important in preparing for a career in the diplomatic corps, various international agencies, teaching, translation, journalism, publishing, and commercial and cultural relations between Canada and Spanish-speaking countries.
The Department supports other programmes and activities which enrich the course programme. These include Club Hispanico, a film series, Casa Hispana (the Spanish-language section of the Pavillon Bousquet, a tri-lingual residence) and the possibilities of study in Spain, Central or South America. An exchange programme with the Universidad Autonoma de Madrid provides a special opportunity for advanced students.

## Disciplinary B.A. Programmes

## MINOR in Hispanic Studies is 24 credits earned as follows:

18 from Spanish 1100, 2100, 3101, 3111
6 either from Spanish 2001, 2011, 3001, 3011
or
from Spanish 3001, 3011, and literature courses in Spanish at the 3000 level, chosen in consultation with the Programme Advisor.

## MAJOR AREA OF STUDY in Hispanic Studies is 60 credits earned as follows:

18 from Spanish 1100, 2100, 3101, 3111
6 from Spanish 2001, 2011
18 from Spanish at the 3000 level, offered in Spanish
18 credits from complementary courses in Arts and Letters, History, Classics, Social Sciences, chosen in consultation with the Programme Advisor.

Note: A major in Modern Languages (French, German and Spanish), is also available.
Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.

Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## SPANISH COURSES

## SPAN 1100 (6CR)

## INTRODUCTORY SPANISH

Elements of grammar, pronunciation and practice, (including language laboratory), reading of prescribed texts. This is an intensive course designed for students who have no previous knowledge of Spanish. Three class periods per week, plus a fourth hour to be arranged after classes have begun.

## SPAN 2001 (3CR)

## INTRODUCTION TO SPAIN

A survey of the history, literature and art of Spain from the Middle Ages to the Twentieth Century. This course is taught in English and knowledge of Spanish is not a prerequisite.

## SPAN 2011 (3CR) <br> INTRODUCTION TO LATIN AMERICA

A survey of the literature of Latin America in the context of the cultural history of the continent. This course is taught in English and knowledge of Spanish is not a prerequisite.

## SPAN 2100 (6CR)

## INTERMEDIATE SPANISH

Intermediate grammar, oral practice, (including language laboratory), reading of prescribed texts. Introduction to Hispanic literature and civilization. This course is intended to consolidate and develop language skills acquired in first year Spanish. Three class periods per week, plus a fourth hour to be arranged after classes have begun.
Prereq: SPAN 1100; or permission of the Department.

## SPAN 3001 (3CR)

## SPANISH DRAMA

A survey of the dramatic literature of Spain, with a focus on theatre, ideology, and society. The texts, in English translation, will be representative of the works of a limited number of distinguished Spanish dramatists.
Prereq: None; course taught in English.

## SPAN 3011 (3CR) <br> LATIN AMERICAN DRAMA

A survey of dramatic works from Latin America, with a focus on theatre, ideology, and society. The texts, in English translation, will be representative of Latin American playwrights as well as Latino writers from the United States and Canada.
Prereq: None; course taught in English.

## SPAN 3101 (3CR)

## ADVANCED SPANISH I

This course includes intensive conversation, composition and translation. Applied grammar will be included, as will exposure to Hispanic cultures through audiovisual resources (film, print journalism and computer-based sources).Three class periods per week, plus a fourth hour to be arranged after classes have begun.
Prereq: SPAN 2100; or permission of the Department.

## SPAN 3111 (3CR)

## ADVANCED SPANISH II

A continuation of the Advanced Spanish Language course, primarily through literary texts from Spain and Latin America. This course includes intensive practice in writing, translation, and oral expression, and offers an Introduction to Hispanic Literatures that is a prerequisite (or, with permission from the Department, a co-requisite) for all Hispanic Studies courses numbered 3200 and higher.
Prereq: SPAN 3101; or permission of the Department.

## SPAN 3201 (3CR)

## MEDIEVAL SPANISH LITERATURE

A study of the rise and evolution of Spanish literature against its historical background through the reading and discussion of literary works of all types from the 11 th to the 15 th centuries. This course will be conducted in Spanish.
Prereq: SPAN 3101 and 3111; or permission of the Department.
SPAN 3211 (3CR)

## SPANISH LITERATURE OF THE GOLDEN AGE

A study of the literature of Spain of the 16th and 17th centuries. Particular attention will be given to poetry, theatre and the novel. This course will be conducted in Spanish.
Prereq: SPAN 3101 and 3111; or permission of the Department.

## SPAN 3221 (3CR)

## NINETEENTH-CENTURY SPANISH LITERATURE

A study of the poetry and theatre of the Romantic period and of the novel of the second half of the century. This course will be conducted in Spanish.
Prereq: SPAN 3101 and 3111; or permission of the Department.

## SPAN 3231 (3CR)

## TWENTIETH-CENTURY SPANISH LITERATURE

A study of selected poetry, novels and plays of this century beginning with the "Generacion de 1898". This course will be conducted in Spanish.
Prereq: SPAN 3101 and 3111; or permission of the Department.

## SPAN 3301 (3CR)

## SHORT PROSE OF LATIN AMERICA

A survey of the short story and the essay, concentrating primarily on the Twentieth Century. Readings from some of the principal essayists and short story writers. This course will be conducted in Spanish.
Prereq: SPAN 3101 and 3111; or permission of the Department.
SPAN 3311 (3CR)

## THE SPANISH-AMERICAN NOVEL

A study of 19th and 20th Century novels and of the principal themes and forms of the genre. This course will be conducted in Spanish.
Prereq: SPAN 3101 and 3111; or permission of the Department.
SPAN 3321 (3CR)
SPANISH-AMERICAN THEATRE
A survey of the theatre of Latin-America, through a study of key examples of its dramatic literature and historical trends. This course will be conducted in Spanish.
Prereq: SPAN 3101 and 3111; or permission of the Department.

SPAN 3331 (3CR)

## SPANISH-AMERICAN POETRY

A survey of the poetry of Latin-America, concentrating on the modern (20th Century) period. This course will be conducted in Spanish.
Prereq: SPAN 3101 and 3111; or permission of the Department.
SPAN 4800/4801 (6/3CR)
SPECIAL TOPICS IN HISPANIC LITERATURE AND LANGUAGE
This seminar course provides students with an opportunity to pursue in-depth study of a specific area of Hispanic Language or Literature.
Prereq: At least six credits in 3000 level Literature courses offered in Spanish; or permission of the Department.

## SPAN 4950/4951 (6/3CR)

## A PROGRAMME OF INDEPENDENT STUDY

Study of a well-defined subject carried out on a tutorial basis. The syllabus will be planned at the end of the student's third year in consultation with the professor directing the work.
Prereq: Permission of the Department.

## JAPANESE STUDIES

## Interdisciplinary B.A. Programme

## INTERDISCIPLINARY MINOR in Japanese Studies is 24 credits earned as follows:

12 from Japanese 1000, 2000
12 from Economics 1000(or 1001 and 1011), 3501, 3531, Geography 3321, History/Political Science 3731, History 2700, Religious Studies 3101, 3891

Note: Transfer credits earned at Kwansei Gakuin University may be applied in fulfilment of this program with permission of the Program Advisor and an Academic Dean. Exchange students who have earned 60 or more credits in Japanese Studies may apply for approval of a specially approved Interdisciplinary Major in Japanese Studies in accordance with Calendar Regulation 7.2.12.
Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## JAPANESE COURSES

## JAPA 1000 (6CR) <br> INTRODUCTORY JAPANESE

An introduction to the main elements of the modern Japanese language. Emphasis is placed on learning the hiragana and katakana systems of writing and the essentials of grammar. In addition students will begin to learn the kanji character form. An increasing emphasis will be placed on communication in spoken and written Japanese. Three hours of class and one hour of language laboratory per week. Intended for students with no prior background in Japanese.

## JAPA 2000 (6CR) <br> INTERMEDIATE JAPANESE

A continuation of Japanese 1000 with particular attention directed to communications skills in both writing and speaking. Three hours of class and one hour of language laboratory per week.
Prereq: JAPA 1000; or permission of the Department .

## LINGUISTICS

Like other inquiries which are central to human experience, language has long been the focus of intellectual examination. Speculation on the nature of language appears in the works of Plato, Aristotle and other Greek philosophers. Although a number of disciplines, from literary studies to computer science, share the study of language with linguistics, the focus of linguistics is the scientific study of language. Linguists are interested in how human language is organized in the human mind and in how the social structures of human communities shape language to their own purposes, reflecting themselves in language use.
Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## LINGUISTICS COURSES

LING 2001 (3CR)

## INTRODUCTION TO THE STUDY OF LANGUAGE

A general interest course intended to acquaint students in all fields with the structural, social and psychological forces that shape language, beginning with a consideration of the origins and nature of language and proceeding to an examination of languages as systems and the ways they structure meaning.
Prereq: None

## LING 3001 (3CR)

## FUNDAMENTALS OF GENERAL LINGUISTICS.

This course on the nature and structure of language examines the physiology of speech, word formation, theoretical concepts of sentence generation, and the phonological and historical forces involved in language creation and language change. It is recommended for senior students in language and literary studies, and students interested in language pathology.
Prereq: LING 2001 and a minimum of six credits in a language other than English; or permission of the Department.

## LING 3011 (3CR) <br> LANGUAGE AND SOCIETY

This course is an introduction to issues and methods in the field of sociolinguistics, the study of the interaction between language and the structure and functioning of society. It includes topics in language variation, the contact of languages and bilingualism, and issues in second-language acquisition.
Prereq: LING 2001 and a minimum of six credits in a language other than English; or permission of the Department.

## MUSIC

The study and performance of music has been a special feature of Mount Allison University since the first Certificate in Music was granted in 1874. At the present time, music offerings range from degree programs which prepare students for professional careers in music to elective courses designed especially for Arts, Commerce, Fine Arts, or Science students. The Department's splendid facilities and versatile faculty enable Mount Allison to provide a thoroughly professional experience within a small, residential, liberal arts university.
The Department of Music offers programs leading to the Bachelor of Music and Bachelor of Arts, (Major or Honours in Music) degrees.
Each program is designed to develop well-rounded musicians as well as to provide students with a sound basis in the liberal arts. A Minor in Music is available to students in any program at Mount Allison. The various curricula conform to the Guidelines adopted by the Canadian University Music Society. A wide variety of courses are offered in the following areas: Theory and Composition, Music History and Literature, Music Education, Applied Studies, and Performance Electives.
The Department of Music also offers courses and ensembles as electives for students outside the Bachelor of Music and B.A. (Honours, Major, or Minor) in Music programs. Music 2000 is a basic course in the study and appreciation of Music which is designed especially for non-Music students. Music 1001 is available to non-music students without prerequisite. Enrolment in Music 1101 is determined by a Placement Test. Other courses are open with Departmental permission and/or upon completion of the necessary prerequisite(s).
Note: For information concerning the Bachelor of Music Degree Requirements, see Section 7.6 - Music.
For a full description of the Marjorie Young Bell Conservatory of Music and its fine facilities, see Section 1 - Introduction (The Campus) Marjorie Young Bell Conservatory of Music.

## Disciplinary B.A. Programmes

## BACHELOR OF ARTS WITH MAJOR IN MUSIC

This programme emphasizes the historical and theoretical aspects of the art of music. It is designed for the student who wishes a Major in music along with more Arts and Science courses than the Bachelor of Music programme allows.
Although no practical courses in Music are essential in this programme, it is highly desirable that the student have acquired some proficiency on an instrument or in voice prior to enrolling. Although this programme is not designed with a particular professional goal, it may lead to a career in music librarianship, music journalism, music therapy, music production in television and radio, music publishing, instrument manufacturing, or graduate work in musicology.

## B.A. MAJOR in Music is $\mathbf{6 0}$ credits earned as follows:

6 from 1101 and 1111
24 from 2101, 2111, 1201, 1211, 2201, 2211, 3241, 3251
3 from 1629-4629, 1639-4639, 1659-4659, 1669-4669, 2679-4679
9 from $3221^{*}, 3231^{*}, 4221^{*}, 4181,4191,3303,3411,3423,4951$, 1500. Students must audition for entry to Music 1500.

18 elective credits chosen in consultation with the Department.

[^1]
## B.A. MINOR in Music is 24 credits earned as follows:

6 from 1101 and 1111
6 from 1201, 1211
6 from 2201 and 2211 or 2101 and 2111
6 from $3221^{*}, 3231^{*}, 3303,3413,2141,2151,3141,3151,3161$, 3171, 3241, 3251, 3423, 4951

* May be repeated if topic differs


## B.A. HONOURS in Music is 57 credits earned as follows:

6 from 1101 and 1111
24 from 1201, 1211, 2101, 2111, 2201, 2211, 3241, 3251
3 from 1629-4629, 1639-4639, 1659-4659, 1669-4669, 2679-4679
12 from $3221^{*}, 3231^{*}, 4221^{*}, 4181,4191,3303,3413,3423,4951$, up to 3 credits from Music Ensembles.
12 from Music electives chosen in consultation with the Department of Music, including Applied Music 1500 and 2500. Students must audition for entry to Music 1500.

* May be repeated if topic differs

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## THEORY AND COMPOSITION

Placement of students in Music 1101 and 1111 will be determined by the Department on the basis of a placement test given as part of the audition process, and during orientation week. Music 1001 and 1011 may not be used to fulfill the requirements for the Bachelor of Music degree, or the Honours, Major or Minor in Music.

## MUSC 1001 (3CR) <br> FUNDAMENTALS OF MUSIC I

An introduction to fundamental concepts of music theory, including notation and technical terminology, as well as to listening, singing, and keyboard skills.

## Prereq: None

MUSC 1011 (3CR)
FUNDAMENTALS OF MUSIC II
A continuation of Music 1001 in Term II.
Prereq: MUSC 1001
MUSC 1101 (3CR)

## MATERIALS OF MUSIC I

A study of the harmonic, melodic, rhythmic and structural materials of music through analysis, writing, sight-singing, and listening, including: harmonic rhythm, structural and non-structural dissonance; cadence formulae, diatonic triads and seventh chords in all positions; elementary modulation; secondary dominant and leading-tone triads and seventh cords; various types of melodies; basic structural units; simple part forms.
Prereq: MUSC 1011; or Placement Test in Music Theory.

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MUSC 1111 (3CR)
MATERIALS OF MUSIC II
A continuation of Music 1101 in Term II.
Prereq: MUSC 1101
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## MUSC 2101 (3CR)

MATERIALS OF MUSIC III
A review and continuation of Music 1111 or 1131. Includes: advanced part-writing techniques; chromaticism; advanced modulation; borrowed and altered chords (Neapolitan and augmented sixth chords); traditional formal structures: binary, ternary, theme and variations, rondo, sonata-allegro, sonata-rondo; survey of contrapuntal genres and techniques.
Prereq: MUSC 1111 or 1131; or permission of the Department.

## MUSC 2111 (3CR)

MATERIALS OF MUSIC IV
A continuation of Music 2101 in Term II.
Prereq: MUSC 2101; or permission of the Department.

## MUSC 3241 (3CR)

## TWENTIETH CENTURY MUSIC I

A survey of western art music from the turn of the century to the beginning of World War II. The course will focus on the study of representative works of music. The approach will be both historical, placing the works in their cultural contexts, and analytical, examining the structural and expressive bases of the works.
Prereq: MUSC 2111, 2211; or permission of the Department.

## MUSC 3251 (3CR) <br> TWENTIETH CENTURY MUSIC II

A survey of western art music from the beginning of World War II to the present. The course will focus on the study of representative works of music, with the approach again being both historical and analytical. Prereq: MUSC 3241; or permission of the Department.

## MUSC 3121 (3CR)

ORCHESTRATION I
A course in the use of the instruments of the modern symphony orchestra and the relationship between medium and style. Scoring for groups of instruments and for full orchestra. Score analysis. Preparation of parts for performance.
Prereq: MUSC 2111; or permission of the Department.
MUSC 3131 (3CR)
ORCHESTRATION II
A continuation of Music 3121 in Term II.
Prereq: MUSC 3121; or permission of the Department.
Coreq: MUSC 3111; or permission of the Department.

MUSC 2141 (3CR)

## ELEMENTARY COMPOSITION I

Work in the small forms using traditional concepts, techniques and idioms. An attempt will be made to develop an approach to composition that will serve the student in whatever style or medium is chosen. The initial emphasis will be placed on developing an awareness of the factors that come into play in musical composition, as well as on recognizing and being able to produce strong musical material. The focus shifts gradually to cohesion, the development of materials and the handling of contrast.
Prereq: MUSC 1111; or permission of the Department.
MUSC 2151 (3CR)

## ELEMENTARY COMPOSITION II

A continuation of Music 2141 in Term II.
Prereq: MUSC 1111; or permission of the Department.
MUSC 3141 (3CR)
INTERMEDIATE COMPOSITION I
A continuation of Music 2151 with work in both small and large forms, using concepts, techniques and idioms of 20th century art music.
Prereq: MUSC 2151; or permission of the Department.
MUSC 3151 (3CR)
INTERMEDIATE COMPOSITION II
A continuation of Music 3141 in Term II.
Prereq: MUSC 3141; or permission of the Department.
MUSC 4141 (3CR)
ADVANCED COMPOSITION I
A continuation of Music 3151 with adding emphasis on the development of an individual style.
Prereq: MUSC 3151; or permission of the Department.
MUSC 4151 (3CR)

## ADVANCED COMPOSITION II

A continuation of Music 4141 in the Term II.
Prereq: MUSC 4141; or permission of the Department.
MUSC 3161 (3CR)
INTRODUCTION TO ARRANGING I
A survey of the tools and techniques indispensable to the successful arranger through the study of various types and styles of arrangements. Although the major focus of the course will be on choral arranging, students will be introduced to the fundamentals of instrumental arranging as well.
Prereq: MUSC 2111; or permission of the Department
MUSC 3171 (3CR)
INTRODUCTION TO ARRANGING II
A continuation of Music 3161 in Term II.
Prereq: MUSC 3161; or permission of the Department.

## MUSC 4181 (3CR) <br> ANALYTICAL TECHNIQUES I

Development of skills in the analysis of music through examination of scores drawn from a wide range of periods, styles and media.
Introduction and application of various theories of coherence and unity (Schenker, Hindemith, Messiaen, et al.).
Prereq: MUSC 2111; or permission of the Department.

## MUSC 4191 (3CR)

## ANALYTICAL TECHNIQUES II

A continuation of Music 4181 in Term II.
Prereq: MUSC 4181; or permission of the Department.

## MUSIC HISTORY AND LITERATURE

## MUSC 1201 (3CR) <br> MUSIC HISTORY AND LITERATURE I

This is the first course in a series designed to introduce students to the history and literature of music in the Western World. The first part of the course will provide an overview of the various style eras and genres. This will be followed by a survey of music from the Medieval and Renaissance eras. Changing concepts, styles, forms and media are considered and compared through readings, score study, recordings, library research, and classroom performance.
Prereq: Registration in the first year of the B.Mus. or B.A. (Major or
Honours in Music), Minor in Music; or permission of the Department.
Coreq: MUSC 1101
MUSC 1211 (3CR)
MUSIC HISTORY AND LITERATURE II
A survey of music history and literature of the Baroque period.
Prereq: MUSC 1201; or permission of the Department.
Coreq: MUSC 1111

## MUSC 2001 (3CR)

INTRODUCTION TO MUSIC
This course will include an introduction to the basic elements of music. The development of listening skills and an understanding of these elements will be fostered through an examination of various styles which will include world music and/or contemporary popular music.
Exclusion: MUSC 2000

## MUSC 2011 (3CR)

## Survey of Western Music

In this course, form and style will be interrelated with historical considerations in a chronological approach to the history of western music. Live performances will be included whenever possible.
Exclusion: MUSC 2000
MUSC 2201 (3CR)

## MUSIC HISTORY AND LITERATURE III

A survey of music history and literature of the Pre-Classical and Classical periods through Beethoven.
Prereq: MUSC 1211; or permission of the Department.
Coreq: MUSC 2101

MUSC 2211 (3CR)
MUSIC HISTORY AND LITERATURE IV
A survey of music history and literature of the Romantic period, extending from Beethoven's contemporaries through the nineteenth century.
Prereq: MUSC 2201; or permission of the Department.
Coreq: MUSC 2111
MUSC 3001 (3CR)

## INTRODUCTION TO MUSIC IN CANADA

This course is a survey of the history of music in Canada from the beginning of the seventeenth century to the present. Reference will be made to the folk music of indigenous and immigrant groups. Some attention will be given to the development of listening skills and understanding of the elements of music related to the course. Historical and social consideration alongside a chronological approach to Canadian music history will form the basis of the course.
Prereq: Enrolment in the B.Mus. or B.A. (Major or Honours in Music); or permission of the Department.
Exclusion: MUSC 3000
MUSC 3221 (3CR)

## SELECTED COMPOSER(S) STUDY I/II

The study of specific works by a selected composer or group of closely related composers. The choice of composer(s) will be announced in the spring, prior to pre-registration. The works selected will be examined from both an analytical and a historical perspective.
Prereq: MUSC 2211; or permission of the Department.

## MUSC 3231 (3CR)

## SELECTED GENRE STUDY I/II

The study of works from a selected genre of music. The choice of genre will be announced in the previous spring, prior to pre-registration. The range of choices will include such genres as symphonies, string quartets, art song, oratorio, opera, piano music, chamber music, jazz, or such
other genres as are deemed appropriate by the Department. The music
will be studied from both an analytical and historical perspective.
Prereq: MUSC 2211; or permission of the Department.

## MUSC 4221 (3CR)

## SEMINAR IN MUSIC HISTORY I/II

A senior seminar on the formulation of critical concepts as they relate to specific styles and works, including questions of analytical systems, the formation of values, reception theory, aesthetics, and allied matters. Emphasis will be placed on the development of research, bibliographical, and writing skills, as well as on the presentation of oral reports. This course is especially useful for students contemplating graduate studies in Musicology.
Prereq: MUSC 3221; or permission of the Department.
Note: Students may register for MUSC 3221, 3231, and/or 4221 more than once, provided the subject matter differs.

## MUSIC EDUCATION

Note: Music 3303, 3311, 4311, and 4363, are open to B. Mus. and B.A. (Honours or Major in Music) students; other students by permission of the Department, contingent on the student's musical background and completion of the necessary prerequisite(s). Registration in other instrumental methods courses is also subject to the availability of
musical instruments. Students should consult the timetable carefully regarding the semester(s) in which these courses are offered.

## MUSC 3303 (3CR) <br> VOCAL METHODS

This is a practical course designed to acquaint the student with the skills required for good singing. The basic physiology, acoustics and co-ordination of singing will be studied in a class situation. The emphasis will be on vocal production and expression and will include solo singing of standard repertoire, with critical analysis by the class of vocal technique and style. The application of vocal principles to choral singing will also be considered.

## MUSC 3311 (3CR)

## ELEMENTARY METHODS

This course is designed to introduce students to the topic of music and young children, and to acquaint them with current philosophies and methodologies with an emphasis upon those of Zoltan Kodály and Carl Orff. It is designed for any music students who are interested in the topic of music and young children and is not limited to those students planning to teach in the public schools.
Prereq: MUSC 2111; or permission of the Department.

## MUSC 3323 (3CR) BRASS METHODS

A practical course designed to acquaint the student with the basic skills necessary for the playing and teaching of the instruments of the brass family. Concentration is on basic embouchure formation, posture, hand position, fingering or slide position, proper breathing, and methodology.

## MUSC 3333 (3CR)

## WOODWIND METHODS

A practical course designed to acquaint the student with the basic skills necessary for the playing and teaching of the instruments of the woodwind family. Concentration is on basic embouchure formation, posture, fingering, proper breathing, and methodology.

## MUSC 3343 (3CR)

## STRING METHODS I

A practical course designed to acquaint the student with the basic skills necessary for the playing and teaching of the instruments of the bowed string family. Instrumental assignment is made by the instructor, and the student plays one instrument (violin, viola, cello, or bass) for the duration of the course. Concentration is on basic techniques of posture, position, bowing and left-hand finger patterns.

## MUSC 4311 (3CR)

## SECONDARY METHODS

This course, which is a continuation of Music 3311, covers several aspects of music instruction at the secondary level including choral, instrumental, and general music programs. An introduction to the use of technology in music programs and classroom harmony instruments will also be included.
Prereq: MUSC 3311; or permission of the Department.

## MUSC 4353 (3CR) <br> PERCUSSION METHODS

A practical course designed to acquaint the student with the basic skills necessary for the playing and teaching of the instruments of the percussion family. Initial concentration is on rudiment and advanced drumming techniques, followed by basic instruction on tympani and mallet instruments, and percussion instruments of indefinite pitch.

## MUSC 4363 (3CR) KEYBOARD METHODS

This course is designed to acquaint the student with the essential principles of creative keyboard teaching in an individual or group situation. The historical development of keyboard playing will be examined along with the special problems confronting the teacher of today. A survey of teaching material will include the comparison and evaluation of approaches for children and older beginners.
Prereq: MUSC 3500 or MUSC 2500 and enrolment in MUSC 3500; or permission of the Department.

