

Q127
.C3
C38

1991/92



Industry, Science and
Technology Canada

Industrie, Sciences et
Technologie Canada



IC

**CANADA SCHOLARSHIPS PROGRAM
ANNUAL REPORT CARD
1991-92**

Canada



CANADA SCHOLARSHIPS PROGRAM
ANNUAL REPORT CARD
1991-92

INDUSTRY, SCIENCE AND
TECHNOLOGY CANADA
LIBRARY

DEC - 8 1992

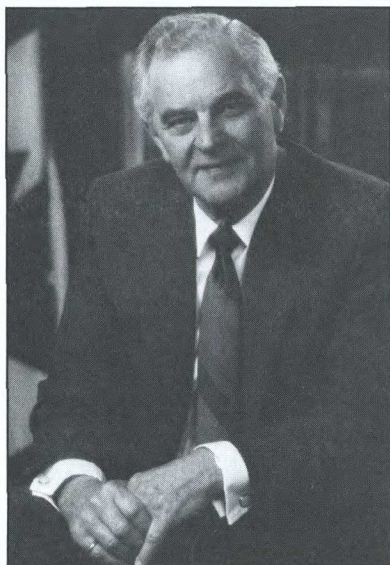
BTRZ

BIBLIOTHÈQUE
INDUSTRIE, SCIENCES ET
TECHNOLOGIE CANADA

Aussi disponible en français.

© Minister of Supply and Services Canada 1992
Cat. No. C2-205/1992E
ISBN 0-662-19995-2
ISTC-CSP-032

MESSAGE FROM THE MINISTER



I am pleased to present the fourth annual report card for the Canada Scholarships Program. In 1991-92, the Program experienced a rapid expansion, both in terms of numbers and program activities. The number of applicants reached 12 763, its highest level ever and an increase of 32% over 1990-91. This year, a total of 3 194 Canada Scholarships were awarded, with women maintaining a 52% share.

Several important developments made this an exceptional year for the Program. In particular, the federal government decided that the Canada Scholarships Program will extend to 1995-96 and, as announced on 14 February 1992, the value of the Scholarship will be increased from \$2 000 to \$2 500 per year, beginning in 1993-94. The government also approved the creation of the Canada Scholarships in Technology. These new scholarships, which will attract more top students to technician and technologist programs, are an important investment in Canada's industrial competitiveness and prosperity. The awards were scheduled to commence in September 1992, with information on the Canada Scholarships in Technology being reported in next year's annual report.

Another major achievement was the launch of the Innovators in the Schools/Frontrunners Networks. This initiative arranges for scientists, engineers, technicians, technologists, Canada Scholars and other top performing university and college students to visit elementary and secondary schools to promote science and technology studies and careers. Preliminary figures show that, in the initiative's first year of operation, over 3 500 volunteers registered as Innovators/Frontrunners and over 2 700 school visits took place.

As in the past, the success of the Canada Scholarships Program is dependent on the dedicated efforts of universities and colleges, as well as the Association of Universities and Colleges of Canada, who administers the program on behalf of ISTC. With this in mind, I am pleased to welcome the Association of Canadian Community Colleges and the more than 140 community colleges, cégeps and private training institutes, who will administer the Canada Scholarships in Technology next year.

My congratulations to those individuals who received a Scholarship in 1991-92, and to our 729 Scholars who have completed the full tenure of their Award successfully.



William C. Winegard
Minister for Science

TERMINOLOGY

- 1988 cohort refers to those Scholars who were awarded their Scholarship in the 1988–89 academic year, the first year of the Program.
- 1989 cohort refers to those Scholars who were awarded their Scholarship in the 1989–90 academic year.
- 1990 cohort refers to those Scholars who were awarded their Scholarship in the 1990–91 academic year.
- 1991 cohort refers to those Scholars who were awarded their Scholarship in the 1991–92 academic year.

Data Note

Any discrepancies in figures used in this report compared to previous reports are due to the up-dating of statistics for the Canada Scholarships Program Information System. Data used for this report are accurate as of 20 July 1992.

CONTENTS

Highlights of 1991–92	1
Program Rationale	3
Program Initiatives	5
New Initiatives	12
Scholar Recognition and Celebration in 1991–92	15
Special Reports	18
Statistics	20
Annex I: Innovators in the Schools/Frontrunners	36
Annex II: 1991–92 Canada Scholars by Province of Institution	37

HIGHLIGHTS OF 1991-92

- The 1991-92 Canada Scholarships Program (CSP) of Industry, Science and Technology Canada (ISTC), was launched on 16 October 1991 by the Minister for Science, William C. Winegard, at Dalhousie University. Other institutions participating in the ceremony were Acadia University, University of King's College, Nova Scotia Agricultural College, Saint Mary's University, Mount Saint Vincent University and the Technical University of Nova Scotia.
- The number of applications for Canada Scholarships increased by 39% from last year (to 17 924 from 12 861). The number of applicants reached an all time high at 12 763 — the largest annual increase in the Program's history.
- 3 194 Scholarships were awarded to outstanding first-year undergraduate students registered in science and engineering programs across the country. As in the previous year, 52% of the Scholarships were awarded to women.
- Preliminary data on renewal rates of the 1991-92 Scholars show that 63% of Scholars will renew their Scholarship into their second year. This is the highest level of first year renewal since the Program's inception.
- 79% of the 1990-91 Scholars will be entering their third year of study as compared to a second year renewal rate for the 1989-90 cohort of 73.5%.
- 81% of the 1989-90 cohort will be entering their fourth year of study. The renewal rate for the 1988-89 cohort entering their fourth year of study was 76%.
- The federal government decided the CSP should be extended through to 1995-96, and on 14 February 1992, Prime Minister Brian Mulroney announced that the amount of the Scholarship will be increased from \$2 000 to \$2 500 per year, beginning in 1993-94.
- On 6 May 1992, Minister Winegard announced the expansion of the CSP to include students enrolling in eligible technology programs related to the natural sciences, engineering and the primary industries at community colleges, cégeps and private sector institutes of technology. The Minister also announced the creation of the Canada Scholarships in Technology Review Board, to advise him on program eligibility and implementation issues related to the Canada Scholarships in Technology.

- Celebratory events were held by 74 universities and colleges to honour new Canada Scholarship winners. These events were attended by the Governor General, federal ministers, Members of Parliament, Senators or senior industry representatives.
- Over 1 000 high schools and cégeps across Canada honoured their Canada Scholar alumni by holding celebratory events, at which the key contributions of educators and parents were recognized.
- 74 corporate awards were presented to Canada Scholars. Corporate sponsors include: DuPont Canada Inc., General Electric Canada, Merck Frosst Canada, the MDS Health Group, NOVA, Rio Algom, SCIEX and Syncrude Canada.
- Two new corporate awards were added to the CSP: The Governor General's Canada Scholarships in the Environmental Sciences (sponsored by Shell Canada), and Her Royal Highness The Princess of Wales' Canada Scholarships in the Biological Sciences (sponsored by Glaxo Canada).
- On 9 May 1991, the Council of Science and Technology Ministers announced they would launch a national initiative to identify resource people to promote student interest in science and technology studies and careers. This Innovators in the Schools/Frontrunners Network now operates in every province and territory with support from the CSP. Over 3 500 volunteers have been included on the list of Innovators/Frontrunners. During the 1991-92 school year approximately 2 700 school visits were made.
- More than 15 organizations have become partners in the Innovators Network, providing financial support and making commitments for volunteers. This group includes the following:

Applied Science Technologists and Technicians of British Columbia
 Association of Community Colleges of Canada
 Association of Universities and Colleges of Canada
 Canadian Cable Television Association
 Canadian Chamber of Commerce
 Canadian Council of Professional Engineers
 Canadian Council of Technicians and Technologists
 Canadian Federation of Biological Societies
 Canadian Forestry Association
 Canadian Information Processing Society
 Canadian Mathematics Society
 Industrial Biotechnology Association of Canada
 Information Technology Association of Canada
 Insurance Institute of Canada
 Pharmaceutical Manufacturers Association of Canada
 Royal Society of Canada

PROGRAM RATIONALE

The CSP was announced by the Prime Minister in January 1988 in response to recommendations of the National Advisory Board on Science and Technology. The Program is designed to counter two disturbing trends:

- while overall undergraduate enrolment at Canadian universities has been increasing over the past few years, enrolment in natural sciences and engineering, disciplines vital to the country's future economic competitiveness and prosperity, has been decreasing; and
- women are still significantly under-represented in most natural science and engineering programs in Canada.

To help reverse these trends, the CSP (worth \$6.6 million in 1991-92) awards a minimum of 2 500 scholarships to top Canadian students entering undergraduate studies in the natural sciences and engineering and, starting in 1992-93, will award 800 scholarships (to rise to 1 600 in 1995-96) to students entering eligible technology programs at community colleges, cégeps and private sector institutes of technology. Scholarships are divided about equally between women and men. Other details of the Program include the following:

- Canada Scholarships in Science and Engineering (CSSE) are presently valued at \$2 000 a year, and will be increasing to \$2 500 in 1993-94. Scholarships are renewable for up to four years, conditional upon the attainment of a first-class academic standing and the continuation of registration in an eligible field. Scholars may receive up to \$8 000 and, as of 1993-94, up to \$10 000. Scholars on accelerated programs can receive their full Scholarship over a three-year period, while students registered in co-op programs can take up to five years to receive their full amount;
- Canada Scholarships in Technology (CST) have the same annual value, but are renewable for a maximum of three years for a total value of \$6 000 (\$7 500 as of 1993-94);
- applicants to the Program must be Canadian citizens or permanent residents, and plan to register as full-time students in an eligible post-secondary degree program;
- Scholarships are allocated to institutions based upon the most recent data available on the number of graduates at each institution in eligible disciplines;

- participating institutions nominate Canada Scholars from among their best applicants entering their first year of postsecondary studies in eligible disciplines;
- a minimum of 10 Canada Scholarships in science and engineering and four in technology is assured for residents of each province and territory; and
- the science and engineering component of the Program is administered for the Government of Canada by the Association of Universities and Colleges of Canada (AUCC), and the technology component by the Association of Canadian Community Colleges (ACCC).

