### **FACULTY OF MEDICINE**

#### **Table of Contents**

- 1. Administration, page 33
  - Administrative Officers, page 33 1.1
- General Information, page 33
  - History, page 33 2.1
  - Medical Societies, page 34
- 3. Scholarships, Bursaries, Prizes, Medals and Loan Funds, page 35
  - Scholarships and Bursaries, page 35 3.1
  - 3.2 Prizes, page 38
  - 3.3 Medals, page 39
  - Loan Funds, page 39 3.4
- Programs of Study, Admission and Curriculum, page 39
- Undergraduate Programs of Study and Admission, page 39
- 4.2 Non-Quebec Students, page 42
- 4.3 Registration, page 43
- Collège des Médecins du Québec, page 43 4.4
- 4.5 Courses for the Degree of M.D., C.M., page 43
- Descriptive Outline of the Curriculum in the Faculty of 4.7 Medicine, page 44
- Leaves of Absence, page 44 4.8
- 4.9 Curriculum Review, page 44
- 4.10
- Evaluation System, page 44
  Requirements for the Degree of M.D.,C.M., page 45
- Requirements for Licence, page 45
- Graduate Training Programs in the Clinical Departments 4.13 of the Faculty of Medicine, page 46
- Graduate Studies and Research in the Medical Sciences, page 46
- 5. Courses of Instruction, page 46
  - Basis of Medicine (BOM), page 46 5.1
  - Introduction to Clinical Medicine (ICM), page 47 5.2
  - Practice of Medicine (POM), page 47 5.3
  - 5.4 Back to Basics (BTB), page 47
- 6. Units in the Faculty of Medicine, page 47
  - Anatomy and Cell Biology, page 47 6.1
  - 6.2 Anesthésia, page 47
  - Artificial Cells and Organs Research Centre, page 48 6.3
  - 6.4
  - Biochemistry, page 48
    Biomedical Engineering Department, page 48 6.5
  - Diagnostic Radiology, page 48 6.6
  - Epidemiology and Biostatistics, page 48 6.7
  - Family Medicine, page 48 6.8
  - 6.9
  - Human Genetics, page 48 Medical Physics Unit, page 49 6.10
  - 6.11
  - Internal Medicine, page 49
    Microbiology and Immunology, page 49 6.12
  - Neurology and Neurosurgery, page 49 6.13
  - Obstetrics and Gynecology, page 49 6.14
  - 6.15 Occupational Health, page 49
  - Ophthalmology, page 50 Otolaryngology, page 50 6.16
  - 6.17
  - Pathology, page 50 6.18
  - Pediatrics, page 50 6.19
  - 6.20 Pharmacology and Therapeutics, page 50
  - 6.21 Physiology, page 50
  - 6.22 Psychiatry, page 51
  - Social Studies of Medicine, page 51 6.23
  - Surgery, page 51 6.24
  - Elective/Selective Courses, page 52
- 7. Staff by Department, page 52

#### Administration

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General Information: (514) 398-3515 Admissions Information: (514) 398-3517 Website: http://www.med.mcgill.ca

#### **Administrative Officers**

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ALVIN SHRIER, B.Sc.(C'dia), PhD.(Dal.) **Associate Dean** (Computing and Information Technologies)

LINDA SNELL, B.A., M.D.(Alta), M.H.P.E.(III.), F.A.C.P., F.R.C.P.(C)

**Associate Dean** (Continuing Medical Education)

YVONNE STEINERT, B.A.(McG.), M.A.(Tor.), Ph.D.(McG.) **Associate Dean (Faculty Development)** 

ROBERT E. MACKENZIE, B.Sc.(McG.), M.N.S., Ph.D.(C'nell) Associate Dean (Graduate Studies and Research)

SAM BENAROYA, B.Sc., M.D., C.M. (McG.), F.R.C.P.(C)

Associate Dean (Interhospital Affairs) J. DONALD BOUDREAU, B.Sc.(New Br.), M.D.(Dal.), F.R.C.P.(C)

Associate Dean (Medical Education and Student Affairs) ANNE-MARIE MACLELLAN, B.Sc., M.D., C.M. (McG.),

F.R.C.P.(C), C.S.P.QAssociate Dean (Postgraduate Medical **Education and Professional Affairs)** 

RICHARD LATT, D.V.M.(O.V.C.) Director

(Animal Resources Centre)

VIMLA PATEL, B.Sc.(Otego), M.A., Ph.D.(McG.) **Director** (Centre for Medical Education)

DAVID S. CRAWFORD, B.A., Dip.Lib.Stud, A.L.A. Director, **Health Sciences Library** 

#### **General Information**

#### 2.1 History

The Faculty of Medicine was established as the first faculty of McGill University in 1829. It dates its origin to 1823 when four staff members of the recently opened Montreal General Hospital founded the Montreal Medical Institution in order to offer lectures to students of medicine. In 1833, four years after the Institution became the Faculty of Medicine, William Leslie Logie was awarded the degree of Doctor of Medicine and Surgery and became the first McGill, and the first Canadian medical, graduate. In 1862 the degree was changed to its present designation, Doctor of Medicine and Master of Surgery (M.D., C.M.) and in 1872 it was conferred upon the Faculty's most illustrious graduate, William Osler. Osler served on the faculty from 1874 to 1884 before going on to the University of Pennsylvania, Johns Hopkins University, and Oxford University. He was instrumental in developing the Medical Library, which had its origin in the Montreal Medical Institution and which now contains over 216,000 volumes and

2,300 periodicals, and left to it his extensive collection of books devoted to the history of medicine.

The land occupied by the University, deeded to it by James McGill, lies in the heart of Montreal on the southern slope of Mount Royal. The medical faculty offices are located in the McIntyre Medical Sciences Building which lies higher on the flank of the mountain on Drummond Street at Pine Avenue. The Medical Library, the Osler Library of the History of Medicine, and a number of the departments of the Faculty are located in this building. The Royal Victoria Hospital, founded in 1887, the Strathcona Anatomy and Dentistry Building, and the Montreal Neurological Institute and Hospital are situated a half mile east of the McIntyre building while the Montreal General Hospital, relocated in 1955 from its original site south of the University, lies a half mile to the west. There are two other principal teaching hospitals, the Montreal Children's Hospital and the Sir Mortimer B. Davis-Jewish General Hospital, and seven specialty teaching hospitals. In addition, there are nine centres and units specializing in human genetics, artificial cells and organs, cancer research, human transplantation, host resistance, nutrition and food science, aerospace medical research, medical physics, age and aging, and in medicine, law and ethics.

#### 2.2 Medical Societies

#### McGill Medical Students' Society Inc.

Mail: 655 Drummond Street, 6th Floor

Montreal, QC, H3G 1Y6

Office: McIntyre Medical Sciences Building, Room 508

Telephone: (514) 398-7167 Fax: (514) 398-1789

Email: msspres@med.mcgill.ca

The Society is an association of all registered medical students. Acting through its elected council and various Faculty committees, the Society performs a number of functions:

- to represent medical students' ideas, concerns and problems to the Faculty of Medicine, the rest of the McGill community, the government, and the public at large;
- to promote interaction among medical students through both the Federation of Quebec Medical Student Societies and Canadian federations of medical students;
- to attempt the advancement of new forms of learning in response to the desires of the students;
- to collaborate with the Students' Societies of Nursing, Physical and Occupational Therapy, and Dentistry in running the "Annex", the social centre;
- 5 to regulate all student sporting and social events within the Faculty:
- 6. to publish a newspaper, The Placebo, for all medical students;
- to recognize and supervise the formation and operations of affiliated student societies;
- 8. to attempt generally to provide the resources and personnel to meet student needs and wishes as they arise.

The M.S.S. has members on many Faculty committees, including the Curriculum Committee and the Admissions Committee. Details of all the activities are easily available from the M.S.S. Office and it is hoped that all students will participate in the Society's activities.

L'Association des Étudiants en Médecine est une association de tous les étudiants inscrits en médecine. Représentée par son conseil élu et par les divers comités de la faculté, l'Association accomplit les fonctions suivantes:

- représente les idées des étudiants, leurs soucis et leurs problèmes à la faculté de médecine, à la communauté McGill en général, au gouvernement et au public en général;
- facilite la communication des étudiants en médecine par le biais du Fédération des Associations des étudiants en médecine du Québec et du Fédération des étudiants en médecine du Canada;

- essaye de développer de nouveaux cours qui répondront aux désirs des étudiants;
- collabore avec les Associations des étudiants en nursing, en ergothérapie et réadaptation, et en médecine dentaire dans la direction de "l'Annexe", notre centre social;
- s'occupe des activités sportives et sociales des étudiants en médecine;
- publie un journal, The Placebo, pour tous les étudiants en médecine.
- reconnaît et supervise la formation et le fonctionnement d'organisations ou de sociétés d'étudiants en médecine à des fins diverses.
- 8. de façon générale, essaye de fournir les ressources et le personnel afin de rencontrer les besoins et les désirs des étudiants qui se font ressentir.

L'Association des étudiants en médecine a des membres sur plusieurs comités de la faculté y compris le "Curriculum Committee" et l' "Admissions Committee". Des renseignements sur nos activités peuvent facilement être obtenus au bureau de l'association et nous souhaitons ardemment que tous les étudiants participent à nos activités.

#### Osler Medical Aid Foundation (OMAF)

Four McGill medical students founded OMAF in 1985. Its aim is to increase awareness of international health issues, and to promote student involvement in international health programs. OMAF does this by providing lectures and information on international health projects and organizations. OMAF also helps medical students organize and obtain funding for medical electives and research projects in rural and developing areas. Currently OMAF is beginning to develop a long-term, substainable project for McGill Medicine in a developing nation.

OMAF welcomes all who share an interest in providing and improving equal health care for all. For more information, email OMAF@medcor.mcgill.ca

#### **Osler Society**

The Osler Society was founded in 1921 to perpetuate the memory and teaching of Sir William Osler, the most illustrious graduate and professor of the Faculty of Medicine at McGill. Through the presentation of lectures and seminars by students and guest lecturers on topics in the medical humanities, the Society strives to uphold Osler's ideals of a liberal medical education.

Meetings are held throughout the academic year approximately once a month. In the fall, the Osler Lecture is given by a distinguished guest. It is followed by the Osler Banquet, an occasion marked by traditional ceremonies. The public is welcome to all Osler Society functions.

#### Phi Delta Epsilon

The Phi Delta Epsilon International Medical Fraternity is a professional, coeducational organization with a membership of over 25,000 students, interns, residents, and practicing physicians.

The McGill chapter was founded in 1926 to promote the highest ethical, scientific, and educational standards in the field of medicine. The chapter's activities reflect their long-term commitment to non-profit community service as well as addressing the need among medical students for a supportive, relaxed environment.

Phi Delta Epsilon's international network of graduate members also offers their student members many benefits, including: funding for a variety of projects; advice and support in the selection of electives, research and residency positions; awards for academic and research excellence, and for outstanding community service; low-interest student loans; regional and international conventions.

#### **McGill Journal of Medicine**

The McGill Journal of Medicine (MJM) is a scholarly scientific journal providing an international forum for university students to publish original research, case reports, reviews and expository essays in any field of medicine. Established in May 1994, MJM is

published and produced entirely by students in the Faculty of Medicine and the Faculty of Graduate Studies and Research at McGill University.

Based on the principles of student excellence and education, MJM is unique among existing medical journals. It is the only student-run scientific journal devoted to publishing the original research of students exclusively, on an international scale. MJM has already established a national and international base of authors. Please see recent reviews of MJM in the New England Journal of Medicine (336:885;1997) and JAMA (278:1461-2;1997) and visit online at http://www.mjm.mcgill.ca

#### Medical and Dental Christian Fellowship (MDCF)

In 1988, several students from Med I and II started the Medical Christian Fellowship, which has since become the MDCF. This group created a place for Christians in medical training to meet weekly for Bible study, encouraging each other in continuous spiritual growth. In addition, various speakers (doctors, faculty, medical missionaries, etc.) expose the members to different ways to effectively integrate faith and medical practice by sharing with members their experiences as Christians in the medical profession.

Ranging from Roman Catholic to Lutheran and from Greek Orthodox to Calvinist, the group covers a large spectrum of denominations and enjoys the richness in thought such a diversity brings. Even though the MDCF is an independent group, it is associated with the Christian Medical and Dental Society (CMDS), the Canada and U.S. wide organization of Christian doctors and dentists

#### **Medical Education Council (MEC)**

"Is the education that we receive at McGill maximally preparing us for careers in medicine?" Many argue that since the implementation of the new medical curriculum by McGill in 1994, the answer to this question is "Yes". However, we also recognize that there is always room for improvement.

In order to identify areas for improvement in the curriculum, the Medical Education Council (MEC) was created. The purpose of MEC is to bring together the ideas of students from all four medical classes in the discussion of both specific changes to the curriculum and general philosophical issues of medical education. As well, this Council acts as a liaison between students and the Faculty in proposing changes to the curriculum.

So far, MEC has identified four main areas that need to be explored: community involvement, curriculum content and format, evaluations and rewards, and admissions.

Committees meet regularly during the year to discuss medical education at McGill and explore ways of implementing positive change. Proposals are then drafted and formally submitted to the Faculty. To be part of this exciting endeavour, look for announcements about the MEC. For more information, please call any of the Committee's curriculum representatives.

#### Medical Students' Computing Committee (MSCC)

The MSCC is responsible for managing the student tax of \$10/ student/semester for the maintenance of the computer facilities on the second floor of the McIntyre Building. The computer lab is composed of:

- 16 PC stations (Pentium 120Mhz and 233MHz) set on standard Infopoint settings (Microsoft Office, Netscape, Netscape Mail and most other basic utilities) and operating from a Windows NT
- 7 PowerMacs, also with basic utilities;
- 2 laser printers.

The MSCC budget is used to pay part of the salary of the computer technician who is indispensable for computer maintenance. The MSCC tests and buys medically-related software, organizes workshops on basic software and internet searching for medical students, and generally facilitates communication between students and MEDCOR. It also actively participates in the maintenance and installation of the computers in the laboratory. The Computer Committee is an fundamental arm of the Medical Students' Society. The Faculty of Medicine at McGill is very inclined towards the integration of computer into medical information, and facilities are expanding each year. Student input is vital to the shaping and expansion of the facilities, and all members are active on the Faculty of Medicine Computing Committee and other decision-making groups. Student representation from all years is encouraged. Come and join MSCC.

#### Medical Students for Social Responsibility (MSSR)

The MSSR is an organization devoted to raising awareness about issues at the boundary of medical education and the world at large, from global health and development to local ethical issues. Discussions within the group help to sharpen a sense of society as a place where medical, ethical, socioeconomic and political issues are all related. MSSR provides a forum for students to explore social issues and translate their awareness into action.

Activities have included potlucks, films and guest speakers, fund-raising for black South African medical student bursaries, an international health conference, the collecting and dispensing of information about alternative medicine and more. MSSR is for activists who want to remain active, students who want to do more than study, and anyone interested in social justice.

#### Scholarships, Bursaries, Prizes, Medals and Loan Funds

For details of scholarships, bursaries and loan funds open to students in all faculties, see the Undergraduate Scholarships and Awards Calendar, available from the Admissions, Recruitment and Registrar's Office, James Administration Building, 847 Sherbrooke Street West, Montreal, or on the Office website (http://www.aro.