## APPLIED STUDIES

MUSC 1500/2500/3500/4500/4501 (6/3 CR) CHIEF PRACTICAL I, II, III, IV
Applied courses involve individual weekly instruction in vocal and instrumental music, and facilitate technical command, interpretive insight, and understanding of pedagogical procedures. These courses stress the development of the ability to perform with competence and musical understanding while providing a comprehensive background of music of various periods, styles and composers, thus allowing students to interpret representative works of the past and present.
Prereq: For 1500: audition; for advanced levels: successful completion of the preceding course in the sequence.

## MUSC 4590/4593 (6/3 CR) RECITAL

Preparation and execution of a public recital programme ( 30 minutes for 4591 or 60 for 4590 ) under the supervision of the student's principal teacher. The programme must be planned at the end of the student's third year in consultation with the teacher, and it must be submitted to the department for approval.
Prereq: Students enrolling in 4590 must attain at least A- in MUSC 3500, and must have participated in at least one half-recital. Students enrolling in 4593 must attain at least A- in MUSC 3500, and must have participated in at least two collegia concerts (or the equivalent) since enrolling in the B.Mus. programme. Students enrolling in 4590 or 4593 must have completed MUSC 2111 and 2211.

## MUSC 4600 (6CR) <br> ACCOMPANIMENT

This course is designed to allow fourth year keyboard majors to concentrate on accompaniment in lieu of the Chief Practical, 4500. The student will be expected to accompany a full recital, or two half recitals, or the equivalent thereof in the accompaniment of several individuals or a major ensemble or ensembles. Permission to enroll will be granted and instruction will be given by the Chief Practical instructor.
Prereq: MUSC 3603; or permission of the Department.

## PERFORMANCE ELECTIVES

Students should note that most of these electives are 3 credit courses which run through both terms. For complete information please consult the timetable.

## MUSC 2521 (3CR) <br> DICTION FOR SINGERS

This course will acquaint students with the symbols and sounds of the International Phonetic Alphabet and with the application of the IPA to the English, French, German, Italian, Latin and Spanish languages. The differences between spoken and sung language will be explored and the physical processes required to produce the various sounds will be investigated and practised.

## MUSC 2603 (3CR)

## ACCOMPANIMENT I

This course will assist students in acquiring the basic knowledge and skills necessary for providing an artistic accompaniment. Students will examine different styles of music including Art Song, Lieder and Oratorio, as well as accompaniments for instrumental works and orchestral reductions.
Prereq: MUSC 1500; permission of the Department.

## MUSC 3603/4603 (3CR)

## ACCOMPANIMENT II/III

These courses provide piano and organ students in the Bachelor of Music programme with practical experience in the accompaniment of half-recitals with student vocalists and instrumentalists. Students will be assigned by the Department. Repertoire for the half-recital and a recital date will be set at the end of the student's second or third year of study prior to the next academic year.
Prereq: For 3603: MUSC 2603; for 4603: MUSC 3603

## MUSC 2613 (3CR) <br> CHAMBER MUSIC I

These courses (taken in sequence) are designed to give students practical experience in the art of chamber music performance. Students will be assigned to instructors and repertoire ( 30 minutes minimum) will be chosen and approved in the Spring prior to the beginning of the next academic year. There will be two public performances by each chamber group.
Prereq: MUSC 2613 open to 2nd, 3rd, and 4th year music students in their major instrument with the permission of the applied music instructor, the course instructor, and the coordinator; others by permission of the Department.

MUSC 3613 (3CR)
CHAMBER MUSIC II
Prereq: MUSC 2613; or permission of the Department
MUSC 4613 (3CR)
CHAMBER MUSIC III
Prereq: MUSC 3613; or permission of the Department

MUSC 3413 (3CR)

## CHORAL CONDUCTING

A practical course designed to train the student in the fundamentals of conducting. Students will help each other by acting as an ensemble for student conductors.
Prereq: MUSC 2111; or permission of the Department
Coreq: MUSC 3303
MUSC 3423 (3CR)

## INSTRUMENTAL CONDUCTING

A practical course designed to train musicians in fundamentals of Instrumental conducting.
Prereq: MUSC 2111; or permission of the Department
MUSC 4951 (3CR)

## SPECIAL TOPICS IN MUSIC

This course allows students the opportunity to pursue a topic of special interest not covered in other Department of Music courses, or a topic not covered in depth by the course offered.
Prereq: Completion of the core Music courses in the area of the Special Topics elective; or permission of the Department.

THE FOLLOWING ARE ONE CREDIT ENSEMBLES:
MUSC 1629-4629 CHAMBER ORCHESTRA
MUSC 1639-4639 SYMPHONIC BAND
MUSC 1649-4649 INSTRUMENTAL JAZZ ENSEMBLE
MUSC 1659-4659 CHAMBER CHOIR
MUSC 1669-4669 CHORAL SOCIETY
MUSC 1689-4689 LARGE ENSEMBLE OF LIKE INSTRUMENTS
(BRASS CHOIR)
MUSC 1699-4699 VOCAL JAZZ ENSEMBLE
MUSC 2679-4679 OPERA WORKSHOP
Prereq: Permission of the Department.

## RECITAL AND CONCERTS

Performances by students, faculty, and guest artists form an important part of the musical life of Mount Allison. The University Performing Arts Series brings to the campus top performers of international rank. Various music faculty ensembles provide an "in residence" group of performers. Frequent student recitals and Collegia Musica provide further enrichment as well as opportunities for students to gain valuable listening and performance experience.

## PRACTICE FACILITIES

Practice facilities are available in the Department of Music for non-music majors from 5 p.m. to 6:30 p.m. daily. Other times are reserved for students registered in Applied Studies courses: Chief Practical, Recital, Accompaniment and Chamber Music.

## PHILOSOPHY

Philosophy is the endeavour to understand the basic questions that arise for us in our world, and to formulate this understanding in a critical manner. Traditionally, these questions have touched upon what can be known, what can be valued, what our own position is socially and individually- above all, how we can know what we think we know.
The Department believes that careful study of the great works of the past and present provides the best access to philosophical questions. Thus many of our courses concentrate the student on developments in the history of philosophy, from the sixth century B.C. to the twentieth century. Courses in logic, ethics, metaphysics, philosophy of science and the philosophy of mind examine special issues in these developments and are compared to the formulation of these same issues in Asian philosophy.
The study of philosophy invites critical and imaginative consideration of the questions themselves.
Only thereby can the student learn to appreciate their force, and the variety of responses to them. Since philosophical questions are deeply imbedded in the development of western civilization, one can study philosophy in conjunction with a wide range of other disciplines. Moreover, our students have found it a useful background for subsequent endeavours in fields such as law, civil service, medicine, theology, and further graduate study.

## Disciplinary B.A. Programmes

## MINOR in Philosophy is 24 credits, earned as follows:

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6 from the Humanities }1600\mathrm{ Series
6 to 12 from Philosophy at the 2000 level
6 to 12 from Philosophy at the 3/4000 level, chosen in consultation
with the Programme Advisor
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## MAJOR AREA OF STUDY in Philosophy is 60 credits earned as follows:

6 from the Humanities 1600 Series
6 to 12 from Philosophy at the 2000 level
24 to 30 from Philosophy at the $3 / 4000$ level, including 6 from the 4000 level
18 credits from complementary courses in Arts and Letters and Humanities, chosen in consultation with the Programme Advisor

## HONOURS in Philosophy is 66 credits earned as follows:

42 credits as in the first three lines of the Major, plus:
6 from Philosophy 4990
18 from Philosophy at the $3 / 4000$ level, chosen in consultation with the Programme Advisor.

## BASIC COURSES

The Humanities 1600 -series is intended to provide an introduction to Humanities disciplines. These three-credit courses offered by the participating disciplines of Classics, History, Philosophy and Religious Studies are designed to acquaint beginning students with the methodologies typical of these disciplines and to familiarize them with
the approaches taken, as well as the sorts of themes pursued and questions raised in these disciplines.

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## PHIL 1601 (3CR)

PLATO'S REPUBLIC
A study of Plato's The Republic can serve as an introduction to almost all the issues that are central to our western philosophical tradition. The problems of virtue (temperance, courage, wisdom), justice, order (social, political and cosmological), knowledge, the nature of the psyche, beauty, and of reality in general will all arise in the study of this text, providing a good basis for discussion.

## PHIL 1611 (3CR)

## SELF, SOCIETY AND FREEDOM

This course will examine various accounts given of 'the self' in the history of ideas. What values can be accorded to human beings are dependent upon our accounts of the nature of the self, especially in relations: social, political, intellectual, emotional. The main theme to be explored will revolve around the issue of whether freedom is anything more than an illusion formulated to control the population.

## PHIL 1651 (3CR)

## THE CHANGING IMAGE OF NATURE

Our intellectual heritage is laced with shifting and conflicting attitudes towards "Nature" which impact everything from how we can come to know about nature, scientifically, to ethical implications for how human beings relate to other natural beings. This course will use readings from the history of western philosophy, especially from the early modern era, to assess the extent to which we have inherited these convictions or developed alternatives to them. space added here

## PHIL 2511 (3CR)

## INTRODUCTORY PHILOSOPHY OF SCIENCE

Successful science claims to give us knowledge of what exists in the universe, and it claims to explain why what happens in a given localized system happens. The italicized words in the last sentence indicate philosophical assumptions within science which this course will explore. Based on historical cases, philosophical interpretations will be compared from logical positivism to Kuhnian paradigms, and the most recent critiques from social constructivism and feminism.
Prereq: Three credits from Humanities 1600 Series; or permission of the Department.

PHIL 2611 (3CR)

## INTRODUCTORY LOGIC I

A study of and exercise in the elementary forms of focussed thinking. Specific topics include the nature of categorical formulation, the techniques for distinguishing valid from invalid reasoning (deductive inference), and the principles violated in typical varieties of fallacious reasoning.
Prereq: Three credits from Humanities 1600 Series; or permission of Department.

PHIL 2621 (3CR)
INTRODUCTORY LOGIC II
A study of and exercise in more advanced forms of focused thinking. Specific topics include the Greek understanding of the basis and goal of learning (inductive inference) and the modern logical reinterpretation of deductive, inductive, and fallacious reasoning.
Prereq: PHIL 2611; or permission of the Department.

## PHIL 2701 (3CR)

## INTRODUCTORY ETHICS

An introduction to the history and philosophical problems of ethics in the western tradition. This will acquaint the student with a number of received traditions based on metaphysical, religious, rational, and pragmatic grounds, as well as introduce certain fundamental perennial problems of moral decision-making.
Prereq: Three credits from Humanities 1600 Series; or permission of the Department

## PHIL 2801 (3CR)

## INTRODUCTION TO METAPHYSICS

An introduction to the study of metaphysics understood broadly as the study of the fundamental nature of reality. This will include the study of various themes including the nature of substance, divinity, causation, appearance and reality, the one and the many, mind and matter, as they appear in the discussions of the world's great philosophers from Lao Tzu to Shankara, and from Aristotle to Bertrand Russell.
Prereq: Three credits from Humanities 1600 Series; or permission of the Department.

## PHIL 3000 (6CR)

## ANCIENT PHILOSOPHY

The issues which develop before and with Plato establish the framework for all subsequent philosophic reflection. This course will examine some of these issues as they appeared prior to Plato and will employ these "pre-Socratics" as an entry into Plato's philosophy. Subsequently, aspects of Aristotle's thought will be explored as alternatives to and developments of Plato's philosophy.
Prereq: Three credits from 2000-level Philosophy; or permission of the Department.

## PHIL 3221 (3CR)

## MODERN PHILOSOPHY: THE RATIONALIST TRADITION

An investigation of the leading seventeenth century continental thinkers who formulated the great a priori systems. The capacity and function of human reason fully to understand the world is a theme common to these thinkers, and constitutes one of the major concerns of the course, a concern balanced by investigation of why these systems have reached such diverse answers to the substantive issues of how the world is to be understood.
Prereq: Three credits from 2000-level Philosophy; or permission of the Department.

PHIL 3231 (3CR)

## MODERN PHILOSOPHY: THE EMPIRICIST TRADITION

An investigation of the thought of the English language thinkers of the seventeenth and eighteenth centuries. These authors, among whom are to be counted Locke, Berkeley and Hume, in part may be understood as reacting to the a priori tradition examined by Philosophy 3111. But they also make claims that are not merely reactive, and the extent to which one or more of them proposes a coherent interpretation of the extent and the limitations of human understanding will be investigated. Prereq: Three credits from 2000-level Philosophy; or permission of the Department.

PHIL 3331 (3CR)
MODERN SOCIAL AND POLITICAL PHILOSOPHY
An investigation of the early foundations of modern political liberalism with a special concentration on the concepts of the state of nature, autonomy, and social contract. Authors considered will include: Machiavelli, Hobbes, Hume, Spinoza, Locke, Mill and Rousseau.
Prereq: Three credits from 2000-level Philosophy; or permission of the Department.

## PHIL 3421 (3CR)

## NINETEENTH CENTURY AMERICAN PHILOSOPHY

A study of the principles of the American spirit as early formulated in the works of such authors as Thomas Paine and Thomas Jefferson, Benjamin Franklin and Walt Whitman, H.D. Thoreau and R.W.
Emerson. Central to the American spirit is the concern for individuality and practicality.
Prereq: Three credits from 2000 level Philosophy; or permission of the Department.

## PHIL 3451 (3CR)

## TWENTIETH CENTURY AMERICAN PHILOSOPHY

A study of selected American thinkers from Henry Adams to the present, including William Faulkner and John Dewey.
Prereq: Three credits from 2000-level Philosophy; or permission of the Department.

## PHIL 3511 (3CR)

## PHILOSOPHY OF THE LIFE SCIENCES

In recent decades the philosophical assumptions underlying the life sciences have been seen increasingly as distinct from the physical sciences. This course will examine this difference as well as the linkage between them, then turn to the philosophical issues within evolutionary theory, the notion of species and problems of classification, persistent controversies surrounding sociobiology, genetic control, use of animals in research, and the application of bioethics.
Prereq: Normally Philosophy 2511 is expected. However B.Sc. students already doing 3/4000-level work in their own field, and students in either the Environmental Science or Environmental Studies programs, will be admitted; or permission of the Department.

PHIL 3631 (3CR)

## SYMBOLIC LOGIC I

This is a basic course in Symbolic Logic, concentrating on the nature of logic, methods of deduction, quantification theory, and the logic of relational statements.
Prereq: Three credits from 2000-level Philosophy; or permission of the Department.

PHIL 3641 (3CR)
SYMBOLIC LOGIC II
Building upon the work of Philosophy 3631, this course considers axiomatic systems (mainly Russell's), metalogical induction (regarding consistency, completeness, independence, and the like), axiomatic set formation (mainly Zermelo's), and theory of logic.
Prereq: PHIL 3631; or permission of the Department.

## PHIL 3711 (3CR) <br> BIOMEDICAL ETHICS

This course will consist of the examination of a number of contemporary issues, such as gene therapy, abortion, reproductive technologies, euthanasia, HIV testing and confidentiality, organ retrieval, and advanced directives. In a framework of health, we will discuss larger philosophical questions such as: the possibility of assigning and comparing values, the nature of the human self, the possibilities of agency and responsibility, duties to society, gender and health, the meanings of technology, and social justice. While the focus of this course is not on ethical theory, we will make use of classical moral theories and principles to frame our analyses.
Prereq: Philosophy 2701; or permission of the Department.

## PHIL 3721 (3CR) <br> ENVIRONMENTAL ETHICS

After reviewing traditional attitudes toward the environment, this course will explore recent attempts to "apply" ethical analysis to such problems as pollution and conservation. We will pay particular attention to the ways in which problems of preservation challenge us to extend our traditional norms and values. To what extent, for example, does growing sensitivity to our natural environment require of us a new "environmental ethic" and oblige us to recognize "animal rights"?
Prereq: PHIL 2701; or permission of the Department.

## PHIL/RELG 3891 (3CR)

ASIAN PHILOSOPHY
A study of the ancient trends of Oriental literature in the light of western philosophical concerns. Readings include the Hindu Bhagavadgita, the Chinese Tao Te Ching, and selected Buddhist writings.
Prereq: Three credits from 2000-level Philosophy; or permission of the Department.
Note: This course is cross-listed as RELG 3891 and may therefore count as three credits in either discipline.

## PHIL 4101 (3CR) <br> ADVANCED ANCIENT AND MEDIEVAL PHILOSOPHY

Advanced study of one or more of the main philosophers of these periods, or one or more philosophic questions they address.
Prereq: Permission of the Department.

## PHIL 4200 (6CR)

## KANT

An examination of Kant's Critical project, including the arguments for the existence of God, freedom and immortality to which it led. This will involve, among other things, a close study of the Critique of Pure Reason, The Groundwork for the Metaphysics of Morals, The Critique of Practical and Religion Within the Bounds of Mere Reason.
Prereq: Permission of the Department.

## PHIL 4311 (3CR)

## 19TH \& 20TH CENTURY POLITICAL THOUGHT

This course examines the theoretical and political grounds upon which liberal political philosophy has been extended, modified or abandoned. Specifically, we investigate contemporary defenders of a social contract model of ethical and political relations, and some of the many critiques of its principles (autonomy, transparency, consent), its methods (liberal jurisprudence, representation) and its promised (equality, a neutral state, a just society). Alternative critical frameworks, such as communitarianism, Marxism, feminist ethics, and postmodernism, will be investigated.
Prereq: Permission of the Department.
PHIL 4411 (3CR)

## TWENTIETH CENTURY LINGUISTIC PHILOSOPHY

Advanced study of the logical questions that arise in conjunction with the phenomenological analysis of signification and meaning originally proposed by Husserl and Heidegger and subsequently developed by Merleau-Ponty, Foucault, Derrida, Gadamar and others.
Prereq: Permission of the Department.
PHIL 4511 (3CR)

## PHILOSOPHY OF MIND

A study of the contemporary philosophical arguments which attempt to resolve the real nature of mental states vis à vis the physical states of the brain; how it is we have knowledge of our own sensations, beliefs, desires, our own consciousness and how we gain knowledge of other minds; and also the more general questions of how we should best proceed to resolve these issues.
Prereq: Permission of the Department.

## PHIL 4600 (6CR)

## PHENOMENOLOGY

A study of a number of selected problems according to the methods and concerns of this twentieth century style of thinking.
Prereq: Permission of the Department.
PHIL 4950/4951 (6/3CR)

## PROBLEMS IN PHILOSOPHY

A senior seminar or tutorial course to be determined by the student(s) and instructor(s) involved.
Prereq: Permission of the Department.

## PHIL 4990 (6CR)

HONOURS TOPIC
The content of study is to be determined by the student in conjunction with one or more supervisors of the course. The format of the course is described in the Departmental Handbook.
Prereq: Permission of the Department.

## PHYSICS

Physics seeks to describe the nature of the physical world. The most fundamental of the natural sciences, it forms an essential part of any serious program of study in any branch of science, and indeed, to an increasing degree in the modern world, it is important in any well-balanced curriculum for the non-scientist as well.
In the undergraduate program the development of fundamental concepts and mathematical formulation proceeds simultaneously in a selected series of courses in physics and mathematics, from the elementary ideas of classical mechanics through modern relativistic, quantum and nuclear theories.
Whether the student wishes to prepare for more advanced study in physics itself; for a career in applied areas such as photonics, materials science, or biomedical engineering; for a career in such fields as astronomy, space research, or oceanography; or simply wishes to be informed in an important area of scientific thought, he/she will be able to make an appropriate choice of courses from the list.
Further details of the Physics programme may be found in the Departmental Handbook.

## Disciplinary B.Sc. Programmes

## MINOR in Physics is 24 credits earned as follows:

3 from Physics 1051
6 from Math 1111, 1121 (or 1131)
3 from Physics 1551, 3511, 3521
12 from Physics, including 6 from the $3 / 4000$ level, chosen in consultation with the Programme Advisor. Physics 1001 or Physics 2401, but not both, can be used on the Physics Minor.

## MINOR in Applied Physics is 24 credits earned as follows:

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9 from Physics 1051, 1551, 2801
6 from Math 1111, 1121 (or 1131)
9 from Physics 3321, 3361, 3521, 3581, 3601, 3701, 3751 or
    Computer Science 1711
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## MAJOR AREA OF STUDY in Physics is 63 credits earned as follows:

6 from Physics 1051, 1551
6 from Chemistry 1001, 1021
3 from Computer Science 1711
12 from Math 1111, 1121, 2111, 2121,
3 from Math 2221, 3141
18 from Physics 2251, 2801, 3101, 3701, 3811, 4411
15 from Physics at the 3/4000 level, chosen in consultation with the Programme Advisor

## HONOURS in Physics is 87 credits earned as follows:

63 credits in the Major including Physics 3401, 3701.
Note that 6 of the 15 from Physics at the 3/4000 levels must be from the 4000 level (not counting those listed below)
6 from Physics 4990

6 from Physics 3201, 3821
6 from Math 2221, 3131
3 from Math 3221, 3411, 3431, 4131, 4151
3 from Physics or Math at the 4000 level, chosen in consultation with the Programme Advisor.

## Interdisciplinary B.Sc. Programme

## B.Sc. HONOURS in Mathematics and Physics is 90 credits earned as follows:

18 from Mathematics 1111, 1121, 2111, 2121, 2211, 2221
3 from Computer Science 1711
6 from Chemistry 1001, 1021
12 from Physics 1051, 1551, 2251, 2801
9 from Mathematics 3111, 3211, 3311
9 from Mathematics 3131, 3141, 4131
6 from Mathematics 3121, 3151, 3231, 3321, 3411, 3431, 3531, 4111, 4151, 4211
18 from Physics 3101, 3201, 3401, 3701, 3811, 3821
3 from Physics at the 4000 level
6 from Physics 4990
Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## PHYSICS COURSES

PHYS 1001 (3CR)

## ASTRONOMY

This course provides a broad introduction to current ideas regarding the nature, evolution and future of the universe. Topics covered include observational astronomy, telescopes, celestial motions, the solar system, stellar evolution, black holes, relativity, cosmology, and life in the universe. A background in physics is not assumed, but basic concepts of physics are taught within the course. The laboratory experiences combine observational and laboratory based experiments.

## PHYS 1051 (3CR)

## GENERAL PHYSICS I

This algebra based introductory physics course will cover kinematics, dynamics, work and energy, momentum in one dimension, fluid mechanics, waves and sound, DC circuit electricity, geometrical and physical optics, and an introduction to modern physics. This course provides a basic knowledge of the concepts of physics needed in all sciences. Students enrolling in Physics 1051 should normally have completed a university preparatory level course in Mathematics.

## PHYS 1551 (3CR)

## GENERAL PHYSICS II

This calculus based introductory physics course will cover rotational motion, angular momentum, simple harmonic motion, gravitation, electric fields forces and potentials, capacitors, magnetism, electromagnetic induction, AC circuits, introductory thermodynamics, nuclear reactions and additional selected topics in modern physics.
Prereq: PHYS 1051 and MATH 1111; or permission of the Department.

## PHYS 2251 (3CR)

## CLASSICAL WAVES

In this course the study of free, forced and damped harmonic oscillator is followed by a treatment of discrete coupled oscillators in one dimension. This is then generalized to the study of traveling and standing waves in continuous media. Ideas of Fourier components of signals are introduced. A number of examples will be taken from physical optics, and the topics in this course provide the theoretical basis for understanding modern photonic devices.
Prereq: PHYS 1551 and MATH 1121; or permission of the Department.

## PHYS 2401 (3CR) <br> PHYSICS IN EVERYDAY LIFE

This course, designed primarily for non-science majors who have successfully completed their first year, examines the relationship between a variety of phenomena in everyday life and physics principles. Experiential activity including a number of field trips, experiments in the laboratory and relevant data analysis form the underpinnings of this study of physics. Topics include principles and applications of particle, rigid body and fluid mechanics; thermodynamics, magnetism; electricity, and optics. Participation in field trips and a major report/presentation are required.
Prereq: Completion of 24 credits or permission of the Department.
Exclusion: PHYS 2401 (Structure of Physics)

## PHYS 2801 (3CR) <br> DATA ACQUISITION AND ANALYSIS

This experimentally oriented course is designed to give the students an exposure to the techniques and software tools that can assist them in using computers to enhance their work throughout a science curriculum. Basic methodology for data manipulation is introduced (error analysis, statistical analysis of data, linear regression, graphing, Fourier transform techniques), as are aspects of simulation, digitization, interfacing and data acquisition, and presentation. The course will also include sensors and transducers to convert a variety of signals (light, pressure, strain, radioactivity, sound, etc.) into electrical form.
Prereq: PHYS 1051 and MATH 1111; or permission of Department
PHYS 3001 (3CR)
ASTROPHYSICS
This course examines orbits, optical telescopes, determination of stellar properties, relativity, cosmology, and the origin of the solar system.
Prereq: PHYS 1051, MATH 1111 and Astronomy 1001, or PHYS 1551 and MATH 1111; or permission of the Department.

## PHYS 3101 (3CR)

## ELECTRICITY AND MAGNETISM

This course will cover vector analysis, differential and integral calculus as well as solutions of the Poisson and Laplace equations for different electrostatic problems. Certain special techniques such as method of images, separation of variables and multiple expansion are then introduced. Magnetostatics and electric and magnetic fields in matter are also examined leading to the conclusion of this course where Maxwell equations are integrated and applied.
Prereq: PHYS 1551, MATH 2111 and MATH 2121; or permission of the Department.