PROGRAM INITIATIVES

ADMINISTRATIVE CHANGES

Each year, program officials from both ISTC and the Association of Universities and Colleges of Canada consult with university and college awards administrators and faculty to discuss issues related to the administration of the CSP. In addition, the CSP Administrative Advisory Board held three meetings to discuss on-going operational matters. In 1991-92, there were 20 possible improvements identified, of which 18 have been either fully implemented or are in the process of being implemented. The key improvements include:

Direct Deposit — a revised payment system should be introduced in the autumn of 1992. While Canada Scholars' first scholarship instalments will continue to be issued and distributed through their institution's Awards Office, all subsequent Scholarship instalments will either be mailed directly to them or directly deposited into the Scholars' bank accounts.

Communications — there will be a significant increase in ISTC's direct communication with Scholars. In past years, the Awards offices distributed all Program materials to Scholars. In 1992, information will be mailed directly to the students.

Electronic Data Interchange — an automated system for exchanging student data between the Association of Universities and Colleges of Canada and institutions should be implemented in September 1992.

CORPORATE INVOLVEMENT

The trend toward greater private sector participation in the CSP continued in 1991-92. Much of this support took the form of financial sponsorship of special corporate awards and support to the Innovators in the Schools/Frontrunners Networks. To date, 24 Canadian corporations have pledged over one-half million dollars in sponsorship. Other companies are participating in the Program by recruiting volunteers from among their employees for the Innovators in the Schools Network (see Annex II).

For the second year, corporate awards were offered to Canada Scholars excelling in a particular field of study. These awards are sponsored by: DuPont Canada Inc., General Electric Canada, the MDS Health Group, Merck Frosst Canada, NOVA, Rio Algom, SCIEX and Syncrude Canada. There were eight

corporate sponsors offering a total of 74 awards valued at \$1 000 each for one year.



Jean Bélanger, President, Canada Chemical Producers Association; Sue Riddell, Manager Employment and Staffing, Du Pont Canada Inc.; Finn Hovland, Senior Vice-President, Du Pont Canada Inc.; Debra Fawcett, Communications Account Manager Du Pont Canada Inc.; and Canada Scholars at the presentation of the first Governor General's Canada Scholarships in Environmental Engineering (sponsored by Du Pont Canada Inc.) held at Government House, Ottawa, 5 December 1991.

SPECIAL AWARDS

This year also marked the addition of two new corporate awards:

- *The Governor General's Canada Scholarships in the Environmental Sciences.* Sponsored by Shell Canada Limited, 25 scholarships worth \$1 000 each will be awarded annually to Canada Scholars in the environmental sciences who demonstrate an exceptional commitment to resolving environmental problems. Shell Canada has committed \$75 000 to fund this award over its first three years.
- *Her Royal Highness The Princess of Wales' Canada Scholarships in the Biological Sciences.* Twenty awards worth \$1 000 each will be given annually to Canada Scholars entering their final year of a biological sciences degree who demonstrate through their research and course content an outstanding dedication to treating and preventing Acquired Immune Deficiency Syndrome (AIDS). These scholarships are generously being supported by Glaxo Canada, which has pledged \$60 000 to fund the award over its first three years.

All awards are administered for ISTC by the Association of Universities and Colleges of Canada, which conducts the selection process in August of each year. Nominated by the Dean of their faculty, winners are selected by committees of university and industry representatives (not including sponsoring companies) from across Canada. These committees carefully review the credentials of each candidate against criteria established by the Association of Universities and

Colleges of Canada, ISTC, and the corporate sponsor. The names of winners are announced in October.

Contact: Tim Hamilton, Canada Scholarships Program, ISTC,
8th Floor West, 235 Queen St., OTTAWA, Ont., K1A 0H5,
Tel.: (613) 993-9635

MENTOR CLUBS

The 1991-92 academic year saw the creation of the first Canada Scholars' Mentor Clubs in the engineering schools of seven Canadian universities: Carleton University, Mount Saint Vincent University, St. Francis Xavier University, the Technical University of Nova Scotia, the University of Calgary, the University of New Brunswick and the University of Windsor.

By developing mentoring relationships among Canada Scholars and senior students and faculty, the clubs help Scholars maintain their academic performance. Activities undertaken by the clubs in 1991-92 included study skills workshops and faculty-Scholar "feedback" meetings.

With the support of Canadian Marconi, which is generously providing the seed capital for mentor clubs, more clubs may be established in 1992-93.

Contact: Tim Hamilton, Tel.: (613) 993-9635

CANADA SCHOLARS' EMPLOYMENT REGISTER

As in previous years, the CSP has arranged for the Technical Service Council, a Canada-wide industry-sponsored placement service and personnel consulting firm, to offer the Canada Scholars' Employment Register. The Register catalogue — free of charge — the résumés of all Canada Scholars seeking summer, co-op and full-time employment. Feedback from various users of the Register indicates that more data on the Scholars would facilitate recruitment. To enhance the Register, ISTC is working with the Technical Service Council to include information on the employment and postsecondary education history of each Scholar in the Register. The electronic register is circulated to major employers of scientists, engineers, technicians and technologists, thereby ensuring maximum corporate exposure for Canada Scholars.

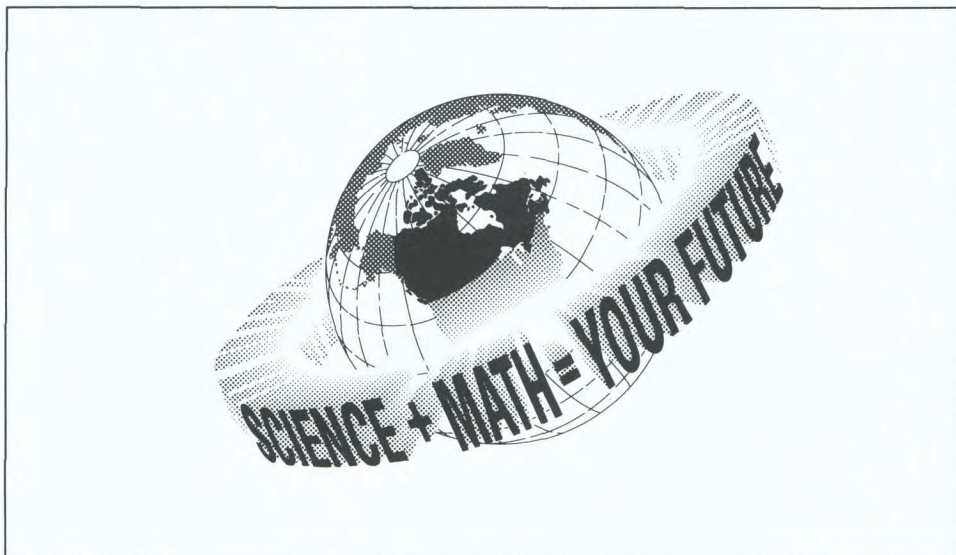
Contact: Joanne Steinberg, Canada Scholarships Program, ISTC,
8th Floor West, 235 Queen St., K1A 0H5, OTTAWA, Ont.,
Tel.: (613) 990-6149

INNOVATORS IN THE SCHOOLS/FRONTRUNNERS NETWORKS

In 1990-91 the CSP launched a federal-provincial-territorial initiative to promote science and technology in elementary and secondary schools across the country. These networks experienced great success in their first year of operation.



Innovator Marie Lemay demonstrates a science experiment to a young student.



Innovators in the Schools

On 9 May 1991, the Innovators in the Schools Network was announced by the Council of Science and Technology Ministers as a federal-provincial-territorial initiative. Modeled after successful programs in British Columbia, Alberta, Nova Scotia and Prince Edward Island, the Innovators in the Schools Network is turning kids on to science and math. Its volunteers are helping teachers by visiting classrooms, organizing student visits to their workplace, answering hotlines and judging science fairs. Preliminary data for the 1991-92 school year indicates that approximately 3 500 Innovators have volunteered and 2 700 elementary and high schools have had an Innovator visit. To assist in the task of organizing visits, ISTC has produced a training kit (handbook and video) entitled *Selling Science to Students*.

The Innovators Network is active in every province/territory through a regional coordinator who matches school requests with volunteers. The following organizations perform this coordination role as partners with ISTC:

- Science World British Columbia
- Science Alberta Foundation
- Association of Professional Engineers of Saskatchewan
- Science/Technology Awareness Network Inc. (Manitoba)
- Association of Professional Engineers of Ontario
- Ordre des ingénieurs du Québec
- Association of Professional Engineers of New Brunswick
- Association of Professional Engineers of Nova Scotia
- Metro-Halifax Scientists in the Schools
- Association of Professional Engineers and Geoscientists of Newfoundland
- Newfoundland and Labrador Science Advisory Council
- Growing Awareness of Science, Technology, Engineering and Math (STEM) — University of Prince Edward Island
- Association of Professional Engineers of the Yukon Territory
- Science Institute of the Northwest Territories

ISTC, in collaboration with the Innovators network is developing the Canadian Innovators Data Systems ([CIDS] — pronounced kids). This system will do automatic matching when requests for speakers are received. This data base is available to the Innovators Network through the InterNet System. CIDS will also house an electronic library of science and technology experiments and resource materials. The electronic library will be available to Innovator coordinators and Innovator volunteers.

Frontrunners

The Frontrunners initiative was launched in the autumn of 1991. Under this initiative, ISTC, working with student organizations and university and college administrators, identifies outstanding students, beginning with Canada Scholars, who are willing to visit schools to promote science and technology studies and careers. Approximately 600 Frontrunners were recruited during the 1991-92 school year and more than 1 000 visit requests were received — only a fraction of which could be handled.

In order to better align volunteers and schools, the Frontrunners Network is being more closely integrated with the Innovators network. In addition, Frontrunners recruiters are being established on campuses across Canada.

Other Innovators in the Schools/Frontrunners Networks Highlights

- More than four million pamphlets on the Networks were included with family allowance cheques.
- A holographic logo for the Networks has been developed, as well as holographic stickers, which will be distributed in classrooms by the volunteer speakers.
- A video to market the Innovators Network to school teachers, industry and the general public is being developed and will be ready for distribution in the winter of 1992.
- A bilingual newsletter for the Networks is being developed and the first issue was scheduled for distribution in October 1992.
- CSP corporate sponsors have donated prizes to be awarded at the end of each school year. For each visit made by an Innovator or Frontrunner, a school's name will be entered. Winners were announced during Science and Technology Week, 16 to 25 October 1992.
- Over 3 000 employers were contacted to encourage participation of additional technically trained volunteers.