Students in the Faculty of Medicine who demonstrate outstanding performance are recognized through the awarding of prizes, medals and J.W. McConnell Awards. Receipt of an award is permanently recorded on the transcript of each recipient.

Each year the Faculty Student Research Committee supervises both summer (\$2,700) and winter (\$2,000) research bursaries, awarded on a competitive basis. As well, various bodies outside of McGill University offer special research and exchange awards. For further details, please inquire at the Medical School Office.

In view of the high level of academic performance already achieved by students entering the Faculty of Medicine, scholarships and bursaries, other than research bursaries, are generally awarded by the Faculty on the basis of good standing and financial

Students requiring financial aid should complete the financial aid forms available from the Student Aid Office, 3637 Peel Street, Montreal.

#### Scholarships and Bursaries

DR. MAUDE E. SEYMOUR ABBOTT SCHOLARSHIPS - from a fund of \$10,000, established in 1938 by an anonymous donation in honour of the late Maude E. Seymour Abbott, B.A., M.D., F.R.C.P.(C), LL.D.(McGill), to commemorate her distinguished work in connection with the history of Canadian medicine, the Sir William Osler Pathological Collection, and her outstanding research in congenital cardiac disease. The revenue of this fund provides scholarships awarded by the University to undergraduates in the Faculty of Medicine. Preference is given to women. Awards vary according to need. Further information may be obtained from the Dean's Office, Faculty of Medicine.

JAMES MOSES AND STELLA FROSST ALEXANDER SCHOLARSHIPS value: \$8,000 each. Established in 1992 to honour James Moses Alexander, a distinguished graduate of the Faculty of Medicine, McGill University (1934). Two scholarships are available each year for students with outstanding merit entering the four-year undergraduate program in the Faculty of Medicine. Awarded by the Faculty Scholarships Committee and renewable provided the holder maintains an academic standing satisfactory to the Committee. Students who hold this scholarship during third and fourth year will have the opportunity of doing an elective clinical rotation at the University of North Carolina in recognition of Dr. Alexander's major commitment to the institution.

**J.H.B. ALLAN SCHOLARSHIP** – available to undergraduate students in any year.

SIR EDWARD W. BEATTY MEMORIAL SCHOLARSHIPS FOR MEDICAL STUDENTS – income from a bequest of \$100,000 from the late Dr. Henry Albert Beatty provides scholarships for undergraduate and graduate students in the Faculty of Medicine. For students who hold or are working towards the McGill M.D.,C.M., the award may be held at any approved institution in Canada or abroad. For other qualified students the award must be held at McGill. The holder is expected to devote the year of tenure either to research or to some form of special training excluding the normal training towards the M.D.,C.M. and excluding any of the years of residency training required in the Diploma courses.

**BELLAM MEMORIAL BURSARIES** – from a bequest of \$20,000 from the estate of the late C.F. Bellam and awarded on the basis of financial need to students from Stanstead County, Quebec.

**DR. BEN BENJAMIN MEMORIAL BURSARY** — established by his sisters in memory of the late Ben Benjamin, B.A., M.D., C.M., Lecturer in the Department of Pediatrics. Awarded on high academic standing and financial need.

ETTIE ISRAEL BENNETT BURSARY – established in 1986 to be awarded for medical research to a deserving student as selected by the Faculty Scholarships Committee.

**JOSEPH ISRAEL BENNETT BURSARY** – a bequest from the late Joseph Israel Bennett provides an annual bursary for a deserving student.

MAX BINZ SCHOLARSHIP – from the bequest of the late Max Binz. \$1,000 is set aside annually for scholarships in the Faculty of Medicine.

SYDNEY BLIDNER MEMORIAL MEDICAL SCHOLARSHIP – established in 1996 by a bequest of the late Mrs. Pauline Blidner Krupp in memory of her brother. Awarded by the Student Aid Office to worthy undergraduate students in any year in the Faculty of Medicine on the basis of academic standing and financial need.

**DR. MAURICE BRODIE MEMORIAL SCHOLARSHIP** – established in 1993 by Mrs. Edna Singer Brodie in memory of Dr. Maurice Brodie (M.D.'28). Awarded on the basis of academic standing and financial need by the Student Aid Office to undergraduate students in the Faculty of Medicine, tenable in any year.

**ELFRIC DREW BROWN BURSARY** – established in 1973 by a bequest from the late Elfric D. Brown, M.D.,C.M. The income provides bursaries to help deserving students in the Faculty of Medicine.

**NAT CHRISTIE SCHOLARSHIPS** – established in 1982 by the Nat Christie Foundation, an annual gift of \$50,000 provides scholarships for undergraduate medical students valued at a minimum of \$1,200 each. Awarded on the basis of academic standing and financial need.

CLASS OF MEDICINE 1943B BURSARY – established in 1995 by the Class of Medicine 1943B in honour of their 50th Anniversary of graduation. A bursary awarded by the Student Financial Aid Office to a third year medical student in good academic standing who exhibits financial need.

**CLOUSTON MEMORIAL SCHOLARSHIP** – \$1,800, endowed in 1986 by the family in memory of Dr. H.R. Clouston and his father, Dr. J. Clouston, both of Huntingdon, Quebec. Awarded by the Faculty Scholarships Committee to a medical student who undertakes a research project with preference to the field of genetics.

MR. & MRS. JOHN HENRY COLLINS MEMORIAL BURSARY — endowed in 1986 by a bequest from Mrs. John Henry Collins to assist students in conducting medical research. Awarded by the Faculty Scholarships Committee.

**BEVERLEY COONER BURSARY** – established by the family and friends of the late Beverley Cooner to assist a deserving student.

Awarded with the approval of the National Council of Jewish Women on the basis of financial need and academic standing.

**BOWMAN CORNING CROWELL AWARD** – established in 1979 by a bequest from Frances B. Crowell. To be awarded to an undergraduate medical student engaged in research in Pathology.

Laura Crawford Bursary – established in 1987 by a bequest from Laura Crawford to be used as bursaries for Canadian students studying medicine. Awarded by the Faculty Scholarships Committee

**JAMES H. CUMMINGS SCHOLARSHIPS** – two or more entrance scholarships bequeathed by the late James H. Cummings are awarded at the discretion of the Faculty of Medicine.

**ANNIE DIAMOND BURSARIES** – established in 1969 for medical students with financial need.

**SAMUEL EIDLOW MEMORIAL BURSARY FUND** – established for worthy medical undergraduate students with financial need.

CHANCELLOR FERRIER MEMORIAL BURSARY — established by Mrs. Herbert V. Lacey in memory of her great-grandfather, Senator James Ferrier, Chancellor of McGill from 1884 to 1889. Awarded on the basis of academic standing and financial need, with preference to students from the State of Wyoming.

**DR. E.M. FISHER MEMORIAL SCHOLARSHIP** – available to any medical undergraduate student.

SIMON AND ROSALIE HALPERN MEMORIAL SCHOLARSHIP – established by the late Dr. Fanny G. Halpern in memory of her parents. The sum of \$400 is available to students of the Roman Catholic or Jewish faith who have distinguished academic standing and financial need. The recipient in any one session may re-apply for the following year.

**DR. DAVID M. AND DONALDA L. HARVEY SCHOLARSHIP** – value: \$2,000. Established in 1995 by Dr. David M. Harvey (M.D. 1955) and his wife Donalda, to support medical students based on academic standing and demonstrated financial need. The scholarship is tenable in any year and may be renewed. Awarded by the Student Aid Office.

WALTER J. HOARE MEMORIAL SCHOLARSHIP – endowed by the late Dr. Charles W. Hoare, a graduate of McGill University, in memory of his son, Walter J. Hoare, who was killed in World War I. Preference is given to graduates of the Collegiate Institutes of the counties of Essex, Kent and Lambton entering the Faculty of Medicine.

**KEITH HUTCHISON MEMORIAL SCHOLARSHIPS** – two or more scholarships, in memory of the late Dr. Keith Hutchison. Awarded on the basis of distinguished academic standing and need; tenable in any year. The recipient in any session may re-apply for the following year.

IVES SCHOLARSHIP – established in 1967 by a bequest of the late David Fraser Murray, M.D.,C.M., 1924. Awarded on the basis of financial need with preference given to students from Nova Scotia, New Brunswick or Prince Edward Island.

CAMPBELL KEENAN MEMORIAL SCHOLARSHIP – established by the late Miss Charlotte Mildred Hagar in memory of the late Dr. Campbell B. Keenan. Tenable in the second, third, or fourth year; and awarded on the basis of distinguished academic standing and financial need to an applicant who intends to enter surgical practice. The recipient in any session may re-apply for the following year.

James Grahame Ker and Frederick K. Petrie Memorial Scholarship – awarded to a student from Eastern Ontario (Counties of Dundas, Stormont, Glengarry, Grenville, Carleton, Russell and Prescott) or from Montreal. Based upon distinguished academic standing and financial need; tenable in second year and may be renewed.

**KINCH MEMORIAL BURSARY** – established by Miss Dia Joyce in memory of Mr. and Mrs. C.H. Kinch to assist medical undergraduates.

FREDERICK PENTON LOFTUS LANE BURSARY OR SCHOLARSHIP FUND – established in 1979 by a bequest from Esther M.E. Lane. The income provides one or more bursaries or scholarships for Canadian medical undergraduates.

**LEUKEMIA RESEARCH FUND BURSARY** – value: \$3,500. Established in 1992 by the Leukemia Research Fund. Awarded annually by the Faculty Scholarships Committee to a medical student who participates in a summer research project in leukemia-related research at McGill University.

**DR. GABRIEL LEUNG MEMORIAL AWARD** — established in 1987 by Mrs. Jane Leung and friends, through the Education Foundation of the Federation of Chinese Canadian Professionals, in memory of Dr. Gabriel Leung, who graduated from McGill with his M.D.,C.M. in 1972. Awarded by the Student Financial Aid Office to a second year medical student for achieving academic excellence or to pursue an independent research project under the direction of the Faculty. Financial need can be part of the consideration.

**GUSTAV LEVINSCHI SCHOLARSHIP FUND** – endowed in 1986 for needy medical students requiring assistance in the pursuit of their studies.

**DR. DAVID T.W. LIN FOUNDATION SCHOLARSHIP** – value: \$2,600. Established in 1993 in honour of Dr. David T.W. Lin, B.Sc. (1937), M.D.(1940), O.C., Surgeon Emeritus at the Royal Victoria Hospital, Honorary President of the Montreal Chinese Hospital and a leader in the Chinese community. Awarded by the Student Aid Office to a medical student on the basis of academic achievement and demonstrated need. Preference will be given to students of Chinese origin.

McGill Hong Kong Graduates Bursary Fund – established in 1987 through donations from McGill graduates in Hong Kong to be used to provide bursary assistance for deserving students in any faculty who are from Hong Kong. To be awarded by the Student Aid Office in collaboration with the McGill Society of Hong Kong.

**DR. CLARKE K. McLeod Memorial Scholarship Fund** – established in 1979 by a bequest from Dr. Clarke K. McLeod, M.D.,C.M., 1927 to provide scholarships for undergraduate medical students.

James O. Meadows and Maria Meadows Awards – income from a bequest of \$200,000 from the late Dame Maria Cowan Meadows provides awards for undergraduate and graduate students in the Faculty of Medicine who are engaged in research. Preference is given to candidates working in cancer research but worthy candidates in other areas of medical or surgical research are also considered. Application is made to the Dean of the Faculty of Medicine

RONALD DOUGLAS NAYMARK AWARD — established by the Medical Class of 1984 in memory of Ronald Douglas Naymark, B.Sc., M.D.,C.M.(McG.), this award is given to that member of the graduating class who most enriches the life of the class in the eyes of his or her peers. The award seeks to recognize an individual who inspires trust and confidence, optimism and enthusiasm in his or her medical colleagues. The individual is a participant in class activities and is in satisfactory academic standing.

**DR. H.K. NEILSON BURSARY FUND** – established in 1986 to be used to further the education of worthy medical students. Awarded on the basis of academic standing and financial need.

PHARMACEUTICAL MANUFACTURERS ASSOCIATION OF CANADA, HEALTH RESEARCH FOUNDATION SUMMER RESEARCH

SCHOLARSHIPS – value: approximately \$4,000 each. Three to six summer research scholarships will be awarded to undergraduate medical students for pharmacological research in the broadest context. A maximum of two scholarships can be renewed for a second year. Recipients must be Canadian citizens or Permanent Residents who demonstrate a willingness to make a significant commitment to research. Awarded by the Faculty of Medicine Scholarships Committee. The recipients may be requested to attend an awards ceremony or other PMAC events (all costs paid by the PMAC-HRF). Recipients will also be eligible for consideration for \$1,000 travel grants to enable them to present their work at a PMAC sponsored conference or a national/international research meeting.

**IVAN RACHEFF SCHOLARSHIPS** – established in 1986 to be awarded by the Faculty Scholarships Committee to medical students who demonstrate an interest in research in public health and/or the effects of pollution or pollutants on the human body.

**SAMUEL ROSENFELD BURSARY** – established by Mrs. Ida Rosenfeld Letovsky in memory of her late husband, Mr. Samuel Rosenfeld, to support worthy undergraduate medical students.

**ANN AND GEORGE ROSENGARTEN BURSARY FUND** – established in 1987 by Ann J. and George J. Rosengarten to aid students in any faculty who require financial assistance to continue their program of studies.

**REUBEN ROSS MEMORIAL AWARD** – the income from a bequest of the late Reuben Ross provides an annual award to medical students in financial need.

**SOLOMON DAVID SACKS BURSARY** – established in 1973 by Mr. and Mrs. Issie Sacks in memory of their son, to assist a deserving medical student in financial need.

**DAVID E. AND RONNIE SCHOUELA MEMORIAL SCHOLARSHIP** – established by the family in 1980 to assist a first-year medical student. Awarded either on the basis of financial need or for participation in the Summer Research Program.

**DR. JACOB C. SCHWARTZMAN SCHOLARSHIP** – established in 1983 in memory of Jacob C. Schwartzman, M.D.,C.M., F.A.C.S., by his family and friends. This tuition scholarship is to be awarded each year by the Faculty Scholarships Committee to a student in the Faculty of Medicine on the basis of academic standing and financial need. Candidates must be Canadian citizens or Permanent Residents. A stipulation of the Scholarship is that each recipient agree to make contact with the family of Helaine Livingstone, B.A., McGill, 1960, who organized the Scholarship in memory of her father.

ROSE SCHWARZ - HELEN MARCUS BURSARY — established by the family and friends of the late Rose Schwarz and the late Helen Marcus. To assist a needy, deserving student engaged in summer work in cancer research. Awarded with the approval of the National Council of Jewish Women.

ROBERT SHARWOOD MEMORIAL SCHOLARSHIP – tenable in any year of the undergraduate course in Medicine. It is awarded on the basis of distinguished academic standing and financial need. The recipient in any one session may re-apply for the following year.

ROSALINE SHINDER MEMORIAL RESEARCH BURSARY — established in 1987 by her family in memory of Rosaline Shinder. Awarded by the Faculty Scholarships Committee to a medical student for cardiac or related research.