PHYS 3201 (3CR)

## STATISTICAL MECHANICS

The conditions under which the Maxwell-Boltzmann distribution, the Bose-Einstein distribution, and the Fermi-Dirac distribution apply are developed. Applications of these distributions to many physical systems are examined in detail.
Prereq: PHYS 3701 and MATH 2111; or permission of the Department.

## PHYS 3321 (3CR)

## ANALOG ELECTRONICS AND SIGNAL PROCESSING

This is a course in analog electronics and in analog signal processing, and would be valuable both for those planning to go on in technical careers and for scientists who wish to develop tools for the collection and analysis of data. Topics include impedance matching considerations, semiconductor physics, pn junction diodes, AC circuit analysis, passive filter designs, DC power supply construction including regulation, junction and field effect transistors and transistor amplifier circuits, operational amplifiers, active filter designs, signal conditioning circuits such as Schmitt trigger, modulation and demodulation, noise (sources, frequency characteristics, and control measures), integrating sensors and electronics, practical issues in electronics, and an introduction to the photonic transition.
Prereq: PHYS 1551 and PHYS 2801 and MATH 1121; or permission of Department
Exclusion: PHYS 3311

## PHYS/COMP 3361 (3CR)

## DIGITAL SIGNAL PROCESSING AND ELECTRONICS

This course introduces students to both digital electronic circuits and digital signal processing, and would be valuable both for those planning to go on in technical careers in computer science or in physics, and for scientists who wish to develop tools for the collection and analysis of data. Topics to be covered include digital logic gates, Boolean algebra, counting circuits, digital signal conditioning, sampling considerations such as the Nyquist criterion, analog to digital and digital to analog conversion, Fourier Transform theory and application as FFT, correlation and convolution, digital filtering using finite impulse response and infinite impulse response circuits including the ztransform and filter design, and digital image processing including two dimensional FFT techniques, microprocessors, microcontrollers and digital signal processing integrated circuits.
Prereq: PHYS 2251 and PHYS 2801 and COMP 1711; or permission of Department
Note: This course is cross-listed with COMP 3361 and may therefore count as three credits in either discipline
Exclusion: PHYS/COMP 3351

## PHYS 3521 (3CR)

## PHYSICS OF THE LIVING BODY

This course is intended primarily for students in biology and psychology. The course will introduce and describe from a physics perspective the many physical processes involving living organisms. Study will include the human body, with examples from other animals given for purposes of comparison. Topics will include sound and hearing (including Fourier analysis and resonance), light and vision (including microscopy), electrical pulses, electrocardiac measurement, mechanics of body motion, scaling relations, fluid flow, feedback relationships and thermodynamics.
Prereq: PHYS 1051 and MATH 1111; or permission of Department Exclusion: PHYS 3521 (Biosensory Physics)

## PHYS 3581 (3CR) <br> MEDICAL PHYSICS

This course is intended both for physics students who are considering a career in medical physics or in the field of medicine, and for students in other programs with similar interests. The course will consider fundamental concepts of ionizing radiation, diagnostic applications of medical physics, and therapeutic applications of medical physics. Topics in the diagnostic area will include x-rays, computed tomography, magnetic resonance imaging, positron emission tomography, nuclear medicine and ultrasound. Topics in the therapeutic area will include radiation generators, absorbed dose calculations, dose measurement, treatment planning, quality assurance and brachytherapy.
Prereq: PHYS 1051 and MATH 1111; PHYS 1551 or PHYS 3521 ; or permission of Department

## PHYS 3601 (3CR)

## FLUID MECHANICS

The objective of this course is to develop an understanding of fluid properties. Topics include: Fluid properties, static forces in fluids, kinematics and dynamics of flow, Bernoulli's and momentum equations, dimensional analysis and similitude, and flow through pipes.
Prereq: PHYS 1551 and MATH 1121; or permission of the Department.

## PHYS 3701 (3CR)

## THERMODYNAMICS

The objective of the course is to develop a clear and broad understanding of the First and Second Law of Thermodynamics, with application to a wide range of problems. Topics include: the general energy equation, First Law, Second Law, entropy, limiting-cycle efficiencies, irreversibility and availability, steam power plant, refrigeration and gas engine applications.
Prereq: PHYS 2801 and MATH 2111, or permission of the Department.

## PHYS 3751 (3CR)

## PHYSICS OF ENERGY PRODUCTION AND TRANSFER

The goal of this course is to teach aspects of energy harvesting, storage and transmission with particular emphasis on the theory and development of renewable energy resources. The specific technologies considered will vary somewhat according to the interests of the class but will normally include wind power, photovoltaic generation, other forms of solar energy, nuclear fission and fusion energy generation, hydroelectric, combustion based fuel generation, tidal energy and fuel cells.
Prereq: CHEM 1021, PHYS 1551 and MATH 1121;
Prereq or Coreq: PHYS 3701 or CHEM 2211; or permission of Department

## PHYS 3811 (3CR)

## MODERN PHYSICS

This course considers the two major revolutionary ideas of modern physics, quantum mechanics and special relativity. Lorentz transformations, length contraction and time dilation, relativistic mass and momentum are considered, including the fourvector relativistic notation. Evidence for quantization along with early models for atoms is then briefly examined and De Broglie's hypothesis for the matter wave is discussed. The Schrodinger equation and its solutions for some usual systems are the main topics of this course. The course ends with a look at the three dimensional systems and a discussion of angular momentum in quantum mechanics.
Prereq: PHYS 2251.
Coreq: PHYS 3101 and MATH 2121; or permission of the Department Exclusion: PHYS 3811- Quantum Waves

PHYS 3821 (3CR)
QUANTUM MECHANICS I
This course is an introduction to formal quantum mechanics: the matrix formulation, harmonic oscillator, perturbation theory, two-state systems, multiparticle systems, and an introduction to the general theory of angular momentum.
Prereq: PHYS 3811 and MATH 2221; or permission of the Department.

## PHYS 4101 (3CR)

## ELECTROMAGNETIC THEORY

An advanced treatment of static and time-dependent electric and magnetic fields in materials. Particular attention will be given to wave solutions of Maxwell's equations for spatial dependent media such as wave guides.
Prereq: PHYS 2251 or MATH 2121; PHYS 3101; or permission of the Department.

PHYS 4201 (3CR)
SOLID STATE PHYSICS
A study is made of the various quantized models used to describe the thermal, electrical, optical and electromagnetic properties of solids. Conductors, semi-conductors and insulators are analysed.
Prereq: PHYS 3811; or permission of the Department.

## PHYS 4311 (3CR)

MODERN OPTICS
This course provides an advanced treatment of a number of topics in modern optics with particular emphasis on topics of industrial and research importance. A brief treatment of geometric optics will concentrate on the design of optical systems. Topics in physical optics may include dispersion in materials, production and properties of polarized light, interference, diffraction in the Fresnel and Fraunhofer limits, Fourier optics, holography and an introduction to quantum optics. Applications of this theoretical background will be made in such areas as fibre-optic transmission, photonic devices, thin film coatings, and electrochromic devices. There will also be some considerations of electro-optical devices such as lasers, charge coupled device detectors, image intensifiers and photodiodes.
Prereq: PHYS 2251 and PHYS 2801 and PHYS 3101; or permission of the Department
Exclusion: PHYS 4401

## PHYS 4411 (3CR)

## CLASSICAL MECHANICS AND RELATIVITY

This course will cover three-dimensional dynamics of both particles and rigid bodies using various coordinate systems. The course focuses on an introduction to Lagrangian and Hamiltonian formalisms, followed by application of these approaches to problems in constrained motion. Other topics covered include motion in resistive fluids, planetary orbits, motion in accelerated reference frames and the inertia tensor. The latter part of the course will provide an introduction to general relativity including spacetime invariants, metric and metric tensor, the field equations and tests of general relativity.
Prereq: PHYS 3101, 3811 and MATH 2121; or permission of Department
Exclusion: PHYS 4701

## PHYS 4831 (3CR)

## QUANTUM MECHANICS II

The principles of quantum mechanics developed in Quantum Mechanics I (PHYS 3821) are extended. Properties of continuous and discrete representations are compared. Time-independent perturbation theory is developed for first order, second order, and degenerate cases. Small perturbations are also treated through direct diagonalization of large matrices. Central force problems, elements of scattering theory. And the addition of quantized angular momenta are examined, then time-dependent perturbation theory is introduced to describe transitions between stationary levels in a quantum system. The course concludes with aspects of relativistic quantum mechanics, including the Klein-Gordon and Dirac equations, and the evolution of spin from these equations.
Prereq: PHYS 3821; or permission of the Department.

## PHYS 4841 (3CR)

## ATOMIC AND MOLECULAR PHYSICS

This is a course on the quantum mechanical theory of atomic and molecular structure, and treats orbital and spin angular momentum, fine structure, Zeeman and Stark effects, Lamb shift, molecular orbital theory and molecular spectra.
Prereq: PHYS 3821; or permission of the Department.

## PHYS 4851 (3CR)

## NUCLEI AND FUNDAMENTAL PARTICLES

This is an introductory course in nuclear theory and particle physics and discusses nuclear energy levels and spectra, scattering experiments, symmetry and conservation principles, quantum electrodynamics, and the weak and strong interactions.
Prereq: PHYS 3821; or permission of the Department.

## PHYS 4911 (3CR)

## CURRENT TOPICS IN PHYSICS

This course will introduce students to current topics and trends in physics which are not represented in other courses in the curriculum. This will be a seminar format course with sessions led by students, faculty and guest speakers. A key part of the course will be development of skills for identification and critical evaluation of primary literature in physics.
Prereq: PHYS 3811; or permission of Department
PHYS 4951 (3CR)
SPECIAL TOPICS
Students may select up to two three credit courses from topics to be approved by the Department. This choice is normally available only to fourth year Physics students.

PHYS 4990 (6CR)
HONOURS THESIS
Normally, a student electing this course is expected to accomplish work equivalent to any fourth year course. Students are encouraged, but not required, to work on the project in the Department during the summer immediately preceding the senior year. The topic often involves experimental work, but must have a theoretical component.

## POLITICAL SCIENCE

The study of politics has been an integral part of a university education since the philosopher Plato established an academy in classical Greece to teach the "royal art". Political decisions shape the character of our public and private institutions, determine our foreign and domestic policies, and through these, establish our character as a people. As the eighteenth-century writer Jean-Jacques Rousseau observed in a letter "everything is radically connected with politics."
At Mount Allison, courses in Political Science fall into three broad categories: political theory, political systems both domestic and foreign, and international relations. The Department offers a number of courses in each of these broad subfields. As a small department we also encourage students to develop more specialized interests by taking related courses in other disciplines and by taking advantage of the directed readings course offered to senior students with high academic standing.
Political Science 1000 is a team taught introductory course and is the normal prerequisite for all upper-level courses. In addition, Political Science 2301 is normally required of all students wishing to take Political Science 3310 and 4300. Students should consult the programme advisor for additional information.

## Disciplinary B.A. Programmes

## MINOR in Political Science is 24 credits earned as follows:

6 from Political Science 1000
18 from Political Science 2/3/4000 level, including at least 6 credits from 3/4000 level courses.

## MAJOR AREA OF STUDY in Political Science is 60 credits earned as follows:

6 from Political Science 1000
36 from Political Science 2/3/4000 level. No more than 6 of the above 36 credits may be taken at the 2000 level. At least three credits at the $3 / 4000$ level must be taken from each of the four sub-disciplines in Political Science corresponding with the series numbers for Political Theory (30/40), Canadian Politics (31/41), Comparative Politics (32/42) and International Politics (33/43)
18 credits from complementary courses in Arts \& Letters, Humanities and Social Science, chosen in consultation with the Programme Advisor

## HONOURS in Political Science is 72 credits earned as

 follows:60 credits as in the Major, plus:
12 from Political Science at the $3 / 4000$ level, chosen in consultation with the Programme Advisor. At least six credits at the 3/4000 level must be taken from each of the four sub-fields in Political Science (corresponding with the series numbers for Political Theory (30/40), Canadian Politics (31/41) Comparative Politics (32/42), and International Politics (33/43).

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.

Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## POLITICAL SCIENCE COURSES

## POLS 1000 (6CR)

## INTRODUCTION TO POLITICAL SCIENCE

An introduction to the principal areas of study in political science. This includes the nature of politics, the government of Canada, political institutions, and international relations.

## POLS 2001 (3CR)

## DEMOCRATIC THOUGHT

An introduction to democratic thought from its origins in the ancient polis through to its modern incarnation in the writings of Rousseau, Tocqueville, John Stuart Mill and in debates among selected
contemporary theorists. Particular emphasis will be placed on the central conflict between participatory and elite models of democraic citizenship.
Prereq: POLS 1000; or permission of the Department.
Exclusion: POLS 2001 (Issues in Political Thought)

## POLS 2101 (3CR)

CANADIAN GOVERNMENT AND POLITICS
An introduction to the major issues of public policy in Canada, and their treatment by the federal government.
Prereq: POLS 1000; or permission of the Department.
POLS 2201 (3CR)
GOVERNMENT OF THE U.S.A.
A study of political institutions and practices in the United States of America.
Prereq: POLS 1000; or permission of the Department.

## POLS/INLR 2301 (3CR)

## TOPICS IN INTERNATIONAL RELATIONS

A study of the major issues and themes in international relations, including the nature of war and the conditions of peace.
Prereq: POLS 1000; or permission of the Department.
Note: This course is cross-listed as INLR 2301 and may count as 3 credits in either discipline.

## POLS 3001 (3CR)

## ANCIENT POLITICAL THOUGHT

An examination of the ancient tradition of political thought from Plato, Aristotle, and Augustine through to its eclipse in Machiavelli. Emphasis will be on the enduring themes of nature, virtue, citizenship, property, religion and the best regime.
Prereq: POLS 1000 or 3011, or permission of the Department.
Exclusion: POLS 3001 (History of Political Thought I)

## POLS 3011 (3CR) <br> MODERN POLITICAL THOUGHT

An examination of the modern tradition of political thought from its origins in Hobbes and Locke to its zenith in Rousseau and Marx.
Emphasis will be on the defining problems of freedom, history, property, revolution, and the state.
Prereq: POLS 1000 or 3001, or permission of the Department.
Exclusion: POLS 3011 (History of Political Thought II)
POLS 3021 (3CR)
SOCIALIST THOUGHT
An examination of the socialist tradition from Marx to the present, with particular emphasis on the relationship between theory and practice in the writings of Lukács, Gramsci, and the Frankfurt School. The recent challenges of feminism and postmodernism will also be considered.
Prereq: Three credits from POLS 2001, 3001, or 3011, or permission of the Department.

## POLS 3031 (3CR) <br> WOMEN AND POLITICS

A study of the relationship between women and politics, with particular emphasis on Canada. Areas to be covered might include historical and conceptual roots of the problem of citizenship for women, patterns of women's participation in mainstream politics and government, organizational aspects of the women's movement, and women's effects on public policy.
Prereq: Three credits from POLS 2101, 3101, 3111 or 3121, or permission of the Department.
Exclusion: POLS 3131 (Women and Canadian Politics)

## POLS 3101 (3CR)

## POLITICAL LEADERSHIP IN CANADA

A study of the various public offices in Canada and the individuals who fill them, including the Prime Minister, Provincial premiers, members of parliament, mayors and judges. Emphasis is placed on the
opportunities and challenges each faces in providing political leadership in Canada.
Prereq: POLS 1000; or permission of the Department.
Exclusion: POLS 3100
POLS 3111 (3CR)
CURRENT TOPICS IN CANADIAN FEDERALISM
A study of timely issues facing the Canadian federation. In a given year this may involve examination of new constitutional proposals and/or federal-provincial relations in specific policy areas such as social policy or the environment. Emphasis is on the concept of federalism and its current Canadian manifestations.
Prereq: POLS 1000; or permission of the Department.
Exclusion: POLS 3100

## POLS 3121 (3CR) <br> CANADIAN ELECTORAL STUDIES

A study of Canadian elections and the Canadian electoral system. Topics covered include: an examination of how the rules of the game shape electoral competition; the role of the media in election campaigns; obstacles facing women candidates; and, whether elections provide governments with mandates.
Prereq: POLS 1000; or permission of the Department.

## POLS 3200 (6CR)

EUROPEAN POLITICS
A comparative analysis of government and politics in Western Europe with particular reference to the United Kingdom, France and Germany.
Prereq: POLS 1000; or permission of the Department.

## POLS 3310 (6CR)

## STRATEGIC STUDIES

An analysis of strategic thought in the 19th and 20th centuries, with particular reference to the ideas of Karl von Clausewitz and their relevance to the nuclear era.
Prereq: POLS 1000; or permission of the Department.
POLS/HIST 3731 (3CR)

## JAPAN IN THE MODERN WORLD

This course will examine Japan's relations with the international community in the years following renewed contact with the West in the 1860 's. Particular emphasis will be placed on the expanding intellectual, diplomatic and economic interchange and the impact of that interchange on the shaping of modern Japan.
Prereq: Second year standing and at least six credits in History at the 1000 or 2000 level; or permission of the Department.
Note: This course is cross-listed as HIST 3731 and may therefore count as three credits in either discipline.
Exclusion: HIST/POLS 3321
POLS 4000 (6CR)
PROBLEMS IN THE HISTORY OF POLITICAL THOUGHT
Seminar on a selected problem in the history of political thought.
Prereq: Three credits from POLS 3001, 3011 and 3021 or POLS 3000; or permission of the Department.
Exclusion: POLS 4000 (Political and Social Ideas)

## POLS 4100 (6CR) <br> POLITICAL PARTIES AND INTEREST GROUPS

An examination of political parties, party systems, and interest groups, primarily from a Canadian perspective. Topics covered include: a review of the principal models of political parties; the organization, character and functions of parties; the development of party systems; and, the development and role of interest groups.
Prereq: Three credits from POLS 3101, 3111 and 3121 or POLS 3100; or permission of the Department.

## POLS 4200 (6CR)

## POLITICAL AND CULTURAL CHANGE: A COMPARATIVE ANALYSIS

 OF NORTH AMERICA AND EUROPEA comparative analysis of the impact of political change on the broader culture, as expressed in literature, cinema, architecture and
communications media. Examples will be taken from North American and European experience.
Prereq: Three credits in Political Science at the 2000 or 3000 level; or permission of the Department.

POLS 4211 (3CR)
POLITICS AND LITERATURE
An analysis of the relationship between literature and social change. Selected works of a number of recent Latin American and Central European writers will be examined.
Prereq: Three credits in Political Science at the 2000 or 3000 level; or permission of the Department.

POLS 4300 (6CR)

## CANADIAN FOREIGN POLICY

A study of the major themes and issues in post-1945 Canadian Foreign policy, with a focus on the concept of internationalism as the foundation for Canada's post-war approaches to international order and security.
Prereq: POLS 3310; or permission of the Department.

## POLS/HIST 4550 (6CR) ADVANCED TOPICS IN UNITED STATES FOREIGN RELATIONS

 Seminar in main currents of United States Foreign relations.Note: This course is cross-listed as HIST 4550 and may count for six credits in either discipline.

## POLS 4700/01 (6/3CR) SPECIAL TOPICS

A seminar/tutorial open to senior students in an advanced research area of political science. Course content and requirements will be set by individual instructors.
Prereq: Permission of the Department.

## POLS 4950 (6CR)

## DIRECTED READING ON SPECIAL TOPICS

This course permits a senior student, under the direction of one faculty member, to pursue a programme of independent reading or study. Normally, only students with a minimum average of B in their previous years of study at the University are eligible to register for this course.

## PSYCHOLOGY

Psychology is the scientific study of mind and behaviour. It is a biological, a social, and a cognitive science. As a biological science, it studies the physiological mechanisms and evolutionary origins of mental and behavioural phenomena. As a social science, it studies personality and interpersonal relations and their bases in social interaction, cognition and emotion. As a cognitive science, it studies such processes as sensation and perception, abstract thinking, reasoning, language, and memory. Developmental psychology combines all three aspects in taking for its subject matter the total life span. The objectives of psychological study are to understand human nature, for its own sake, and to provide an increasingly reliable basis for the application of psychological principles to education, social policy, and medical treatment.

Psychologists use a variety of methods appropriate to the questions they study. Experimentation, laboratory techniques, observational procedures, measurement, and statistical methods are among the important tools of the psychologist. Whatever their methods, psychologists share in their research a commitment to careful and systematic observation aimed at the formulation of general principles. In recent years psychology has become increasingly interdisciplinary. Psychologists work with biologists, geneticists, medical researchers, physiologists, and biochemists on those questions of a biological nature. They work with sociologists, criminologists, anthropologists, and economists, among others, on questions relating to social behaviour. Finally, they work with mathematicians, computer scientists, philosophers, linguists, and others on questions involving the nature and origins of knowledge.

## Disciplinary B.A. and B.Sc. Programmes

## B.A. \& B.Sc. MINOR in Psychology is 24 credits earned as follows:

6 from Psychology 1001, 1011
6 from Psychology 2101, 2201, 2301
12 from Psychology, including 6 from the 3/4000 level, chosen in consultation with the Programme Advisor

## B.A. \& B.Sc. MAJOR AREA OF STUDY in Psychology is 60 credits earned as follows: under both degrees, 42 credits from Psychology earned as follows:

6 from Psychology 1001, 1011
6 from Psychology 2001, 2011
6 from Psychology 2101, 2201, 2301
15 from Psychology at the 3/4000 level, including 3 from the 4000 level, chosen in consultation with the Programme Advisor
9 from Psychology
plus, for B.Sc., 18 credits from Science:
3 from Physics 1051
3 from Physics 1551, 3521
6 from Chemistry 1001, 1021

6 from Math 1111, and three other credits from Math or Computer Science selected from Math 1121, 1131, 2211, 2221, 2311 or Computer Science 1711.
plus, for B.A., 18 credits from complementary courses in, for example, Biology, English, History, Mathematics \& Computer Science, Philosophy, Sociology, Anthropology, Canadian Studies, or Modern Languages, chosen in consultation with the Programme Advisor.

## B.A. and B.Sc. HONOURS in Psychology is 78 credits earned as follows:

60 credits as in either the B.A. or B.Sc. Major, plus:
18 from Psychology which must include 3001, 3901, 4903, 4990, chosen in consultation with the Programme Advisor

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## PSYCHOLOGY COURSES

## PSYC 1001 (3CR) INTRODUCTION TO PSYCHOLOGY I

A general introduction to the concepts, problems, and methods of modern scientific psychology. Topics surveyed include neuroanatomy and other aspects of the biological bases of psychological processes, learning, motivation, sensation, perception, memory, and language.

## Prereq: None

Note: Students who, prior to September 2000, have successfully completed either PSYC 1001 (Psychological Adaptation) or 1101(Psychological Processes) may obtain credit for either PSYC 1001 (Introduction to Psychology I) or PSYC 1011(Introduction to Psychology II)

## PSYC 1011 (3CR) <br> INTRODUCTION TO PSYCHOLOGY II

A general introduction to the concepts, problems, and methods of modern scientific psychology. Topics surveyed include attitudes, stereotyping and other aspects of social psychology, developmental psychology, intelligence, personality, and the psychology of abnormal behaviour. PSYC 1001 and 1011 may be taken in either order. Neither is a prerequisite to the other.
Note: Students who, prior to September 2000, have successfully completed either PSYC 1001 (Psychological Adaptation) or 1101(Psychological Processes) may obtain credit for either PSYC 1001 (Introduction to Psychology I) or PSYC 1011(Introduction to Psychology II)

## PSYC 2001 (3CR) <br> RESEARCH DESIGN AND ANALYSIS I

A lecture and laboratory course in which basic design principles involved in the scientific approach to empirical research and data collection are considered. The use of descriptive and inferential statistics to evaluate the results of carefully planned research is also described.
Prereq: PSYC 1001 and PSYC 1011 and at least second-year standing; or permission of the Department.
Exclusion: MATH 2311

## PSYC 2011 (3CR)

## RESEARCH DESIGN AND ANALYSIS II

This course covers the research process from the development of simple and complex research designs to statistical analyses of the data collected. Topics covered include analysis of variance, regression analysis, and nonparametric approaches. This course will include both lectures and tutorials.
Prereq: PSYC 1001, PSYC 1011, PSYC 2001 and at least second-year standing; or permission of the Department.
Exclusion: MATH 2321, PSYC 2101 (Research Design and Analysis)

## PSYC 2101 (3CR)

## BIOPSYCHOLOGY

In this lecture and laboratory course, students will be provided with a basic foundation in the neural bases of behavior. Topics will include the role of evolution and genetics in the development of the nervous system, the structure and function of the nervous system, and the biological bases of perception, movement, eating, drinking, sleeping and dreaming, sexual behaviour, addiction and reward, and memory.
Prereq: PSYC 1001 and 1011 and at least second-year standing; or permission of the Department.
Exclusion: PSYC 2051 (Introduction to Brain and Behaviour)

## PSYC 2111 (3CR)

DRUGS AND BEHAVIOUR
Principles of pharmacology, neural transmission, behavioural assessment of drug effects, theories of addiction, tolerance, and dependence will all be explored as a conceptual introduction to behavioural pharmacology. Specific psychopharmacologic issues will be discussed for alcohol, benzodiazepines, barbiturates, opiates, psychomotor stimulants, caffeine, tobacco, hallucinogens, and antipsychotic drugs.
Prereq: PSYC 1001 and 1011 and second-year standing; or permission of the Department.