Contact: Lois Smith, Network Coordinator, Canada Scholarships Program, ISTC, 8th Floor West, 235 Queen St., OTTAWA, Ont., K1A 0H5, Tel.: (613) 998-1301

CSP HOTLINE

In January 1992, ISTC introduced of a toll-free Hotline to facilitate enquiries about the CSP. Through the CSP Hotline, four Canada Scholarships services can be accessed:

1. Innovators in the Schools/Frontrunners Networks (calls are routed to ISTC and the network manager in the region of the caller).
2. Canada Scholarships Program: information and how to obtain an application form for Canada Scholarships in Science and Engineering or Canada Scholarships in Technology, or information on Canada Scholarships high school citations or events (calls routed to the Association of Universities and Colleges of Canada, the Association of Canadian Community Colleges or ISTC).
3. Canada Scholars Employment Register (calls routed to the Technical Service Council).
4. Communication directly with the CSP.

The CSP toll-free Hotline number is: 1-800-465-7766

NEW INITIATIVES

CANADA SCHOLARSHIPS IN TECHNOLOGY

On 6 May 1992, the Minister for Science, the Honourable William C. Winegard, announced that the CSP was being expanded to include students enrolling in eligible technology programs related to the natural sciences, engineering and the primary industries, at community colleges, institutes of technology and cégeps across Canada.

A minimum of 800 additional Canada Scholarships will be provided in 1992, rising to 1 600 in 1995. As with the existing Canada Scholarships, those for technicians and technologists will have a value of \$2 000 annually, or up to \$6 000 over their maximum tenure of three years. The Scholarships will be awarded in roughly equal number to men and women, on the basis of outstanding academic achievement. The Association of Canadian Community Colleges administers the Canada Scholarships in Technology on behalf of ISTC. More than 115 public and private institutions are participating in the technology portion of the CSP.

TECHNOLOGY SCHOLARSHIPS REVIEW BOARD

Along with the creation of the Canada Scholarships in Technology, the Minister for Science also announced the establishment of a Review Board to advise him on which institutions, programs and disciplines should be included in the Program and to provide advice on program policy. The Review Board is composed of representatives of colleges, cégeps, private training institutes as well as industry and labour, and educational associations. The Review Board met four times during the summer of 1992, evaluated 770 programs of study and recommended 669 for eligibility. The Board also evaluated 42 private institutions and recommended five for eligibility. Minister Winegard approved the recommendations of the Board.

Contact: Association of Canadian Community Colleges, Suite 200,
1223 Michael St. North, OTTAWA, Ont., K1J 7T2,
Tel.: (613) 746-4906

To obtain a copy of the report of the Review Board, please contact:
Bernard Chabot, Canada Scholarships Program, ISTC, 8th Floor West,
235 Queen St., OTTAWA, Ont., K1A 0H5, Tel.: (613) 993-5452

GOLD AND SILVER CITATIONS

Each year, approximately 1 500 high schools/cégeps that graduate Canada Scholars are presented with special Citations signed by the Prime Minister. In response to numerous requests, the Program will also be providing (beginning 1991-92) a Gold Citation, signed by the Prime Minister, to the school in each province/territory with the greatest number of Canada Scholars relative to its population of graduating high school/cégep students. A Silver Citation will be presented to each of the high schools/cégeps in the next top 10% of schools in each province/territory generating Canada Scholars.

Contact: Wendy Yam, Canada Scholarships Program, ISTC, 8th Floor West, 235 Queen St., OTTAWA, Ont., K1A 0H5, Tel.: (613) 991-4657

CERTIFICATES TO CANADA SCHOLARS WHO HAVE COMPLETED THEIR TENURE SUCCESSFULLY

Canada Scholars who were successful in retaining their Scholarship over its full term are being provided with a special Certificate signed by the Prime Minister in recognition of sustained academic excellence in science and engineering. For 1991-92, some 729 Scholars will receive the Certificate.

Contact: Wendy Yam, Tel.: (613) 991-4657

THE SAVVY SCHOLAR: HOW TO RETAIN YOUR CANADA SCHOLARSHIP

Beginning in the autumn of 1992, Canada Scholars and Frontrunners will be provided with a copy of *The Savvy Scholar: How to Retain Your Canada Scholarship*. This guide was prepared for ISTC by Professor Danton H. O'Day of Erindale College, University of Toronto. This guide is based on his book *How to Succeed at University* (Trilobyte Press). The purpose of this guide is to help Scholars get on track during their first year of college or university and to assist them in maintaining their Canada Scholarship. Topics covered include:

- "The Complexity of College and University Life"
- "Note Taking: Lectures and Reading"
- "How to Study and Learn"
- "Preparing for and Writing Exams"
- "Time Management is Critical to Success"
- "Problems and Solutions"

Contact: Joanne Steinberg, Tel.: (613) 990-6149

STUDY GROUP ON TECHNICIANS AND TECHNOLOGISTS

In order to assess the role of technicians and technologists in Canadian competitiveness, the CSP supports and participates in the Study Group on Technicians and Technologists. This group is composed of representatives of employers, labour unions, employee associations and community college educators. In addition to ISTC, funding is provided by Employment and Immigration Canada under an Industrial Adjustment Service Agreement. The Study Group has established three subcommittees to deal with the role of the educational system; the low participation rate of women; and the contribution of technicians and technologists to Canadian international competitiveness. The results of the research undertaken by the Study Group will be released in a report this autumn.

Contact: Joanne Steinberg, Tel.: (613) 990-6149 or Judy Giroux,
The Canadian Labour Market Productivity Centre, 66 Slater St.,
OTTAWA, Ont., K1P 5H1, Tel.: (613) 234-0505

SCHOLAR RECOGNITION AND CELEBRATION IN 1991-92

UNIVERSITY AND COLLEGE EVENTS

The Honourable William C. Winegard, Minister for Science, launched the fourth year of the CSP at Dalhousie University on 16 October 1991. The launch ceremony for the 1991-92 CSP included Dalhousie University along with Canada Scholars from six other Nova Scotia postsecondary institutions: Acadia University, the University of King's College, Nova Scotia Agricultural College, Saint Mary's University, Mount Saint Vincent University and the Technical University of Nova Scotia. Minister Winegard took the occasion to congratulate the first group of 78 Canada Scholars graduating in science and engineering, as well as the more than 4 000 second, third and fourth year Scholars.

Throughout the 1991-92 academic year, a total of 74 universities, community colleges and military colleges held 71 ceremonies (plus the multi-institutional launch) to honour their Canada Scholars. During these ceremonies, each Scholar was presented with a certificate signed by the Prime Minister. Federal representation at 27 of these events was either by a federal minister, Member of Parliament, Senator or other federal representative. Representatives from some of Canada's top research and development and high-technology industries were present at 30 ceremonies.



The Hon. Gerald Merrithew, MP, and Tom Dunn, Northern Telecom Canada, at the 7 November 1991 celebratory event held to honour new Canada Scholars from the University of Prince Edward Island.

CORPORATE EVENTS

In addition to university and college events, Canada Scholars figured prominently in several corporate events. For example, during the 23 September 1991 opening ceremonies of the new Merck Frosst Centre for Therapeutic Research in Montreal, the Right Honourable Brian Mulroney presented the Merck Frosst Award to Canada Scholars in Chemistry and Biochemistry, to 10 outstanding Canada Scholars in these disciplines.

A similar event held on 14 April 1992, celebrated the ground breaking for Glaxo Canada's corporate headquarters in Mississauga, Ontario. Attended by Prime Minister Mulroney, Canada Scholarships graduation certificates were presented to nine Scholars. Jacques Lapointe, President and Chief Executive Officer of Glaxo Canada also announced a new contribution to the CSP, the establishment of *Her Royal Highness The Princess of Wales' Canada Scholarships in the Biological Sciences*.

Another highlight of this year's celebrations was the first annual Festival of Engineering, held in Ottawa from 6 to 11 April. Festival of Engineering '92 aimed to increase the public's awareness of the important part engineering plays in our everyday life, and to encourage young people to consider engineering as a career. The inaugural ceremony held at the National Museum of Science and Technology in Ottawa honoured those Scholars from the University of Ottawa, Université du Québec à Hull and Carleton University. During this ceremony, His Excellency the Right Honourable Ramon John Hnatyshyn, Governor General of Canada, announced the establishment of the *Governor General's Canada Scholarships in the Environmental Sciences* sponsored by Shell Canada Limited. This company was represented by Jack McLeod, President and Chief Executive Officer who expressed his company's pleasure in funding this special environmental award. Also during the ceremony, Guy Saint-Pierre, President and Chief Executive Officer of the SNC Group and Honourary Chair of the Festival, announced that the Canadian Council of Professional Engineers was committed to providing 5 000 volunteers to the Innovators Network.



Dr. Marcel Hamelin, Rector, University of Ottawa; Claude Lajeunesse; Governor General Ramon John Hnatyshyn; Minister Winegard; Guy Saint-Pierre, President, SNC; the Hon. John Bosley, MP; Jack MacLeod, President, Shell Canada; and the Canada Scholars of the University of Ottawa at the first annual Festival of Engineering, 6 April 1992, held at the National Museum of Science and Technology in Ottawa.

HIGH SCHOOL EVENTS

During 1991-92, over 1 000 high schools and cégeps honoured their Canada Scholars alumni at ceremonies designed to recognize the efforts and contributions of parents, teachers, counsellors and administrators to the outstanding accomplishments of the Canada Scholarships recipients. Many of these events were attended by a local Member of Parliament. A Citation signed by the Prime Minister and bearing the names of the 1991 Scholars graduating from the school was presented at these ceremonies.

In response to requests by high schools, ISTC redesigned the Prime Minister's Citation to allow for automated production, thereby allowing delivery earlier in the school year. In addition, a picture frame supplier, Flair-U Frame It Franchise Systems Inc., was selected by competitive tender to offer by mail order, frames especially suited to Canada Scholarships Citations and Certificates.

Contact: Keith Richardson, Canada Scholarships Program, ISTC,
8th Floor West, 235 Queen St., OTTAWA, Ont., K1A 0H5,
Tel.: (613) 990-6150

SPECIAL REPORTS

NON-ACADEMIC FORFEITURES STUDY

In early 1992, a survey was conducted of former Canada Scholars who had forfeited their Scholarships for non-academic reasons. The purpose of the study was to examine reasons for non-academic forfeitures of Scholarships in order to evaluate and enhance the CSP.