**BRUCE SMITH BURSARY FUND** – from a bequest by the late Dr. Bruce Stewart Smith to enable worthy students with financial need to complete medical training at McGill University.

**ALLAN JAY SOLOMON AWARD** – a fund of \$2,000 established in 1977 by family and friends in memory of the late Allan Jay Solomon, M.D.,C.M. The income provides an annual award tenable in any year; awarded for distinguished academic standing and financial need.

**ROBERT ROLF STRUTHERS BURSARY** – the income from a bequest of the late Robert Rolf Struthers (Medicine 1918) provides support for a needy Canadian student entering third year Medicine.

**DR. JOSEPH TANZMAN AWARD** – a bequest establishing an award in honour of Dr. Joseph Tanzman, M.D.,C.M., 1927. Preference is given to a medical student from New Brunswick but if there is no such candidate the award may be given to any deserving student in the Faculty of Science. Awarded by the Scholarships Committee of the Faculty of Medicine or the Faculty of Science.

**DR. MILTON C. AND NINA E. WILSON AWARD** – established in 1970 by a bequest from the late Dr. Milton C. Wilson. The annual income provides support for undergraduate or postgraduate students in the Faculty of Medicine who are in financial need.

**GEORGE WIOR FOUNDATION BURSARIES** – three bursaries in the amount of \$2,500 each, awarded annually to students in financial need with good academic standing. One bursary to a student in each of second, third and fourth year. The bursary is renewable only if academic standing is maintained.

#### 3.2 Prizes

APPLETON & LANGE MEDICAL PUBLICATIONS BOOK PRIZES — established in 1965 to provide recognition to outstanding medical students. Awards may be presented to one graduating senior and one undergraduate student upon completion of the basic science course requirements. Recipients are chosen by the Associate Dean of Medical Education.

MR. AND MRS. J.A. BESNER PRIZE – a prize of approximately \$475 is awarded to the student obtaining the highest standing in the Introduction to Clinical Medicine component of the medical undergraduate course.

H.S. BIRKETT MEMORIAL PRIZE IN OTOLARYNGOLOGY — established by Miss Winifred Birkett in memory of her father, the late Dr. H.S. Birkett, formerly Professor of Otolaryngology. A prize of \$375 is given to the student who has shown outstanding performance in Otolaryngology.

James Q. Bliss Annual Book Award – \$100 awarded to the student who obtains the highest standing in the Gas, Fluids and Electrolytes unit.

BOEHRINGER INGELHEIM (CANADA) LTD. AWARD – an annual \$500 award, accompanied by a personalized plaque, established in 1991 by the Boehringer Ingelheim (Canada) Ltd./Ltée. The Faculty of Medicine will choose a fourth year medical student who is in excellent academic standing and demonstrates clinical professionalism in the field of either respirology or cardiology. It is preferable that this student not hold another award concurrently.

CARLO Bos PRIZE – value: \$200. Established in 1991 in memory of Dr. Carlo Bos, a humane and respected psychiatrist who taught a multitude of medical students at the Allan Memorial Institute. Awarded by the Coordinating Committee for the Introduction to the Patient and Introduction to the Practice of Medicine courses to the student who has demonstrated the greatest proficiency in the clinical skills preparatory to the practice of medicine.

**JOSEPH MORLEY DRAKE PRIZE** – founded by the late Joseph Morley Drake, M.D., a prize of \$300 is awarded to the student with the highest standing in the Pathobiology, Prevention and Treatment of Disease unit.

SHIRLEY NANCY ENDMAN PRIZE – established in 1982 by Louis Endman in memory of his wife. A prize of \$70 is awarded to the student who obtains the second highest standing in the Gas, Fluids and Electrolytes unit.

**EPIDEMIOLOGY BOOK PRIZE** – awarded to the student who obtains the highest standing in Epidemiology and Health in Year I of the medical curriculum.

SHIRLEY RIVA FISHER PRIZE — established in 1985 by Randy Fisher in memory of his mother, Shirley Fisher, a prize of \$100 is awarded to the medical student showing the most promise and sensitivity in the area of Palliative Care in Medicine.

**ROBERT FORSYTH PRIZE** – bequeathed by the late Miss Jeanie Forsyth, a prize of \$300 is awarded annually to the graduating student who has shown particular ability in all branches of Surgery.

CHARLES E. FROSST MEDICAL PRIZE AND BRONZE MEDAL — a bronze medal and prize of \$1,000 are awarded annually to a student, in the Basis of Medicine, who has achieved excellence in the Unit on Pathobiology, Treatment and Prevention of Disease and has demonstrated, on the basis of interviews, the most promise in the field of Pharmacology.

CLAUDE GIROUD PRIZE IN PEDIATRICS – established in 1981 in memory of Dr. Claude Giroud, Physician-Endocrinologist of the Montreal Children's Hospital and McGill University. \$250 awarded on the basis of scientific merit to the author of a paper suitable for publication in a pediatric journal. The prize is open to medical students and to residents and fellows in pediatric training. Awarded by the Faculty of Medicine.

**ELIZABETH ANN MUNRO GORDON PRIZE** – established in memory of Dr. Elizabeth Ann Gordon. Awarded to the member of the graduating class, who in the opinion of the Faculty and students,

embodies the highest qualifications to practise medicine and has demonstrated outstanding leadership abilities.

ROBERT B. GREENBLATT PRIZE – endowed in 1987 by Dr. Robert B. Greenblatt, an eminent endocrinologist and professor emeritus at the Medical College of Georgia, who graduated from McGill with a B.A. in 1928 and an M.D.,C.M. in 1932. Awarded by the Faculty Scholarships Committee to the student who obtains the highest standing in the Life Cycle unit.

HARRY S. GROSS MEMORIAL PRIZE – bequeathed by the late Mrs. Esther B. Gross in memory of her late husband, Harry S. Gross, D.D.S., 1913, M.D.,C.M., 1921, a prize of \$125 is awarded to the student in the Introduction to Clinical Medicine component with the highest standing in ICM(C).

**JOSEPH HILS PRIZE** – founded by the late Dr. Joseph Hils, of Woonsocket, R.I., a prize of \$175 is awarded to the student obtaining the highest standing in the Musculoskeletal and Blood unit.

CAMPBELL HOWARD PRIZE IN CLINICAL MEDICINE – founded by Mrs. Campbell Howard in memory of the late Dr. Campbell P. Howard, Professor of Medicine at McGill, a prize of \$100 is awarded to the student in the Introduction to Clinical Medicine component with the highest standing in ICM(B).

F. SLATER JACKSON PRIZE – founded by Mr. and Mrs. H.F. Jackson in memory of their son, the late F. Slater Jackson, M.D., a prize of \$175 is awarded to the student with the highest standing in the Molecules, Cells and Tissues unit.

**CAMPBELL KEENAN MEMORIAL PRIZE IN CLINICAL SURGERY** — established by the late Miss Charlotte Mildred Agar in memory of the late Dr. Campbell B. Keenan, a prize of \$100 is awarded to the graduating student who has shown the highest proficiency in Clinical Surgery. The winner of the Robert Forsyth Prize in Surgery is ineligible.

**CHESTER MACNAGHTEN PRIZES** – an essay prize open to students in all faculties. Information may be obtained from the English Department, Faculty of Arts.

REILLY MADSEN PRIZE – Value: \$250. Established to honour the memory of Reilly Madsen who was Manager, Records and Research, Development and Alumni Relations Services. Awarded, on recommendations from faculty and students, by the Faculty of Medicine Scholarships Committee to a student with good academic standing who had demonstrated exceptional warmth and empathy towards patients.

McGill Alumnae Society Prize – \$100, presented upon graduation to a distinguished student for excellence and high academic standing. Preference given to women students.

FRANCIS MCNAUGHTON PRIZE – established in 1980, a prize of \$200 and a book are awarded to the student with the highest standing in the Nervous System and Special Senses unit.

**MERCK, SHARP & DOHME OF CANADA LIMITED AWARD** – an award of \$1,000 plus a Merck Manual of Diagnostics and Therapeutics. Established by Merck, Sharp & Dohme of Canada Limited for undergraduates in the Faculty to support research in the field of therapeutics. Awarded by the Faculty Student Research Committee.

**MONTREAL CHILDREN'S HOSPITAL CUSHING MEMORIAL PRIZE** – a prize of \$250 is awarded to the student with the highest standing in Pediatrics.

MARK NICKERSON PRIZE – Value: \$250. Established in 1990 by the Department of Pharmacology and Therapeutics in honour of Professor Mark Nickerson, a renowned McGill pharmacologist. Awarded to the student, in the Basis of Medicine, who has achieved excellence in the unit on Pathobiology, Treatment and Prevention of Disease and has demonstrated, on the basis of interviews, an understanding of the role of pharmacology and therapeutics in contemporary society. Recipients will also receive a scroll.

**NEWELL W. PHILPOTT AWARD** – \$200, established in 1986 by the Department of Obstetrics and Gynecology in honour of Newell W. Philpott, M.D. (1926), Chairman of the Department from 1943 to 1956. This award is to commemorate Dr. Philpott's excellence as

a teacher of medical students and residents as well as his many contributions in the field and to the Department of Obstetrics and Gynecology. Awarded to a graduating student for academic achievement and clinical excellence by the Faculty Scholarships Committee on the recommendation of the Department.

PRIZE IN MEDICAL ETHICS AND JURISPRUDENCE - established in 1953, a prize of \$500 is awarded to the fourth year medical student who writes the best essay in fulfilment of the requirements of the course in Medical Ethics and Jurisprudence.

PSYCHIATRY PRIZE - a prize of \$200 is awarded on the recommendation of the Department of Psychiatry to the student who has shown the most promise in this field.

SAMUEL ROSENFELD PRIZE - a prize of \$125 is awarded to the student with the highest standing in Host Defence and Host/ Parasite Relationships unit.

Mona Bronfman Sheckman Prize – a prize of \$275 is awarded to the student with the highest academic standing in Psychiatry.

E. DAVID SHERMAN AWARD IN GERIATRIC MEDICINE - a prize of \$300 is awarded to the most outstanding student in the field of clinical geriatric medicine.

DR. JOSEPH SHUGAR - JEWISH GENERAL HOSPITAL PRIZE IN ORTHOPAEDICS - established in December of 1989 in memory of Dr. Joseph Shugar who was Orthopaedic Surgeon-in-Chief at the Jewish General Hospital. Dr. Shugar established an enviable reputation for clinical teaching at both the undergraduate and postgraduate levels and was active in national and international affairs. This award, in the amount of \$350 is granted annually to a graduating medical student who, during his/her undergraduate career, demonstrates the greatest knowledge and proficiency in Orthopaedic Surgery. Selection will be made by the Division of Orthopaedic Surgery.

ALEXANDER D. STEWART PRIZE - founded by the late W. Grant Stewart (Arts, 1885; Medicine, 1888) in memory of his brother, the late Alexander D. Stewart (Medicine, 1888). A prize of \$250 is awarded to the member of the graduating class who, in the opinion of the Faculty, presents in every aspect the highest qualifications to practise the profession.

MARY AND LOUIS STREICHER PRIZE - established in 1980, a prize of \$150 is awarded to the student with the highest standing in the Endocrinology, Metabolism and Nutrition unit.

SUTHERLAND PRIZE - founded in 1878 by the late Mrs. Sutherland in memory of her husband, William Sutherland, M.D., formerly Professor of Chemistry in the Faculty. A Prize of \$250 is awarded to the student who obtains the highest standing in the Basis of Medicine component of the medical undergraduate curriculum.

J. FRANCIS WILLIAMS PRIZE IN MEDICINE AND CLINICAL MEDICINE founded by the late J. Francis Williams, M.D., a prize of \$500 is awarded to the student obtaining the highest standing in the Internal Medicine Clerkship of the medical curriculum.

#### 3.3 Medals

HOLMES GOLD MEDAL - founded by the Medical Faculty in 1865, in memory of the late Andrew Holmes, M.D., LL.D., sometime Dean of the Faculty. It is awarded to the student graduating with the highest aggregate standing in the entire medical curriculum.

WOOD GOLD MEDAL - endowed by Casey A. Wood, M.D., LL.D. in memory of his grandfather, Thomas Smith Wood. It is awarded for the most outstanding clinical performance achieved by a student in the Clerkship Period. The winner of the Holmes Medal is not eligible.

#### 3.4 **Loan Funds**

MAUDE ABBOTT MEMORIAL LOAN FUND - established by the Federation of Medical Women of Canada. Any woman medical student, first year intern, or graduate student may apply to the Secretariat, Federation of Medical Women of Canada, Box 8244, Ottawa, Ontario, K1G 3H7.

**BORIGHT LOAN FUND** – established in 1963 by a beguest from the late George H. Boright to provide loans to deserving medical students.3

Boswell James Loan Fund - established in 1943 by Dr. A. Boswell James to provide loans for undergraduates and gradu-

DAVID M. CALDWELL STUDENT LOAN FUND – established in 1973 by a beguest from the late David M. Caldwell, M.D.(1919) to assist students in the Faculty of Medicine, with preference to American students.3

CLEMENT C. CLAY MEMORIAL LOAN FUND – established in 1985 by a bequest from Clement C. Clay, M.D.(1932) to provide loan assistance for students born in the United States who are registered in the Faculty of Medicine.\*

ALEC AND SYLVIA DOLLIN LOAN FUND – established in 1965 by Mr. Alec Dollin to provide loans for medical students.

KELLOGG LOAN FUND - established by the Kellogg Foundation. It provides loans up to a maximum of the tuition fees in any one year. Available to students in good standing and with financial need. Application and regulations are as for other loan funds of the Universitv.\*

LACEY LOAN FUND - established in 1962 by a donation from Mrs. Herbert Van Devanter Lacey, Cheyenne, Wyoming, primarily to aid medical students from the State of Wyoming. It may however be extended to others in accordance with the following priorities: medical students from the State of Wyoming; dental students from the State of Wyoming; medical students from other states of the U.S.A.; medical students from other countries. Loans are not to exceed \$700 per year.\*

GEORGE W. MERCK MEMORIAL LOAN FUND - established in 1960 by the Merck Company Foundation to provide loans for undergraduate medical students, interns and residents.3

GERTRUDE MUDGE MEMORIAL STUDENT AID FUND - established in 1958 by donations from students, graduates, and staff in memory of the late Gertrude Mudge, for many years Assistant Secretary of the Faculty of Medicine. Loans shall not exceed the fees for the

WESTON FAY VOLBERG JR. MEMORIAL LOAN FUND - established in 1956 by classmates of the late Weston Fay Volberg, Jr., M.D., C.M. (1953). It is available to medical students.

\*Apply to Student Aid Office.

#### Programs of Study, Admission and Curriculum

#### **Undergraduate Programs of Study and** Admission

The Faculty of Medicine offers a four-year undergraduate medical curriculum. Students are ordinarily admitted into the first year of this program but admission is also available directly from CEGEP by means of a medical preparatory (Med-P) program. The Faculty does not accept students for part-time medical studies.

An M.D./Ph.D. program is offered for students interested in a research career in academic medicine.

An M.D./M.B.A. program is offered for students wishing to acquire management skills related to health care.

The language of instruction is English.