## PSYC 2121 (3CR)

## BEHAVIOUR MODIFICATION

Basic concepts and theories involved in the psychology of learning, the analysis of behaviour and behavioural assessment will be discussed in the context of real life problems. Applications of behaviour modification and behaviour therapy will be discussed in terms of problems associated with parenting, development of social skills, education, disabilities, health and other issues.
Prereq: PSYC 1001 and 1011 and at least second-year standing; or permission of the Department.
Exclusion: PSYC 2011 (Learning and Memory)

## PSYC 2201 (3CR)

## COGNITIVE PROCESSES

This lecture and laboratory course provides an overview of mental processes and activities used in perceiving, learning, remembering, thinking, and understanding. This course will offer students an opportunity to explore current information processing models and their applications. Some of the topics surveyed include attention, memory, language, neurocognition and thinking and reasoning.
Prereq: PSYC 1001 and 1011 and at least second-year standing; or permission of the Department.
Exclusion: PSYC 3021 (Cognition)

## PSYC 2301 (3CR)

## SOCIAL PSYCHOLOGY

A lecture and laboratory course introducing students to the field of social psychology. Topics covered will include social cognition, attitudes, prejudice and discrimination, interpersonal attraction, social influence, helping and aggression, and group processes.
Prereq: PSYC 1001 or 1011 and at least second year standing; or permission of the Department.
Exclusion: PSYC 3081 (Social Psychology)

## PSYC 2401 (3CR)

## CHILD DEVELOPMENT

An overview of social, cognitive, and biological development during infancy and childhood. Some of the topics covered include the development of perception, memory, emotions, and family and peer relationships.
Prereq: PSYC 1001 and 1011 and at least second-year standing; or permission of the Department.
Exclusion: PSYC 2031 (Introduction to Developmental Psychology)

## PSYC 2411 (3CR) <br> ADOLESCENCE

An overview of social, cognitive, and biological development during adolescence. Some of the topics covered include puberty, identity, peer groups, and adolescent sexuality.
Prereq: PSYC 1001 and 1011 and at least second-year standing; or permission of the Department.
Exclusion: PSYC 3031(Stages of Psychological Development)

## PSYC 2421 (3CR)

## ADULTHOOD AND AGING

An overview of social, cognitive, and biological development during early, middle, and late adulthood. Some of the topics covered include career development, menopause, bereavement, late-life changes in memory and sensory processes, and relationships between adults and their parents.
Prereq: PSYC 1001 and 1011 and at least second-year standing; or permission of the Department.

## PSYC 2501 (3CR) <br> PSYCHOLOGY OF WOMEN

This course systematically reviews psychological theories and research findings about women's development. Topics will include biological effects on gender development, gender roles, health and reproduction, personality and social interaction, work, sexuality, violence in women's lives, and mental health. The ways that race, ethnicity, class, physical ability, sexual orientation, and age modify women's experience will also be considered.
Prereq: PSYC 1001 and 1011 and at least second-year standing; or permission of the Department.

## PSYC 2601 (3CR)

## PSYCHOLOGY OF ABNORMAL BEHAVIOUR

This course will present an overview of psychological disorders: their biological and social origins, classification, symptoms and common treatments.
Prereq: PSYC 1001 and 1011 and at least second-year standing; or permission of the Department.
Exclusion: PSYC 3061 (Psychopathology)
PSYC 2701 (3CR) PERSONALITY
This course will provide an introduction to personality as an enduring, organized pattern of thinking, feeling and behaving. The course will examine key theorists and broader perspectives on personality, as well as the measurement of personality from those perspectives. Examples of perspectives may include dispositional, biological, psychoanalytic, learning, and phenomenological.
Prereq: PSYC 1001 and 1011 and at least second-year standing; or permission of the Department.
Exclusion: PSYC 3071 (Personality)

## PSYC 3001 (3CR)

## ADVANCED DESIGN AND ANALYSIS

This lecture and laboratory course provides the student with advanced analytic and design tools necessary to interpret the research of others and to conduct original research. Lectures will be supplemented by labs in which students will have an opportunity to practice their skills in answering questions of practical and theoretical interest.
Prereq: PSYC 1001, 1011, 2001 and 2011, plus at least third-year standing; or permission of the Department.

## PSYC 3011 (3CR)

## COMPUTER APPLICATIONS IN PSYCHOLOGY

A lecture and laboratory course which describes the many ways in which psychologists have applied computer technology to their research -
stimulus presentation, measuring and timing responses, data analysis, report writing, using the Internet for data collection and collaborative research are some examples covered.
Prereq: PSYC 1001 and 1011 and at least 2 courses in Psychology at the 2000 level plus at least third-year standing; or permission of the Department.
Exclusion: PSYC 3101 (Computer Applications)

PSYC 3021 (3CR)
PSYCHOLOGICAL MEASUREMENT AND INDIVIDUAL

## DIFFERENCES

This course examines the history and principles of psychological testing. It is concerned with the logic of test construction and the problems associated with attempts to quantify and assess human abilities and characteristics.
Prereq: PSYC 1001 and 1011 and at least 2 courses in Psychology at the 2000 level plus at least third-year standing; or permission of the Department. PSYC 2001 and 2011 strongly recommended as additional prerequisites.

## PSYC 3101 (3CR)

## HUMAN NEUROPSYCHOLOGY

This lecture and laboratory course examines the structure and functions of the cerebral cortex. Topics will include cerebral asymmetry in function, the anatomy and functions of the frontal, parietal, temporal, and occipital lobes, and the neural substrates of higher functions such as memory, language, emotion, spatial behaviour, and attention.
Prereq: PSYC 1001 and 1011 and at least 2 courses in Psychology at the 2000 level plus at least third-year standing; or permission of the Department. PSYC 2001 and 2011 strongly recommended as additional prerequisites.
Exclusion: PSYC 3051 (Brain Mechanisms of Complex Behaviour)

## PSYC 3111 (3CR) <br> CONDITIONING

This lecture and laboratory course examines the role of associative processes in both human and non-human learning. Topics will include habituation, classical conditioning, operant conditioning, and observational learning.
Prereq: PSYC 1001 and 1011 and at least 2 courses in Psychology at the 2000 level plus at least third-year standing; or permission of the Department. PSYC 2001 and 2011 strongly recommended as additional prerequisites.
Exclusion: PSYC 3011 (Conditioning)

## PSYC 3201 (3CR)

## MEMORY

This lecture and laboratory course examines contemporary research and theories of human memory. Topics covered will include short-term and long-term memory, forgetting, implicit memory, amnesia, memory and aging, reconstructive processes, mnemonics and imagery.
Prereq: PSYC 1001 and 1011 and at least 2 courses in Psychology at the 2000 level plus at least third-year standing; or permission of the Department.

## PSYC 3211 (3CR) <br> SENSATION AND PERCEPTION

This course will examine how physical energy is translated into sensory information and processed into our perceptions of the world around us. Topics covered will include the psychophysics and neural coding of each of our senses as well as the higher order processes of attention and cognition. In addition to lectures, students are required to participate in scheduled laboratory sessions.
Prereq: PSYC 1001 and 1011 and at least 2 courses in Psychology at the 2000 level plus at least third-year standing; or permission of the Department.
Exclusion: PSYC 3121 (Sensation and Perception)

## PSYC 3221 (3CR)

## PSYCHOLINGUISTICS

This lecture and laboratory course will describe our present state of knowledge concerning the mechanisms underlying the production, comprehension, and use of language.
Prereq: PSYC 1001 and 1011 and at least 2 courses in Psychology at the 2000 level plus at least third-year standing; or permission of the Department.
Exclusion: PSYC 3141 (Psycholinguistics)

## PSYC 3231 (3CR)

EMOTION
This lecture and laboratory course reviews theories and evidence on the nature and variety of emotions and the conscious experiences that accompany them. The evidence for innate patterns of neural and hormonal response underlying proposed "basic" emotions is examined, along with theories of their individual and evolutionary function. Special attention is given to the influence of ordinary language on our conception of emotion and as evidence for and against the various theories proposed.
Prereq: PSYC 1001 and 1011 and at least 2 courses in Psychology at the 2000 level plus at least third-year standing; or permission of the Department.

## PSYC 3301 (3CR)

INTERPERSONAL RELATIONS
A lecture and laboratory course examining aspects of interpersonal attraction and interpersonal relationships. Topics covered will include attachment and affiliation, interpersonal attraction, developing and maintaining close relationships, friendship and love, relationship problems, as well as relationship termination.
Prereq: PSYC 1001 and 1011 and at least 2 courses in Psychology at the 2000 level plus at least third-year standing; or permission of the Department.

## PSYC 3401 (3CR)

## LANGUAGE DEVELOPMENT IN CHILDREN

This lecture and laboratory course will examine the development of language. The precursors of language in the neonate; phonological, semantic, syntactic and pragmatic development will be covered as well as theories of language acquisition.
Prereq: PSYC 1001 and 1011 and at least 2 courses in Psychology at the 2000 level plus at least third-year standing; or permission of the Department.
Exclusion: PSYC 3131 (Processes of Psychological Development)

## PSYC 3411 (3CR)

## COGNITIVE DEVELOPMENT

This lecture and laboratory course will examine theories and research methods of developmental psychology, with a focus on research and findings in cognitive development in infancy, childhood and adolescence. Included are theories of how infants and children discover and understand the world, remember information, and solve problems. Prereq: PSYC 1001 and 1011 and at least 2 courses in Psychology at the 2000 level plus at least third-year standing; or permission of the Department

## PSYC 3501 (3CR)

## SELECTED TOPICS

This course will allow topics not covered by the current course offerings to be occasionally presented. The course content and format will vary depending on the particular area of Psychology to be covered.
Prereq: PSYC 1001 and 1011 and at least 2 courses in Psychology at the 2000 level plus at least third-year standing; or permission of the Department.

## PSYC 3801 (3CR) <br> EDUCATIONAL PSYCHOLOGY

An introduction to selected principles, research findings, and theories of psychology considered relevant to teaching and learning. Topics will include such areas as human development and learning including developmental changes, motivational and learning processes, exceptionalities and other individual differences, dynamics of social groups, and the evaluation of teaching/learning.
Prereq: PSYC 1001 and 1011 and at least 2 courses in Psychology at the 2000 level plus at least third-year standing; or permission of the Department.

## PSYC 3811 (3CR) <br> DISORDERS OF LEARNING

A lecture and laboratory course which will examine the application of scientific findings in psychology to our understanding of disorders of learning. It will apply knowledge in the fields of cognitive science (memory, attention, etc.), neuropsychology, and learning theory to the field of learning disabilities/dyslexia.
Prereq: PSYC 1001 and 1011 and at least 2 courses in Psychology at the 2000 level plus at least third-year standing; or permission of the Department.

## PSYC 3901 (3CR) <br> HISTORY OF PSYCHOLOGY

A course of lectures and seminars surveying the philosophical roots of scientific psychology, placing the problems and concepts of contemporary psychology in a historical context. The course covers the development of psychology from antiquity to the twentieth century.
Prereq: PSYC 1001 and 1011 and at least 2 courses in Psychology at the 2000 level plus at least third-year standing; or permission of the Department.
Exclusion: PSYC 3091 (History of Psychology)
PSYC 4101 (3CR)

## ADVANCED TOPICS IN BEHAVIOURAL NEUROSCIENCE

Advanced seminar on the relation between brain and behaviour.
Prereq: PSYC 2101; at least two courses in Psychology at the 3000 level plus at least third year standing; or permission of the Department.
Exclusion: PSYC 4051 (Advanced Topics in Behavioural Neuroscience)

## PSYC 4111 (3CR)

## ADVANCED TOPICS IN CONDITIONING

Advanced seminars on Pavlovian conditioning, operant conditioning and other forms of learning in animals and people.
Prereq: PSYC 3111; at least one other course in Psychology at the 3000 level plus at least third-year standing; or permission of the Department. Exclusion: PSYC 4011 (Advanced Topics in Learning)

## PSYC 4201 (3CR)

## ADVANCED TOPICS IN COGNITION

Advanced seminars on subjects of current theoretical interest in the psychology of attention, memory and thought.
Prereq: PSYC 2201; at least two courses in Psychology at the 3000 level plus at least third year standing; or permission of the Department.
Exclusion: PSYC 4021 (Advanced Topics in Cognition)

## PSYC 4301 (3CR)

ADVANCED TOPICS IN SOCIAL PSYCHOLOGY
An advanced seminar on selected topics of current theoretical interest in the study of social behaviour.
Prereq: PSYC 2301; at least two courses in Psychology at the 3000 level plus at least third year standing; or permission of the Department.
Exclusion: PSYC 4081 (Advanced Topics in Social Psychology)

## PSYC 4401 (3CR)

ADVANCED TOPICS IN DEVELOPMENTAL PSYCHOLOGY
This course is designed to provide a deeper understanding of the methods and concepts of developmental psychology through intensive treatment of specific research areas.
Prereq: One from PSYC 2401, 2411, 2421; at least 2 courses in Psychology at the 3000 level plus at least third year standing; or permission of the Department.
Exclusion: PSYC 4031 (Advanced Topics in Developmental Psychology I), PSYC 4131 (Advanced Topics in Developmental Psychology II)

## PSYC 4411 (3CR) <br> ADVANCED TOPICS IN ADULTHOOD AND AGING

This course will use a seminar format. Specific topics in the field of Adulthood and Aging will be explored in depth (e.g., health and communication across adulthood, collaborative cognition, memory and comprehension of verbal and written information, etc). Theory and research methodology in life-span psychology will also be covered. Prereq: PSYC 2411 or 2421 ; at least 2 courses in Psychology at the 3000 level plus at least third-year standing; or permission of the Department

## PSYC 4501 (3CR)

SELECTED TOPICS
A senior seminar course devoted to topics in Psychology not covered by our current course offerings.
Prereq: At least two courses in Psychology at the 3000 level plus third year standing; or permission of the Department.
Exclusion: PSYC 4550 (Selected Topics)

## PSYC 4601 (3CR)

ADVANCED TOPICS IN PSYCHOPATHOLOGY
This course presents an in-depth examination of theory and research pertinent to a topic of current interest in the field of Psychopathology. Prereq: PSYC 2601; at least two courses in Psychology at the 3000 level plus at least third year standing; or permission of the Department.
Exclusion: PSYC 4061 (Advanced Topics in Psychopathology)

## PSYC 4701 (3CR)

## ADVANCED TOPICS IN PERSONALITY

This course presents an in-depth examination of theory and research pertinent to a topic of current interest in the field of Personality.
Prereq: PSYC 2701; at least two courses in Psychology at the 3000 level plus at least third year standing; or permission of the Department.
Exclusion: PSYC 4071 (Advanced Topics in Personality)
PSYC 4903 (3CR)

## HONOURS SEMINAR

A seminar for honours students in Psychology that will involve consideration of metatheoretical, psychometric, and ethical issues that inevitably arise in the course of virtually any type of psychological inquiry. In addition to the critical evaluation of classic articles on these topics, students will make periodic presentations of their own ongoing research, which will be open to all members of the Department.
Coreq: PSYC 4990; or permission of the Department.

## PSYC 4950/4951 (6/3CR) <br> DIRECTED STUDY ON SPECIAL TOPICS

The course is intended to enable advanced students to pursue their interests in areas not covered by other classes offered at the 4000 level. Students must consult with the faculty member whom they wish to supervise their work, and obtain his or her consent, before attempting to register for this course. The prerequisites (or corequisites) will be determined by the nature of the work the student wishes to do.

## PSYC 4990 (6CR)

## HONOURS THESIS

The senior thesis will involve an experimental research project carried out in close consultation with a member of the Department.
Prereq: PSYC 3001 and 3091; or permission of the Department.

## RELIGIOUS STUDIES

Religion deals with the most basic and ultimate questions of human existence: the meaning and purpose of life; the presence of death, sorrow and anxiety; the existence of God; questions of morality and justice; the possibilities of transcendence, salvation, and liberation for individuals and communities. Religion plays a central role in the construction of human cultures and societies, motivating and legitimating social, political, and ethical action. Religion has been and continues to be a powerful influence in literature, the arts, and history, as well as in current civil and global conflicts.
Religious Studies as an academic discipline does not indoctrinate in any religious tradition (though it may certainly help students clarify their own thinking and convictions). Rather, it takes a scholarly and analytical approach, and, as such, is open to students from all backgrounds, secular and religious. The academic study of religion examines the various religious traditions of the world, east and west, in their historical and contemporary contexts. It explores the various ways in which religion shapes culture and history, forms values, and authorizes human action. Thus Religious Studies is an integral part of the liberal arts curriculum.
Courses in Religious Studies are divided into three streams: Eastern Traditions (Hinduism, Buddhism, East Asian Religions), Western Traditions (Judaism, Christianity, Islam), and Religion and Culture. Introductory courses (at 1000 and 2000 levels) lay the foundation for focused study of particular traditions and for courses that explore how religion relates to themes in the wider culture - such as in the arts, gender issues, and ethics (at 3000 and 4000 levels).
The Humanities 1600 -series is intended to provide an introduction to Humanities disciplines. These three-credit courses offered by the participating disciplines of Classics, History, Philosophy and Religious Studies are designed to acquaint beginning students with the methodologies typical of these disciplines and to familiarize them with the approaches taken as well as the sorts of themes pursued and questions raised in these disciplines.
Further information is available on request from the Department Office, Room 112, Hart Hall (364-2556).

## RELIGIOUS STUDIES ELECTIVES

Those who wish to do electives may choose from Religious Studies courses in the 1600 series: 1641, 1651, and 1671; or from 2401, 2801, $2811,2821,2831$, or 2841 ; or with appropriate prerequisites, several other courses in the Department.

## Disciplinary B.A. Programmes

## MINOR in Religious Studies is 24 credits earned as follows:

6 from the Humanities 1600 Series
6 from Religious Studies at the 2000 level
12 from Religious Studies at the 3000/4000 level, chosen in consultation with the Programme Advisor.

## MAJOR AREA OF STUDY in Religious Studies is 60 credits earned as follows:

6 from the Humanities 1600 Series

RELG 2401 and 2801
RELG 3901
from RELG 3001, 3101, 3301 or 3311
from RELG 3501, 3601, or 3701
3 additional credits from RELG 3001, 3101, 3301, 3311, 3501, 3601, or 3701
18 from 3/4000 level Religious Studies courses, with at least 6 from 4000 level Religious Studies courses
18 credits from complementary courses in Arts and Letters, Humanities and Social Sciences, which may include further 2000 level Religious Studies courses, chosen in consultation with the Programme Advisor.

## HONOURS in Religious Studies is 72 credits earned as follows:

60 credits as in the Major, plus:
6 from Religious Studies 4990
6 from Religious Studies at the 3/4000 level, chosen in consultation with the Programme Advisor.

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## RELIGIOUS STUDIES COURSES

## RELG 1641 (3CR) <br> RELIGIOUS PERSPECTIVES ON THE BODY AND SEXUALITY

This course examines cross-cultural reflections on the human body and sexuality. The course will begin by situating these topics within the larger worldview of each tradition. In addition, it will examine issues of bodily functions, gender roles, sexual orientation, and related topics.

## RELG 1651 (3CR) <br> CONTEMPORARY MYTHS

This course identifies and explores some of the most prominent of the myths that shape our perspectives on life and set our priorities for living. The kind of myths that will be considered are: a science myth, a sports myth, a sex myth, a society myth, a consumer myth, an ecology myth, and a religion myth.

RELG 1671 (3CR)
SACRED SPACE AND PILGRIMAGE
This course examines how the phenomena of "sacred space" and "pilgrimage", or "sacred journey", originate and give expression to core beliefs, symbols, and devotion of various world religions. Particular attention is focused upon ancient and contemporary Jerusalem, a hotly contested site of holiness for Jews, Christians, and Muslims.
Exclusion: RELG 1671

## RELG 2401 (3CR) <br> INTRODUCTION TO EASTERN RELIGIONS

This course introduces the origins, history, philosophy and practice of the major religions of India, China, and Japan, including Hinduism, Buddhism, Jainism, Sikhism, Confucianism, Taoism, and Shinto.
Exclusion: RELG 2211

## RELG 2801 (3CR) <br> INTRODUCTION TO WESTERN RELIGIONS

This course examines the history, beliefs, practices, and contemporary socio-cultural significance of what are conventionally called the Western religions: Judaism, Christianity, and Islam. The course will also briefly examine Ancient Near Eastern religions (Egyptian and Mesopotamian), Greco-Roman paganism, as well as Zoroastrianism and Baha'i.
Exclusion: RELG 2201

## RELG 2811 (3CR) <br> NTRODUCTION TO THE BIBLE I: HEBREW BIBLE

An introduction - in English translation - to the literature of the Hebrew Bible, or Old Testament. Selected passages are discussed in the context of Israel's history, religion, and society, set against the backdrop of the Ancient Near Eastern civilizations of Egypt and Mesopotamia. We will seek to understand why these texts and the religion they represent have been so influential and in what ways they still illuminate and speak to the human situation today
Exclusion: RELG 2001

## RELG 2821 (3CR) <br> NTRODUCTION TO THE BIBLE II: NEW TESTAMENT

This course discusses the literature of the New Testament, in English translation, in light of the historical and cultural conditions from which it emerged. The New Testament is analyzed both as a witness to Jesus and to Christian origins, and as a text which has exerted enormous creative power within human culture and history.
Exclusion: RELG 2011

## RELG 2831 (3CR)

FAITH AND DOUBT
Consideration of western theism in terms of possibilities and forms of religious knowledge, rationality of belief in God, the challenge of the problem of evil, and the nature and significance of religion.
Exclusion: RELG 2501

## RELG 2841 (3CR)

## THE APOCALYPTIC CONSCIOUSNESS

A study of the apocalyptic consciousness in ancient documents and in modern thought, particularly with reference to ideas about the Day of Judgment and Second Coming. In addition to biblical and non-biblical texts, students will reflect on contemporary portrayals of the apocalyptic image in art, literature and film. Modern manifestations of the apocalyptic cult will be explored, with specific reference to cults of expectation.
Exclusion: RELG 2031

## RELG 3001 (3CR)

HINDUISM
A study of Hinduism, examining its origins, history, philosophy, and culture. The course will treat ancient, classical, medieval and modern periods, and conclude with a discussion of the challenges facing contemporary Hinduism.
Prereq: RELG 2401; or permission of the Department.
Exclusion: RELG 3261

RELG 3101 (3CR)
BUDDHISM
A study of Buddhism, examining its origins, history, philosophy and cultures. The course will treat the three major strands of classical Buddhism, and conclude with an analysis of the growing phenomenon of Western Buddhism.
Prereq: RELG 2401; or permission of the Department.
Exclusion: RELG 3271

## RELG 3301 (3CR) RELIGIONS OF CHINA

This course will study the religious traditions of China, examining the basic ideas and concepts underlying Chinese religion and the ways in which these ideas were implemented. The course will look in detail at both Confucianism and Daoism, at Chinese folk religion, and at the adaptation of Buddhism to China. It will conclude with an evaluation of the current state of religion in China.
Prereq: RELG 2401; or permission of the Department.

## RELG 3311 (3CR) <br> RELIGIONS OF JAPAN

This course will study the religious traditions of Japan, examining the underlying ideas and concepts of Shinto, including its relation to Shamanism, the nature and role of Kami, the role of purity and aesthetics, and its political functions. The introduction and adaptation of Buddhism and its relation to Shinto will be discussed, as will the modern day "new religions" which form such a vital part of contemporary Japanese religious practice. The influence and roles of Confucianism and Daoism will also be briefly covered.
Prereq: RELG 2401; or permission of the Department.

## RELG 3411 (3CR) <br> GENDER ISSUES IN EASTERN RELIGIONS

This course examines the role that gender plays in the context of myths, scriptural texts, rituals and doctrine, in the major religious traditions of the East. Attention will be paid to such matters as sexuality and sexual orientation, the body, feminism and other critical approaches, political rights and responsibilities, access to religious experience, and spiritual leadership.
Prereq: RELG 2401; or permission of the Department.
Exclusion: RELG 3900, 4280

## RELG 3501 (3CR) <br> JUDAISM

This course examines the roots and various expressions of Judaism in the ancient world up to the destruction of Jerusalem by the Romans in 70 CE and the rise of Rabbinic Judaism. Jewish life in the medieval world and the Islamic East, as well as the emergence of Kabbalah, are also discussed. The course then examines the emergence of various expressions of modern Judaism, including religious Zionism. The core convictions, sacred texts, institutions, and practices of Judaism will be analyzed within these historical contexts.
Prereq: RELG 2801, or 2811; or permission of the Department.
Exclusion: RELG 3241
RELG 3601 (3CR)
CHRISTIANITY
A consideration of the central beliefs and forms of the Christian tradition in terms of their origins and relevance for today.
Prereq: RELG 2801 or 2831; or permission of the Department.
Exclusion: RELG 2511

## RELG/HIST 3611 (3CR)

## CHRISTIANITY IN THE ROMAN EMPIRE

This course examines the crucial, defining crises of the ancient Christian communities in the social, political, and cultural context of Late Antiquity (roughly, 2nd to 6th centuries CE/AD) and the Roman Empire. Early Christianity is analyzed as a social movement, as a religious movement with a developing belief system, and as an historical phenomenon embedded within historical events and processes.
Prereq: RELG 2801 or 2821 or 3601 or third or fourth year History Major; or permission of the Department.
Note: This course is cross-listed as HIST 3611 and may therefore count as three credits in either discipline.
Exclusion: RELG 3601

## RELG/HIST 3621 (3CR)

## CHRISTIANITY IN CHRISTENDOM

A consideration of Christianity at the height of its political power in the middle ages.
Prereq: RELG 3601 or 3611 or third or fourth year History Major; or permission of the Department.
Note: This course is cross-listed as HIST 3621 and may therefore count as three credits in either discipline.
Exclusion: RELG 3620
RELG/HIST 3631 (3CR)

## CHRISTIANITY IN THE REFORMATION ERA

A consideration of the reasons for and impact of the divisions in Christianity instituted by the Protestant Reformation.
Prereq: RELG 3601 or 3611 or 3621 or third or fourth year History Major; or permission of the Department.
Note: This course is cross-listed as HIST 3631 and may therefore count as three credits in either discipline.