Results

- Of the 523 former Scholars (or 79%) who had switched to ineligible disciplines, 49% or 256 Scholars chose medicine as their new field of study.
- 9% of respondents had forfeited their Scholarship due to postponed/terminated studies. This included illness, financial difficulties, loss of interest/motivation, and re-assessment of career choice.
- 5% of respondents cited a less than 60% science content in their program as the reason for forfeiture.
- 5% forfeited their Scholarship because they switched to part-time studies.
- 2% of the survey population cited other reasons for forfeiture.

APPEALS EVALUATION REPORT

This survey was conducted in response to concerns raised by universities and the Association of Universities and Colleges of Canada during annual consultations about a formal appeals process. Results indicate a high rate of approval of appeals submitted by institutions (appeals were divided into two types):

- Type 1 Appeals were approved at a 97.6% rate. They include appeals related to CSP policies and procedures, and in most cases involved Scholars who had not actually forfeited at the time of their appeal. For example, late nominations, university or administrative errors, applications for tenure outside Canada, requests for Scholarship deferral and special cases.
- Type 2 Appeals (related to medical, family, personal or other reasons) were approved at a rate of 81.8%.

These high rates demonstrate that most appeals that reach the ISTC level with support from both the institution and Association of Universities and Colleges of Canada are considered tenable. Analysis also shows that the rate of reinstated Scholars forfeiting for a second time is also high (47%), especially among women (79%). This situation indicates that while there are compelling reasons to consider and grant appeals, these cases must continue to be carefully screened and scrutinized at all levels of the appeals process.

CITATION PRESENTATIONS SURVEY

A survey of high schools and cégeps from which Canada Scholars graduated was conducted during the summer of 1991. The objectives of this survey were to determine how these institutions accepted the Citations awarded to them, and to obtain their opinions of the CSP.

Of the 1 038 questionnaires sent, 319 were completed and returned prior to 31 August 1991. This low response rate (31%) may be attributable to the timing of the survey (summer).

Responses to several questions indicate that schools in general are very supportive of the CSP. When asked how they would rate the success of the event where Citations were presented, 67% of respondents said "very successful." The percentage of schools that would likely have another event was also quite high at 73%. Some 89% showed interest in receiving another Citation.

Several recommendations were presented in the report such as: earlier notification of Scholarship winners, better explanation of what the Citation's purpose is, modifying the design of the Citation and framing the Citation.

Contact: Denise Woods, Canada Scholarships Program, ISTC,
8th Floor West, 235 Queen St., OTTAWA, Ont., K1A 0H5,
Tel.: (613) 990-3318

MORE THAN JUST NUMBERS

Last year the CSP participated in a special industry-labour committee led by the Canadian Council of Professional Engineers, the Association of Consulting Engineers of Canada, the Association of Universities and Colleges of Canada, and the Canadian Manufacturers Association. In due course, this Committee on Women in Engineering released its report on the participation of and environment for female engineering students and engineers in Canada. Entitled *More Than Just Numbers*, the report contains 29 recommendations, each with specific strategies and time frames for implementation. The recommendations are directed at primary and secondary school educators, faculties of engineering, employers of engineers and associations of professional engineers. To follow through on its commitment, ISTC is working with educators, especially in universities, and with employers on the implementation of the recommendations and on monitoring and reporting on progress.

Contact: Jeanne Inch, University Research Policy, ISTC, 8th Floor West,
235 Queen St., OTTAWA, Ont., K1A 0H5, Tel.: (613) 991-0363

STATISTICS

1991-92 AWARDS PROCESS

The 1991 awards process commenced with the distribution of Canada Scholarships information kits and application forms to over 1 200 high schools, cégeps, universities, community colleges, Employment Centres, and provincial and territorial ministries of education across the country, as well as to Armed Forces schools abroad.

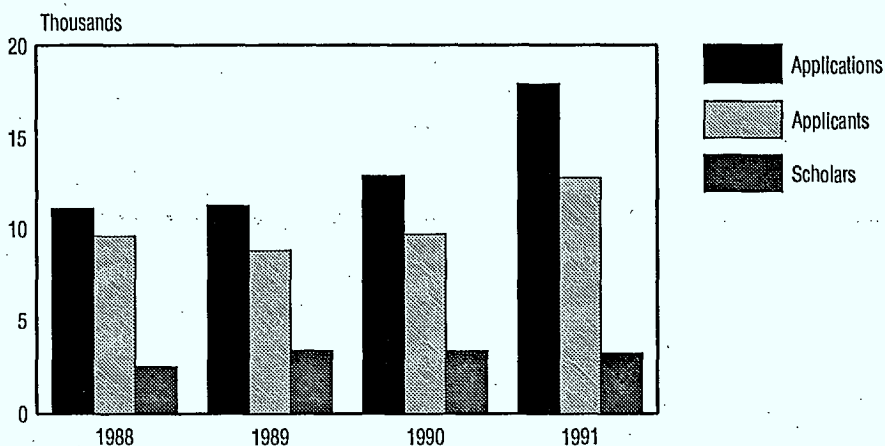
The 87 postsecondary institutions and two territorial governments that received the applications assessed and sent their list of nominees to the Association of Universities and Colleges of Canada by 20 September 1991. After reviewing nominations to ensure adherence to Program criteria, the Association of Universities and Colleges of Canada submitted a list of Scholarship candidates to the Minister for Science. In early October 1991, Scholarship recipients were notified of their awards by letters from the Prime Minister and the Minister for Science. The names of the winners were announced officially by the Minister for Science in Halifax on 16 October 1991.

1988 TO 1991 APPLICATIONS, APPLICANTS AND SCHOLARS

Table 1 — Percentage Distribution by Gender for Applications, Applicants and Scholars, 1988 to 1991

	1988	1989	1990	1991
Applications				
Men	55.4	53.1	50.6	50.7
Women	44.6	46.9	49.4	49.3
Applicants				
Men	55.4	53.6	51.4	51.5
Women	44.6	46.4	48.6	48.5
Scholars				
Men	48.8	47.7	47.8	48.0
Women	51.2	52.3	52.2	52.0

Chart 1
CSP Applications, Applicants and Scholars, 1988 to 1991



	1988	1989	1990	1991
Applications	11 042	11 242	12 861	17 924
Applicants	9 568	8 777	9 677	12 763
Scholars	2 500	3 340	3 322	3 194

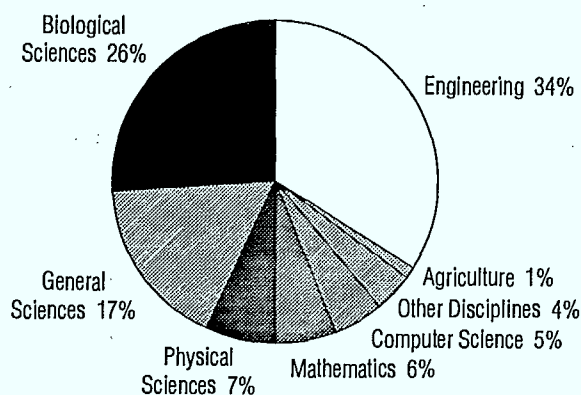
Applications

This year, 17 924 applications were submitted to the 87 institutions eligible under the Program. This represents an increase of 39% over last year and a 62% increase from the Program's first year. Women made up 49.3% of all applications this year with men accounting for 50.7%.

Applicants

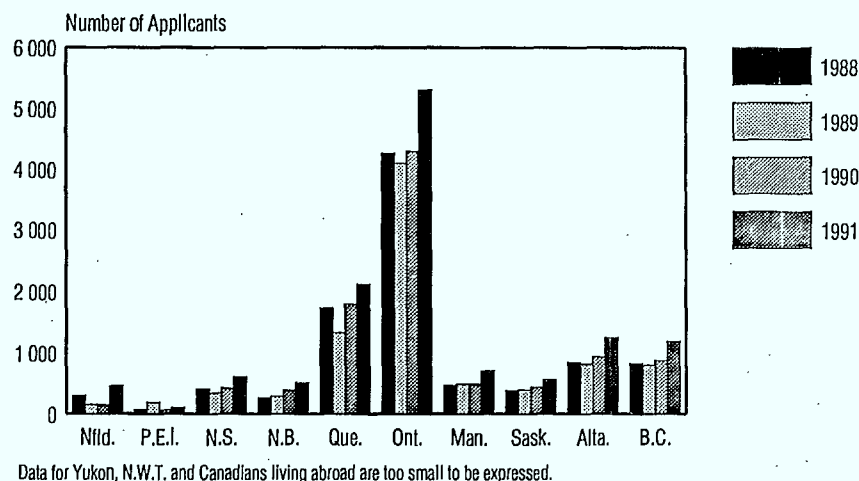
The number of applicants reached an all time high of 12 763. This is a 32% increase from 1990-91, and the largest annual increase in the Program's history. (Note: an applicant can apply for a Scholarship at more than one institution, therefore the number of applications is larger than the number of applicants.) The distribution of male and female applicants has remained consistent with last year (51.5% men, 48.5% women). Of the 12 763 students applying for a Canada Scholarship, 34% planned to enter engineering. This was followed by biological sciences at 26% and general sciences at 17%. This year the number of applicants from each province/territory increased. Students residing in Ontario made up 41% of all applicants.

Chart 2
Cohort Applicants by Discipline, 1991



Number of applicants: 12 763

Chart 3
Applicants by Province of Residence, 1991



Scholars

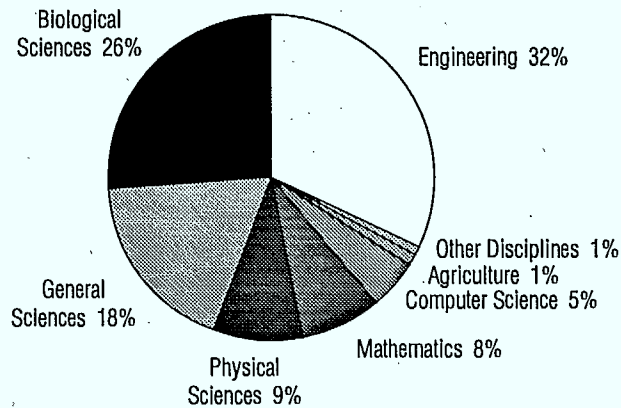
A total of 3 194 Scholarships were awarded for the 1991-92 CSP year. The reduction in Scholarship volume is attributable to the fact that fewer Scholars are forfeiting their Awards resulting in less funds being reallocated as additional first year awards. This year, 52% of Scholarships were awarded to women — similar to the previous year where they were awarded 52.2% of Scholarships (see Table 1).