#### REQUIREMENTS FOR ADMISSION FOUR-YEAR PROGRAM

Applicants must have received an undergraduate degree, or be in the final year of a course of study at a recognized college or university leading to an undergraduate degree consisting of 120 credits over eight semesters following completion of high school. However, students who have received a diploma of collegial studies (CEGEP) in the Province of Quebec must have completed 90 credits (six semesters) in a Quebec university to obtain the required degree. Similarly, Quebec residents who, having received credit for their diploma of collegial studies, elect to complete their undergraduate degree outside the Province of Quebec (other Canadian provinces, U.S.A. or elsewhere) will be required to complete an undergraduate degree with a minimum of 90 credits (six semesters) at the non-Quebec university to be eligible to apply. Students who fail to complete a DEC before transferring to a non-Quebec university must complete a four-year degree. Successful candidates must be in receipt of the bachelor's degree by the time of registration for the first year of the medical curriculum.

Although the Faculty attempts to ensure by means of the specific requirements listed below that all students have an adequate preparation in science, it also wishes to encourage students from a variety of backgrounds to select medicine as a career. Prospective applicants are therefore advised to pursue courses of study, whether in the natural or social sciences or the humanities, which appeal to them and which have as their aim a broad education and intellectual training rather than merely anticipating the medical curriculum. In all programs of study, to be admissible, prospective applicants should have carried a full load of courses. Official transcripts must have numerical or letter grades. Narrative transcripts are not acceptable.

**Specific requirements.** These consist of the following courses and the Medical College Admission Test.

One full year (2 semesters) university level course, with laboratory work, in each of:

General biology

General chemistry

Organic chemistry

**Physics** 

### It is important to note that in all of the above courses Pass/Fail grades are not acceptable.

Prerequisite courses completed more that eight years ago must be repeated. Exception may be made for applicants with advanced degrees in the material concerned.

University-level courses in biochemistry or cell and molecular biology are strongly recommended.

Medical College Admission Test. All applicants who wish to apply to the four-year program starting in August 2000 must have taken the MCAT by August 21, 1999. This test is conducted by the MCAT Programs Office, P.O. Box 4056, Iowa City, IA 52243, telephone (319) 337-1357, and is given each year in the spring and fall at various centres in Canada, the U.S. and other countries. Registration material may be obtained from the address given above or, as of February 1999, from the office of the Associate Dean for Admissions, Faculty of Medicine. The MCAT test dates for 1999 are April 17, 1999 and August 21, 1999. For those who plan to write the test in April 1999, the registration deadline is March 12, 1999 for test centres in Canada, the U.S. and Puerto Rico. For those who plan to write the test in August 1999, the registration deadline is July 16, 1999 for test centres in Canada, the U.S. and Puerto Rico. Applications must be postmarked by the deadline dates; late applications will not be accepted. Candidates are advised to mail well in advance of the deadlines since experience shows that packets may be postmarked only a day or two after they have been placed in a mail box.

The MCAT is designed to measure specific science knowledge and its application in solving related problems and to provide a measure of learning and reasoning skills considered important for the study and practice of medicine. The MCAT Student Manual describes the test in detail and is available for U.S. \$20 from: AAMC, Dept. 66, Washington, D.C. 20055. Telephone (202) 828-0416.

The test should be retaken if it was written more than three years before the date of application. For applicants whose first language is not English, this fact will be taken into account in assessing the results of the test.

#### **FOREIGN MEDICAL GRADUATES**

Applicants who are Canadian citizens or Permanent Residents, who satisfy current Quebec residency requirements and who hold a medical degree awarded by a recognized university outside of Canada or the U.S., may be eligible to apply to the first year of the four-year program if:

- official transcripts sent by that university show numerical grades for all courses completed and,
- the candidate meets the specific requirements of science prerequisites and MCATs described under the four-year program.

The criteria for selection will be identical to those applying to the four-year program with a bachelor's degree. The foreign medical degree and its GPA will be substituted for a bachelor's degree.

#### M.D./M.B.A. PROGRAM

The M.D./M.B.A. program recognizes that physicians will be increasingly involved in the growing partnerships between business and health/sickness care into the next century. The program will graduate a group of doctors with skills uniquely directed towards management in the health care sector. This will provide opportunity to compete for positions in a growing niche of physician-managers who will be found in all facilities from the smallest clinic to the largest tertiary health care facility, from research laboratory to university or hospital medical departments.

This is a five-year program in which the first year from September to the following July is spent in the Faculty of Management. In August the students will begin their medical studies with the first year class and elements of health management and practicums will be integrated into the elective opportunities in the regular four-year medical curriculum. At Graduation, graduates will receive an M.B.A. from the Faculty of Management and an M.D.,C.M. from the Faculty of Medicine.

Acceptance into this program has identical requirements as those required for the four-year Medical Program.

Cost of Study: Tuition fees for the first three terms (fall, winter, and summer) of the joint M.D./M.B.A. program are \$25,200 for international students, \$4,015.62 for non-Quebec Canadian students, and \$2,335.62 for Quebec students. Figures are given in Canadian dollars and are based on 1998-99 tuition fees. Student services, administrative, society fees and M.B.A. computer fees are not included. Tuition for the balance of the M.B.A. portion of the joint program will be prorated on a per credit basis.

Applications must be submitted no later than November 15, 1999. Further information can be obtained from: Program Administrator M.D./M.B.A.Program, McIntyre Medical Sciences Building, 3655 Drummond Street, Montreal, Quebec, H3G 1Y6. Telephone (514) 398-3517. Fax (514) 398-4631.

#### M.D./Ph.D. PROGRAM

Students interested in a research career in academic medicine may wish to apply for admission to the M.D./Ph.D. program. This is a seven-year program in which the basic and clinical sciences portion of the medical curriculum are completed from September of year one to December 31 of year two, prior to the beginning of full-time graduate studies. The latter are expected to last three, but no more than four, years by which time all course work and the research requirements for the Ph.D. degree must have been completed and a thesis submitted. The defense of the thesis will ordinarily take place at a later date. From January of year five to May of year seven students will complete the requirements for the M.D. degree.

Acceptance into the M.D./Ph.D. program is conditional upon fulfilling the requirements for and being accepted into the four-year medical curriculum and acceptance by one of the departments of the Faculty of Graduate Studies and Research. Students currently enrolled in the first year of the medical curriculum at McGill and who have a bachelor's or master's degree are eligible to apply before October 1 of second year.

Applications must be submitted no later than November 15, 1999. Further information can be obtained from: Program Administrator,

M.D./Ph.D. Program, McIntyre Medical Sciences Building, 3655 Drummond Street, Montreal, QC, H3G 1Y6.

#### **MED-P PROGRAM**

Prospective applicants who are citizens or Permanent Residents of Canada living in the Province of Quebec and who are currently enrolled in the second and final year of the Sciences de la nature profile of the Quebec Colleges of General and Professional Education (CEGEP) are eligible to apply for the Med-P program. Required courses: Biology 301, 401; Chemistry 101, 201, 202; Mathematics 103, 203; Physics 101, 201, 301. Recommended course: Chemistry 302; those who do not take this course in CEGEP will be required to take an equivalent course in the first year of the program. All courses must have numerical grades in order to be acceptable. The Medical College Admission Test is NOT required for entry into the Med-P program.

The DEC Integré may also be acceptable providing the candidates have completed the approved number of science prerequisites - two courses acceptable to both of the McGill Faculties of Medicine and Science in each of: Biology, Chemistry, Physics and Mathematics. Should the course content of any of these fail to satisfy the criteria of the profile 10.11 of the structure d'accueil, the student may be required to replace electives by one or more of these courses as part of the Med-P curriculum.

#### Not admissible to the Med-P medical program:

- Applicants who are completing a Diploma of Collegial Studies in more than two years are not eligible to apply.
- CEGEP students who have formerly been enrolled in college or university programs or in post-secondary technical schools, within or outside of the province, are not eligible to apply.
- Applicants who have already obtained a Diploma of Collegial Studies who are registered in an undergraduate degree program or who have completed an undergraduate degree are not eligible. Those students must fulfil the requirements for, and make application to, the four-year program.

In the first medical preparatory (Med-P) year of the program, students are registered in the Faculty of Science. In addition to completing the specific requirements for entry into the four-year program, they must take a number of humanities, social science, and elective courses selected for the purpose of broadening and enriching their education. Following the successful completion of this year, determined by a promotions committee, students proceed into the first year of the four-year program.

It should be noted that there are more applicants for the Med-P program than can be accepted. Unsuccessful applicants are ordinarily well qualified for admission into other undergraduate degree programs (e.g. B.A., B.Sc.). All applicants are advised to make application for an alternative program. This can be done by submitting a separate application which must be obtained from and returned to the Admissions, Recruitment and Registrar's Office, McGill University, James Administration Building, 847 Sherbrooke Street West, Montreal, QC, H3A 3N6. Telephone (514) 398-3910. Website: (http://www.aro.mcgill.ca).

#### **ADVANCED STANDING**

There are no places available for students who wish to transfer to McGill.

Students currently in medical school are not eligible to apply to the program unless their application provides proof of withdrawal from that medical school and that they meet all the admissions requirements to the four-year program.

#### APPLICATION FOR ADMISSION

Application for admission should be made through online admissions at <a href="http://www.med.mcgill.ca/admissions">http://www.med.mcgill.ca/admissions</a>. (Medical students are expected to have facility with computers and Internet access.) An applicant who is unable to comply with the above may request a paper application package by writing to the office of the Associate Dean (Admissions), Faculty of Medicine, Room 633, McIntyre Medical Sciences Building, 3655 Drummond Street,

Montreal, QC, H3G 1Y6, stating the reasons and submitting a self-addressed envelope measuring 10" x 13". The application will be mailed to him/her within 15 working days. A non-refundable fee of \$100.00, payable in Canadian or United States funds to McGill University (international money order negotiable in Canada without term), must accompany all paper applications.

#### Deadlines for receipt of applications are:

- November 15, 1999 for applicants whose residence is outside of Quebec;
- November 15, 1999 for all applicants to the M.D./Ph.D. program;
- November 15, 1999 for applicants to the M.D./M.B.A. program;
- January 15, 2000 for residents of Quebec applying for the four-year program;
- March 1, 2000 for residents of Quebec applying to the Med-P program;

Applicants claiming Quebec residency must fulfill precisely one of the residency criteria as defined by the Quebec Ministry of Education on the "Attestation of residency in Quebec" form. These forms can be found on our web site. All documents required for application, including official transcripts, MCAT scores (four-year, M.D./Ph.D., M.D./M.B.A. programs only), autobiographical letter and letters of reference must be submitted by these deadlines to be acceptable. Transcripts must contain letter grades (GPA) or numerical grades for every course completed. The material submitted becomes the property of the University and cannot be returned. A non-refundable fee of \$100.00, payable in Canadian or United States funds to McGill University (international money order negotiable in Canada without term), must accompany all regular paper applications. The application fee for the regular web application is \$60.00; an international money order negotiable in Canada without term must accompany the hard copy version of the application. Receipt of any other form of payment will result in the annulment of their application.

Applicants not admitted on the basis of a first application may submit a second application. Applicants making a third application to the four-year program are rarely successful and are strongly discouraged from applying.

Appropriate consideration is given to qualified applicants with physical disability.

#### PROCEDURES FOR SELECTION AND NOTIFICATION

Selection of students by the Admissions Committee is based upon academic achievement at the time of application and an assessment of personal characteristics and accomplishments. Academic achievement is determined from the academic record in undergraduate studies and the result of the Medical College Admission Test. While completed graduate degrees are taken into consideration, applicants should know that the undergraduate CGPA and MCAT scores are the major consideration in measuring academic performance. Applicants to the four-year program must have undergraduate CGPAs of 3.5 or better and similar grades in science prerequisites. They must have a total of 30 or more in the MCAT scores.

Applicants to the Med-P Program must have a minimum overall and science average of 85% (excluding Physical Education courses) and no grades below 82% in any of the math/science prerequisites at the time of application.

The initial assessment of personal qualities and achievements is made from a study of the autobiographical letter submitted by all candidates. The letter should give the Committee a clear image of the applicant and the personal characteristics and experiences which make him/her particularly suitable for the study and practice of medicine. On the first page only, applicants should describe briefly the basis for their decision to be a doctor and detail their experience and exposure to health care in general and more specifically to sick persons, doctors, and other health care workers. They should show that they know what they are getting into in choosing to study and practice medicine.

41

The remaining three pages should be devoted to examples of leadership, initiative, originality, empathy, compassion, service to others, whether in the community of their institution of study or beyond, evidence of communication skills, the ability to work in teams and interact positively with others. The ability to take initiative, excel in one's studies while engaging in depth in such things as team sports, student government, music, theatre, drama, art, creative writing and other endeavours which require dedication, determination and the capacity to handle the stress of coping with different enterprises are of particular importance to the Committee. The effort expended, the importance of the applicant's role, individual responsibility and level of achievement should be explained. Clearly indicate just when the activities cited began and ended. While past activities may be important to this narrative, the more recent activities generally carry more weight with the Committee. Work experiences, travel, cultural interests and achievements or hobbies which the candidate can relate directly to his/her suitability for medicine should be mentioned. Personal qualities cited should be substantiated by examples of life experience to make them credible. Applicants not currently enrolled as students should indicate clearly what they have done since graduation. The date and outcome of the applicant's most recent medical examination should be given and any medical problems or time missed from studies because of illness should be briefly included.

The assessment of the autobiographical letter, together with the confirmatory statements and amplifications contained in the reports from those referees chosen by the student, form the basis for a decision on whether an applicant possessing the academic performance criteria is to be invited for an interview. Such decision for interview, however, is not affected by academic performance above the minimums described above. The files of candidates who are not invited for interviews are not considered further.

The decisions described above are final and, once made, are not subject to appeal.

Applicants from outside of the province of Quebec will be notified as soon as possible after March 31, 2000, whether they have been accepted, placed on the pending list, or not accepted. Residents of Quebec applying for the four-year program will be notified as soon as possible after May 1, 2000. Decisions for the Med-P program will be mailed on May 17, 2000. Acceptance is conditional upon receipt of a bachelor's degree (four-year, M.D./Ph.D., M.D./M.B.A. programs) or D.C.S. (Med-P program) and upon the successful completion by the time of registration of any studies currently in progress, including the requirements for admission, at a level comparable to past academic performance.

For specific instructions to be accepted to the Med-P Program, please refer to the "Instructions for applicants..."

Successful applicants must respond within two weeks to the offer of a place in the entering class. For students accepted into the four-year program, notification of acceptance must be accompanied by a deposit of \$500, which will be applied against tuition. The deposit is refundable up to May 15, 2000 for U.S. and other foreign students, and up to June 15, 2000 for out-of-province Canadian applicants and Quebec residents applying to the four-year program.

A maximum of 110 students are accepted into the first year class. Students accepted in 1998 had the following academic profile (mean scores): GPA 3.7 (4 point scale); MCAT: Verbal Reasoning 9.57; Physical Sciences 11.12; Biological Sciences 11.24; overall score 31.93.

#### **Compulsory Immunization Program**

The basic Compulsory Immunization information is outlined on page 5. Students who are accepted for the study of medicine will receive details of the immunization requirements with their letter of acceptance. Two immunization issues must, however, be taken into consideration prior to entry into medical school.