## RELG/HIST 3641 (3CR) <br> CHRISTIANITY AND MODERN STATES

A consideration of how secularization has occurred in various modern states and of the sphere of influence that remains for religion in these circumstances.
Prereq: RELG 3601 or 3611 or 3621 or third or fourth year History Major; or permission of the Department.
Note: This course is cross-listed as HIST 3641 and may therefore count as three credits in either discipline.
Exclusion: RELG/HIST 3641 (The Modern Church)

## RELG 3661 (3CR) <br> THE CHRISTIAN TRADITION AND THE UNIVERSITY

This course will introduce students to a consideration of the relationship between the Christian tradition and the origins and philosophy of the university, science, education and the liberal arts. The student will be encouraged to explore the complex inter-relatedness of litterae and religio and scientia, especially the creative tensions among these ways of knowing.
Prereq: RELG 2801 or 3601 ; or permission of the Department. Exclusion: RELG 2601

## RELG 3701 (3CR)

## ISLAM

This course traces Islam from its origins in the life and activities of Mohammed through to contemporary world Islam and its diverse responses to the challenges of "modernity" and the West. The world view, institutions, rituals, and practices of Islam will be studied within these changing historical and cultural contexts. Effort will be made throughout to gain insight into the religious, spiritual impulses which animate Islam and unite devout Muslims.
Prereq: RELG 2801; or permission of the Department.

## Exclusion: RELG 3291

## RELG 3811 (3CR)

## GENDER ISSUES IN WESTERN RELIGIONS

This course examines the role that gender plays in the context of myths, scriptural texts, rituals and doctrine, in the major religious traditions of the West. Attention will be paid to such matters as sexuality and sexual orientation, the body, feminism and other critical approaches, political rights and responsibilities, access to religious experience, and spiritual leadership.
Prereq: RELG 2801; or permission of the Department.
Exclusion: RELG 3900, 4280

## RELG/PHIL 3891 (3CR)

ORIENTAL THOUGHT
A study of the ancient trends of Oriental literature in the light of western philosophical concerns. Readings include the Hindu Bhagavad-gita, the Chinese Tao Te Ching, and selected Buddhist writings.
Prereq: Six credits in Philosophy; or permission of the Department. Note: This course is cross-listed as PHIL 3891 and may therefore count as three credits in either discipline.

## RELG 3901 (3CR) <br> THEMES AND THEORIES IN RELIGIOUS STUDIES

This course examines various kinds of religious phenomena, including mystical experience, sacred texts, religious ethics, and ritual, and explores the different ways they are understood and interpreted in the discipline of Religious Studies. Major theoretical approaches, including text-historical, phenomenological, gender-critical, philosophical, cultural-critical, are explored and critically assessed for their value in the study of religion.
Prereq: RELG 2401, 2801; or, permission of the Department. This is a required course for all Majors and Honours students in Religious Studies, and is recommended for those taking a Minor.

## RELG 3911 (3CR)

## CONTEMPORARY ETHICAL ISSUES (WESTERN)

A consideration of the nature of ethics will be followed by exploration of some of the most prominent contemporary ethical issues, such as abortion, euthanasia, ecology, gay rights, racism, and sexism.
Prereq: RELG 2801 or 3601 or PHIL 2701; or permission of the Department.
Exclusion: RELG 3541

## RELG 3921 (3CR)

EASTERN RELIGIONS AND CONTEMPORARY ETHICAL ISSUES
A discussion of the Eastern Traditions' responses to contemporary ethical issues, such as those of abortion, euthanasia, ecology, and bio-medical technologies. The course will look at both classical and contemporary perspectives.
Prereq: RELG 2401; or permission of the Department.
RELG 3931 (3CR)

## THE BIBLE AND THE ARTS

This course will explore major biblical themes in the art and literature of the western world, looking at ways in which themes such as creation, liberation, salvation, resurrection, and fulfilment have been portrayed and interpreted in literature, the visual arts and music. The focus will be on the widespread influence of the Bible and biblical motifs on Western culture.
Prereq: RELG 2801 or 2811 or 2821; or permission of the Department.

## RELG 3941 (3CR)

## RELIGION, REVOLUTION AND VIOLENCE

This course examines the development and historical manifestations of ideologies of violence and nonviolence within the major world religions, with special attention to how these ideologies continue to play themselves out in contemporary global and national conflicts.
Prereq: RELG 2401 and 2801; or permission of the Department.
Exclusion: RELG 3231
RELG 3951 (3CR)
ETHICS IN BUSINESS
A consideration of how ethics is and may be involved in business practice for individuals and corporations.
Prereq: Open to third and fourth year students; or permission of the Department.
Exclusion: RELG 3550

RELG 3961 (3CR)
ETHICS IN BUSINESS CULTURE
A consideration of the challenges posed for business ethics by the power of the limited liability corporation and its expansion into the transnational corporation and the global economy as reflected in the World Trade Organization.
Prereq: Open to third and fourth year students; or permission of the Department.
Exclusion: RELG 3550

## RELG 3971 (3CR) <br> RELIGION IN FILM

This course examines the cultural legacy and/or influence of various religious traditions and scriptural texts in the modern medium of film. It begins, with an examination of some great religious "epics", and then considers more recent cinematic treatments of religious themes and figures.
Prereq: RELG 2401 and 2801; or permission of the Department. (2811 and 2821 are also strongly recommended)

## RELG 3981 (3CR) RELIGIOUS ETHICS AND THE ENVIRONMENT

What role does religion play in our interaction with the environment? This course examines various religious perspectives on nature and environmental ethics. Focusing primarily on Eastern traditions, the course begins by reviewing the concept and place of nature in various religions, and then critically examines scholarship which applies religious perspectives to issues in environmental ethics. We will also consider the religious basis of certain environmental thinkers and movements.
Prereq: RELG 2401; or permission of the Department.

## RELG 4401 (3CR)

## HINDUISM AND BUDDHISM IN LITERATURE

A seminar-style course treating several genres of Hindu and Buddhist literature. The course will begin with a study of classical texts, such as the Hindu epics and the Buddhist canon, and will conclude with a discussion of contemporary literary works.
Prereq: RELG 3001 or 3101 ; or permission of the Department.

## RELG 4411 (3CR)

ADVANCED STUDIES IN EASTERN THOUGHT
A seminar-style course on Eastern philosophies, focusing on the traditions of Hinduism and Buddhism. The course will examine both classical systems of thought and their modern interpretations.
Prereq: RELG 3001 or 3101; or permission of the Department.
RELG 4421 (3CR)
EASTERN RELIGIONS AND THE CHALLENGE OF MODERNITY
A senior-level course studying the contemporary state of Eastern Religions. The course will discuss the recent histories of the Eastern Religions, looking at the challenges of science, the impact of colonialism, movements of political independence, and issues of poverty and social justice. It will particularly study these traditions' encounter with the West, and their responses to the cultural exchange that ensues from this encounter.
Prereq: RELG 2401 and either 3001 or 3101; or permission of the Department.

## RELG 4601 (3CR)

## RECENT CHRISTIAN THOUGHT

Consideration of influential directions in recent theology with focus on approaches such as secular theologies, political theologies,
liberationist theologies, feminist theologies, environmental theologies, process theologies, and post-modern theologies.
Prereq: RELG 3601; or permission of the Department.
Exclusion: RELG 3531
RELG 4801 (3CR)
MODERN WESTERN CRITIQUES OF RELIGION
Consideration of challenges to religion by prominent modern thinkers such as Hume, Kant, Hegel, Marx, Feuerbach, Darwin and Nietzsche.
Prereq: RELG 2831; or permission of the Department.
Exclusion: RELG 3521

## RELG 4821 (3CR)

## SACRED TEXTS IN WESTERN RELIGIONS

This course examines the phenomena of "sacred text" (scripture) and "sacred tradition" within Judaism (Torah), Christianity (New Testament), and Islam (Quran). The course addresses questions of the origin of sacred texts and how they nourish the religious, cultural, and social life of a community. It explores how diverse Jewish, Christian, and Muslim communities at different periods in their histories have made fresh appropriations of the scriptural tradition through various strategies of interpretation.
Prereq: RELG 2811 or 2821, and one of 3501, 3601, or 3701; or permission of the Department.
Exclusion: RELG 3251

## RELG 4841 (3CR)

## SEXUALITY AND THE BIBLICAL TRADITION

This course will focus on the history of sexuality in the biblical and post-biblical traditions. The course examines, first, the Bible's treatment of the subject of sex (including bodily purity, reproduction and sexual orientation) through the close reading of biblical texts. It then looks at the Bible's influence on this subject in the history of Judaism and Christianity, and, finally, in the modern, secular era.
Prereq: RELG 2811 and 2821; or permission of the Department.
RELG 4950/4951 (6/3CR)
DIRECTED STUDY ON SPECIAL TOPICS
Independent reading and study under the direction of a member of the Department.
Prereq: Permission of the Department.
RELG 4990 (6CR)
HONOURS THESIS
Independent research and thesis writing under the direction of a member of the Department, for students in the Religious Studies Honours programme.
Prereq: Permission of the Department.

## SCIENCE, TECHNOLOGY AND SOCIETY

## Interdisciplinary B.A. Programme

## INTERDISCIPLINARY MINOR in Science, Technology and Society is 24 credits earned as follows:

6 from Philosophy 1651, Science above the 1000 level, Sociology 1001, Religious Studies 1651
6 from Sociology 3601, 4601
6 from Philosophy 2511, 3511
6 from Philosophy 1651, Religious Studies 1651, Sociology 3611, 3631, Mathematics 3031, Geography 3211, Commerce 4441, Computer Science 3851, Economics 3501 chosen in consultation with the Programme Advisor.

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## SOCIOLOGY

Sociology involves the study of people as they interact with one another in varied social, structural, cultural and historical contexts. Sociology provides information on the social world, introduces students to different perspectives on social life, and offers training in specific research skills. It expands our horizons, challenges us to think critically about the world around us, and prepares us to participate in that world First and second year sociology courses provide an overview of the discipline and an introduction to sociological analysis. Third year courses emphasize theoretical approaches, analytical methods, and their application to major substantive areas of sociological interest. Fourth year courses allow students to work with greater interdependence and in more depth on a range of sociological topics.

## Disciplinary B.A. Programmes

## MINOR in Sociology is 24 credits earned as follows:

3 from Sociology 1001
3 from Sociology 2001
6 from Social Science at the $1 / 2000$ level
12 from Sociology at the 3/4000 levels, chosen in consultation with the Programme Advisor.

## MAJOR AREA OF STUDY in Sociology is 60 credits earned as follows:

3 from Sociology 1001
6 from Social Science at the $1 / 2000$ level
3 from Sociology 2001
3 from Sociology 3301
6 from Sociology 3001, 3011
12 from Sociology at the $3 / 4000$ levels
6 from Sociology at the 4000 level
3 further credits in Sociology
18 credits from complementary courses in Social Science, Humanities, Arts and Letters, and Psychology or Math 2311, 2321, 3311,3321 chosen in consultation with the Programme Advisor.

## HONOURS in Sociology (Thesis Option) is 66 credits earned as follows:

42 credits as in the eight lines of the Major, plus:
18 from Sociology at the 3/4000 levels chosen in consultation with the Programme Advisor
6 from Sociology 4990

## HONOURS in Sociology (Course Option) is 66 credits earned as follows:

42 credits as in the eight lines of the Major, plus:
24 from Sociology at the 3/4000 level, including 6 from the 4000 level, chosen in consultation with the Programme Advisor.

Note: The Honours Average will be calculated on all courses required for Honours that have been taken above the 1000 level.

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## SOCIOLOGY COURSES

## SOCI 1001 (3CR) <br> INTRODUCTION TO SOCIOLOGY

The course is designed to introduce students to the basic concepts of sociology. These concepts include social structure, culture, socialization, deviance, social control, social organization, structured social inequality, and social change. Extensive use is made of examples from the Canadian context.

## Exclusion: SOAN 1001

## SOCI 2001 (3CR) <br> PRINCIPLES OF SOCIAL ANALYSIS

A study of the fundamental elements of social analysis from the sociological perspective. The aim is to give students a firm grounding in the general approaches taken in sociology and to promote the particular critical thinking, reading, methodological, and writing skills essential to advanced work in the discipline. This course is a prerequisite for entry into SOCI 3001, 3011 and 3301.
Prereq: SOCI 1001 and 3 credits in Social Science; or permission of the Department

## SOCI 3001 (3CR)

## THEORETICAL FOUNDATIONS OF SOCIOLOGY

A critical review of the perspectives developed in the first and second generations of sociology in Europe, with special emphasis on the ideas of Auguste Comte, Herbert Spencer, Karl Marx, Max Weber and Emile Durkheim.
Prereq: SOCI 1001, 2001 and 6 credits in Social Sciences at the $1 / 2000$ levels; or permission of the Department
Exclusion: SOAN 3001

## SOCI 3011 (3CR) <br> CONTEMPORARY SOCIOLOGICAL THEORY

An overview of concepts, theoretical issues, and debates in recent sociological theory. The course examines the nature of functionalism and conflict theory, the rise of micro-sociological analysis, the challenges of feminism, the debate over post-modernism, and other contemporary theoretical developments.
Prereq: SOCI 1001, 2001, 3001 and 6 credits in Social Sciences at the $1 / 2000$ levels; or permission of the Department
Exclusion: SOAN 3011
SOCI 3111 (3CR)
INEQUALITY IN CANADIAN SOCIETY
An analysis of social inequality in Canada, past and present. Such topics as the development of the Canadian class structure, income distribution, social mobility, educational opportunity, life chance differentials, gender inequality, ethnic inequality and class consciousness will be discussed.
Prereq: SOCI 1001 and 9 credits in the Social Sciences at the 1/2000 levels; or permission of the Department
Exclusion: SOAN 3111

## SOCI 3121 (3CR) <br> LANGUAGE AND ETHNICITY IN CANADA

An analysis of the official linguistic duality and ethnic plurality of Canadian society. Focus will fall on the nature of these two fundamental features of the society, and on their cause and consequence.
Consideration will also be given to regional variations within Canada as well as to comparisons with other societies. Particular attention will be paid to understanding the social-psychological, structural, and cultural consequences of linguistic and ethnic diversity within Canadian society.
Prereq: SOCI 1001 and 9 credits in the Social Sciences at the $1 / 2000$ levels; or permission of the Department
Exclusion: SOAN 3121

## SOCI 3201 (3CR)

## PRIMARY AND SECONDARY SOCIALIZATION

This course centres on the relationship between the individual and society. This fundamental sociological theme is considered, mainly using the symbolic interactionist perspective on socialization as a life-long process of learning, with continual implications for identity. The differences between primary and secondary socialization will be a theme recurring throughout the course.
Prereq: SOCI 1001 and 9 credits in the Social Sciences at the $1 / 2000$ levels; or permission of the Department.
Exclusion: SOAN/SOCI 2201
SOCI 3211 (3CR)

## GENDER RELATIONS

An introduction to the study of gender through an examination of the nature of gender relations. Major theories of the origin and consequences of gender inequality will also be considered. Issues such as reproduction, work, law, violence, and racism are addressed, using cross-cultural examples.
Prereq: SOCI 1001 and 9 credits in the Social Sciences at the $1 / 2000$ levels; or permission of the Department.
Exclusion: SOAN/SOCI 2211

## SOCI 3301 (3CR)

## SOCIOLOGICAL RESEARCH METHODS

This is a course in sociological research methodology, including a consideration of questions of social epistemology and research design. Students will gain practical experience in doing social research through the conducting of surveys, participant observation, content analysis, case studies, and other techniques.
Prereq: SOCI 1001, 2001 and 6 credits in Social Sciences at the $1 / 2000$ levels; or permission of the Department
Exclusion: SOAN 3301

## SOCI 3331 (3CR)

FIELD COURSE IN SOCIOLOGY
This course is designed to provide students with an intensive field experience, during which they pursue research on a topic to be chosen by the Instructor. As such, the course is not designed to be offered during normal term time, but is available to students through Continuing Education. Completion of SOCI 3301 (Sociological Research Methods) is recommended before registering for this course.
Prereq: Permission of the Department.

SOCI 3431 (3CR)

## CRITICAL MEDIA ANALYSIS

An advanced research course on the media-based control of information and dissemination of ideologies in modern society. The course will examine issues of ownership and control of the media and the social construction of news. Students will examine in detail current theoretical debates in cultural studies and media analysis.
Prereq: SOCI 1001 and 9 credits in the Social Sciences at the 1/2000 levels; or permission of the Department

## Exclusion: SOAN 3431

## SOCI 3441 (3CR) <br> SOCIOLOGY OF KNOWLEDGE

This course focuses on the relationship between ideas and their social and cultural contexts. The course will critically examine various forms of knowledge, including common sense, scientific knowledge, and feminist epistemology.
Prereq: SOCI 1001 and 9 credits in the Social Sciences at the 1/2000 levels; or permission of the Department

## Exclusion: SOAN 3441

## SOCI 3451 (3CR)

## DYNAMICS OF POPULAR CULTURE

An investigation of the process and forms of contemporary popular culture. Students will be introduced to the major theoretical debates in the field of popular culture. In addition, the course will examine the development of popular cultural expression.
Prereq: SOCI 1001 and 9 credits in the Social Sciences at the $1 / 2000$ levels; or permission of the Department
Exclusion: SOAN 3451, 2421

## SOCI 3521 (3CR) <br> COMMUNITIES

A review of the sociological literature on rural, small-town, and urban social organization with special emphasis on the notion of "community" in Canadian society.
Prereq: SOCI 1001 and 9 credits in the Social Sciences at the $1 / 2000$ levels; or permission of the Department

## Exclusion: SOAN 3521

## SOCI 3601 (3CR)

## SCIENCE, TECHNOLOGY AND SOCIETY

An analysis of the social processes associated with science and technology. The course will consider such topics as: the social dynamics of scientific and technical communities; the social processes of technical invention, diffusion, and control; and the role of technology in the work-place and the household.
Prereq: SOCI 1001 and 9 credits from PHIL 1651, PHIL 2511, 3511, RELG 1651, Social Sciences at the $1 / 2000$ levels; or permission of the Department
Exclusion: SOAN 3601

## SOCI 3611 (3CR)

## ENVIRONMENTAL CONTROVERSIES

A course in the sociology of environmental controversies with particular attention to the social processes involved in the genesis, development, maintenance, containment, and decay of environmental controversies. This includes a consideration of the role of a range of social factors in controversies, including: science, technology, the media, public constituencies, the law, public hearings, environmental assessments, and bureaucracies.
Prereq: SOCI 1001 and 9 credits in the Social Sciences at the $1 / 2000$ levels; or permission of the Department
Exclusion: SOAN 3611

## SOCI 3631 (3CR)

SOCIOLOGY OF CYBERSPACE
A course in the sociology of cyberspace, considering the social, structural, cultural, and interactional dimensions of cyberspace and the information society. Cyberspace will be treated in the broader context of the role of information in society, and the theories of the relationship between communication technologies and social structures. The usefulness of the term cyberspace as well as its commercial hype and pop cultural status will be examined.
Prereq: SOCI 1001 and 9 credits in the Social Sciences at the $1 / 2000$ levels; or permission of the Department

## Exclusion: SOAN 3631

SOCI 3701 (3CR)

## LAW IN CANADIAN SOCIETY

This course examines the structure and variation of law in its social context in general and with particular reference to Canadian society. The differences and similarities in legal systems in societies and the major trends in the development of law in western society are a focus of the course. The relationship between the structure of law and social order is discussed in relation to a range of topics which may include crime, conflict resolution, social change, administration and economic change.
Prereq: SOCI 1001 and 9 credits in the Social Sciences at the 1/2000 levels; or permission of the Department
Exclusion: SOAN 3701

## SOCI 3911 (3CR)

INTERMEDIATE SPECIAL TOPICS IN SOCIOLOGY
An intermediate course which focuses on topics not covered by current course offerings in Sociology, or topics not covered in depth in the courses offered.
Prereq: SOCI 1001 and 9 credits in the Social Sciences at the $1 / 2000$ levels; or permission of the Department
Exclusion: SOAN 3911
SOCI 4001 (3CR)
SOCIOLOGICAL THEORY
An advanced discussion of sociological theory based on major works of selected sociologists.
Prereq: SOCI 3001; 3011,3301 or permission of the Department. Exclusion: SOAN 4001

SOCI 4031 (3CR)

## FEMINIST PERSPECTIVES

This advanced seminar course examines the nature of feminist methodological approaches and theoretical analyses. Students will explore feminist contributions on a variety of issues.
Prereq: SOCI 3001, 3011, 3301; or permission of the Department.
Exclusion: SOAN 4031

## SOCI 4101 (3CR)

## CLASS, STATUS AND PARTY

An advanced discussion of the economic, social and political dimensions of structured social inequality. Canadian content will be used where appropriate.
Prereq: SOCI 3001, 3301 and 3 additional 3000 level credits in Sociology; or permission of the Department.

## Exclusion: SOAN 4101

## SOCI 4201 (3CR)

## SOCIAL INTERACTION

This advanced course examines the theoretical underpinnings of approaches taken to under-standing social interaction and critically evaluates such approaches as symbolic interactionism, phenomenology and behaviourism.
Prereq: SOCI 3001, 3301 and 3 additional 3000 level credits in Sociology; or permission of the Department.

## Exclusion: SOAN 4201

## SOCI 4511 (3CR)

## SOCIAL ORDER AND SOCIAL CHANGE

An advanced seminar on the nature and maintenance of social order in society. The course examines the way in which the combination of coercion and consent leads to the maintenance of power on the part of elite groups, and the suppression of dissent from other groups. In addition, strategies for social change are assessed sociologically. Prereq: SOCI 3001, 3301 and 3 additional 3000 level credits in Sociology; or permission of the Department.

## Exclusion: SOAN 4511

## SOCI 4531 (3CR)

## EDUCATION AND SOCIETY

A research seminar in the sociology of education in Canada. Topics covered include educational credentialism; education and social mobility; access to post-secondary education; the increasing significance of professionalism; educational institutions; and educational subcultures.
Prereq: SOCI 3001, 3301 and 3 additional 3000 level credits in Sociology; or permission of the Department.
Exclusion: SOAN 4531

## SOCI 4601 (3CR)

THE SOCIAL DYNAMICS OF SCIENCE AND TECHNOLOGY
An advanced course in science and technology studies.
Prereq: SOCI 3001, 3301; or 9 credits from 3601, 3611, GEOG 3211, PHIL 2511, 3511; or permission of the Department.
Exclusion: SOAN 4601

## SOCI 4901 (3CR)

## ISSUES IN SOCIOLOGY

A study of specific issues in Sociology or Anthropology.
Prereq: SOCI 3001, 3301 and 3 additional 3000 level credits in Sociology; or permission of the Department.
Exclusion: SOAN 4901

## SOCI 4911 (3CR)

ADVANCED SPECIAL TOPICS IN SOCIOLOGY
An advanced course which focuses on topics not covered by current course offerings in Sociology, or topics not covered in depth in the courses offered.
Prereq: SOCI 3001, 3301 and 3 additional 3000 level credits in Sociology; or permission of the Department.
Exclusion: SOAN 4911

## SOCI 4990 (6CR)

HONOURS THESIS
Prereq: Permission of the Department.

## SOCIOLOGY/ANTHROPOLOGY

Note: Interdisciplinary Major Area of Study and Honours in Sociology/Anthropology are also available. See Sociology/Anthropology.

## SPANISH STUDIES

See Modern Languages and Literatures, Hispanic Studies

## SOCIOLOGY / ANTHROPOLOGY

## Interdisciplinary Programme

In everyday life, people concern themselves with various features of the world which they describe as social. Our interest in the social dimension of life is reflected in the many university disciplines dealing with some aspect of it. Sociology and Anthropology differ from other forms of inquiry in the extent to which study focuses on social phenomena and rests on the common general assumptions of the two disciplines that social life is most significantly structured by social forces. The programme is designed to develop an awareness of social and cultural processes and forms, emphasizing what it means to think sociologically and anthropologically. As in all areas of serious study, the two disciplines involve a number of different approaches, and the programme is designed to provide students with a good grasp of these various perspectives. Most courses offered also integrate material from Sociology and Anthropology.