The distribution of Scholars among the eight fields of study mirrors the previous year's results, with engineering (32%), biological sciences (26%) and general sciences (18%) being the three most popular disciplines.

The trend toward strong gender differences in discipline choice remains the same as in previous years with women maintaining majorities in agriculture (67%), biological sciences (63%), general sciences (63%) and mathematics (56%); and men dominating computer sciences (67%) and engineering (60%). However, there has been a notable change in the physical sciences. In 1988, men

constituted 62% of this group, as compared to 38% for women — a 24 percentage point difference. Over the past four years, a shift has occurred where men now represent 56% and women 44% — a 12 percentage point difference (see chart 11).

Chart 4
Cohort Scholars by Discipline, 1991



Number of scholars: 3 194

Chart 5
Agriculture — First Year Cohort

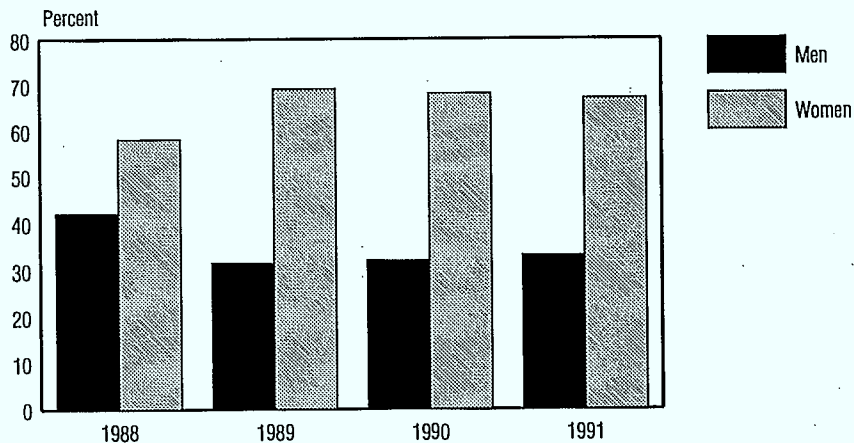


Chart 6
Biological Sciences — First Year Cohort

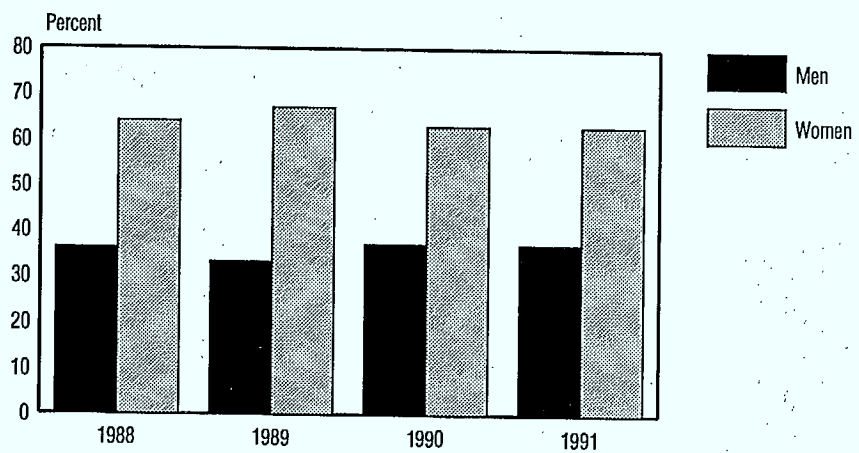


Chart 7
Computer Science — First Year Cohort

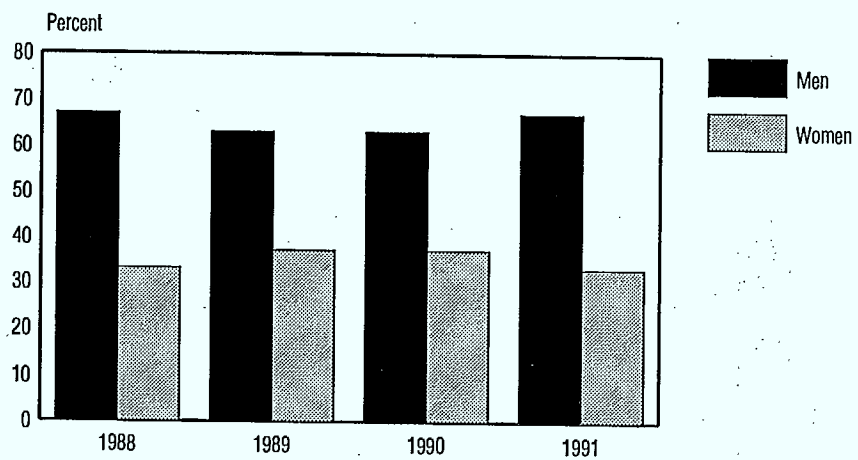


Chart 8
Engineering — First Year Cohort

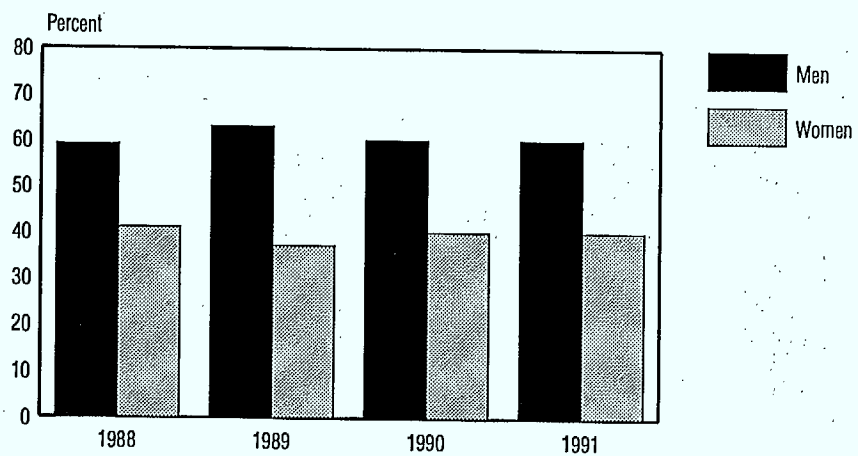


Chart 9
General Sciences — First Year Cohort

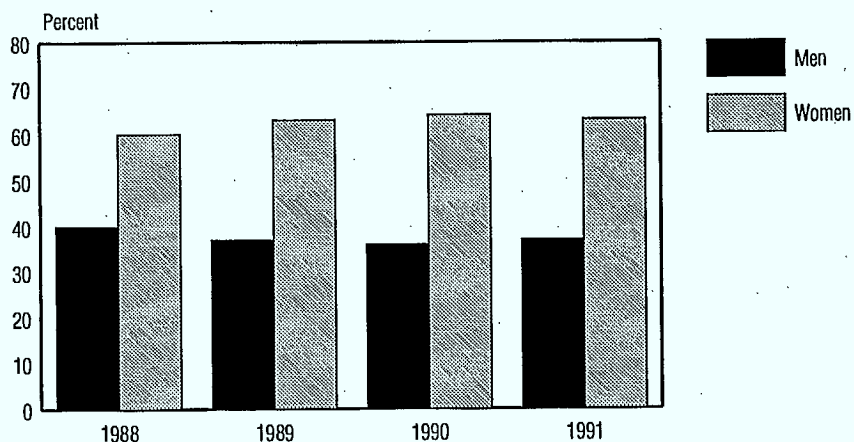


Chart 10
Mathematics — First Year Cohort

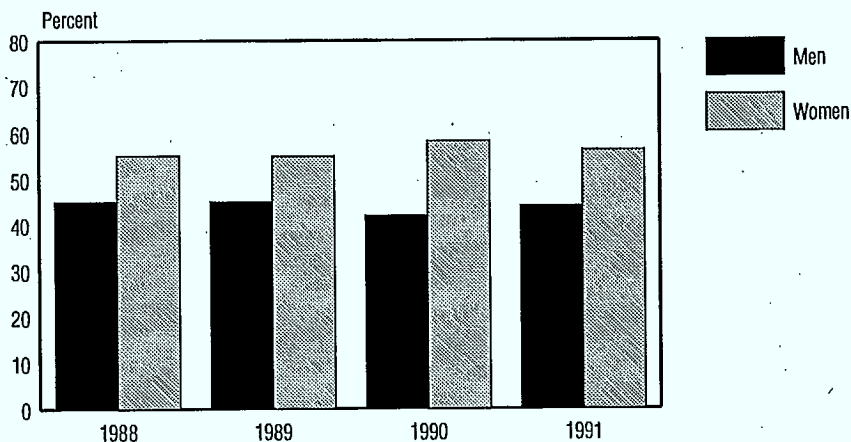


Chart 11
Physical Sciences — First Year Cohort

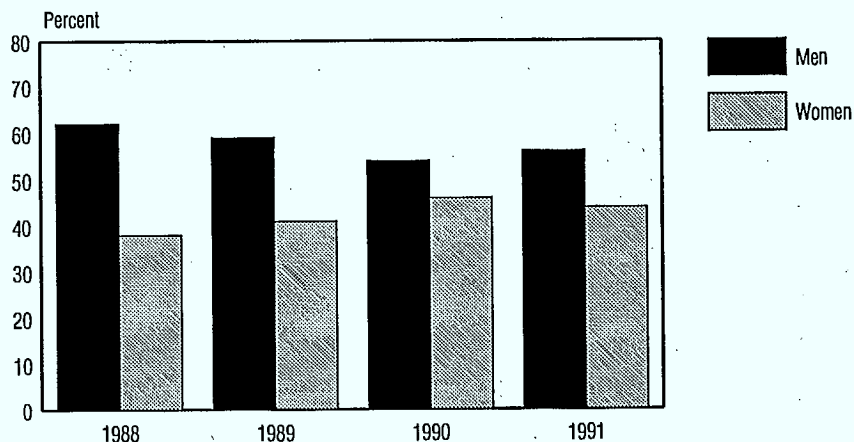
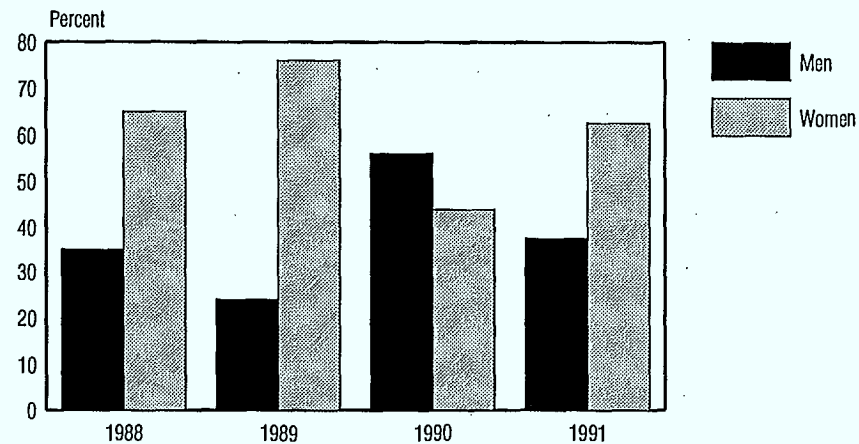


Chart 12
Other Disciplines — First Year Cohort



APPLICANT SUCCESS RATES IN 1991–92

With the number of applicants continuing to rise and the number of Scholarships awarded decreasing slightly, the overall success rate has been diminished from 34.3% last year to 25% in 1991–92. Women continue to have a higher overall success rate than men (26.7% v. 23.4%). Last year's success rates for women and men were 36.9% and 31.9%, respectively.