Varicella (chicken pox): Students who do not have a clear, documented history of having had this childhood infection, must have their serology verified prior to registration. (It should be noted that a University-affiliated hospital may deny the student access to a

clinical rotation if he/she is potentially contagious; this may impact on the student's studies.) In the event that the student's titre is negative, it is **highly recommended** that the student have a Varicella vaccination prior to registration. Failure to do so will compromise clinical rotations and may impact on the student's graduation date.

Hepatitis B: This is a serious and potentially contagious disease, and all prospective medical students who are seronegative must be vaccinated before they will be permitted contact with patients. Any student who, in pre-vaccination testing, is found to be carrying the Hepatitis B virus will not be permitted to perform medical procedures involving needles, scalpels or other sharp objects as this poses a potential risk to the patient. This will severely limit the student's ability to participate fully in the medical school program and his/her ultimate career will be similarly restricted. Applicants who know they are carrying this virus should consider carefully their intention to become a doctor and govern themselves accordingly.

#### **DEFERRED ADMISSIONS**

Admission into the first year of the four-year program may be deferred for a period of one year for a defined academic purpose to obtain an advanced degree. However, students currently enrolled in graduate programs are expected to apply only when they are in the final year of that program.

A written request which includes the details of the proposed academic program must be submitted no later than August 1st of the year in which deferral is sought.

Deferred admission is not granted for the Med-P program.

#### 4.2 Non-Quebec Students

The government of Quebec provides two quotas under which non-Quebec students may be admitted to study medicine at McGill.

1. A quota for U.S. and foreign applicants, and 2. a quota for Canadians and Permanent Residents of Canada who do not reside in Quebec. Should applicants be accepted under either of these quotas, their acceptance and obligations to same will be for the duration of their medical studies, regardless of any change in citizenship or residency status. The candidate, in accepting such an offer of admission, will accept these conditions.

As a measure to control manpower in the province, the Quebec government requires that all students who are not Quebec residents must agree in writing at the time of registration that if, upon completion of the four-year curriculum and post-graduate training, they wish to remain in the province, they will practice for a defined period of time in one of the areas designated as medically underserved. It should be noted that this requirement does not interfere in any way with the right to study medicine in Quebec or, following graduation, to take post-graduate training in Quebec or elsewhere.

#### **American Students**

The Faculty encourages applications from United States citizens and offers admission to a considerable number of such applicants each year. Students accepted for admission must have a student authorization by the date of registration. Instructions for making application for this authorization are included with the letter of acceptance.

The Faculty of Medicine is accredited by the Liaison Committee on Medical Education of the AAMC and AMA, and studying at McGill is equivalent to studying medicine in a U.S. medical school. U.S. students studying at McGill write the USMLE exams in the same way and at the same time as U.S. students studying in U.S. medical schools.

While U.S. medical students are eligible to do residency training in Canada, U.S. program directors recognize the high calibre of McGill graduates and those students are very competitive in their U.S. residency applications.

Tuition for non-Canadian students is appreciably higher than for Canadian students. U.S. citizens benefit, however, with respect to all costs from a favourable exchange rate on the Canadian dollar.

#### Other Foreign Students

The Faculty also encourages applications from citizens of other foreign countries and offers admission to a number of such students each year. The majority of applicants have usually undertaken some or all of their undergraduate studies in Canadian or U.S. colleges. Students accepted for admission must have a student authorization by the date of registration. Instructions for making application for this authorization are included with the letter of acceptance.

It is the personal responsibility of the foreign students to ensure that they fulfil all the licensing requirements of the country in which they intend to practice medicine. A medical degree does not necessarily confer the right to practice.

Therefore, any foreign student must submit along with his/her application form, a letter issued by the responsible authorities in his/her country indicating that they recognize the medical degree awarded by the Faculty of Medicine at McGill University and that this degree will enable this student to practice medicine in his/her country.

#### **Out-of-Province Canadian Students**

A very limited number of places will be made available by the Quebec government.

#### 4.3 Registration

All first year students must register in mid-August. An orientation program immediately follows registration. Attendance is required at both registration and orientation activities.

Returning students must register by MARS in advance by the announced deadlines or pay the appropriate late registration fee.

#### 4.4 Collège des Médecins du Québec

All students studying medicine in a university of the Province of Quebec are required by law to register with the Collège des Médecins du Québec by November 1 of their first year of study. Registration packages are made available to accepted students.

#### 4.5 Courses for the Degree of M.D., C.M.

Four years of medical study in the University leads to the degree of M.D., C.M.; an additional period of postgraduate training is necessary for licensure.

While the Faculty's administration exercises a general supervision of arrangements for postgraduate applications, the Faculty of Medicine does not assume the responsibility for providing internships or residencies for students.

### Educational Goals of the Curriculum in the Faculty of Medicine

The primary objective of the medical curriculum is to help the student acquire the knowledge, skills, attitude, and values essential for the practice of medicine.

#### 4.6 Curriculum Outline

#### **BASIS OF MEDICINE**

Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	March	April	May	June	July	Aug.
Molecules, Cells & Tissues	Cells & Electrolytes		Life Cycle	Endocrinology, Metabolism & Nutrition		Musculo- skeletal & Blood		System & Senses	Host Defence & Host Parasite	efence Host Vacati	
(4 weeks)	weeks) (9 weeks) (3 weeks)		(3 weeks)	(7 weeks)		(4 weeks) (8 weeks)		(5 weeks)			
ITP											

#### INTRODUCTON TO CLINICAL MEDICINE (ICM)

Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	March	Ар	oril	May	June	July	Aug.
Host Defence & Host	Pathobiology, Treatment & Prevention of Disease			ICM A (4 weeks)	ICM B (10 weeks)			ICM C (10 weeks)			ICM D (4 weeks)	
Parasite (3 weeks)	(13 weeks)			Clinical Sciences & Ethics	Medicine Family Medicine Geriatric Medicine			Surgery Anesthesia Emergency Medicine			Elective/ Research	Vacation/ Research
	ITI	PM		Ne	eurology			Radiolo	ogy			

#### PRACTICE OF MEDICINE (POM)/CLERKSHIP

Sept.	Oct.	Nov.	Dec.	Jan.	Fe	eb. M	larch	April	May	June	July	Aug.
ICM E (5 weeks)	Medici	3 - 7		_	ctive I	Family		( /		Pediatrics	Vacation	Psych
Peds Psych Ob/Gyn IHP	(8 wee	ks)	(8 weeks)		veeks)	Medicine (4 weeks				(8 weeks)	(4 weeks)	(4 weeks)

#### **BACK TO BASICS (BTB)**

Sept.	Oct.	Nov.	Dec.	Jan.	Feb.	March	April	
Psych (4 weeks)	Elective II (4 weeks)	Elective III (4 weeks)	Elective IV (Selective)	Seminar Options	Medicine & Society	Seminar Options	Seminar Options	
		Vac	ation	Ambulatory Medicine/Communication Plus				

Next Page

## 4.7 Descriptive Outline of the Curriculum in the Faculty of Medicine

The curriculum recognizes the importance of a solid data base and a multidisciplinary approach to medical education with interdigitation (integration) of clinical and basic science experience. It is designed to permit a variety of teaching and evaluation methods recognizing the importance of small group teaching and clinical relevance of teaching. It also focuses on the strengths of teaching available in basic science departments and the close cooperation and co-ordination between the basic and clinical scientists at McGill University.

The curriculum is composed of four components entitled Basis of Medicine (BOM), Introduction to Clinical Medicine (ICM), Practice of Medicine (POM), and Back to Basics (BTB). The BOM component occupies the first 18 months of medical school, ICM occurs in the second half of the second year and POM is given in the third year and half of the fourth year. The BTB component occupies the remainder of the fourth year.

The BOM component consists of nine system-based units and focuses on normal structure and function with a progression to abnormal structure and function, disease prevention and therapy. There is a significant interdisciplinary coordinated clinically based aspect to all of this teaching. In addition, two sub-units, Introduction to the Patient and Introduction to the Practice of Medicine permit early introduction of students into the hospital.

In January of second year, the students begin their full-time activity in the clinical settings (ICM). This commences with a course devoted to clinical skills, physical diagnosis, medical ethics and jurisprudence, and doctor-patient communication skills. The students subsequently participate in clinical rotations in Medicine, medical subspecialties, Dermatology, Neurology, Surgery, surgery subspecialties, Anaesthesiology, Radiology and Emergency Medicine. There is also an ongoing ambulatory outpatient based experience in primary care. Students have an opportunity for clinical or research electives.

In third year, the students enter clerkship (POM) which covers all the major clinical areas as well as permitting elective time.

From January of fourth year to graduation, the final block of teaching includes opportunities to learn about Medicine in Society and selected topics in basic science as applied to clinical medicine. In addition, there is an ongoing sustained experience in ambulatory medicine. There is a further opportunity for research.

Thus, the curriculum provides interdisciplinary integrated clinical and basic science teaching with early exposure to clinical experience for medical students. There is a horizontal and vertical integration emphasizing reinforcement of important basic science and clinical knowledge in the clinical context. Flexibility in the program permits opportunities for clinical and research experience as well as a diversity of ongoing clinical inpatient and ambulatory care experience. Evaluation will be reflective of the objectives of this curriculum.

#### 4.8 Leaves of Absence

Leaves of absence will be granted only for reasons of health or family crises. Requests for leaves must be discussed with the Associate Dean. Permission is granted by the Dean. A request must be accompanied by supporting documentation (e.g. a letter from the student's physician/counsellor). In general, a medical leave is granted for up to one year. The Faculty reserves the right to impose a limitation on the number as well as the total duration of leaves. Should a prolongation be requested, the Faculty of Medicine reserves the right to require a second opinion from a Faculty-designated physician.

A student returning from a medical leave must provide supporting documentation from the treating physician/counsellor. These documents must state that the student is capable of resuming his/her studies.

Once the leave has been approved by the Deans, the student's registration and fees must be clarified with the Student Records

Officer. Students may be required to forfeit all or part of their tuition fees. All students must have an interview with the Student Aid Office to reassess impact on financial aid.

(The Faculty will consider requests for other leaves under exceptional circumstances, as in the case of a student awarded a Rhodes Scholarship.)

#### 4.9 Curriculum Review

The Faculty realizes the need for constant review of the medical curriculum that is necessitated by:

- a. rapid advances in scientific knowledge;
- b. changes in the role of the medical school in the community and changes in the delivery of health care; and
- application of new principles of educational science to medical education.

A permanent Faculty Curriculum Committee, with student representation, is charged with the task of reviewing the curriculum and recommending any modifications of time allocation or content to Faculty.

#### 4.10 Evaluation System

The Evaluation System is multifaceted and under constant review by the Faculty. The Faculty reserves the right to change any of these rules and regulations at any time, although in general such changes will not come into effect in the middle of a session. For complete Faculty regulations, reference should be made to the Faculty of Medicine Student "Information Handbooks" which are updated annually.

The Faculty operates on a pass/fail system. This in effect means that students' standings, class rank, and grades in courses and rotations are not available to any external agency such as hospitals, universities or licensing bodies. For purposes of internal use students' numerical grades are used in the calculations required for awards, prizes, Dean's Honour List designation, academic bursaries and faculty medals.

For the purposes of evaluation, the four-year curriculum is broken down into the following promotion periods.

#### **Promotion Period I**

Units 1 to 6 and Introduction to the Patient

#### **Promotion Period II**

Units 7, 8, 9 and Introduction to the Practice of Medicine (The beginning of Year II to end of Unit 9)

#### Promotion Period III

Introduction to Clinical Medicine, Units A, B, C, D, E

#### **Promotion Period IV**

Practice of Medicine

#### **Promotion Period V**

Back to Basics

#### STUDENT PROMOTIONS

The Student Promotions Committee will review the academic record and general performance of any student on a regular basis and will determine whether the student may proceed to the next promotion period.

No evaluation, examination mark, etc. shall be considered final until passed by the Student Promotions Committee.

Where a student has failed one or more subjects, or has been found to have been engaged in unethical or inappropriate conduct, the Student Promotions Committee will automatically review the student's entire academic record and general performance. The Student Promotions Committee may require the student:

a) to undergo remedial rotation(s), b) to repeat an entire Evaluation session or c) to withdraw from the Faculty. Furthermore, a student who obtains a "failure" or two or more "below expectations" in the clinical components (ICM, POM) may be placed on probationary status.

Students are reminded that academic offenses such as plagiarism and cheating on examinations, including examinations administered by the Faculty of Medicine on behalf of external agencies, and unethical and inappropriate conduct while on clinical rotations are considered serious offenses which could lead to suspension or expulsion from the University.

The Faculty reserves the right to require the withdrawal at any time of any student who is considered incompetent and/or unsuitable for the practice of medicine.

#### PROMOTION PERIOD I

traunit and final evaluation.

Evaluation will be reflective of the objectives of an individual unit. The students' performance in each unit will be assessed by in-

The student must complete all units in Evaluation Session I successfully in order to be promoted to Evaluation Session II.

The Student Promotions Committee will review the record of any student failing a unit and, under certain conditions, remedial activity and a supplemental evaluation will be permitted.

#### PROMOTION PERIOD II

Evaluation will be reflective of the objectives of an individual unit. The students' performance in each unit will be assessed by intraunit and final evaluation.

The student must complete all units in Basis of Medicine (II) successfully in order to be promoted to Introduction to Clinical Medicine.

#### **PROMOTION PERIOD III**

Evaluation will be reflective of the objectives of an individual unit.

The students' performance in each unit will be assessed by intraunit and final evaluation.

The student must complete all units in Introduction to Clinical Medicine successfully in order to be promoted to the Practice of Medicine.

#### PROMOTION PERIOD IV

Evaluation will be reflective of the objectives of an individual Clerkship Rotation.

The students' performance in each Clerkship or Elective will be assessed by clinical supervisors and written/oral exams.

The student must complete all units in Practice of Medicine successfully in order to be promoted to Back to Basics.

#### **PROMOTION PERIOD V**

The student must complete all courses in Back to Basics successfully in order to graduate.

### FAILURE OF SUPPLEMENTAL EXAMINATIONS OR REMEDIAL ROTATIONS

A failure in the supplemental examination or remedial rotation of any unit will require the student to repeat the Promotion Period. Failure in any unit or subject during a repeat Promotion Period will result in automatic retirement from the Faculty. A student may not repeat more than one promotion period in the curriculum.

The results of all supplemental examinations and the evaluation result of remedial clinical rotations will be recorded in the official transcripts as supplemental examinations, and will be considered as such for purposes of promotion.

**Notification of Failures:** It is the student's responsibility to be available for notification of a failing grade.

If a student is unable to be located after a reasonable amount of effort by the Dean's office, the consequences will be borne fully by the student.

#### 4.11 Requirements for the Degree of M.D., C.M.

 Every candidate for the degree of Doctor of Medicine and Master of Surgery in this University must be at least twenty years of age and of good moral character.

- Candidates must have fulfilled all the requirements for entrance to the Faculty of Medicine.
- No one is permitted to become a candidate for the degree who has not attended at least two full academic years at this University's Faculty of Medicine.
- Every candidate for the degree must have passed all the required evaluations in the subjects comprising the Medical Curriculum.