## MAJOR AREA OF STUDY in Sociology / Anthropology is 60 credits earned as follows:

6 from Sociology 1001, Anthropology 1011
6 from Sociology and/or Anthropology at the 2000 level
3 from Sociology 3301 or Anthropology 3311
6 from Sociology 3001, 3011, 4001, 4031 Anthropology 3021, 3031, 4021
3 from Anthropology 2801, 3811, 3821, 3831, 3841, 3851, 3861
6 from Sociology and/or Anthropology at the 3/4000 level
6 from Sociology and/or Anthropology at the 4000 level
6 further credits in Sociology and/or Anthropology
18 credits from complementary courses in Social Science, Humanities, Arts and Letters, and Psychology or Math 2311, 2321, 3311, chosen in consultation with the Programme Advisor.

## HONOURS in Sociology/Anthropology (Thesis Option)

 is 66 credits earned as follows:42 credits as in the first eight lines of the Major, plus:
3 additional credits from Anthropology 3021, 3031, 3311, 4021, 4311 Sociology 3001, 3011, 3301,4001,4031,
15 from Sociology and/or Anthropology at the 3/4000 level, including 6 from the 4000 level, chosen in consultation with the Programme Advisor
6 from Sociology or Anthropology 4990

## HONOURS in Sociology/Anthropology (Course Option) is 66 credits earned as follows:

42 credits as in the first eight lines of the Major, plus:
9 further credits from Sociology 3001, 3011, 3301, 4001,4031, Anthropology 3021, 3031, 3311, 4021, 4311
15 further credits from Anthropology and/or Sociology at the 3/4000 level, including 9 from the 4000 level, chosen in consultation with the Programme Advisor.

Note: The Honours Average will be calculated on all courses required for Honours that have been taken above the 1000 level.

Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.

Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## WOMEN'S STUDIES

Women's Studies is an interdisciplinary program with a critical focus on social, cultural, economic, and political issues from the perspective of gender. Drawing on a substantial body of scholarship that challenges many of the assumptions and methods of traditional academic disciplines, Women's Studies creates new perspectives from which all students may analyze such issues as work, health, sexuality, violence, family Race, class and ethnicity. The curriculum of the Minor in Women's Studies includes core courses in Women's Studies and elective courses in the following departments: History, Sociology and Anthropology, Geography, Religious Studies, Philosophy, English, Classics, Psychology, Political Science, Canadian Studies and Modern Languages and Literatures. The core courses provide an introduction to the principles of Women's Studies as well as a more advanced study of the theoretical and methodological approaches of feminism.

## MINOR in Women's Studies is 24 credits earned as follows:

12 from Women's Studies 2001, 3001, 3021, 4001
12 from Canadian Studies 3301, 3311, 4250/4251* Classics/History 2051, Classics 4950/4951*, English 3651, 3661, 4901*, Geography 4811, 4950*, History 3531, 4571, 4950/4951*, French 3821, German 4950/4951*, International Relations 3001, Spanish 4950/4951* ${ }^{*}$,4880/4951*, Philosophy 4950/4951* ${ }^{*}$, Political Science 3131, 4950*, Psychology 2501, 4401*, 4501*, Religious Studies 3900,4841, 4950/4951* Sociology 3211,4031, Sociology 4911* Anthropology 4911*

Note: Asterisked courses are Special or Advanced Topics courses and are acceptable for credit when a significant Women's Studies component can be demonstrated.
Note: The listing of a course in the calendar is not a guarantee that the course is offered every year.
Note: Students must obtain a grade of at least C- in all courses used to fulfill prerequisite requirements. Otherwise, written permission of the appropriate Department or Programme Coordinator must be obtained.

## WOMEN'S STUDIES COURSES

## WOST 2001 (3CR)

## INTRODUCTION TO WOMEN'S STUDIES

This course provides an introduction to Women's Studies, a discipline which documents and analyzes the experience and contributions of women from a global and historical perspective. Students will be introduced to the core principles of the discipline of women's studies. In addition, the course will examine key issues of research and analysis in women's studies, including: social construction of sex and gender, patriarchy and the origins of female subordination, and women's activism and social change initiatives.
Prereq: Completion of 30 credits or permission of the instructor.

WOST 3001 (3CR)

## FEMINIST THEORIES

This course provides a comparative and critical analysis of various feminist theories developed as explanatory frameworks for the understanding of the gender divisions within society. The course will review major feminist critiques of conventional approaches, and will offer an introduction to feminist thought. Theories examined include uniquely feminist theories such as radical feminism and cultural feminism, as well as feminist modifications of traditional social and political theories. Attention is given to perspectives which emerge from the diversity of women's lives.
Prereq: WOST 2001 or permission of the instructor.

## WOST 3021 (3CR)

FEMINIST EPISTEMOLOGY AND METHODOLOGY
This course examines feminist critiques and strategies relating to the construction of knowledge and research methodologies, with particular attention to both historical and contemporary debates on significant research issues. Students will be introduced to the methods, techniques, and ethics involved in feminist research and analysis. The emphasis is both theoretical and practical: students will therefore engage in the process of assessing and performing feminist research.
Prereq: WOST 2001, 3001 or permission of the instructor.
WOST 4001 (3CR)

## CONTEMPORARY ISSUES IN FEMINISM

This course provides an opportunity for students to study in considerable depth and detail selected contemporary issues of feminism in a global context. The course may focus on issues such as the politics of difference, theory and praxis debates, anti-feminist backlash, women and social change, masculinities, and feminist explorations of the body. Prereq: WOST 2001, 3001, 3021 or permission of the instructor.

## 9 CONTINUING AND DISTANCE EDUCATION

The Department of Continuing and Distance Education provides educational opportunities for part-time, mature and evening students. It also provides the opportunity for full-time students to take additional courses. It helps part-time day students through the admissions and registration process and aids them in obtaining needed advice and counselling. The department also assists Student Life with orientation activities for these students.

### 9.1 EVENING CREDIT PROGRAMME

An evening credit programme consisting of approximately 20 courses each year is offered during the September through April academic year. It is possible for students to earn most of the 120 credits necessary for a B.A. degree through this programme as well as a number of Science and Commerce credits. Evening courses are offered each year in Moncton. Courses may also be arranged in other communities, such as Truro, Parrsboro, and Sussex, upon request. The Department attempts to introduce new courses into this programme to meet changing demands of adult learners.

### 9.2 INTERSESSION AND SUMMER COURSES

Intersession courses are offered during the period of May - June, in Sackville, Moncton, and Miramichi. These courses expand the offerings of the evening credit programme as well as provide the opportunity for full-time students to take additional courses. Intersession 6 credit courses run four days or evenings a week, for seven weeks in May and June; 3 credit courses run two days or evenings a week during this period. A few summer courses may be offered during the month of July and early August. These run during the day, 2.5 hours per day for 3 weeks ( 3 credit course) or 2.5 hours per day for 6 weeks ( 6 credit course). Students in Good Standing may register for a maximum of 6 credits offered through Continuing and Distance Education in each of the Spring and Summer sessions, for a maximum total of 12 credits. Exceptions must be approved in writing by an Academic Dean.

### 9.3 THE DISTANCE EDUCATION PROGRAMME

The Distance Education programme is offered during both the academic year and the summer. It allows students to acquire credits toward a degree at home. During the fall/winter term, students are given the usual eight months to complete six credits; during the summer they have the option of completing these courses in four months. While most students register for these courses in September, January or April, part-time students may sign up for courses at any time during the year.
Full-time students registering for Distance Education courses must have the approval of an Academic Dean and follow registration and withdrawal deadlines as outlined in the Academic Regulations section.

### 9.4 FIRST YEAR AT HOME PROGRAMME

The Department coordinates the Mount Allison contribution to the Cooperative University Program on the Miramichi. This programme, offered in partnership with St. Thomas University and UNB, provides a first year university program in Arts, Science, Social Science and

Commerce to students on the Miramichi. This enables Miramichi students to complete their first year of university studies at home. Mount Allison's contribution is the offering of 5-7 courses in a variety of subjects. A very limited number of second and third year courses is also offered in this program, to enable selected students to complete their second year of university studies on the Miramichi. A First Year at Home Program is also offered in Moncton, New Brunswick. As in the Miramichi, the intention of this program is to allow students to take all of their first year courses while staying in Moncton. All courses in this program are Mount Allison courses. The program includes required first year courses in Sciences, and Social Sciences, plus several elective courses.

### 9.5 TRAVEL/STUDY PROGRAMMES

A summer study program is arranged during the months of May and June in Hangzhou, China. This is an inclusive, escorted study program at Zhejiang University during which time students have the opportunity to earn 12 credits ( 6 in Chinese language and 6 in History) while living in a university setting and experiencing all aspects of life as a student in China. The department is presently working to arrange other travel/study programmes. For details and updates of the travel/study programmes, contact the Department of Continuing and Distance Education.

### 9.6 SEMINARS AND WORKSHOPS

Non-credit courses, seminars and workshops may be organized during the academic year and in the summer on a wide variety of topics. These are designed to provide educational experiences on a short-term, casual basis. Such courses are usually offered at the University but may be given in nearby communities upon request.

### 9.7 FEES

Fees for all credit courses are based on full- time tuition fees and change as those fees change. For non-credit evening courses or lecture series, fees vary according to the length and type of programme being offered.

### 9.8 FINANCIAL AID

Several forms of financial aid are currently available to part-time students. These include the Scoudouc Awards, and Part-time Student Loans. Scoudouc Awards, donated by Dr. William Webster, are available to New Brunswick residents only and range in value from \$100 to \$300 per course. Part-time student loans are interest-bearing loans guaranteed by the Government of Canada, and may be used for tuition, books, transportation, day care and incidentals. The university also administers a bursary programme for which part time students may be eligible.

### 9.9 CONTACT INFORMATION

For more information on any of the programmes described above, please contact the Department of Continuing and Distance Education, 65 York St., Mount Allison University, Sackville, New Brunswick, E4L 1E4; telephone 506-364-2266, Fax 506-364-2301. Web:
[http://www.mta.ca/conted/distance.html](http://www.mta.ca/conted/distance.html). E-mail:
[continuing_ed@mta.ca](mailto:continuing_ed@mta.ca).

## 10 CO-CURRICULARLIFE

### 10.1 THE STUDENT UNION

The Student Union of Mount Allison is governed by the Students' Administrative Council (SAC). This a body of elected and appointed persons who represent, organize, and plan for the interests of the students. However, the wider Mount Allison community benefits from many of the activities the SAC pursues.
The SAC represents the students through council with representatives from on and off campus, and the six member executive. There are also many other positions, appointed through the SAC that allow any students the opportunity to get involved. Many positions include small honoraria. The SAC also employs an administrator and office manager to aid in its work. The SAC is located in the University Centre.
Some of the services and events we provide include:

- Organizing ORIENTATION, HOMECOMING and WINTER CARNIVAL
- Photocopying and faxes (pay as you play)
- Examination File
- Student Directories and your Allisonian Yearbook
- MAST (Mount Allison Student Tutoring)
- Dances, speakers, entertainment...AND MORE!!

The SAC also sponsors and promotes the Clubs and Societies (C\&S) of Mount Allison. These are a great asset and a wonderful way to become involved on campus. They include:

- Academic Departments C\&S (eg. Commerce Society, Fine Arts Society)
- Political C\&S - Young PC's, Young Liberals and Young NDP's
- Musical C\&S - Chapel Choir, Conservatory Chorale, Ethel Peake Memorial Society, Mt. Allison Brass Ensemble, etc.
- Blue/Green Society (Environmental)
- Eurhetorian Society (Debating)
- Garnet and Gold Society (Musical Theatre group)
- Mount Allison Christian Fellowship
- Society of All Nations (SAN)
- World University Services of Canada (WUSC)

Any student wishing to form a club or society can do so. Come to the SAC and we will help you get started. Athletic clubs and intramurals are all run through the Athletics Department. Students have wide spread representation on the campus, including membership on the Board of Regents (governing body) and Senate (academic body). Full-time students are also enrolled as members of the New Brunswick Student Alliance.

### 10.2 THE ARGOSY WEEKLY

This weekly newspaper has been published for over 125 years by an all-student staff. The newspaper is editorially independent of both the University administration and the Student Administrative Council.

### 10.3 CHMA FM

In 1985 the CHMA Radio Station was converted to FM Stereo frequency. Mount Allison is one of the smallest universities to have an FM radio station. The staff (from the announcers to the technicians) is composed mainly of students and members of the Sackville
community, all working under a full-time Station Manager. The Station is funded by students fees and advertising revenues and reaches a listening audience of over 15,000 .

### 10.4 GARNET AND GOLD SOCIETY

The Garnet and Gold Society offers students a chance to take part in the production of a major musical. Students coordinate all aspects of the production, which is usually presented early in the new year.

### 10.5 WINDSOR THEATRE

This theatre group puts on major productions each term. In addition, lunch time theatre and monthly productions, often written by members of the Mount Allison community, are also offered.

### 10.6 STUDENT ENTERTAINMENT OFFICE

This branch of the S.A.C. co-ordinates all campus entertainment. In addition to the usual dances, movies, live bands, and cultural performances, a number of popular special events are also offered. These include Orientation Week, Homecoming, Junior Prom, Winter Carnival and Graduation events.

### 10.7 RESIDENCE COUNCIL

All students living in the University's various residences elect house councils and executives. These bodies organize house events and co-ordinate social activities. Each House Council President sits on Residence Council, a body which represents residential concerns to the Dean of Students.

### 10.8 THE TANTRAMARSH CLUB

The campus pub, established in 1974, is a vital place for social gatherings. The pub is the only permanently licensed facility on campus and offers to its members a giant T.V. screen, pool tables, a dance floor and weekly special events.

### 10.9 STUDENT EMPLOYMENT

Part time job opportunities are plentiful at Mount Allison. Students may earn extra income through employment with Food Services, the Library, the Campus Police, Residence Staff, Bar Services, the Tantramarsh Club and various academic departments.

### 10.10 ACCOMMODATION

### 10.10.1 Residences

Mount Allison is a residential university with housing facilities available for approximately $50 \%$ of the student population. Each residence is unique and provides a positive living and learning environment, which promotes a balanced university experience.
Since 1973 the University has offered co-ed residence facilities to its students. Bennett, Bigelow, Hunton, Trueman, Windsor, the Satellites and Bermuda House offer single and double rooms while Edwards, Harper and Thornton have single rooms. Some co-ed residences are divided by floor or by wing, while others have male and female rooms integrated on the same floor.
In keeping with its desire to provide choices in accommodation, the University offers students wishing to immerse themselves in French,

German or Spanish language and culture the opportunity to live in La Maison Francaise.
Each residence provides a lounge, kitchenette and coin-operated laundry facilities. All residence rooms are completely furnished. Included in residence fees are active cable, local phone and computer hook-ups (students provide the hardware).
Prospective students should note that the University cannot be responsible for personal property. Students are strongly advised to insure personal effects. Pets, firearms and explosive materials are not permitted in residence.

### 10.10.2 Residence Application Procedure

All first year students who wish to be considered for residence accommodation should complete both sides of the Residence Application card that is enclosed with the offer of admission. This card should be completed and returned to the Office of Student Services along with the Registration deposit and Residence deposit. For further information see Fees, Section 4.2.
Students are asked to take the time to answer all the questions on the application, as this helps in appropriate placement of students in residence. Provided incoming students have met all admission and deposit deadlines, they are guaranteed residence accommodation.
Once a student enters residence, the student is responsible for the full residence and meal plan fees. If a student later withdraws from residence, the student will be entitled to the refunds detailed in the "Withdrawals and Student Accounts" section of the University Calendar. Students studying abroad should contact the Office of Student Services, [sas@mta.ca](mailto:sas@mta.ca), in January, if they wish to live in residence upon their return to Mount Allison.

### 10.10.3 Non-University Housing

The Student Life Office maintains, for the use of students, a list of accommodations available in Sackville and area. Students wishing to live in town are invited to use this information.

### 10.11 DEPARTMENT OF PHYSICAL RECREATION AND ATHLETICS

### 10.11.1 Intercollegiate Athletics, Varsity Programs

Mount Allison's Intercollegiate athletic teams compete against other Atlantic Universities in a number of sports. Mount A. competes in the Atlantic University Sport conference in football, men's and women's soccer, women's rugby, women's volleyball, and men's and women's swimming, and women's Ice Hockey. Mount Allison also has varsity teams in the Atlantic College Athletic Association in men's and women's basketball and men's and women's badminton. In all sports, the championship team represents Atlantic Canada in National Championships. The Mounties also play exhibition games with teams from other parts of Canada and the United States.
If you are interested in receiving information about a varsity program, contact either the coach or the Athletic Director. Please note that the fall sports usually have pre-season tryout camps. Students interested in one of these sports should contact the Athletic Director.
Note: Students who are registered in correspondence courses offered by Mount Allison through Continuing and Distance Education and who are considered full-time students according to their course load,
but who pay per-course tuition according to the fee structure outlined in 4.1.1 are not considered full-time on-campus students and are not eligible to participate in varsity sports that require confirmation of full-time enrolment.

### 10.11.2 Competitive Club Sports

A number of competitive club sport teams have been developed in recent years. Men's rugby, men's volleyball, golf, curling, tennis, men's hockey, figure and precision skating, are just some of the sports that have developed representative teams and compete against other Universities and Colleges. The coordinator is the Athletic Director.

### 10.11.3 Intramurals

The intramural program gives students the opportunity to participate and compete in a wide variety of activities. Emphasis is placed on participation and fun. Leagues are scheduled in soccer, softball, basketball, hockey, and volleyball. Tournaments are held in golf, curling, tennis, badminton, ultimate frisbee, and other sports based on student interest. The coordinator is the Intramural Co-ordinator.

### 10.11.4 Campus Recreation

There is ample time scheduled in the athletic facilities for open recreational use. Badminton, swimming, tennis, skating, pick up hockey, basketball, field games, ultimate frisbee, and fitness related activities are very popular daily activities. The weight room/fitness centre is open seven days a week and assistance is provided in personal fitness programs.

### 10.11.5 Men's and Women's Intramural Councils

Students play an integral part in the organization and administration of Mount Allison's intramural programme.
Each residence on campus and off-campus students have or will elect one or two representatives who make up the intramural council. The council meets regularly to plan and administer the various leagues and tournaments. If you are interested in becoming involved as a sports representative, contact your house president as soon as you arrive on campus. Many students become involved as officials for intramural competitions. These are part-time jobs, and students are paid for their services. If you would like to become an intramural official, contact the Intramural Office early in September.

### 10.12 RELIGIOUS LIFE ON CAMPUS

### 10.12.1 Introduction

Mount Allison is a church-founded university which affirms the partnership of faith and higher education. The Mount Allison crest declares that religion is a central and integral part of university life, and the University continues the commitment made in its founding to nurture the spiritual life of students. It supports and encourages the practise of the worship of God and affirms that university is a place to be awakened to the deep mysteries of life. The search for truth and for growth is a religious quest as well as an educational goal.
The chapel at Mount Allison, located at the heart of the campus, is a visible symbol of the commitment of the university to the importance of faith in university life. It stands as a reminder that the university is committed to nurturing students as whole human persons.

While founded under Methodist direction, Mount Allison upholds freedom of religion and creeds. Chapel worship and activities are ecumenical by design; the Office of the Chaplain is intended to be an ecumenical appointment, responsive to the many Christian denominations represented on campus. The Chaplain is open to engaging all religious students in faith development.

### 10.12.2 The Chapel

The Chapel on campus is a worship centre, and is also a refuge and a retreat in the midst of the activity around it. It is open daily for quiet reflection or prayer. Its exterior design makes it accessible from any direction on campus; the interior design naturally draws the eye upwards. The chapel is used primarily for worship, but individuals and groups associated with the university may arrange with the Chaplain for the use of the chapel for purposes that reflect the goal of nurturing religious life on campus.
The chapel was built and dedicated in 1965 through the initiative and generosity of the Rev. C.H. Johnson, and with the support of many other alumni, friends of the university, church people of the region and other individuals and institutions.
The organ is a gift of a former Chancellor, Dr. Ralph P. Bell, in memory of his mother. The stained glass windows were given by Marjorie Young Bell. A permanent record of the gifts is found in the "The Book of Remembrance" in the narthex of the chapel.
A small meditation room for private or small group prayer or worship is located to the right of the front of the sanctuary; the Chaplain maintains a study to the left side.
The Manning Room in the basement is named for the generous gift of Mrs. Gladys M. Manning, and is dedicated to the religious and social life of the campus.

### 10.12.3 Worship

Sunday evening worship services, or vespers, are held through the academic year. Holy communion is celebrated on an ecumenical basis each month in a mid-week service. Other special services in the week take place through the year.
The Chaplain provides leadership in worship, drawing also on guest resource persons and members of the University community. Students take an active role in the chapel programmes, sharing in planning, preparing and leading worship. The Chapel Organist and Chapel Choir bring the gift of music to worship, as do many other individuals and groups from the campus community.

### 10.12.4 The Chaplain

The Chaplain oversees the Chapel and its programmes and worship; the mandate of the Chaplain goes beyond worship and extends to nurturing spiritual life on campus. To counsel and comfort those needing encouragement or support, to being a refuge to those in need, to enriching University life. All the work of the Chaplain is undertaken regardless of the religion, ideology or faith of those who seek.
The Chaplain is appointed by the University and serves as Chaplain to the whole community, including both students and employees, and is not the appointee of or minister to any particular denomination. The mandate of the Chaplain is to minister as a representative of the whole Church of Jesus Christ, with a responsibility to speak to the university as well as from within it. The Chaplain maintains an office in the University Centre and a study in the Chapel.

### 10.12.5 Student Groups

Students engage in their faith pilgrimages in many ways, and the University provides ample opportunity to develop in faith. The Chapel services give opportunity to share in worship and develop leadership abilities; the Chapel Choir provides a way to express faith in music. Student groups operate autonomously, but often in conjunction with the Chaplain.
Inter-Varsity Christian Fellowship has an active group that offers fellowship, singing, Bible study and prayer. The Student Christian Movement is also very active, and encourages students to translate Christian faith into action through issues of peace and social justice.
The Pre-Theology Society comprises those students who are considering ministry, and it meets occasionally for fellowship, study and mutual support.

### 10.12.6 Programmes

Religious awareness and spiritual development are the concern of a variety of programmes initiated by student groups, the Department of Religious Studies and the Office of the Chaplain. These may include guest lecturers, forums for dialogue on religious matters, and other special events.

### 10.13 STUDENT LIFE

### 10.13.1 The Dean of Students

The Dean of Students is responsible for the quality of student life, student affairs and for maintaining effective liaison with student administrative bodies, student organizations and individual students. The Dean oversees orientation, the campus life of students, the quality of residence life, health services, counselling services, and governance and liquor policies. The Dean and other staff in Student Life are available for consultation and guidance on academic, personal and social matters.

### 10.13.2 Academic Concerns

Students experiencing medical or personal problems affecting their academic studies are encouraged to consult with the Dean of Students or the Academic and Career Counsellor.

### 10.13.3 Academic Skills

Assistance with academic skills is available on a group or individual basis. Topics addressed include: memory, time and lifestyle management, note-making, writing, preparing for and writing examinations, and motivation. For details please contact the Academic and Career Counsellor.

### 10.13.4 Writing Resource Centre

Student Life offers help to students who are experiencing problems expressing themselves in writing. The Writing Resource Centre is conducted on a one-to-one basis and may be accessed through Student Life.

### 10.14 COUNSELLING SERVICES

### 10.14.1 Personal Concerns

There are a number of options for students who wish to talk in confidence about a personal problem.

The personal counsellors and the Chaplain are available to provide confidential assistance for a variety of personal issues including anxiety, depression, alcohol or drug use, sexuality, relationships, sexual assault, family dysfunction and grief. The need for psychiatric and other mental health services can be assessed through the personal counsellors.
Emergencies: In an emergency, students may contact Student Life, the Sackville hospital or the psychiatrist-on-call at the Moncton hospital.

### 10.14.2 Sexual Harassment

The University's Sexual Harassment Advisor is available to provide education on sexual harassment and assault and to receive complaints from students, staff and faculty. The Advisor has copies of the University's policies and upon request will advise those who contact her about the options available both on and off campus.

### 10.14.3 Career Choice Concerns

The University Career Resource Centre is located in the basement of the University Centre and houses information on graduate programmes, careers and study and work abroad programmes. A computer terminal is available to access academic, career and employment web sites. An annotated bibliography of career web sites is available. Information is available on resume writing, job searching and preparing for interviews. Student Life offers help with career exploration through interest and skill surveys which help students answer the following questions:
What career do my abilities lead to?
What career or study path do my interests lead to?
What can I do with my undergraduate degree?
Where should I go to pursue this career?
What does the future hold for the profession I am interested in?

### 10.14.4 Employment

The Academic and Career Counsellor maintains a job board of off-campus employment opportunities, both part-time and full- time. Applications for a variety of off-campus summer jobs are available in the Student Life Office, in the basement of the University Centre. In addition, the Academic and Career Counsellor coordinates the visits of employers to campus. For further information contact the Academic and Career Counsellor.

### 10.14.5 Financial Concerns

University bursaries, student loan applications and personal budgetary and financial management may be discussed with the Financial Aid Counsellor in the Office of Student Services. Academic scholarships and prizes should also be discussed with the Financial Aid Counsellor in the Office of Student Services. For information on Scholarships and Financial Aid, go to <http: / /www.mta.ca> and choose prospective or current student.

### 10.14.6 Dietary and Nutritional Concerns

A dietitian visits campus one day per week for appointments to discuss balanced diets, nutrition and healthy living. She may be contacted through Student Life.