By Discipline

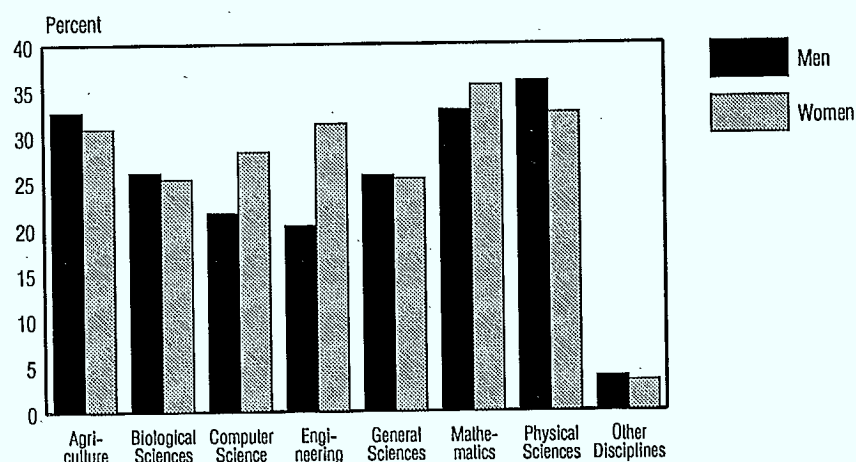
When comparing success rates by discipline, the highest overall rates can be found in mathematics and physical sciences. The lowest rate (24.9%) was in computer science.

There are some gender differences in success rates. The highest success rate in a particular discipline was that of men entering the physical sciences (35.9%). This is followed by women entering mathematics (35.5%). Excluding the category of "other disciplines," the lowest rate of success occurred for men applying for engineering — their success rate registered at 20.3%, as compared to a 31.3% rate for women.

Table 2 — Applicant Success Rate by Discipline (Percent), 1991–92

Discipline	Overall Success Rate	Men	Women
Agriculture	31.7	32.6	30.8
Biological Sciences	25.5	25.9	25.2
Computer Science	24.9	21.6	28.2
Engineering	25.8	20.3	31.3
General Sciences	25.4	25.6	25.2
Mathematics	34.1	32.8	35.5
Physical Sciences	34.2	35.9	32.5
Other Disciplines	3.4	3.7	3.2
Overall	25.0	23.4	26.7

Chart 13
Applicant Success Rates by Discipline, 1991



1991-92 SCHOLAR CAREER OBJECTIVES

Table 3 — Career Objectives of 1991-92 Scholars by Gender (Percent)

	Men	Women	Total
Agriculture	0.8	1.0	0.9
Other Objectives	1.2	1.2	1.2
Environment	0.8	2.3	1.5
Teaching	3.8	6.0	5.0
Computer Science	7.4	3.0	5.1
Mathematics	5.1	5.7	5.4
Undecided	4.2	6.7	5.5
Physical Sciences	10.0	5.4	7.5
Biological Sciences	10.2	17.0	13.7
Health Professions	16.9	27.2	22.2
Engineering	39.6	24.5	32.0

The career objectives of 1991 Scholars reflect those of their predecessors. As in previous years, first year female Scholars continue to be more interested than male Scholars in biological and health science career paths (44.2% v. 27.1%). Engineering careers attracted 32% of this year's Scholars. There is however a sizable difference in the number of men interested in engineering careers as compared to the number of women (see Table 3).

1991-92 SCHOLAR AGE

Data on the age distribution of first year Scholars has been presented in a different format than in previous years. In this report, age of Scholar is shown as of 31 December 1991; in previous years, age was measured mid-year. Scholars continue to be clustered around the age of 18 to 19 years, which is not unusual, considering the majority of Canada Scholars have just completed their final year of high school or cégep.

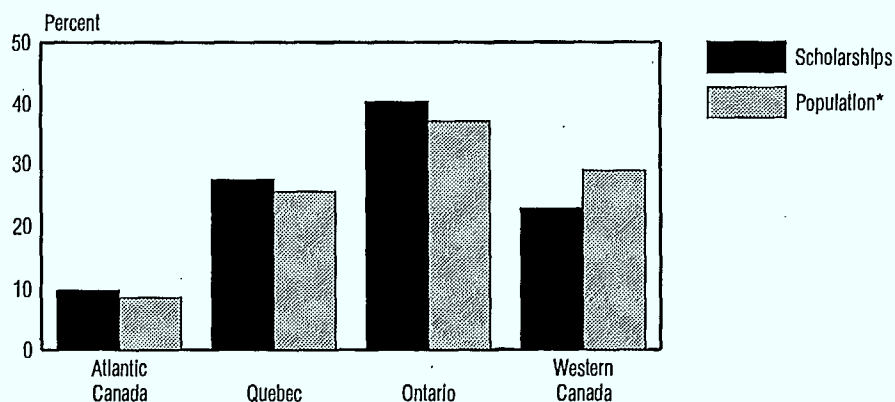
Table 4 — 1991-92 Scholars by Age (on 31 December 1991)

	Men	Women	Total
16 and under	4	2	6
17	69	55	124
18	594	656	1 250
19	638	728	1 366
20	134	138	272
21 and over	97	79	176

REGIONAL AND PROVINCIAL DISTRIBUTION OF 1991-92 SCHOLARSHIPS

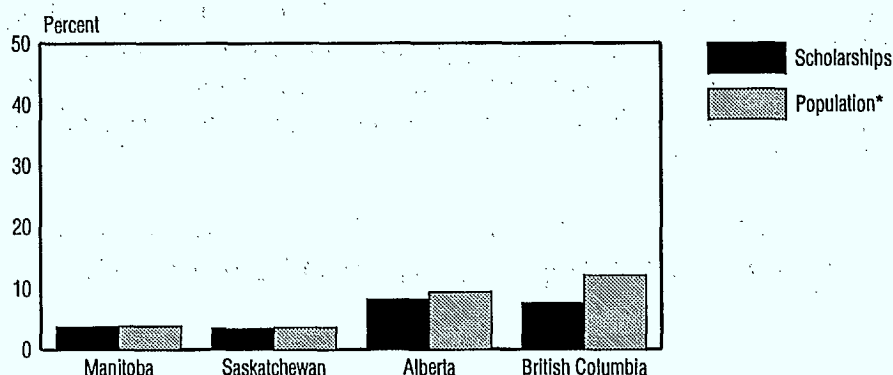
Chart 14

Regional Distribution of Scholarships and Population — Canada, 1991



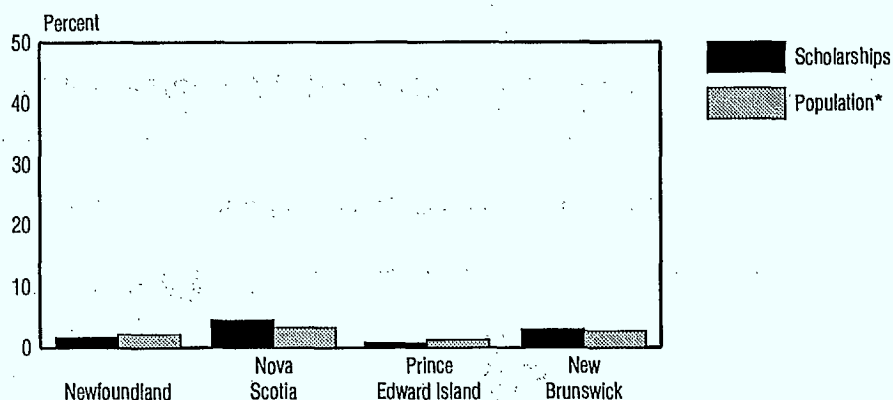
*Source: Statistics Canada, 1991 Census.

Chart 15
Provincial Distribution of Scholarships and Population — Western Canada, 1991



*Source: Statistics Canada, 1991 Census.

Chart 16
Provincial Distribution of Scholarships and Population — Atlantic Canada, 1991



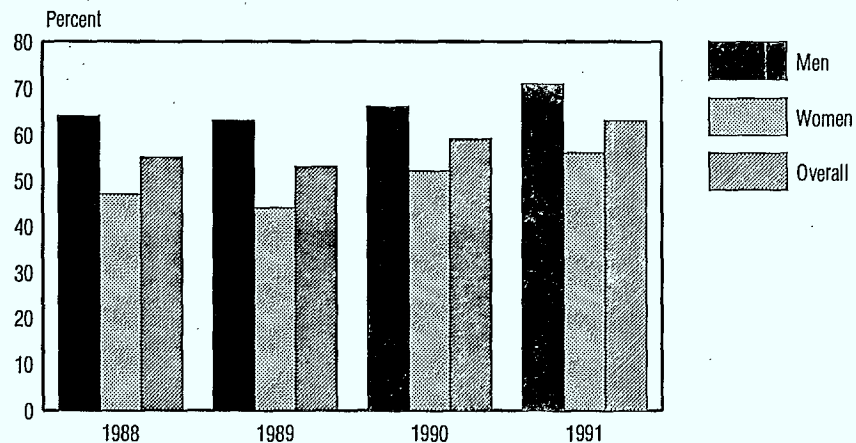
*Source: Statistics Canada, Census 1991.