#### **RESIDENCY MATCHING SERVICES**

A matching service is a clearing house designed to help final year medical students obtain the residencies of their choice and to help hospitals and program directors obtain the students of their choice. It provides an orderly method for students to decide where to intern and for programs to decide which applicants they wish to enrol. For both students and program directors, it attempts to remove the factors that generate unfair pressures and premature decisions.

The matching service acts as the agent of students on the instructions embodied in the confidential list of all the residencies for which they have applied, ranked in order of preference. Similarly, the matching service acts as the hospital's agent on the instructions embodied in its confidential list of all the students who have applied, ranked in order of the hospital's preference.

Students at McGill have access to two different matching services: The Canadian Resident Matching Service matches applicants across Canada. The National Resident Matching Program matches applicants to programs in the U.S.

The Faculty provides comprehensive career guidance. Information sessions and personal counselling are provided throughout the program. Students are given assistance in navigating the residency application process. To this end, the Faculty makes use of its extensive alumni network throughout North America.

#### 4.12 Requirements for Licence

Candidates accepted for admission are reminded that it is their personal responsibility to ensure that they fulfil all the licensing requirements of the country in which they intend to practise medicine. A university degree does not confer the right to practise. In each province of Canada, in each one of the United States, and in all other countries, the authority to license is vested in a licensing body which has its own special laws and requirements. In many cases a special standard of general education is insisted upon before **beginning** the study of medicine. One of the requirements in several provinces is that the entrance qualifications of the student must be registered with the provincial licensing body for five years or more before a licence to practise can be obtained.

Candidates accepted for admission should therefore communicate as soon as possible with the licensing body of the country, province or state in which they intend to practise and obtain from that licensing body the necessary instructions.

Candidates wishing to practise medicine in the Province of Quebec must also meet the French language requirement for professionals, which is fully described in the General University Information section of this Calendar.CR Section #

Full information as to the requirements for registration in the various provinces may be obtained from the Registrars of the Provincial Medical Boards as follows:

Alberta - Registrar, 10180 - 101th Street, Suite 900, Edmonton, AB 5J 4P8

British Columbia - Registrar, 1807 West 10th Avenue, Vancouver, BC V6J 2A9

Manitoba - Registrar, 1410 - 155 Carlton Street, Winnipeg, MB R3C 3H8

New Brunswick - Registrar, 400 Main Street, Suite 1078, Saint John, NB E2K 4N5

Newfoundland - Registrar, 15 Rowan Street, Churchill Park Chambers, St. John's, NF A1B 2X2

Nova Scotia - Registrar, 5248 Morris Street, Halifax, NS B3J 1B4 Ontario - Registrar, 80 College Street, Toronto, ON M5G 2E2

Next Page

Prince Edward Island - Registrar, 199 Grafton Street, Charlottetown, PE C1A 1L2

Quebec - President-Secretary General, 2170 Rene Levesque Boulevard W., Montreal, QC H3H 2T8

Saskatchewan - Registrar, 211 - 4th Avenue S., Saskatoon, SK S7K 1N1

#### **Medical Council of Canada**

Full information concerning the examination may be obtained by writing to the Registrar, Box 8234, 1867 Alta Vista Drive, Ottawa, ON, K1G 3H7

#### USMLE

Full information concerning these examinations may be obtained by writing to the USMLE Secretariat, 3750 Market Street, Philadelphia, PA 19104-3190. Telephone (215) 590-9600. UMSLE World Wide Web site (www.usmle.org).

#### 4.13 Graduate Training Programs in the Clinical Departments of the Faculty of Medicine

The Faculty of Medicine, in conjunction with the affiliated teaching hospitals, offers a wide variety of programs leading to McGill Certificates of Residency Training and certification by the Collège des Médecins du Québec, the College of Family Physicians of Canada, and the Royal College of Physicians and Surgeons of Canada. For information on the graduate medical programs available and eligibility and funding, please consult the following website: (http://www.med.mcgill.ca./postgrad).

### 4.14 Graduate Studies and Research in the Medical Sciences

Opportunities for graduate work in the basic medical and clinical sciences leading to the degrees of M.Sc. and Ph.D. are offered by many of the departments of the Faculty of Medicine. By special arrangement, studies for the degree of M.Sc. can be pursued concurrently with work towards the M.D.,C.M. degree. In addition, a combined M.D./Ph.D. program is available (further information can be obtained from Program Administrator, M.D./Ph.D. Program, McIntyre Medical Sciences Building, 3655 Drummond Street, Montreal, Quebec H3G 1Y6). Details of the programs available are included in the Faculty of Graduate Studies and Research Calendar.

Research in clinical disciplines is carried out at all locations of the McGill University Health Centre – the Montreal Children's Hospital, the Montreal General Hospital, the Royal Victoria Hospital, the Montreal Chest Hospital and the Montreal Neurological Hospital. Research opportunities are also available at the Lady Davis Institute of the Jewish General Hospital, the Douglas Hospital and the Shriners Hospital for Crippled Children. For administrative purposes, graduate work in several clinical departments is grouped under the Division of Experimental Medicine and the Division of Experimental Surgery. Other departments administer individual graduate programs. Consult the Faculty of Graduate Studies and Research Calendar for a description of the programs.

Inquiries concerning research training in the medical sciences should be directed to the chair or graduate program director of the department in which the candidates wish to receive their graduate education. Alternatively, letters may be addressed to the Associate Dean (Graduate Studies and Research), Faculty of Medicine.

#### 5 Courses of Instruction

#### 5.1 Basis of Medicine (BOM)

#### UNIT 1 - Molecules/Cells/Tissues - 524-101A (Unit Coordinator: Dr. H. Warshawsky)

This unit will examine the biosynthesis and assembly of macromolecules with emphasis on cell and tissue organization and function. The structure and organization of the skin, nerves and the embryo will be surveyed in detail and used as model systems to study the major biochemical, physiological, genetic and molecular principles of cells.

### UNIT 2 - Gas, Fluid & Electrolyte Homeostasis – 524-103A (Unit Coordinator: Dr. B. Unikowsky)

This unit will discuss the embryological development, gross anatomy, histology and physiology of the cardiovascular, respiratory and renal systems. The biochemistry of lipids and proteins and the anatomy and physiology of the autonomic nervous system will also be covered.

### UNIT 3 - Life Cycle – 524-105A (Unit Coordinator: Dr. D. Morris)

This unit is designed as an introduction to the basic science that will enable the student to understand human reproduction. The embryology, histology, and anatomy of the reproductive tract will be covered. Human development from genetics, to embryo, to parturition, will be explored and how this knowledge can be applied to clinical medicine in resolving problems of infertility, fetal and maternal morbidity, and menopause.

### UNIT 4 - Endocrinology/Metabolism/Nutrition – 524-104B (Unit Coordinator: Dr. A. Wechsler)

This unit provides an overview of the gross and microscopic structure of the gastrointestinal tract and its accessory organs, along with a grounding in the principles of nutrition and digestion. Emphasis is also placed on those aspects of system and molecular endocrinology which regulate and integrate various metabolic activities.

### UNIT 5 - Musculoskeletal/Blood - 524-102B (Unit Coordinator: Dr. L. Conochie)

The objectives of this unit are to study the structure and function of the components of the musculoskeletal and blood systems. The interaction of the structure and function will be examined. The embryology, macroscopic and microscopic anatomy as well as molecular structure and function relating to the musculoskeletal and blood systems will be discussed. Lectures, laboratory sessions, small group seminars as well as audio-visual presentations, multidiscipline clinically applied sessions, computer-assisted instruction and independent self-directed learning will be utilized to achieve these goals.

### UNIT 6 - Nervous System & Special Senses – 524-106C (Unit Coordinator: Dr. C. Chalk)

The content of this unit includes the anatomy of the head and neck and anatomical, physiological, biochemical and behavioural aspects of the organization of the nervous system and special senses. The material is presented in an integrated series of lectures and laboratory classes combined with small group clinical problem sessions designed to illustrate the clinical relevance of the material.

### UNIT 7 - Host Defense & Host/Parasite Relationships – 524-207G (Unit Coordinator: Dr. D. Briedis)

Infectious diseases arise from dynamic interactions between humans and microorganisms. Using lectures, case-oriented small groups, laboratory sessions, and independent learning, an integrated overview of the basic microbiology of organisms, our immune defenses and how they may be subverted, and approaches to the prevention and control of infection will be provided.

# UNIT 8 - Pathobiology Treatment & Prevention of Disease – 524-208A (Unit Coordinators: Dr. R. Capek, Dr. C. Larson, Dr. R. Michel)

This unit covers the scientific basis of the diagnosis, prevention and drug therapy of selected diseases. The organ/system approach examining pathogenesis, pathology and pathophysiology, psychopathology, and pharmacological principles of treatment of diseases in the individual is integrated with the epidemiology and genetics in the population.

# UNIT 9 - Introduction to the Patient – 524-161H / Introduction to the Practice of Medicine – 524-203A (Unit Coordinator: Dr. D. Dawson)

The first component of this course addresses the psychological social dimensions of human nature in health and illness. The small group program introduces students to the practice of medicine via exposure to health care teams in clinical settings and provides a forum to discuss psychosocial and ethical aspects of the practice of medicine.

The second component of this course is an introduction to clinical data gathering in Medicine - particularly interviewing and history-taking. This will be introduced in lecture format and practiced in small groups with tutors. The doctor-patient relationship will also be studied. This course follows the Introduction to the Patient Course and shares its small group program. It may be considered as preparatory to the Introduction to Clinical Sciences Course.

#### 5.2 Introduction to Clinical Medicine (ICM)

### Introduction to Clinical Medicine A (Coordinator: Dr. David Shannon)

This 4-week unit will provide instruction in physical examination skills as well as consolidating training in history taking. Students will also begin the first component of medical ethics and jurisprudence. Teaching is hospital based in a small group instruction format. There will also be tutor supervised bedside teaching.

### Introduction to Clinical Medicine B (Coordinator: Dr. Paul Latour)

This 10-week unit will provide hospital and community based teaching in internal medicine, neurology, family medicine and geriatrics. Using lectures and small groups format, the students will consolidate clinical skills and data base as they relate to these major disciplines.

## Introduction to Clinical Medicine C (Coordinator: Dr. S. Meterissian)

This 10-week unit will provide hospital based teaching in general surgery, the surgical subspecialties, anesthesia, radiology and emergency medicine. Using lectures and small groups format, the students will consolidate knowledge and clinical skills as they relate to these major disciplines.

### Introduction to Clinical Medicine D (Coordinator: Dr. D. Boudreau)

This 4-week block will provide time for a clinical elective experience. This elective time may be combined with the following 4-week vacation time to permit an 8-week research experience. The clinical elective may take place at either McGill or other sites with prior approval.

### Introduction to Clinical Medicine E (Coordinator: Dr. Julie St. Cyr)

This 4-week unit will provide instruction in pediatrics, obstetrics and gynecology, psychiatry and selected other specialty disciplines. Teaching methods will include lectures and small group sessions. An additional component of this unit will be Introduction to Hospital Practice. This program will provide an opportunity to develop skills in critical reasoning, decision analysis, as well as effective utilization of laboratory resources. Students will also have an opportunity to learn clinical laboratory techniques.

#### 5.3 Practice of Medicine (POM)

The 52-week period of POM includes instruction in all the major clinical areas as well as elective time. A more detailed description of these clerkship rotations is available in the unit entries which follow.

#### 5.4 Back to Basics (BTB) (Coordinator: Dr. L. Berkson)

This final block of teaching occurs following the clerkship (POM) rotations. Its primary goal is to reintroduce the student to fundamental principles in the basic sciences within a context quite different from that of the first year. The student will enter Back to Basics having had a broad clinical experience. The basic sciences will be appreciated not only as a necessary foundation, but also as an essential element of future developments. This goal will be achieved by a seminar series that will focus on topics in basic sciences having particular relevance to current clinical practice. The seminars will present an in-depth review of areas where there has been recent scientific development. These will be presented to the students as options; from which they will select four different topics.

In addition to the seminar series, students will have continued clinical exposure. They will refine their clinical skills, in an ambulatory care setting, two half-days per week for 12 weeks.

There will also be an obligatory four-week course entitled "Medicine and Society". This course will allow students to appreciate the complexity and diversity of medical knowledge as they prepare for post-graduate training. Perspectives in history, epidemiology, ethics, and economics will be provided. Issues such as health indicators, alternative medicine, and community health perspectives will be covered.

#### 6 Units in the Faculty of Medicine

#### 6.1 Anatomy and Cell Biology

#### **Core Courses**

This Department contributes to the multidisciplinary curriculum components of Basis of Medicine and Back to Basics.

#### **MED IV**

**ANATOMY FOR SURGEONS.** A course of practical anatomy, seminar presentations and clinical anatomical conferences is given which supplements the knowledge of human anatomy obtained in the core program. It is especially designed to provide the anatomical basis for surgical practice. (Course coordinator: Dr. D.G. Osmond)

#### **Other Courses**

The Department offers a range of courses leading to the Faculty Program/Masters/Honours B.Sc. in Cell Biology and is well equipped for graduate research leading to the M.Sc. and Ph.D. degrees. See the Faculty of Science and the Faculty of Graduate Studies and Research Calendars.

#### 6.2 Anesthesia

Anesthesia is primarily concerned with the relief of pain and the provision of unconsciousness during surgery. In addition, it takes an active role in the care of the critically ill, in providing analgesia in obstetrics and in managing acute and chronic pain. It is a specialty with a heavy emphasis on the clinical application of the basic sciences.

**ICM-C 501-301B/C ANESTHESIA ROTATION.** A one-week core rotation is required of all students. Students are given supervised experience in the basics or A-B-Cs of resuscitation. They are expected to participate in preoperative, intraoperative and postoperative anesthesia care. Clinical applications of pharmacology and physiology are demonstrated.

#### **ELECTIVES**

Electives are offered to students during their Clerkship year. The objectives are to involve students in aspects of anesthesia care commonly encountered in the operating room, recovery ward and intensive care unit. These include fluid and transfusion therapy, management of acute pain relief, regional and general anesthesia

techniques. The elective permits students to administer general anesthesia under strict supervision and to become involved in preoperative and postoperative patient care. Specialised electives in pediatric and obstetric anesthesia, clinical research and other subspecialties can be individually arranged.

#### 6.3 Artificial Cells and Organs Research Centre

The Research Centre provides opportunity for interdisciplinary research and training in the clinical and laboratory aspects of artificial cells, blood substitutes, artificial liver, artificial blood, immobilized cells and recombinant microrganisms, biomaterials, detoxification, gene therapy, enzyme therapy, drug delivery, biotechnology, and others. Graduate courses are offered in Experimental Medicine, Physiology, and Biomedical Engineering. See the Faculty of Graduate Studies and Research Calendar. Electives, summer research, graduate research, and post-doctoral research are offered.

For further details: http://www.physio.mcgill.ca/artcell

#### 6.4 Biochemistry

#### **Core Courses**

This Department contributes to the multidisciplinary curriculum components of Basis of Medicine and Back to Basics.

#### Other Courses

The Department offers a range of courses leading to the Majors/ Honours B.Sc. in Biochemistry and is well-equipped for graduate research leading to the M.Sc. and Ph.D. degrees. See the Faculty of Science and the Faculty of Graduate Studies and Research Calendars.