### 10.14.7 Lifestyle Concerns

Information, materials and programmes on health, lifestyle choices, stress management, sexuality, birth control, AIDS, sexually transmitted
diseases, alcohol, drugs, and similar concerns, are available through Student Life Programmes will be presented on request.

### 10.14.8 Landlord/Tenant Concerns

Students with inquiries about landlord/tenant relations or leases are encouraged to contact the Dean of Students, or the Office of the Rentalsman in Moncton.

### 10.14.9 First-year Off-Campus Students

Student Life engages a student to help coordinate the activities of first-year off-campus students. The goal of the group is to help involve new non-residence students in campus life and to ensure as warm an introduction to Mount Allison as possible. The student coordinator can be reached through Student Life.

### 10.14.10 International Students

Students who come to Mount Allison from other countries are very important members of the University community. A special International Orientation is held for them when they arrive to help them with their adjustment to Canada through information sessions answering their specific needs. The International Student Advisor is available throughout the year to help international students with any kinds of problems they might have such as cultural adjustment and personal, academic or immigration problems. A comprehensive health insurance plan for international students is available through this office as well. The International Student Advisor also oversees Mount Allison's policy on racism which protects international students' rights not to be discriminated against because of race, colour, ethnic or national origin, place of origin or ancestry, and works with several student clubs and committees on projects which promote multiculturalism on campus.

### 10.14.11 Governance

Since 1989, students have been subject to the student governance system described in the document Policies and Procedures for Student Governance, which is available from Student Life. The Dean of Students is available to explain to students how the governance system works and what students' rights are under the system. All students admitted to the University agree to abide by, and be subject to, the regulations as outlined in this document. The University reserves the right to suspend or dismiss any student for infractions of the regulations. Neither the University nor any of its regents or officers shall be under any liability whatsoever because of such action.

### 10.14.12 Health Services

The offices of six local doctors are located in close proximity to the campus. Students are encouraged to make appointments with the doctors as necessary. Emergencies are dealt with at the Out-Patient Department of the Sackville Hospital.
A dietitian is available each week on campus. Appointments may be made at Student Life.
Because most students have health insurance through parental plans, the University does not have a mandatory health insurance programme. Students are strongly urged to ensure that they have adequate coverage. A list of health insurance options is available from Student Life.

### 10.14.13 Policy on Students with Disabilities

Mount Allison University is proud to be an institution that welcomes and supports a diverse student body. To this end, Mount Allison is committed to providing a supportive and challenging environment for students with disabilities, and, where warranted and without compromising academic standards, will provide reasonable accommodations.
The Office of Student Life and the Meighen Centre (Learning Disabilities) offer a range of services to support the academic needs of students with disabilities. The Meighen Centre offers a range of services to students with learning disabilities and all inquiries related to learning disabilities should be addressed to this office. Student Life coordinates services to students with disabilities other than learning disabilities. Inquiries should be addressed to Student Life.
Copies of the University's Policy on Students With Disabilities may be obtained from Student Life and from the Meighen Centre.

### 10.15 DISABILITY SERVICES

### 10.15.1 Support Services

Mount Allison University is proud to be an institution that welcomes and supports a diverse student body. To this end, Mount Allison is committed to providing a supportive and challenging environment for students with disabilities, and, where warranted and without compromising academic standards, will provide reasonable accommodations. The Student Life Office and the Meighen Centre offer a range of services to support the academic needs of students with disabilities. The Meighen Centre offers services to students with learning disabilities and inquiries related to learning disabilities should be addressed to that office. The Student Life Office coordinates services to students with disabilities other than learning disabilities and inquires related to disabilities other than learning disabilities should be addressed to that office. Copies of the University's Policy on Students With Disabilities may be obtained from the Student Life Office or from the Meighen Centre.

### 10.15.2 Meighen Centre for Learning Assistance and Research

The Meighen Centre for Learning Assistance and Research provides academic assistance to students currently registered at Mount Allison University who have been professionally assessed and found to have a Learning Disability.
Services include academic counselling, learning strategies instruction, peer tutoring, consultation, access to text books on audio tape and arrangements for special accommodations for writing tests and examinations when appropriate.
Students with a learning disability who are applying for admission to Mount Allison are strongly encouraged to identify themselves on the application form. As well they should make contact with the Meighen Centre as early as possible in the admissions process.
Students currently attending Mount Allison who have been previously identified with a learning disability and who want to access support services should contact the Coordinator of the Meighen Centre at (506) 364-2527.

## 11 GENERAL INFORMATION

### 11.1 THE MOUNT ALLISON UNIVERSITY LIBRARIES

The Mount Allison University Libraries include the Ralph Pickard Bell Library, the Alfred Whitehead Memorial Music Library, and the University Archives. The Ralph Pickard Bell Library and the Alfred Whitehead Memorial Music Library provide Mount Allison students and faculty with access to information around the world on-line and through our book and periodical collections. We have 400,000 volumes, 1200 periodical subscriptions, audio and video collections, an electronic reference collection and a collection of e-journals and e-books. Students can access the electronic library catalogues and databases by computer from their residence room, from any of the computer labs on campus, or from anywhere they have Internet access. The Libraries are open seven days a week during the school year and the libraries' staff offer in-depth reference services, in-class instruction and research interviews by appointment. The Bell Library houses all of the University's collections except music, including collections of very rare books, maps and manuscripts dating from as far back as the 17th century, that are all available for use by Mount Allison students. The Whitehead Music Library is home to an impressive collection of Canadian music, a listening room and over 16,000 books, scores and audio recordings.
The University Archives is housed in the Bell Library. It contains textual records, photographs, slides, films, videotapes, and artifacts relating to Mount Allison University and the surrounding community. Its collections and services are available to all Mount Allison students.

### 11.2 THE LIBRARIES' ENDOWMENT FUNDS

## TANNIS ALLISON FUND

A fund established in 1967 by a bequest of the late Tannis Allison to commemorate the names of David Allison, president of Mount Allison University, 1869-1878, and 1891-1911, his wife, Elizabeth A. Allison, Henry Augustus Allison, and his wife Tannis Allison.

## MARY MELLISH ARCHIBALD MEMORIAL FUND

A fund established in 1956 by a bequest of the late Raymond Clare Archibald, 1894. The income is used to maintain the Mary Mellish Archibald collection which Dr. Archibald had established in 1905 in memory of his mother, Mary (Mellish) Archibald, and had continued to develop until his death in 1955.

## ARCHIVES ENRICHMENT FUND

Established in 1987 by the Class of '36, the Archives Enrichment Fund supports the development and preservation of the holdings of the Mount Allison archives.

## THE ANNE WHITTAKER AND PERCY SIMPSON BAILEY ENDOWMENT FUND

A fund established in 1976 by the will of the late Percy Simpson Bailey, B.A., 1907, to purchase books in the departments of Mathematics, Physics, Geology and Classics.

## VISCOUNT BENNETT FUND

A fund established in 1962. The income from this fund is for books in Canadian History and Politics.

## WILIAM HAROLD BLACK MEMORIAL FUND

A fund established in 1980 by C.F. Black, Margaret Folkins and Dorothy Silvester in memory of their brother William Harold Black. The income is used to purchase recordings for the music appreciation course.

## RALPH B BRENAN FUND

A fund established in 1973. The income is used to strengthen Library resources in Marketing.

## OLGA BERNICE BISHOP FUND

A fund established in 2002 from the estate of Olga Bernice Bishop to be used for the purchase of library materials

## CANADIAN MUSIC ENDOWMENT FUND

A fund established by an anonymous donor in 1979. The annual income is used to purchase Canadian Music recordings and scores.

## CLARK MEMORIAL FUND

A fund established in 1982 by Stephen D. Clark and June D. Clark in memory of members of their families. A portion of the income is to be granted to the Library to buy books for the Biology Department.

## E. RUTH COGSWELL MEMORIAL FUND

A fund established by the family and friends of Elva Ruth Cogswell (BA '84) in 1986. The annual income provides books related to the field of Canadian Studies.

## JULIA COLPITTS MEMORIAL FUND

A fund established in memory of Julia T. Colpitts, 1899, by her brother, Edwin H. Colpitts, 1893. The income from this fund is used to purchase Mathematics books .

## THOMAS EARLE COLPITTS MEMORIAL FUND

A fund established in 1969 to commemorate the teaching career of Thomas Colpitts, class of 1879 , by his granddaughter, Dr. Olga Bishop, class of 1938, to be used to purchase books in the field of Education.

## THE CONNECTICUT RIVER VALLEY ALUMNI SOCIETY ENDOWMENT FUND

The income from the fund is used to purchase books in the field of Chemistry.

## DONALD DARRACH MEMORIAL FUND

A fund established in memory of Dr. Donald Darrach, by his wife, Typhenia Tuplin, L.C. 1870-71.

## LEON ESTABROOKS MEMORIAL FUND

A fund established in memory of Leon Estabrooks, class of 1951, by his parents, the income from which is used for books in the fields of Arts and Crafts.

## THE MARGARET EVANS MEMORIAL LIBRARY FUND

A fund established in 1971 from a bequest from the estate of William Benton North Evans, the income to be used to purchase materials on church and organ music.

## THE GLENDENNING FUND

A fund established by Reverend G.W.F. Glendenning, class of 1884, and Mrs. Glendenning (Ellen Bent, L.C. 1882-83), the income from which is to be used for books in English Literature.

## DONALD T. GOODWIN FUND

A fund established in 1980, the income of which is for books in Canadian Studies.

## JACK K. GRAINGER MEMORIAL FUND

A fund established in 1988 by Mrs. Jean Grainger and the Grainger family in memory of Jack K. Grainger (BA '33, MA '34), a former member of the Board of Regents. The annual income is for books relating to English and History.

## ANN HENDERSON MEMORIAL FUND

A fund established in memory of Ann Henderson, class of 1959, for books in the field of Music.

## THE THOMAS HICKS FUND

A fund established in 1939 by a bequest of Reverend Thomas Hicks (1853-1932) upon the death of his wife in January 1939.

## HOLDER/STROTHARD MEMORIAL FUND

A fund established in 1984 by Dr. Clinton H. and Kathleen Strothard Holder in memory of their parents. The income is to be used by the Department of Chemistry for library acquisitions.

## MARY ANN HOWARD MEMORIAL FUND

A fund established by her son, the Rev. Samuel Howard (B.A. '84, B.D, '95, D.D., '23), and the Rev. William J. Howard (B.A., '88, B.D.' 91). The income is to be used for books in Canadian Studies.

## DOROTHY HUNTON LIBRARY MEMORIAL FUND

A fund established in 1978 to commemorate the work of Dorothy Hunton in promoting literature for boys and girls in the community. The income is used to purchase children's classics, new and old.

## S.C. LAWRENCE IP LIBRARY FUND

A fund for the purchase of materials on U.S. foreign relations, established in April 1973 by S.C. Lawrence Ip, a third year Arts student.

## THE CECIL RECORD JOHNS MEMORIAL LIBRARY FUND

A fund established in 1969 by the family and friends of Cecil Record Johns, who was a faculty member of the Department of Music, 1927-1931. The income from this fund is to be used to purchase books in Music.

## THE DAVID W. JOHNSON AND JENNIE L. JOHNSON FUNDS

Funds established in memory of Rev. D.W. Johnson, 1873 and Mrs. Johnson (Jennie L. Morse, M.L.A., 1872), by their sons, C.H. Johnson, 1898 and A.L. Johnson, 1903. The income from the former is for binding of periodicals and from the latter for books in Canadian Literature.

## PROFESSOR J. T. MACFARLANE LIBRARY FUND

A fund established in 1991 at the time of Professor MacFarlane's retirement from Mount Allison University. The income is for Physics books.

## EDWIN ROBINSON MACHUM FUND

A fund established in 1981 by a bequest from the estate of Mrs. Marion H. Bennett in memory of her father, Edwin Robinson Machum, who was a student and friend of the University, and, for many years, a member of the Board of Regents. The income is for books, preferably in English literature.

## MORTON MEMORIAL FUND

The Morton Memorial Fund was established in 1977 by Dr. Harry S. Morton, O.B.E., LL.D., F.R.C.O.G., F.R.C.S., in memory of his grandfather - The Rev. Arthur Dwight Morton, B.A., 1864, M.A., 1870, D.D., 1903, and in memory of his father, Dr. Charles Stuart Morton, M.B.M.D. (Tor.), F.A.C.S., F.R.C.S., (C) and his mother, Maie Howard Stafford, Ladies College 1900-1902. Eighty percent of the endowment interest is for books in Biology and History, at the discretion of the University Librarian. The balance of the income is returned to the Fund capital.

## THE HATTIE BLACK PATERSON MEMORIAL FUND

A fund established in 1928 and since largely augmented by the late Mr . B.E. Paterson in memory of his wife, (Hattie Snowball Black, Piano 1881). The income is for books of general interest, including travel and biographies.

## DR. ELLA SMITH MEMORIAL LIBRARY FUND

A fund established in 1973 in memory of Ella Smith, M.A., D.Litt. by her sister. The income of this fund is for history books, to commemorate Dr. Smith's years as professor of History at Mount Allison University.

## JAMES C. REID FUND

A fund established in 2002 from the estate of James C. Reid to be used for the purchase of library books.

## CAPTAIN WILLIAM ALFRED SEAMAN FUND

A fund established in 1987 by Louise V.D. Seaman in memory of her husband. The income is for books in Religious Studies.

## THE REVEREND E.C. TURNER MEMORIAL FUND

A fund established in memory of her father by Miss Clara G. Turner, of the State Teachers' College, Harrisburg, Virginia. The income from this fund is mainly for books in Theology.

## WILLIAM MORLEY TWEEDIE MEMORIAL FUND

A fund established in 1952 by the will of the late William Morley Tweedie for standard works in English language and literature.

## JEAN T. WARD FUND

A fund established from the estate of Jean T. Ward for the purchase of library materials.

## FRANK L. WEST LIBRARY FUND

A fund established in 1975 in memory of Frank Leslie West, who was associated with Mount Allison University as a student, a member of and head of the Engineering Department, Dean of Science, and Vice-President, during the years 1908-1962. The income from this fund is for books on community planning and sports and general science reference books.

## THE EDGAR WOOD FUND

A fund established in memory of Edgar Wood, 1894, by his wife.

### 11.3 THE MOUNT ALLISON FEDERATED ALUMNI, INC.

The Alumni Society of the Mount Allison College and Academy was established in 1874. The Alumnae Society of the Mount Allison Ladies College was organized in 1871. In 1937, the two societies united and, by an Act of the New Brunswick Legislature, formed the Mount Allison Federated Alumni, Inc.
Throughout the years, Alumni have given generously of their time, talents and resources to continue Mount Allison's tradition of outstanding liberal education.
Operating from the Alumni Centre, 82 York Street, the Alumni staff keeps records of more than 20,000 Allisonians, produces and distributes the Mount Allison Record, and maintains liaison with graduates, non-graduates and friends throughout the world.
The Federated Alumni elects 4 members to the Mount Allison Board of Regents.
For more than a century, Allisonians have undertaken to provide strong support to a large number of Mount Allison endowments. Scholarships, bursaries, buildings and equipment have all benefitted from the enthusiastic assistance of the University's alumni.
The Federated Alumni is active in recruiting students and is ready to assist the University, parents, and prospective students in appropriate action to assure the continued enrolment of energetic and stimulating scholars.

### 11.3.1 Alumni Board of Directors

## Officers

Honorary President
Past President
Sen. Catherine Callbeck '60
Gordon MacKay '67
Bill Bishop '70

## Officers

Vice-President and Secretary Catherine DeCarie '90

## Directors

Katherine Fraser '85
Diane (Merrill) Fullerton '68
David Greenwood '58
Joanne Keating '88
Jennifer Kirby '95
John Laidlaw '80
Beth (Porter) MacMichael '78
Sandra (MacMillan) Murray '59
Phil Sallaj '96
Denise Schofield '90
Lynda Shoveller '92
Barbie Smith '75

### 11.4 COMPUTER FACILITIES

There are seven publicly accessible computer labs on campus. The six PC labs have well over one hundred networked DELL OptiPlex Pentium II/III/IV computers. A student advisor is available to answer questions and provide assistance. Laser printing is available at several locations. The Macintosh lab has 17 Macintosh iMac DV computers, an optical scanner, and laser printing. The Multimedia Production Centre has several high-end PCs and Macs with a number of digital media production software packages including video editing suites, flatbed, slide and negative scanners, digital cameras, and other video/audio equipment is available as well.

### 11.4.1 Software

Software available in the labs include Internet Explorer and Netscape Navigator, Eudora for e-mail, Corel WordPerfect Office Suite for word processing and spreadsheets and several mathematics, statistical and scientific packages. Several programming languages and many other course-specific programs are available. There is also CD-ROM based information offered in conjunction with the Ralph Pickard Bell Library and access to its on-line catalogue.

### 11.4.2 Campus Network

The campus network has a Gigabit Ethernet backbone, with switched Ethernet connections at the desktop. Thirty-six campus buildings are connected to the campus fibre-optic network. All offices, class rooms, and student residence rooms have network jacks. The University is a member of the NB/PEI Educational Computer Network (ECN) and has a multi-megabit ATM connection to other ECN institutions and the Internet. A Gigabit connection from campus to $\mathrm{Ca}^{\star} \mathrm{Net} 4$ is available as well.

### 11.4.3 Residence Networking

A high speed network connection is available for a small fee to all students living in residence who have a computer.

### 11.4.4 Computing Services

Computing Services manages and maintains the University's computing and network resources, and provides advisory and training assistance
to all members of the university community through the Helpdesk, student lab advisors and residence network consultants.

### 11.5 MOUNT ALLISON UNIVERSITY BOOKSTORE

Textbooks and materials required for courses offered by Mount Allison University are available for sale at the Bookstore located in the Fawcett Building at 10 King Street, Sackville. The Bookstore is owned by Mount Allison University with the object to make textbooks and required course materials available to students at the lowest possible prices. Prices are currently discounted between 5-25\% below suggested publisher prices.
Hours of operation are normal working hours 8:30 a.m. to 4:30 p.m. with extended hours in September. Payment may be made by cash, cheque, VISA, Mastercard and Interac direct payment. Credit card orders may be placed on our secure website found at [http://bookstore.mta.ca](http://bookstore.mta.ca). Students staying in residence can opt for the Books on Beds delivery service before classes begin in September and January.

### 11.6 BANKING SERVICES

Branches of the Royal Bank of Canada and the Bank of Nova Scotia are located in Sackville. Twenty-four hour banking facilities are available at both branches as well as ATM service in the University Centre.

### 11.7 PERFORMING ARTS SERIES

Each year the University helps sponsor a series of performances by groups and artists distinguished in the field of high quality entertainment. Mount Allison students have the opportunity to reserve tickets for these performances on specially favourable terms. Full details are available in the Performing Arts Series Brochure supplied to students each September.

## 12 PERSONNEL

### 12.1 OFFICERS OF THE UNIVERSITY

CHANCELLOR
James J. Keith, B.A., M.A.

## PRESIDENT AND VICE-CHANCELLOR

A. Wayne MacKay, B.A., B.Ed., M.A., LL.B.

### 12.2 THE REGENTS OF MOUNT ALLISON

## EX-OFFICIO MEMBERS

A. Wayne MacKay, Sackville, New Brunswick James J. Keith, Berwick, Nova Soctia

## APPOINTED BY THE EXECUTIVE COMMITTEE OF THE BOARD

John Bragg, Oxford, Nova Scotia David Booth, Richmond Hill, Ontario Suzanne Crawford, Westmount, Quebec Cheryl Inman, Dartmouth, Nova Scotia Mary Keith, Saint John, New Brunswick Lynn Loewen, Enfield, Nova Scotia Gordon MacKay, Charlottetown, Prince Edward Island J. Scott McCain, Toronto, Ontario

Bruce McCubbin, Saint John, New Brunswick
Wylie McMullen, Sackville, New Brunswick
Jack Travis, Saint John, New Brunswick
J. Robert Winters, Truro, Nova Scotia (Chair)

## APPOINTED BY THE MOUNT ALLISON FEDERATED ALUMNI

G. Firman Bentley, Sarnia, Ontario

Nancy Grant, Saint John, New Brunswick
Brian G. Johnston, Halifax, Nova Scotia
John Laidlaw, Saint John, New Brunswick

## APPOINTED BY THE UNITED CHURCH OF CANADA

Reid Harrison, Windsor, Nova Scotia
Clifford Moase, Dartmouth, Nova Scotia

## APPOINTED BY THE FULL-TIME TEACHING FACULTY

Paul Bogaard, Sackville, New Brunswick
Peter Edwards, Sackville, New Brunswick

## APPOINTED BY THE STUDENTS' ADMINISTRATIVE COUNCIL

Loren McGinnis, West Vancouver, British Columbia David Sanderson, North Vancouver, British Columbia

SECRETARY OF THE BOARD
Linda R. Wheaton, Sackville, New Brunswick

### 12.3 THE SENATE OF MOUNT ALLISON

James J. Keith, Chancellor
A. Wayne MacKay, President and Vice-Chancellor

Robert Summerby-Murray, Secretary of Senate

## REPRESENTATIVES OF THE BOARD OF REGENTS

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Nancy Grant, B.Sc., M.D.
Gordon Mackay, B.A., M.A.
Wylie McMullen, B.Sc.,P.Eng.
Carman W. Riggs, B.A., M.Div.
J. Robert Winters, Q.C.,B.Com, LL.B.

## EX-OFFICIO MEMBERS

Felix Bserlocher, Acting Dean of Science
Patrick Baker, Dean of Social Science
Michael Fox, Vice-President, Academic and Research
Kathryn Hamer, Dean of Arts
Charles W.F. Hunter, Dean of Students
Chris Hunter, Registrar
Ruthmary MacPherson, Acting University Librarian
Andrew Paskauskas, Director, Research Development
Rosemary Polegato, Faculty Council Executive
Johannes vanderLeest, Faculty Council Executive

## FACULTY REPRESENTATIVES

Monika Boehringer
William Godfrey
Richard Hudson
Robert Lapp
Janine Rogers
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Cathy Baker, Math and Computer Science
Terry Belke, Psychology
Mark Blagrave, English
Paul Bogaard, Philosophy
Penny Bryden, History and Canadian Studies
Ivan Cohen, Classics
William Cross, Canadian Studies
Edmund Dawe, Music
Alex Fancy, Modern Languages \& Literatures
Berkeley Fleming, Sociology \& Anthropology
Colin Grant, Religious Studies
Robert Hawkes, Physics
Thaddeus Holownia, Fine Arts
Robert Ireland, Biology
Stephen Law, Economics
Mark Lee, Modern Languages and Literatures
B. McNally, Library

Loralea Michaelis, Political Science
David Mossman, Geography
Peter Sianchuk, Commerce
John F. Read, Chemistry
Robert Thompson, Biochemistry

## STUDENT REPRESENTATIVES

Michael Belding
Jennifer Bourque
Diane MacDonald
Thea Shaw
Jacob Stone
Amanda Wasylishen

## ASSOCIATE MEMBERS

Jack Drover, Athletic Director Loren McGinnis, President, S.A.C.
Ben Seamone, Vice-President Academic Affairs, S.A.C. John David Stewart, Vice-President Administration

### 12.4 OFFICERS OF ADMINISTRATION

## President and Vice-Chancellor

A. Wayne MacKay, B.A., B.Ed., M.A., LL.B.

Secretary to the President
Linda R. Wheaton
Vice-President, Academic and Research
Michael Fox, B.A., M.A., Ph.D.
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John David Stewart, B.Sc., LL.B.
Vice-President, External Relations
Floyd W. Dykeman, B.A., M.P.L.

## Dean of Arts

Kathryn Eryl Hamer, B.A., M.A., Ph.D.

## Dean of Social Sciences

Patrick Baker, B.A., Ph.D.

## Dean of Science

Felix Baerlocher, Dipl.sc.nat., Ph.D., Dr. habil

## Acting University Librarian

Ruthmary Macpherson, B.Sc., M.L.S.
Director of Student Services
Denise Lauritano, B.A., M.A.
Acting Manager of Admissions, Financial Aid and Scholarships
Mark Bishop, B.A., C.H.S.C
Manager, Registration and Student Administrative Services
Michel J. Boudreau

## Registrar

Chris Hunter, B.F.A.
Financial Aid and Awards Counsellor
Shawn Bellefleur, B.BA

## Controller

Robert Inglis, B.Comm., C.A.

## Dean of Students

Charles W.F. Hunter, B.A., M.A., B.Ed.

## Sexual Harassment Advisor

Melody Petlock, B.A.
Acting Director of Continuing and Distance Education Heather Patterson, B.A., M.A.
Director of Alumni and Development
Gloria Jollymore, B.A., M.B.A.

## Secretary of the Senate

Robert Summerby-Murray, B.A., M.A., Ph.D., A.T.C.L.
Secretary to the Faculty Council
Margaret Fancy, B.A., M.L.S.
Director of Physical Recreation and Athletics
Jack Drover, B.P.E., M.A.

## Director of Computing Services

Helmut K. Becker
Director and Curator of the Owens Art Gallery
Gemey Kelley, B.A., B.F.A.

## Director of Human Resources

Ron Sutherland, B.Com.
Director of Facilities Management
Jeffrey Lamb, B.Eng., M.Eng., P.Eng.
Director of Administrative Services
Vincent Smyth, B.Sc.