Individual institutions are allocated Scholarships on a prorated basis in accordance with their proportion of all graduates in eligible science and engineering disciplines in the previous year. The percentage distribution of Scholarships by province and region resembles that of the Canadian population in 1991, with the exception of western Canada. This is due to a smaller share of graduates in natural science and engineering in western Canada.

The geographic distribution of Scholarships remained fairly consistent with that of last year. The only notable changes being small decreases in: Manitoba and British Columbia (0.6% and 0.5%, respectively) and an increase in Quebec (1.7%).

1991-92 SCHOLARS — RENEWALS AND NON-RENEWALS

Chart 17
First Year Renewal Rates by Cohort and Gender



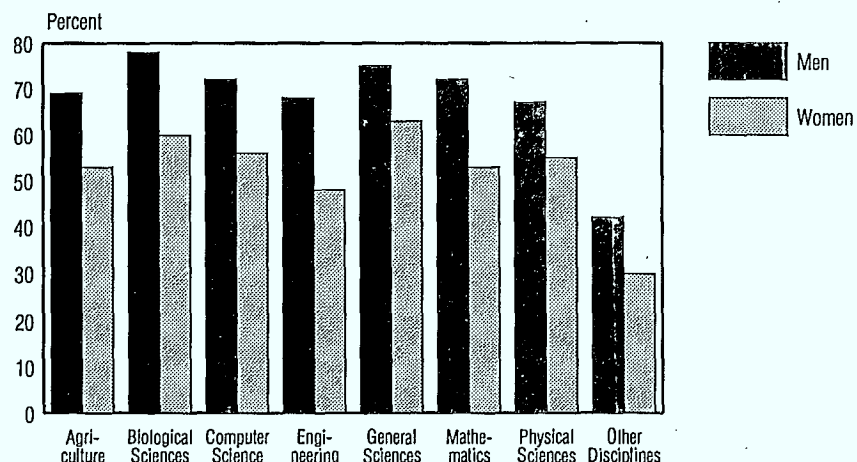
Renewal Rates into Their Second Year

Based on preliminary data, 63% of 1991 Canada Scholars have renewed their Awards for a second year of study. This is up from last year's rate of 59%. (Preliminary data can be expected to fall by 1 or 2%, as some Scholars transfer to ineligible disciplines upon registration in September.)

Men renewed their Scholarships at a rate of 71%; up from 66% the previous year. Women renewed their second year award at a rate of 56%; showing an increase of 4% over their 1990 peers.

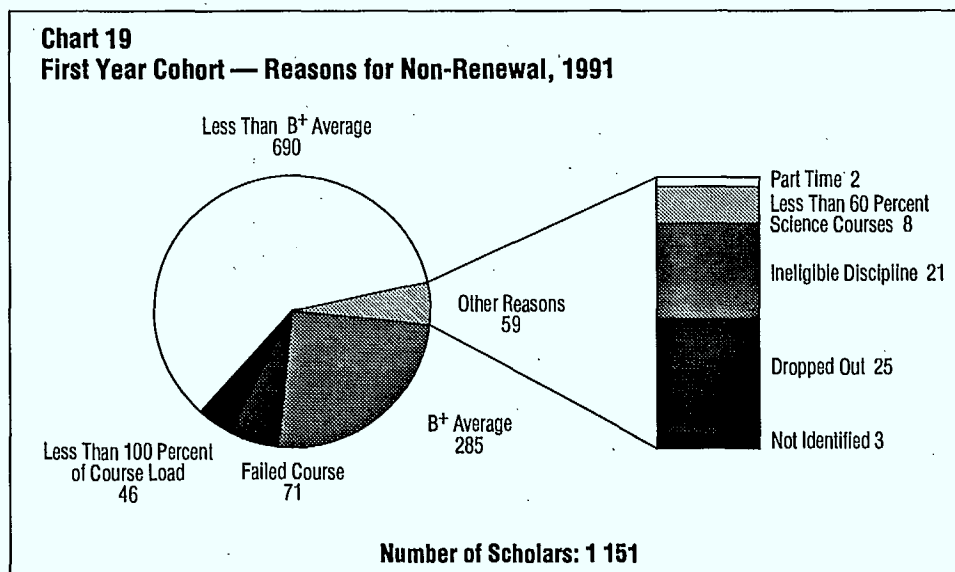
Renewal Rates by Discipline

Chart 18
First Year Cohort Renewal Rates by Gender and Discipline, 1991



Men in the biological sciences had the highest renewal rate by discipline at 78%, whereas the highest renewal rate for women Scholars was in general sciences at 63%. The lowest level of renewals for women was in engineering (48%) where it was 20% lower than the rate for men. The lowest rate for men was in the physical sciences (67%).

Non-renewal of Scholarships

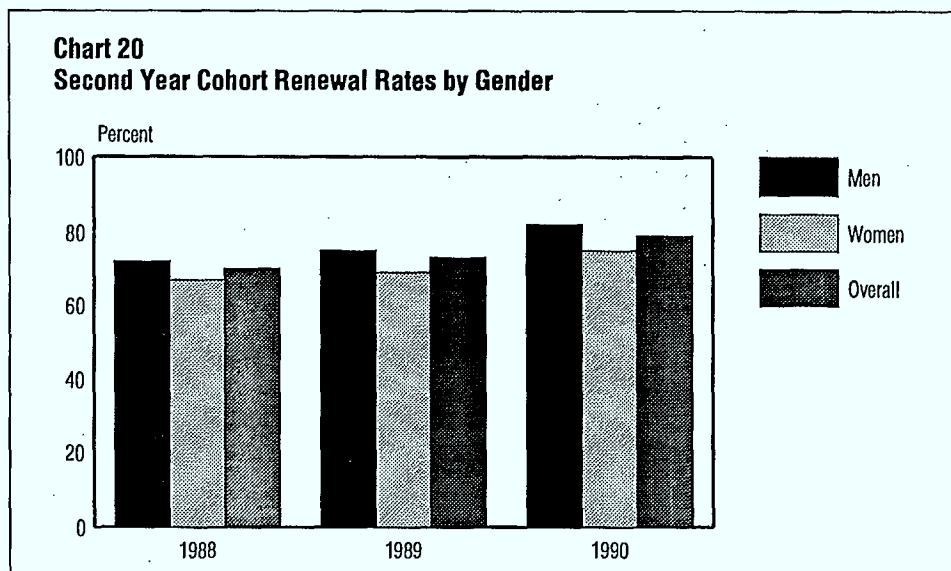


Preliminary data indicate that 1991–92 Scholars had a non-renewal rate of 37% — down from last year's cohort rate of 41%. Non-attainment of first class academic standing accounted for 85% of all 1991 forfeitures. This is up slightly from last year's proportion of 83.5%.

The share of Scholars forfeiting their Award due to transferring to an ineligible discipline remained the same as last year at 2%. Students failing a course has dropped from last year's cohort to 6% from 9%. The number of students switching to a part-time program has dropped from 36 to 2. This year, 25 students chose to drop their studies, as compared to 14 last year.

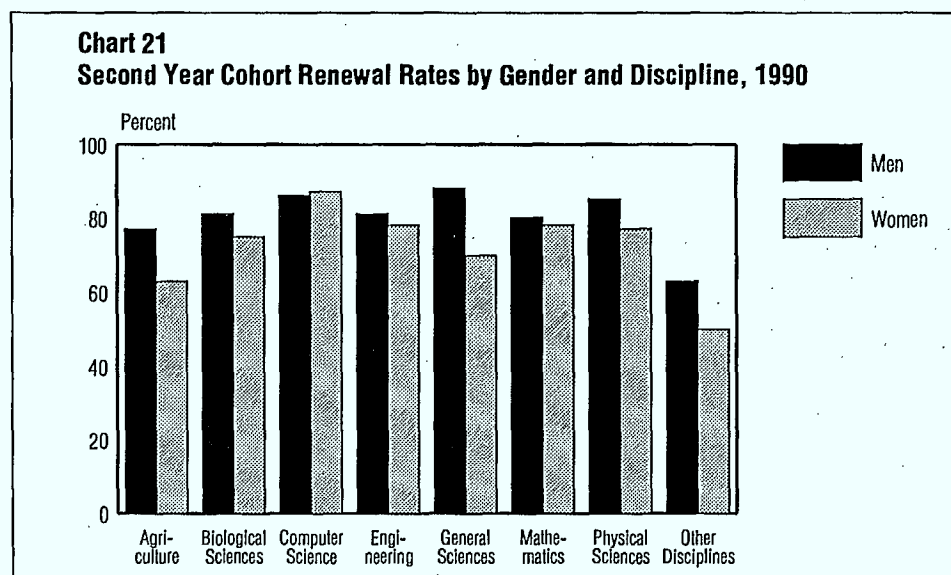
1990-91 SCHOLARS — RENEWALS AND NON-RENEWALS

Renewal Rates into Their Third Year



The overall renewal rate (based on preliminary data) of 1990 Scholars going into their third year of study was 79%. This was the highest rate of renewal going into third year studies — as compared with their 1989 and 1988 colleagues. Both male and female 1990 Scholars had higher renewal rates than their predecessors.

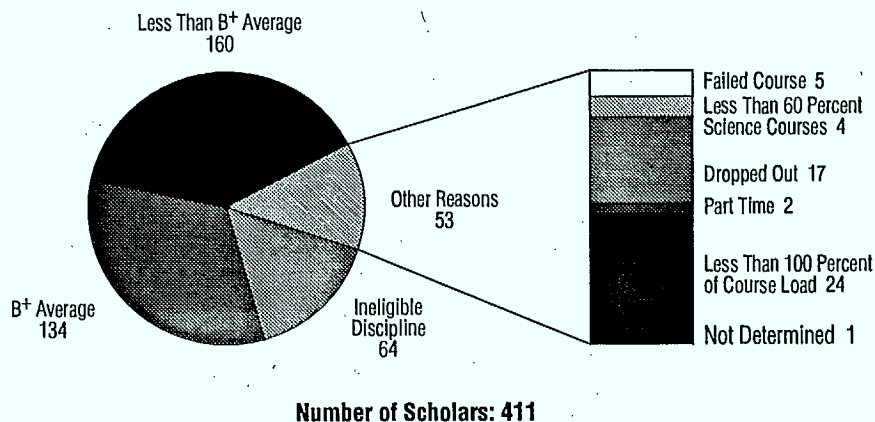
Renewal Rates by Discipline



By discipline, the highest renewal rate for women was in computer science, where they had an 87% renewal rate; men in general sciences had an 88% renewal rate. Excluding other disciplines, both men and women had their lowest level of renewal success in agriculture, at 77% and 63%, respectively.