#### 6.5 Biomedical Engineering Department

#### **Graduate Courses**

The Department of Biomedical Engineering provides instruction and opportunities for interdisciplinary research in the application of engineering, mathematics and the physical sciences to problems in medicine and the life sciences. Courses are offered for graduate students in the life sciences, and in engineering and the physical sciences leading to the Master's and Ph.D in Biomedical Engineering. See the Faculty of Graduate Studies and Research Calendar.

For further details: http://www.biomed.mcgill.ca

#### 6.6 Diagnostic Radiology

#### Core Courses

This Department contributes to the multidisciplinary curriculum components of Basis of Medicine and Introduction to Clinical Medicine.

**ICM-C 558-301B/C RADIOLOGY ROTATION.** This course follows the normal radiological anatomy covered in the Basis of Medicine. It is a one-week rotation that includes a practical approach to common clinical problems. The students will spend time in all the MUHC hospital radiology departments and will be exposed to common pathologies of the chest, abdomen, musculoskeletal, neurologic and pediatric subspecialties.

#### 6.7 Epidemiology and Biostatistics

#### **Core Courses**

This Department contributes to the multidisciplinary curriculum components of Basis of Medicine, Introduction to Medicine, and Back to Basics. In addition, see the Elective Program for elective opportunities in epidemiology and community health.

#### INTRODUCTION TO EPIDEMIOLOGY AND BIOSTATISTICS

(Part of Basis of Medicine - Unit 8)

Lectures and small group tutorials which cover basic principles of epidemiology and biostatistics as applied in clinical and community settings. Included are research design and methods, dealing with bias and confounding, screening and risk appraisal, statistics, and critical appraisal of the literature.

#### **EPIDEMIOLOGY AND COMMUNITY HEALTH**

(Part of Back to Basics - Medicine and Society)

This is a course which integrates epidemiology and community health with the social sciences and ethical issues in medicine. This is a series of lectures and small group tutorials which examine concepts of health and disease from the practitioners' and patients' viewpoint. Specific topics covered include community diagnosis, organization of health services, health economics, health promotion and preventive health, diagnostic testing and clinical decision making, and the assessment and utilization of the health research literature.

#### SPECIAL TOPICS IN EPIDEMIOLOGY

(Part of Back to Basics - Seminar Options)

The Department is in the planning phase for these options. It is expected an option in the critical appraisal of the literature will be offered. This will include the review of a specified body of literature, meta-analysis, and commonly encountered problems in research methodology and bias.

#### **Graduate Courses**

The Department of Epidemiology and Biostatistics has four degree programs: Diploma, Master's (without thesis), Master's (with thesis) and the Ph.D. See the Faculty of Graduate Studies and Research Calendar for description of courses and programs.

#### 6.8 Family Medicine

#### **Core Courses**

This Department contributes to the multidisciplinary curriculum components of Basis of Medicine, Introduction to Clinical Medicine, and Practice of Medicine.

ICM-B 520-301B/C FAMILY MEDICINE ROTATION. This course offers an ambulatory experience in Family Medicine. It consists of ten half-days. This time will be divided between a family physician's office and small group tutorials. The content includes an introduction to the principles of family medicine and patient-centered care, to the role of the family physician in our health care system, and to the diagnosis and management of common medical problems seen in an office setting. It will also include an opportunity to learn how to perform a sensitive pelvic examination which will be taught by trained gynecological teaching assistants in a small group session.

**520-402A/B/C CLERKSHIP/PRACTICE OF MEDICINE.** There is a fourweek core rotation in Family Medicine. This may be done in one of three ways:

- 1. A rotation in a McGill-affiliated urban Family Medicine centre. These may be hospitals or CLSC Family Medicine units.
- A rotation in a McGill-affiliated rural site. The Ministry of Social Affairs funds travel and lodging costs for students.
- 3. It is possible for a few students to request special four-week Family Medicine clerkship experiences outside of the Montreal and remote area teaching programs. For these, requests have to be submitted to the Course Coordinator a minimum of **three months** prior to the rotation. The requirements are outlined in the Clerkship booklet available at the Department.

The student will join a primary care team and will participate in clinical decision-making and management. Each student will also be exposed to the various aspects of ambulatory care and will become familiar with the principles of Family Medicine.

A booklet describing the clerkship is available from the students' office or the Department.

#### 6.9 Human Genetics

#### **Core Courses**

This Department contributes to the multidisciplinary curriculum components of Basis of Medicine and Back to Basics.

#### **Graduate Courses**

M.Sc. in Genetic Counselling (non-thesis); M.Sc. and Ph.D. (with thesis). See the Faculty of Graduate Studies and Research Calendar.

#### 6.10 Medical Physics Unit

#### **Graduate Program**

The Medical Physics Unit is a teaching and research unit concerned with the application of physics and related sciences in medicine, especially (but not exclusively) in radiation medicine, i.e. radiation oncology, medical imaging and nuclear medicine. The Unit offers an M.Sc. in Medical Radiation Physics and facilities are available for students to undertake a Ph.D. in Medical Physics through the Department of Physics.

The research interests of members of the Unit include various aspects of medical imaging, including 3D imaging, the development of new imaging modalities, and applications of imaging in radiation therapy; radiation dosimetry, especially solid state, electret and NMR systems; nuclear cardiology; and applications of radiation biology to therapy.

The M.Sc. and Ph.D. programs in Medical Physics are accredited by the Commission on Accreditation of Medical Physics Education Programs, Inc., sponsored by The American Association of Physicists in Medicine (AAPM), The American College of Medical Physics (ACMP), and The American College of Radiology (ACR). See the Faculty of Graduate Studies and Research Calendar.

#### 6.11 Internal Medicine

#### **Core Courses**

This Department contributes to the multidisciplinary curriculum components of Basis of Medicine, Back to Basics, and Introduction to Clinical Medicine.

ICM-A 524-301B INTRODUCTION TO CLINICAL MEDICINE-A. This course will teach all parts of history taking and physical examination in an objective and structured fashion. The course will be taught in small groups with one or two group leaders who will take the students through the principles of history taking and physical examination in a prearranged and structured mode. In the second and third week of the course, the students are asked to hone their skills by doing two history and physical examinations on patients from the ward. In the latter two weeks of the course, the students continue to refine their skills in groups, at the bedside, with their tutor

**526-301B/C INTRODUCTION TO CLINICAL MEDICINE-B (INTERNAL MEDICINE COMPONENT)** In this ten-week multi-disciplinary course, the student has the opportunity to build further on the clinical skills developed in the course on ICM-A. The students perform full history and physical examinations on assigned patients, write up the cases (including a discussion of the clinical - basic science correlations), and present the case orally to their tutors. Through bedside teaching sessions in small groups, they develop clinical skills. Seminars give an approach to the diagnosis and management of common problems in Internal Medicine.

#### PRACTICE OF MEDICINE (CLERKSHIP)

This is an eight-week core clerkship in Internal Medicine. At this level of training, the student performs the initial patient work-up, completes the written record, develops a differential diagnosis (or problem list) and plan of investigation, writes progress notes and performs simple therapeutic and diagnostic procedures for each patient assigned. Clinical skills are further developed by constant reading, by discussions with the residents and attending staff, and by case presentations. Students attend outpatient clinics to follow up their therapeutic efforts on the wards and to see clinical material less common in an inpatient setting. Specialty conferences augment students' learning.

#### **Experimental Medicine**

See the Faculty of Graduate Studies and Research Calendar.

#### 6.12 Microbiology and Immunology

#### **Core Courses**

This Department contributes to the multidisciplinary curriculum components of Basis of Medicine and Back to Basics.

#### Other Courses

The Department offers a range of courses leading to the Honours B.Sc. in Microbiology and is well-equipped for graduate research leading to the M.Sc., M.Sc.A. and Ph.D. degrees. See the Faculty of Science and the Faculty of Graduate Studies and Research Calendars

#### 6.13 Neurology and Neurosurgery

#### **Core Courses**

This Department contributes to the multidisciplinary curriculum components of Basis of Medicine and Introduction to Clinical Medicine

ICM-B 531-301B/C NEUROLOGY ROTATION. The course's objectives will be to have the student develop the skills to acquire and record a detailed neurological history; perform a complete, orderly and accurate neurological examination, develop a clinical problem-solving approach, i.e. to correlate neurological symptoms and deficits with neuroanatomy and disease processes. The student will also accumulate factual knowledge about neurological diseases, develop awareness of special procedures in neurology and foster positive attitudes towards independent learning.

#### **Graduate Courses**

See the Faculty of Graduate Studies and Research Calendar.

#### 6.14 Obstetrics and Gynecology

#### **Core Courses**

This Department contributes to the multidisciplinary curriculum components of Basis of Medicine, Practice of Medicine, and Introduction to Clinical Medicine.

ICM-E 534-301A OBSTETRICS AND GYNECOLOGY ROTATION. A didactic course in Ob/Gyn, is part of ICM-E.

#### CLERKSHIP (PRACTICE OF MEDICINE) - 534-401A/B/C

As part of the core curriculum in Med III, students will spend a eight-week clerkship on a clinical teaching unit in one of the three centres within the McGill teaching hospital system. This clerkship is designed to enlarge and enrich the basic experience of Med I and Med II. Under supervision, students play an integral role in the management of patients and become a recognized part of the resident-intern-medical student team.

#### 6.15 Occupational Health

The Department of Occupational Health offers a multidisciplinary approach to problems of occupational health and safety. It offers two graduate degree programs: a Ph.D. in occupational health sciences, with the objective of training independent researchers in the field of work environment and health; and a Master of Science (Applied) in occupational health sciences. The objective of this program is to train occupational health and hygiene professionals in the evaluation of the work environment and work hazards, and in the application of appropriate methods of prevention and control. The M.Sc. is offered in a regular sessional format which consists of three full-time terms and usually an additional session, and in a distance education format, normally over a three-year period. See the Faculty of Graduate Studies and Research Calendar.

Next Page

#### 6.16 Ophthalmology

#### **Core Courses**

Ophthalmology teaching will be integrated with the ICM Curriculum. The Department of Ophthalmology gives sessions with particular emphasis on history-taking, diagnosis and treatment of common eye problems, as well as instruction on how to use the ophthalmoscope and slit lamp microscope.

This is taught at the Montreal General Hospital, Royal Victoria Hospital and Jewish General Hospital.

(Coordinator: Dr. W.E.S. Connolly)

In fourth year (Back to Basics), students are given the opportunity to work in the eye clinics for several days.

#### **CLERKSHIP**

Four-week electives are offered to ICM or Clerkship students at the Montreal General, Royal Victoria, Jewish General and Montreal Children's Hospitals. Each student functions as a clinical clerk in the respective Eye Department.

Royal Victoria Hospital, Dr. M. Discepola (385-0530);

Montreal General Hospital, Dr. D. Cheema (937-6011 ext. 4078); Montreal Children's Hospital, Dr. R. Koenekoop (934-4400 ext. 2891).

Please note electives are not offered in July and August.

#### 6.17 Otolaryngology

#### **Core Courses**

ICM-A 524-301B INTRODUCTION TO CLINICAL SCIENCES. The Department of Otolaryngology is a contributor to this course, providing instruction in otolaryngological history-taking and methods of physical examination. Electives are available for students at the four affiliated teaching hospitals.

#### **Graduate Courses**

See the Faculty of Graduate Studies and Research Calendar.

#### 6.18 Pathology

#### **Core Courses**

The teaching in Pathology is designed to provide a systematic coverage of the principal diseases or groups of diseases, including their etiology, pathogenesis, pathology and pathophysiology. This is done with a combination of lectures and small group sessions, in conjunction and integrated with the other units of the curriculum. Thus, the Department of Pathology contributes to multidisciplinary Units 7 and 8, as outlined in BOM as well as to the section, Introduction to Hospital Practice.

#### **COURSE IN APPLIED PATHOLOGY**

Weekly clinico-pathological conferences are offered in conjunction with the Medicine rotation.

#### **Electives**

The Department provides four-week electives for medical students after completion of Unit 8 of the Basis of Medicine. These are available at the Royal Victoria Hospital, Montreal General Hospital, Jewish General Hospital, St. Mary's Hospital and the Montreal Children's Hospital. Please contact Mrs. Hoffmann, Teaching Office, Duff Medical Building, (514) 398-7192 x7195.

#### **Other Courses**

The Department is well-equipped for graduate research leading to the M.Sc. and Ph.D. degrees and offers several graduate level courses. See the Faculty of Science and the Faculty of Graduate Studies and Research Calendars.

#### 6.19 Pediatrics

#### Core Courses

ICM-E 543-301A PEDIATRICS. Provides the students with a data base in pediatrics in order for them to approach the clerkship with some basic understanding of pediatric problems. The course will cover aspects of growth, perinatology, morbidity-mortality in Pediatrics, nutrition, fluid balance, infections of many systems, and neurologic and psychologic development. The course will consist of didactic teaching and small group tutorials where problems related to lecture content are discussed. (Course Coordinator: Dr. Wendy MacDonald)

#### CLERKSHIP/POM - 543-401A/B/C

PEDIATRICS. Clerkship in Pediatrics as a member of a clinical service provides the opportunity for experience in the management of pediatric problems under supervision. The clerkship includes ward and ambulatory rotations at the Montreal Children's Hospital and newborn experience at either the Jewish General Hospital or the Royal Victoria Hospital. The clerks participate in a series of corematerial conferences in addition to the regularly scheduled educational program of the hospital.

(Coordinator: Dr. Wendy MacDonald)

#### 6.20 Pharmacology and Therapeutics

The program of instruction in Pharmacology and Therapeutics is designed to provide a systematic coverage of the principles of drug action for the more important groups of drugs, the factors that control and modify their effects and the basis for selection and use of drugs in the treatment of disease.

#### **Core Courses**

This Department contributes to the multidisciplinary curriculum components of Basis of Medicine, Introduction to Clinical Medicine and Back to Basics.

#### Other Courses

The Department offers a range of different level courses on the principles of pharmacology and therapeutics with emphasis on the sites and mechanisms of action of drugs from whole body to molecular interactions. The compounds covered are representative of classes of drugs used in the treatment of human disease. These courses are available to students registered in the B.Sc. programs. The Department also offers a graduate program leading to the M.Sc., M.Sc. Applied, and Ph.D. degrees. See the Faculty of Science and the Faculty of Graduate Studies and Research Calendars.

#### 6.21 Physiology

#### **Core Courses**

This Department contributes to the multidisciplinary curriculum components of Basis of Medicine and Back to Basics.

The Department offers a range of courses at introductory, intermediate and advanced levels. These are part of undergraduate Faculty, Majors and Honours programs, leading to a B.Sc. in Physiology, as well as the Major Programs in Physiology and Physics, and Physiology and Mathematics, and the Interdepartmental Honours Immunology Program. A number of graduate level courses are also offered. The Department is well equipped for graduate research leading to the M.Sc. and Ph.D. degrees, and is a participant in McGill's M.D./Ph.D. Program. See the Faculty of Science and the Faculty of Graduate Studies and Research Cal-

#### 6.22 Psychiatry

#### **Core Courses**

This Department contributes to the multidisciplinary curriculum components of Basis of Medicine and Introduction to Medicine.