### 12.5 CHANCELLORS EMERITI

Margaret Norrie McCain, O.C., B.A., B.S.W, LL.D
The Very Rev. Angus James MacQueen, B.A., B.D., D.D., LL.D.
Harold Purdy Crawford, O.C., Q.C., B.A., LL.M., LL.D.

### 12.6 PRESIDENTS EMERITI

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Guy Robertson MacLean, B.A., M.A., Ph.D.
Dr. Ian David Campbell Newbold, B.A., M.A., Ph.D., F.R.H.S.

### 12.7 REGISTRARS EMERITI

Donald Alexander Cameron, B.Sc., LL.D.
Leonard A. Owen, B.A., M.A.

### 12.8 PROFESSORS EMERITI

Graham, Adams, Jr., B.A., M.A., Ph.D. Professor of History, Emeritus
Peter Allan, B.A., M.A., Ph.D. Professor of French, Emeritus
Clifford Marsden Allen, B.Sc., M.Sc., Professor of Geology, Emeritus
Lawrence Ross Coates Barclay, B.Sc., M.Sc., Ph.D. Professor of Chemistry, Emeritus
David Beatty, B.A.,M.A.,Ph.D, Professor of History Emeritus
Ronald Albert Boorne, B.A. Sc., P.Eng. Professor of Engineering, Emeritus
Roger Calkins, B.A., M.A., Ph.D, Professor of English Emeritus
Christine Murdock Cavanagh, B.Sc., M.A. Professor of Home Economics, Emeritus
William Bannerman Cunningham, B.A., M.A., Ph.D. Professor of Economics, Emeritus
Lloyd Allison Duchemin, B.A., M.A., Ph.D. Professor of English, Emeritus
Carleton Weir Elliott, B.Mus., M.Mus., Professor of Music, Emeritus Laing Ferguson, B.Sc., Ph.D, Professor of Geology Emeritus

Albert Joseph Furtwangler, B.A., M.A., Ph.D., Professor of English, Emeritus

Douglas Grant, B.Sc., Ph.D., Professor of Chemistry Emeritus
William Baillie Hamilton, B.A., B.Ed., M.A., Ph.D. Professor of Education, Emeritus
Janet Thom Hammock, Artist Dip., M.M.A., D.M.A., Professor of Music, Emeritus
Gerald Hannah, B.Sc., B.E., M.E., P.Eng., Professor of Engineering Emeritus
Hinrich Harries, B.Sc., M.Sc., Ph.D., Professor of Biology, Emeritus
Eldon Hay, B.A., M.A., Ph.D., Professor of Religious Studies Emeritus
David Higham, B.Sc., Professor of Mathematics and Computer Science, Emeritus
Raghavachar Scrinivas Iyengar, B.Sc., M.A., M.Sc. Professor of Mathematics and Computer Science, Emeritus
Evron Norinne Kinsman, B.Mus., M.A. Professor of Music, Emeritus
Douglas Grant Lochhead, B.A., M.A., B.L.S., D.Litt., LL.D., F.R.S.C., Professor of Canadian Studies, Emeritus
John T. Macfarlane, B.A., M.Sc., Professor of Physics, Emeritus
George Gordon Manson, B.A., B.Ed., M.Ed., Ph.D., F.C.C.T. Professor of Education, Emeritus
James Horace Matthews, B.Sc., M.Sc., Ph.D. Professor of Physics , Emeritus
Michael Miller, B.A., M.A., Ph.D., Professor of Music Emeritus John Carman Gailey Moore, B.A., M.Sc., Ph.D. Professor of Geology, Emeritus
Arthur John Motyer, B.A., M.A., D.C.L., Professor of English, Emeritus
Dan C. Patridge, B.Sc., M.B.A., Professor of Commerce, Emeritus
Peter Penner, B.A., M.A., Ph.D., Professor of History, Emeritus
Dr. Vincent C. Reinsborough, B.A., M.A., S.T.B., Ph.D. Professor of Chemistry, Emetitus
Eric DeWitt Ross, B.A., M.A., Ph.D., Professor of Geography, Emeritus
Louise Van Duyn Seaman, B.Sc., M.A. Professor of Home Economics, Emeritus
David Silverberg, B.A., Professor of Fine Arts, Emeritus
Wilson Burnett Stallworthy, B.A., Ph.D., Professor of Biology, Emeritus George Francis Gilman Stanley, C.C., K.St.J., B.A., M.A., M.Litt., D.Phil., D-es-L., D.Lit., D.Litt., LL.D., D.C.L., D.U., F.R.Hist.S., F.R.S.C. Professor of Canadian Studies, Emeritus
John A. Stanton, B.A., M.A., Ph.D. Professor of History Emeritus Elmer Tory, B.Sc., Ph.D., Professor of Mathematics and Computer Science Emeritus
Christiane Ullmann, B.A., Ph.D., Professor of German, Emeritus

### 12.9 LIBRARIANS EMERITI

Eleanor Eileen Magee, B.A., B.Sc., B.L.S., M.L.S.
Himansu Bhusan Mitra, B.A., A.L.A.

### 12.10 ACADEMIC STAFF

### 12.10.1 Professors

## Department of Biology and Biochemistry Programme

Aiken, Ronald Burleigh, B.Sc. (Maryland); M.Sc., Ph.D. (Toronto); Professor of Biology.
Baerlocher, Felix Jakob, Dipl. sc nat. (ETH, Zurich); Ph.D. (Waterloo); Privatdozent (Dr. habil., Basel); Professor of Biology and Interim Dean of Science.
Bailey, John, B.Sc., M.Sc. (Ottawa); Ph.D. (British Columbia); Assistant Professor of Biology
Beaton, Margaret, B.Sc. (Guelph); MSc. (Windsor); PhD. (Guelph); Assistant Professor
Campbell, Douglas, B.Sc. (Acadia), Ph.D. (Western Ontario); Associate Professor of Biochemistry and Canada Research Chair in Environmental Sciences.
Clair, Thomas, B.Sc. (Mt. Allison); M.Sc. (Ottawa); Ph.D. (McMaster); Adjunct Professor of Biology
Currie Suzanne, B.Sc. (Acadia), M.Sc, Ph.D. (Queen's); Assistant Professor

Giberson, Donna J., B.Sc. (Calgary); M.Sc., Ph.D. (Manitoba); Adjunct Professor of Biology
Hansen, Gay, B.Sc., M.Sc. (Acadia); Part-time Lecturer in Biology.
Ireland, Robert John, B.Sc. (Hatfield Polytechnic); Ph.D. (London); Professor of Biology.
Kaczmarska-Ehrman, Irena, M.Sc., Ph.D. (Jagellonian); Professor of Biology
Locke, Andrea, B.Sc., M.Sc. (Guelph); Ph.D. (Toronto); Adjunct Professor of Biology
Stewart, John M., B.Sc. (Saskatchewan); M.Sc. (Regina); Professor of Biochemistry.
Thompson, Robert G., B.Sc. (Queen's); M.Sc., Ph.D. (Simon Fraser); Professor of Biology and Acting Head of Department.

## Department of Chemistry

Barclay, Lawrence Ross Coates, B.Sc., M.Sc. (Mount Allison); Ph.D. (McMaster); Research Professor
Briand, Glen Gerard, B.Sc. (StFX); PhD. (Dalhousie); Assistant Professor Duffy, Stephen, B.Sc. (Laurentian); M.Sc. (Queen's); Ph.D. (Queen's); Assistant Professor
Grant, Andrew, B.Sc. (Queen's); Ph.D. (New Brunswick); Assistant Professor

Johnson, Michael, B.A.Sc., M.Sc., (Missouri); Ph.D. (New Mexico State); Adjunct Professor
Langler, Richard F., M.Sc. (U.N.B.); B.Sc., Ph.D. (Dalhousie); Professor. Read, John Frederick, B.Sc., Ph.D. (Nottingham); Professor and Head of the Department.
Reinsborough, Vincent Conrad, B.A. M.A. (Toronto); S.T.B. (University of St. Michael's College); Ph.D. (Tasmania); Research Professor
Spielvogel, Bernard F., B.S. (Geneva College); Ph.D. (University of Michigan); Adjunct Professor

Westcott, Stephen, B.Sc., Ph.D. (Waterloo); Associate Professor and Canada Research Chair in Boron Pharmaceutical Chemistry.
Wetmore, Stacey, B.Sc. (Mount Allison), Ph.D. (Dalhousie); Assistant Professor.

## Department of Classics

Cohen, Ivan, B.A. (Toronto); M.A. (McMaster); Ph.D. (Toronto); Associate Professor and Head of the Department.
Robertson, Bruce, B.A. (Queen's); M.A. (U.B.C.); Ph.D. (Toronto); Assistant Professor.
vanderLeest, Johannes, B.A. (Calgary); M.A. (London); Ph.D. (Toronto); Associate Professor.

## Department of Commerce

Ambwani, Vinita, BS (Bhopal); MS (Bhopal); MBA (Baruch, CUNY N.Y.); Assistant Professor

Berry, Paul, B.Comm. (Mount Allison); MBA (Queen's); Associate Professor.

Hudson, Richard, B.A. (Bucknell); L.Ph. (St. Paul); M.P.A. (Carleton); M.A., Ph.D. (Ottawa); C.M.A.; Professor.

Farooqi, Nauman, B.Sc. (Pakistan); MBA (St.Louis); PhD (St.Louis); Assistant Professor
Polegato, Rosemary, B.Sc. (St. Francis Xavier); M.Sc. (Guelph); MBA, Ph.D. (Western Ontario); Professor.
Ralph, Neville, B.Comm. (Sir George Williams); MBA (McMaster); C.A., Associate Professor

Sianchuk, Peter, B.A., MBA (McMaster); Associate Professor.

## Department of Economics

Anthonisen, Niels, B.A. (McGill); M.A., Ph.D. (Columbia); Assistant Professor.
Childs, Jason B.A. (Mount Allison); M.A. (McMaster); McCain Fellow Houtsma, John Johannes, Ec. Cand. (Vrije); M.A. (McGill); Associate Professor.
Law, Stephen, B.A. (British Columbia), M.A., Ph.D.(Toronto); Associate Professor

Strain, John Frank, B.A. (Prince Edward Island), M.A. (U.N.B.); Ph.D. (Manitoba); Professor and Head of the Department.

## Department of English

Bamford, Karen, B.A. (Queen's); M.A., Ph.D. (Toronto); Associate Professor.
Blagrave, Mark, B.A. (Mount Allison); M.A., Ph.D. (Toronto); Associate Professor
Brown, Peter, B.A. (Simon Fraser), M.A. (East Anglia);Ph D. (McGill); Assistant Professor

Craig, Terence L., B.A., M.A. (Carleton); Ph.D. (Toronto); Professor Lapp, Robert, B.A., M.A. (Toronto); Ph.D. (Dalhousie); Assistant Professor.
MacMillan, Carrie, B.A. (U.N.B.); M.A. (Dalhousie); Ph.D. (McMaster); Professor
Rogers, Janine, B.A., M.A., Ph.D. (McGill); Assistant Professor Wills, Deborah, B.A (Trinity Western); M.A. (Carleton); Ph.D. (Alberta); Assistant Professor.

## Department of Fine Arts

Burke, Rebecca, B.A. (Guam); M.F.A. (Ohio State); Professor. Burns, Jeffrey, B.A. (Waterloo); M.F.A. (Alberta); Assistant Professor. Edson, Erik, B.F.A. (Queen's); M.F.A. (Windsor); Assistant Professor Hammock, Virgil Gene, B.F.A. (San Francisco Art Institute); M.F.A. (Indiana); Professor.
Holownia, Thaddeus, B.C.A. (Windsor); Professor and Head of the Department.
Kelly, Gemey, B.A. (Toronto); B.F.A. (Nova Scotia College of Art and Design); Part-time Lecturer.
Koval, Anne, B.A. (Queen's), M.A. (East Anglia), Ph.D. (London); Assistant Professor
Macklem, Jennifer, BVA (Parsons School of Design, Paris), MFA (Quebec à Montreal) Assistant Professor;
Steeves,Dan, BFA (Mount Allison) Part-time Lecturer

## Department of Geography

Avram, Michal, B.A. (Toronto); M.A. (Clark) Ph.D. (Clark); Assistant Professor.

Bruce, David, B.A. (Mount Allison); M.A. (U.B.C.); Lecturer.
Ennals, Peter M., B.A., M.A., Ph.D. (Toronto); Professor and Vice-President (Academic).
Mossman, David J., B.Sc., M.Sc. (Dalhousie); Ph.D. (Otago); Professor of Geoscience.
Ollerhead, Jeff, B.Sc. (Guelph); M.Sc. (Toronto); Ph.D. (Guelph); Associate Professor and Head of the Department.
Semple, Stuart, B.A. (Sydney); D.Ed. (Toronto); Part-Time Professor Summerby-Murray, Robert, B.A., M.A. (Canterbury); Ph.D. (Toronto); A.T.C.L. (London); Associate Professor.

Walters, Bradley, B.Sc. (U.B.C.); MES (Dalhousie); Ph.D.(Rutgers) Assistant Professor

## Department of History and Canadian Studies

Bodnar, Cameron, B.A. (Calgary), M.A. (York); Post-doctoral fellow in Canadian Studies
Bryden, Penny, B.A. (Trent); M.A., Ph.D. (York); Associate Professor and Head of the Department.
Godfrey, William Gerald, B.A., M.A (Waterloo); Ph.D. (Queen's); Professor.
Griffiths, Owen, B.A. (University of Victoria); M.A., Ph.D. (University of British Columbia); Assistant Professor
Lundell, William, B.A. (Hope College); M.A. (Toronto); M.S.L.
(P.I.M.S., Toronto); Ph.D. (Toronto); Assistant Professor

McCullough, Marilyn, B.A. (Michigan State); M.A. (Cornell); Part-time Lecturer.
Naylor, Elaine, B.A. (Evergreen State); M.A., Ph.D. (York); Assistant Professor

Nurse, Andrew, B.A. (Dalhousie); M.A., Ph.D. (Queen's); Assistant Professor

Torrance, David, B.A. (Washington and Lee), M.A. (Brown), Ph.D. (Queen's); Associate Professor.

Wilson, William, B.A. (Trent); M.A., Ph.D. (McMaster); Assistant Professor

## Department of Mathematics and Computer Science

Baker, Catharine Anne, B.Sc., M.Sc., Ph.D. (McMaster); Professor and Acting Head of Department.
Beattie, Margaret, B.Sc. (McMaster); M.Sc. Ph.D. (Queen's); Professor.
Beattie, Ronald James, B.Sc., M.Sc. (Windsor); Ph.D. (Queen's);

## Professor.

Dekster, Boris V., M.Sc., Ph.D. (Leningrad); Professor.
Edmunds, Margaret, B.A., B.Comm. (Mount Allison); Part-time Lecturer.
Keliher, Liam T., B.Sc. (St. Francis Xavier), M.Sc., Ph.D. (McGill); M.Sc. (Queen's); Lecturer
Miller, Boyd Arthur, B.A. (Hiram); M.A., Ph.D. (Syracuse); Professor.
Ricker, Laurie, B.Sc. (Mount Allison), M.Sc., Ph.D. (Queen's); Assistant Professor

Rosebrugh, Robert Douglas, B.Sc., M.Sc., (McMaster); Ph.D.

## (Dalhousie); Professor.

Sealy, Robert P., B.Sc. (Mount Allison); Ph.D. (Southern Illinois); Professor.

## Department of Modern Languages and Literatures

Boehringer, Monika, B.A. (Brock), M.A. (McMaster), Ph.D. (Toronto); Assistant Professor of French.
Burnett, Wendy, B.A. (Western Ontario); M.A. (Moncton); Part-time Lecturer in Linguistics and Director of the Language Laboratory.
Cenerelli, Bettina B., 1. Staatsexamen (Berlin), Dr. Phil. (Siegen); Assistant Professor of French
Deniger, Martine, B.A. (Montreal); Part- time Lecturer in French. Edwards, Peter J., B.A. (St. Bernard's Seminary); B.A. (Louvain); M.A., Ph.D. (Fordham); Professor of French and Head of Department.
Fancy, Alex, B.A. (Mount Allison); M.A. (Western Ontario); Professor of French and Director of Drama
Farina, Maritza, B.A., B.Ed. (Catholic University of Valparaiso - Chile); Lecturer in Spanish
Hamer, Kathryn Eryl, B.A., M.A., Ph.D. (Toronto); Professor of French and Dean of Arts.
Hempel, Rainer Lutz, B.A., M.A., Ph.D. (U.B.C.); Associate Professor of German.
Joerger, Thilo K., B.A., M.A., Ph.D. (Waterloo); Professor of German.
Lee, Mark, B.A. (Memorial); M.A. (Johns Hopkins); Ph.D. (Emory); Associate Professor of French.
Martinez, Juan, Carlos, B.A., B.Ed. (Catholic University of
Valparaiso-Chile); M.A. (Carleton), Ph.D. (Toronto)Assistant Professor of Spanish
Oe, Miyako, B.Ed., M.A. (Ochanomizu); Instructor of Japanese.
Weiss, Judith A. B.A. (McGill); M.A., Ph.D. (Yale); Professor of Spanish.
Welch, Liliane, B.A., M.A. (Montana); Ph.D. (Penn. State); Professor of French.

## Department of Music

Altman, William, B.Mus. (Saskatchewan) M.Mus.(Nebraska-Lincoln); Lecturer
Code, Belinda, B.Mus. (Bowling Green); M.Mus. (Western Illinois); Associate Professor.
Code, James Grant, B.S. (Lebanon Valley); M.Mus., D.M.A. (Miami); Professor.
Dawe, Edmund, B.Mus., B.Mus.Ed. (Memorial); M.Mus. (Western Ontario); D.M.A. (U.B.C.); Associate Professor and Head of the Department.
Ellard, Brian J., B.Mus., M.A., Ph.D. (Rochester); Professor.
Ferguson, Danise Joy, B.Mus. (Calgary); M.Mus. (Western Ontario); Associate Professor.
Higham, Peter, B.A., M.Mus. (Alberta); M.L.S. (U.B.C.); L.R.A.M. (London); Part-time Lecturer.
Mark, James, B.Mus. (Rochester); M.Mus (Hartford); D.M.A. (Michigan); Professor.
Mark, Penelope Burridge, B.Mus. (Mount Allison); A.R.C.M. (London); Part-time Lecturer in Music
Pridmore, Helen, B.Mus. (Saskatchewan); M.Mus. (Toronto); D.M.A. (Rochester); Assistant Professor.
Rogosin, David, B.Mus., M.Mus. (Montreal); D.M.A. (U.B.C.), Assistant Professor
Stark, James A., B.A. (Minnesota); M.Mus., Ph.D. (Toronto); Professor. Tucker, Gary, B.Mus. (Mount Allison); M.A., Ph.D. (Western Ontario); Assistant Professor.
Vogan, Nancy F., B.A. (Mount Allison); M.Mus., Ph.D. (Rochester); Professor.

## Department of Philosophy

Bogaard, Paul, B.A. (Central College); M.A., Ph.D.(Emory); Professor and Head of the Department .
Houle, Karen, B.Sc. (Guelph), M.A. (Guelph) Ph.D. (Guelph)in progress McCain Fellow
Majithia, Roopen, B.A. (Beloit); M.A. (Northern Illinois); Ph.D. (McMaster); Assistant Professor
Welch, Cyril, B.A. (Montana), M.A., Ph.D. (Penn. State); Professor.

## Department of Physics

Ahmady, Mohammad Reza, B.Sc. (Shiraz), M.Sc., Ph.D. (Western Ontario); Assistant Professor of Physics
Bruning, Ralph, B.Sc. (Kiel); M.Sc., Ph.D (McGill); Associate Professor of Physics.
Fleming, David E.B., B.Sc. (Mount Allison), M.Sc., Ph.D. (McMaster) Canada Research Chair in Medical Physics
Hawkes, Robert Lewis, B.Sc., B.Ed. (Mount Allison); M.Sc., Ph.D. (Western Ontario); Professor of Physics and Head of Department.
Varma, Pravin Kumar, B.E. (Jodhpur); M.E. (N.S.T.C.), B.Ed. (Mount Allison); P.Eng.; Professor of Physics.

## Department of Political Science

Cross, William, B.A. (Waterloo); M.P.S. (George Washington); J.D. (Houston); M.A., Ph.D. (Western Ontario); Assistant Professor

Hunt, Wayne, B.A. (Laurentian); M.Sc. (Econ.) (London); Ph.D. (Toronto); Professor
Michaelis,Loralea, B.Ind.St.(Waterloo) MA;Ph.D. (Toronto); Assistant Professor
Tucker, Michael J., B.A. (Bishop's); M.A., Ph.D. (Toronto); Professor and Head of the Department.

## Department of Psychology

Belke, Terry W., B.A. (Alberta); M.A., Ph.D. (Harvard); Associate Professor and Head of the Department
Claxton-Oldfield, Stephen, B.A. (Queen's); M.A. (Wilfrid Laurier); Ph.D. (Exeter); Assistant Professor
Harpur, John G.E., B.A. (Queen's, Belfast); M.Sc. (Loughborough); Ph.D. (Queen's, Belfast); Associate Professor.
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## Department of Sociology/ Anthropology

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Steuter, Erin, B.J. (University of King's College); B.A., M.A. (Dalhousie);
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Walker, Marilyn, B.A. (Toronto); M.A. (Manitoba); Ph.D. (York); Associate Professor
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### 12.10.2 Librarians

Cannon, Anita, B.A. (York); M.L.S. (Toronto); Public Services Librarian. Cross, Emma, B.A. (Cardiff), M.A. (Western), M.L.I.S. (Western); Cataloguing Librarian.

Ennals, Cheryl, B.A. (Guelph), B.L.S. (Toronto); Archives Cert. (Public Archives of Canada); University Archivist.
Fancy, Margaret, B.A., M.L.S. (Western Ontario); Special Collections Librarian.
Gullikson, Shelley, B.A. (Toronto); MLIS (Dalhousie); Information Literacy Coordinator
Higham, Peter, B.A., M.Mus (Alberta), M.L.S. (U.B.C.); L.R.A.M. (London); Music Librarian.
Lilburn, Jeff, B.A. (McGill); M.A. (Western Ontario); M.L.I.S. (McGill); Public Services Librarian
McNally, Brian, B.Sc., B.Ed., M.A. (U.N.B.), M.L.S. (McGill); Systems Librarian.
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### 12.11 MEIGHEN CENTRE FOR LEARNING ASSISTANCE AND RESEARCH

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Smith, Frauke, B.Ed. (U.N.B.); Certificate in Special Education (Mt. Allison); Coordinator, Peer Tutoring Program
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Wilson, Alexander M., B.Sc. (Trent); M.Ed., Ph.D. (Calgary); Director

### 12.12 STUDENT LIFE

Broadbent, Allison , B.F.A.(Mount Allison); International Student Advisor
Hunter, Charles W. F., B.A.(Mount Allison); M.A.(Oxford);
B.Ed.(Dalhousie); Dean of Students

Perkin, John, B.A.(Houns)(Acadia); M.A.(Acadia); M.Div.(McMaster); University Chaplain
MacDonald, Mora, B.A.(Mount Allison); B.Ed.(Mount Allison); M.Ed.Counselling)(Acadia); Academic and Career Counsellor

Trotter, Kris , B.A.(Bishop's); B.A.(Carleton);
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Robinson, Kimberly, B.A.(Saint Mary's); M.Sc.(Saint Mary's); Personal Counsellor

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Drover, Jack, B.P.Ed. (U.N.B.); M.A. (Wyoming); Athletic Director, Women's Hockey Coach.
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Hart, Al, B.P.Ed. (U.N.B.); Womens Basketball Coach (Part-time) Oliver, Jaco, B.Comm. (Mount Allison University) Women's Rugby Coach (Part-time)

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Robinson, Janet, B.P.Ed. (U.N.B.), B.Ed. (Mount Allison); Intramural, Club and Recreation Coordinator; Business Manager
Seaborn, Susan, B.P.Ed., M.Sc. (Alberta); Sports Information Director; Women's Varsity Volleyball Coach
Starratt, Duane, B.Ed. Phys Ed Major (NSTC), Men's Basketball Coach (Part-time)
Stone, Shauna, B.Sc., (SMU) Diploma of Sports Injury Management (Sheridan), Certified Athletic Therapist

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[^0]:    6 from Biology 1001, 1501
    3 from Physics 1051
    3 from Physics 1551, 3521
    6 from Math 1111, and three other credits in Math or Computer Science selected from Math 1121, 1131, 2211, 2221, 2311, or Computer Science 1711.
    9 from Chemistry 1001, 1021, 2101 or 2111
    3 from Biochemistry 2001
    12 from Biology 2101, 2301, 2401, 2601
    6 from Group I Biology courses - Biology 3011, 3021, 3351, 3361, 3371, 3401, 3601, 3711, 3801, 4001, 4101, 4371, 4701, 4711
    6 from Group II Biology courses - Biology 3111, 3201, 3211, 3311, 3901, 3941, 4201, 4211, 4221, 4301, Biochemistry 3501, 3531, 4501, 4521, 4541, 4551,
    6 from Group III Biology courses - Biology 3101, 3411, 3451, 3501, 3611, 3651, 3751, 4141, 4151, 4511
    6 additional credits from Biology at the 3/4000 level

[^1]:    * May be repeated if topic differs