#### UNIT 9 ITP/ITPM

The Department participates in this interdisciplinary Course. (Unit Coordinator: Dr. D. Dawson)

**ICM-E 555-302A INTRODUCTION TO CLINICAL PSYCHIATRY.** This course will elaborate and reinforce introductory material in the field of psychiatry presented in early sections of the curriculum. In addition, it will provide students with the basic components of clinical psychiatry, preparatory to the Clerkships. (Coordinator: Dr. D. Frank)

#### CLERKSHIP/PRACTICE OF MEDICINE - 555-401A/B/C

PSYCHIATRY. Eight-week block training to acquaint all students (Core program) with the examination of patients and understanding of some of the major factors involved in abnormal behaviour. Diagnostic procedures, psychotherapeutic and physical methods of treatment will be among the aspects covered. Students will be provided with tutors on an individual and group basis and will also have an opportunity to become conversant with certain more specialized areas of the field of psychiatry. An attempt will be made to provide a comprehensive exposure to current theoretical models and treatment approaches in psychiatry, to indicate the relevance of certain concepts and attitudes to non-psychiatric medical practice, and to supply well-supervised clinical experience which is patient-oriented and responsibility-centered. (Course Coordinator: Dr. G.B. Meterissian)

#### **Graduate Courses**

For information regarding courses leading to the M.Sc. degree in Psychiatry, see the Faculty of Graduate Studies and Research Calendar.

#### 6.23 Social Studies of Medicine

#### **Core Courses**

This Department contributes to the multidisciplinary curriculum components of Basis of Medicine, course of Back to Basics, and Medicine and Society.

#### **Electives**

The Department offers a wide range of electives in aspects of the social sciences and humanities as they relate to medicine. For details see the Electives Catalogue.

#### **Graduate Program**

Through the Department, graduate students can obtain an M.A. in the History of Medicine, an M.A. in Medical Anthropology or an M.A. in Medical Sociology. The above degrees are acquired in programs administered jointly with the Faculty of Arts Departments of History, Anthropology and Sociology. Consult the Department for further information.

#### 6.24 Surgery

#### **Core Courses**

This Department contributes to the multidisciplinary curriculum components of Basis of Medicine, Practice of Medicine, and Back to Basics.

**ICM-A 524-301B INTRODUCTION TO CLINICAL SCIENCES.** The Department is a contributor to this interdisciplinary course. Seven small group sessions are given to demonstrate and discuss the surgical methods of history taking and physical and examination of selected regions

**ICM-C SURGERY ROTATION – 564-301B/C** The main objectives for this four-week rotation are to develop the history taking and physical examination skills necessary to collect information and make

the diagnosis of the patient. The student also learns the pathophysiology of surgical conditions. These objectives help prepare the student for clerkship in the senior years where the issues of patient workup and management are covered. The ICM-C Surgery rotation involves being assigned to a surgical service and tutor, seeing patients in the preoperative and peroperative period and following the patient postoperatively. The student will workup two patients per week on the ward and in the ambulatory care setting and follow each patient through the entire peroperative period. Apart from doing histories and physical examinations, the student will learn how to write progress notes and prepare for case presentations. The objectives of knowledge are primarily covered in small group teaching sessions held in the hospitals. These cover a broad range of topics in the fields of surgical principles and all the subspecialties of surgery. Students are encouraged to attend services rounds, ward rounds, and participate in the operative management of their patients. Students do their rotations at the MGH, RVH, JGH and SMH. (Course Coordinator: Dr. R.G. Zelt)

TWO-WEEK SURGICAL SKILLS (ICM-C) During the ICM period, the student will rotate through a two-week course of surgical skills. These sessions are small group discussion and laboratory based, allowing close interaction and participation. During this learning experience, the student will learn about the operating room environment, methods of skin closure, drains and tubes, and knot tying skills. There will be a one-day seminar on wound management including wound classification, dressings and a practical session on the proper techniques of dressing changes. There will be dry and wet labs on suturing skills, and cast and splint application. Finally, there will be small group instruction on starting IVs and blood taking, surgical note keeping, breast examination, anesthesia, emergency room and palliative care. Participating hospitals MGH, RVH, JGH. (Course Coordinators: Drs. D. Evans, S. Meterissian, C-A. Vasilevsky)

#### CLERKSHIP/PRACTICE OF MEDICINE - 564-401A/B/C

In their senior years, students spend eight weeks as clinical clerks in surgery. The objectives of the surgical clerkship are the workup and management of surgical conditions. Four weeks are spent in General Surgery and, during the other half of the rotation, clerks may choose one of the following surgical disciplines: Cardiothoracic Surgery, Plastic Surgery, Urology or Vascular Surgery. As clinical clerks, the students become apart of the surgical team, attending rounds, managing patients and wards, taking calls and becoming involved in the entire management period of their patients.

During the eight-week rotations, students are given small group teaching on various topics in surgery. Participating hospitals include the MGH, RVH, SMH and JGH. (Course Coordinators: Drs. C. Edmond, J. Hinchey, P. Metrakos, C-A. Vasilevsky)

#### 6.25

ICM-B 524-303B/C GERIATRIC MEDICINE. This course will allow students to achieve comfort and competence in the clinical evaluation of the frail elderly. Specific geriatric problems including dementia, urinary incontinence, and falls will be addressed. A community-based component will expose students to resources for the elderly including home care.

#### 6.26

ICM-C 524-304B/C EMERGENCY MEDICINE. In this course, the student is introduced to the basics of Emergency Medicine with the objectives of: developing an approach to the acute, undifferentiated, sick patient; learning the principles of rapid stabilization; recognizing the concept of triage and prioritization; and developing technical skills in the management of these patients. This is accomplished through small group teaching, specific reading material (provided), and intense, direct clinical exposure in the emergency department.

ICM-A 524-302B MEDICAL ETHICS AND HEALTH LAW. The objectives of this course are to familiarize students with the basic ethical and legal issues and problems arising in clinical medicine and to

develop the skills needed to identify and resolve ethical dilemmas. Emphasis is placed on the following subjects: informed consent, risk disclosure, patient competence, confidentiality, research ethics, discontinuing life support, physician impairment, and ethics in the team context.

(Coordinator: Dr. E. Keyserlingk)

#### 6.27 Elective/Selective Courses

Major electives are offered during ICM (Introduction to Clinical Medicine) and POM (Practice of Medicine), by the following Departments: Anatomy, Anesthesia, Biochemistry, Biomedical Engineering, Emergency Medicine, Epidemiology and Biostatistics, Family Medicine, Geriatrics, Humanities and Social Studies of Medicine, Medicine, Microbiology and Immunology, Neurology, Neurosurgery, Nutrition, Obstetrics and Gynecology, Ophthalmology, Otolaryngology, Pathology, Pediatrics, Pharmacology and Therapeutics, Physiology, Psychiatry, Diagnostic Radiology, Radiation Oncology, Sports Medicine, Surgery and Tropical Medicine. Details are published in the "Elective Calendar" and further information can be obtained from the Coordinator (Elective Program), Faculty of Medicine. (Coordinator: Maureen Dowd)

### 7 Staff by Department

#### **Anatomy and Cell Biology**

Strathcona Anatomy and Dentistry Building 3640 University Street, Montreal, QC, H3A 2B2 Telephone: (514) 398-6335

Chair — John J. M. Bergeron Emeritus Professor — Y. Clermont

Professors — A. Beaudet, G.C. Bennett, J.J. M. Bergeron,
J.R. Brawer, M. Burnier, L. Hermo, D. Lawrence, C.P. Leblond,
S. Miller, R. Murphy, D.G. Osmond (Robert Reford Professor of Anatomy), B. Posner, C.E. Smith, E. Wang, H. Warshawsky

Associate Professors — O.W. Blaschuk, E. Daniels, S. David, M.F. Lalli, P. Lasko, M.D. McKee, M.M. Miller, C.R. Morales, H. Vali

Assistant Professors — C. Autexier, D. Baranes, P. Barker, M.T. Greenwood, T. Kennedy, A. Koromilas, N. Lamarche, P. McPherson, A. Ribeiro-da-Silva, J.G. Snipes, W. Sossin, S. Stifani, D. Walker, G. Wild

Adjunct Professors — D. Cyr, J. Drouin, S. Indue, A. Nantel, D.Y. Thomas

#### Anesthesia

Royal Victoria Hospital

687 Pine Avenue West, Montreal, QC, H3A 1A1

Professor and Chair — F. Carli (Wesley Bourne Professor of Anesthesia)

Emeritus Professors — R.G.B. Gilbert, J.W. Sandison Professors — C. Bushnell (Harold Griffith Professor of Anaesthesia), G.S. Fox

Associate Professors — M. Abou-Madi, F. Beique, K. Brown, R.F.H. Catchlove, D. Chartrand, R. Covert, J. Desparmet,

M. English, P. Fiset, M. Glavinovic, A. Gordon, D. Hickey,

G. Houle, K. Kardash, S. Kleiman, S. Lenis, I.R. Metcalf,

A. Moore, G. Plourde, F. Ralley, R. Robinson, R. Roman,

A. Scott, A.H. Spanier, M. Tessler, D.M. Thomas, A. Vainio, W.M. Wahba, S.K. Weeks, D. Withington

Assistant Professors — I. Amir, M. Angle, S. Backman, F. Barry, R. Bondy, J.F. Courval, E. Dupont, R. Finlayson, M. Gauthier, M. Germain, B. Grillas, G.T. Hemmings, K. Klubien, J. Lavoie,

P. McMillan, B. Popovec, D. Quance, S.H. Rafla, R. Robbins, F. Salevsky, P. Sheridan, T. Siddiqui, J.E. Sioufi, J. Sloan, W. Triolet

Lecturers — S. Bekhor, G. Brock, R. Carranza, M. Diserens, M. Kimia, P. McMillan, S. Vilderman

Associate Members — M. Boulanger, F. Donati, K. Krnjevic, B. Ligier, R. Melzack, N. Searle, P. Solomon, F. Varin Post-Retirement — P. Bromage, J. Rosales

#### Anaesthesia Research

3655 Drummond Street, Room 1207 Montreal, QC, H3G 1Y6

Professor and Director — K. Krnjevic Associate Professor — M. Glavinovic

#### **Artificial Cells and Organs Research Centre**

3655 Drummond Street, Room 1005 Montreal, QC, H3G 1Y6

Professor and Director — T.M.S. Chang
Professors — C.J. Chiu, H.L. Goldsmith, R.D. Guttmann,
M. Kaye, S. Lal, M. Levy, N.P.V. Nair, A.D. Sniderman,
L.E. St. Pierre

Associate Professors — P.E. Barre, I. Binik, N. Eade, A. Gonda, J.A. Hanley, T. Hutchinson, D. Shum-Tim

Assistant Professors — P.A. Bourgouin, G.R. Brown, R.F. Gagnon, R. Sipehia

Research Associate — W.P.Yu, S. Prakash

#### **Biochemistry**

3655 Drummond Street, Room 802 Montreal, QC, H3G 1Y6

Professor and Chair — P.E. Branton (Gilman Cheney Professor of Biochemistry)

Emeritus Professors — A.F. Graham, R.M. Johnstone,

S. Solomon, T.L. Sourkes, L.S. Wolfe

Professors — R. Blostein, P.E. Braun, P. Gros, A. Herscovics,
 R.E. MacKenzie, E.A. Meighen, W.E. Mushynski, G.C. Shore,
 J. Shuster, J.R. Silvius, N. Sonenberg, C.P. Stanners,
 M. Zannis-Hadjopoulos

Associate Professors — N. Beauchemin, V. Giguere, A. Nepveu, M. Park, J. Pelletier, M. Tremblay, A. Veillette

Assistant Professors — K. Gehring, A. Vrielink

Associate Members — J. Bergeron, K. Cianaflone, L.F. Congote, R. Dunn, M. Featherstone, W.C. Galley, P.J. Roughley, E. Schurr, C. Scriver, B. Turcotte, S. Wing, X-J. Yang Adjunct Members — M. Cordingley, M. Cygler, J. Drouin,

M. Gresser, F. Ni, D. Nicholson, M. O'Connor-McCourt, A. Storer

#### **Biomedical Engineering**

3775 University Street, Room 316 Montreal, QC, H3A 2B4

Professor and Chair — R.E. Kearney
Professors — T.M.S. Chang, A.C. Evans, H.L. Galiana
Associate Professors — J.H.T. Bates, J.D. Bobyn, W.R.J. Funnell
Assistant Professor — L. Collins, G.B. Pike, M. Slawnych
Adjunct Professors — I.W. Hunter, T.M. Peters, P.L. Weiss
Associate Members — J. Gotman, B.N. Segal, R. Sipehia,
C. Thompson

### Communication Sciences and Disorders, School of

Research Associates — C. Baker, D. Guitton, A. Katsarkas

1266 Pine Avenue West, Beatty Hall Montreal, QC, H3A 1A8

Associate Professor and Director — R. Mayberry

Emeritus Professor — D. Doehring

Professor — A. Karsarkas

Associate Professors — S. Baum, M. Crago, J. McNutt, L. Polka Assistant Professors — M. Pell (Research Director),

E. Thordardotir

Assistant Professors (Part-time) — G. Leonard, S. Schwartz, R. Shenker

Lecturers - P. Bager, J. Claessen, R. Gesser, A. Gingras,

J. Gordon, J. Miller, J. Paradis, L. Polomeno,

J. Robillard-Scultz, N. Shahnaz, M. Sundara

Adjunct/Associate Members — D. Caplan, H. Chertkow,

D. McFarland, Y. Oshima-Takane, G. Waters

#### Diagnostic Radiology

Montreal General Hospital 1650 Cedar Avenue, Room D5-137 Montreal, QC, H3G 1A4

Professor and Chair - R. Lisbona

Professors — A. Azouz, R. Lisbona, M.J. Palayew, L. Rosenthall Associate Professors — G. Dean, R. del Carpio-O'Donovan,

V. Derbekyan, S. Fontaine, J.H. Gagnon, M.J. Herba,

P. Lander, A. Lisbona, D. Melançon A. O'Gorman, C. Reinhold,

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P. Sebastien (St. Gobain); G. Shematek (Calgary Regional Hospital Authority); J. Siemiatycki (Institut Armand Frappier);

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H. Kreisman, P. Laneuville, A.Langleben, S. Lehnert, A. Loutfi,

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M. Flanders, J.E.S. Gomolin, F. Kingdon, M. Kwitko,

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R. Polomeno, J. Rosen, N.E. Saheb, L. Solomon

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R. Beneish, J.-P. Chartrand, D. Cheema, D. Chow, L. Cooper,

S. Fichman, M. Gans, E. Gordon, M. Kapusta, O. Kasner,

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Professor — A. Katsarkas

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#### **Pathology**

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Professors — M.N. Burnier, A.C. Cuello, A. Ferenczy, R.D.C. Forbes, R. Fraser, A. Fuks, Q. Hamid, I. Hüttner,

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Lecturers — B. Issa-Chergui, B. Reid, T. Sourour, N. Zaklama Post-retirement — W.P. Duguid, J.O. Lough, G. Tremblay Adjunct Professors — T. Seemayer, P.D. Winocour

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Z. Fox, E. Francoeur, H. Goldman, C. Goodyer, R. Gottesman,

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R. Platt, L. Plotnick, R. Primavesi, M. Pusic, D. Rabin,

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