Non-renewal of Scholarships

Chart 22
Second Year Cohort — Reasons for Non-Renewal, 1990

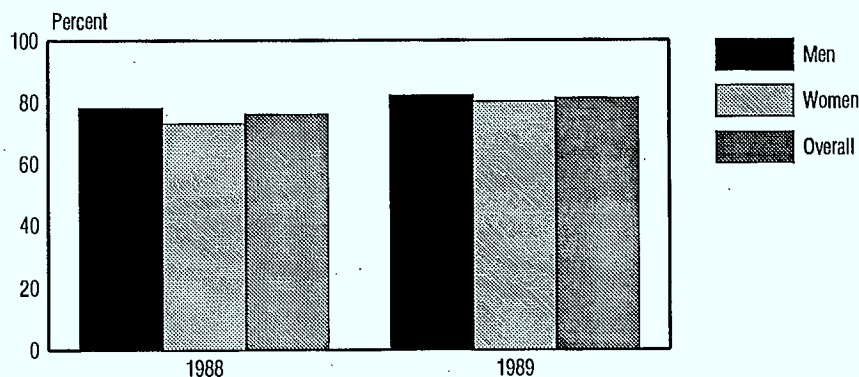


Of the 1990 scholars, 21% did not renew their Award going into their third year. This is down from their 1989 predecessors rate of 30%. Failure to attain first class academic standing accounted for 71.5% of all forfeitures, while switching to an ineligible discipline was the reason given for 15.5% of forfeitures.

1989-90 SCHOLARS — RENEWALS AND NON-RENEWALS

Renewal Rates into Fourth Year of Study

Chart 23
Third Year Cohort Renewal Rates by Gender*



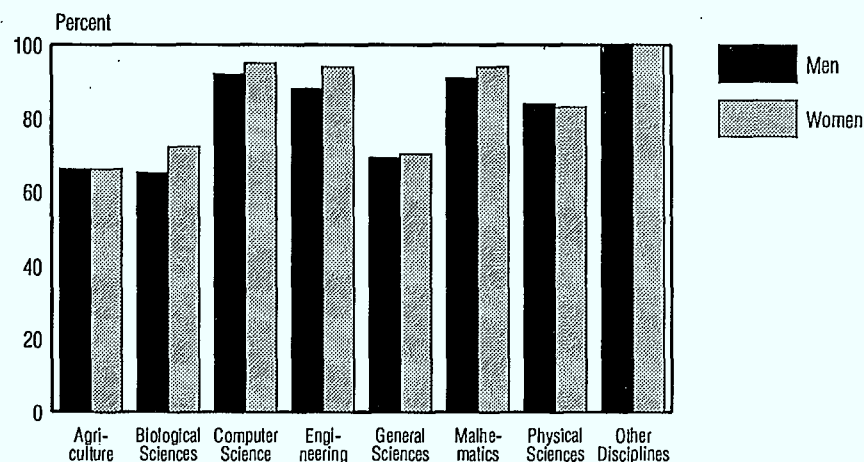
*Non-graduating scholars.

Those 1989 Scholars entering their fourth year had a preliminary renewal rate of 81%. Their 1988 peers had a 76% rate. (This reflects only non-graduating Scholars, since Scholars may graduate after three years of study.) The gap between men and women narrowed to 2% difference from a 5% spread with the previous cohort.

Renewal Rates by Discipline

Chart 24

Third Year Cohort Renewal Rates by Gender and Discipline, 1989

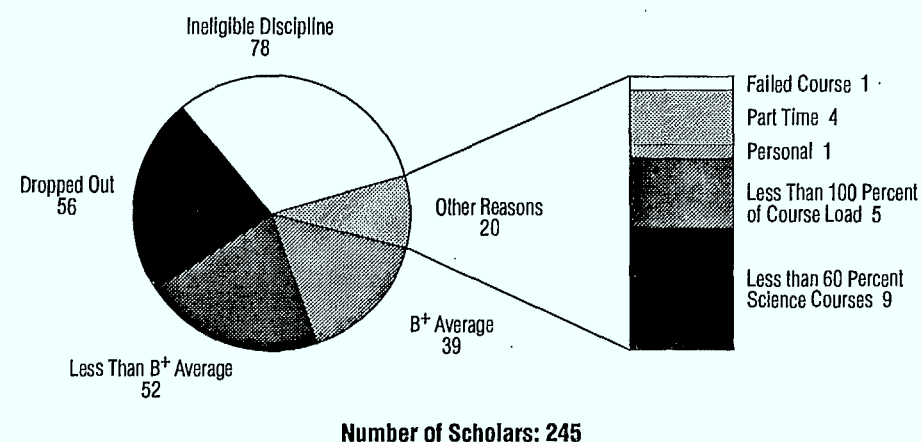


Of the 1989–90 Scholars, only 19% forfeited their Scholarship. This represents a 5% decrease in forfeitures when compared to the 1988–89 cohort. Excluding “other disciplines,” which had a 100% renewal rate — computer science had the highest rate of renewal for both men (92%) and women (95%). By gender, the lowest rates of renewal were for men, biological sciences (65%), and for women, agriculture (66% — identical to the rate of their male colleagues).

Non-renewal of Scholarships

Chart 25

Third Year Cohort — Reasons for Non-Renewal, 1989



Failure to attain first class academic standing accounted for 37% of the 1989 Scholars' non-renewals. Scholars who switched to an ineligible discipline made up 32% of the non-renewal population. The remainder of the group either dropped out of their program (23%) or left for a variety of other reasons (8%). A total of 236 Scholars from the 1988 cohort did not renew their Award going into their fourth year, as compared to 245 Scholars from the 1989 cohort.

SCHOLARS WHO HAVE COMPLETED THEIR TENURE SUCCESSFULLY

Preliminary information shows that a total of 729 Scholars have completed their tenure successfully with the CSP. Women make up 42% of tenured Scholars and men 58%.

Those Scholars who completed their Award between 1988 and 1991 (over three years) numbered 111 (58 women and 53 men).

There were 474 Scholars who began their program in 1988 and completed their Scholarship in 1992 (over four years). A breakdown by gender shows 181 women (38%) and 293 men (62%).

Scholars from the 1989 cohort who completed the Scholarship in 1992 (three year programs) total 143 (66 women and 77 men).

One person from the 1989 cohort, a female Scholar, completed the Scholarship in 1991.

INFORMATION

For further clarification of, or for elaboration on the data contained in this report, please contact:

Bernard Chabot
Canada Scholarships Program
ISTC
8th Floor West
235 Queen Street
OTTAWA, Ont.
K1A 0H5
Tel.: (613) 993-5452

ANNEX I: INNOVATORS IN THE SCHOOLS/ FRONTRUNNERS

Corporate Sponsors

Ballard Power Systems Inc.
Breakwater Books
Canón Canada Inc.
Corel Systems Corporation
Glaxo Canada Inc.
Hudson Bay Mining & Smelting Co. Limited
IBM Canada Ltd.
Norcen Energy Resources Ltd.
PanCanadian Petroleum Limited
Sharp Electronics of Canada Ltd.
The Noranda Foundation
TransCanada Pipelines Limited
Xerox Canada Ltd.

Innovator Partners

Applied Science Technologists and Technicians
of British Columbia
Association of Community Colleges of Canada
Association of Universities and Colleges
of Canada
Canadian Cable Television Association
Canadian Chamber of Commerce
Canadian Council of Professional Engineers
Canadian Council of Technicians
and Technologists
Canadian Federation of Biological Societies
Canadian Forestry Association
Canadian Information Processing Society
Canadian Mathematics Society
Industrial Biotechnology Association of Canada
Information Technology Association of Canada
Insurance Institute of Canada
Pharmaceutical Manufacturers Association
of Canada
Royal Society of Canada

Government Members

Alberta Technology, Research
and Telecommunications
British Columbia Ministry of Advanced
Education, Training and Technology
Industry, Science and Technology Canada
Manitoba Education and Training
Maritime Provinces Education Foundation
Ministère de l'Industrie, du Commerce et
de la Technologie du Québec
Newfoundland Department of Education
Northwest Territories Department of Education
Ontario Ministry of Industry, Trade
and Technology
Saskatchewan Economic Diversification
and Trade
Yukon Department of Education

ANNEX II: 1991-92 CANADA SCHOLARS BY PROVINCE OF INSTITUTION

Institution	Women	Men	Total
NEWFOUNDLAND			
Memorial University of Newfoundland	27	27	54
Total	27	27	54
PRINCE EDWARD ISLAND			
University of Prince Edward Island	7	6	13
Total	7	6	13
NOVA SCOTIA			
Acadia University	13	13	26
University College of Cape Breton	3	2	5
Dalhousie University	33	24	57
University of King's College	1	2	3
Mount Saint Vincent University	6	1	7
Nova Scotia Agricultural College	5	3	8
St. Francis Xavier University	12	7	19
Saint Mary's University	11	7	18
Université Sainte-Anne	1	1	2
Total	85	60	145
NEW BRUNSWICK			
Université de Moncton	5	8	13
Mount Allison University	13	3	16
University of New Brunswick	33	34	67
Total	51	45	96

Institution	Women	Men	Total
QUEBEC			
Bishop's University	3	2	5
Concordia University	31	34	65
Université Laval	80	79	159
McGill University	73	71	144
Université de Montréal	42	41	83
École Polytechnique de Montréal	49	51	100
University du Québec en Abitibi-Témiscamingue	3	0	3
Université du Québec à Chicoutimi	18	12	30
Université du Québec à Hull	3	3	6
Université du Québec à Montréal	46	23	69
Université du Québec à Rimouski	11	7	18
Université du Québec —			
École de Technologie Supérieure	9	37	46
Université du Québec à Trois-Rivières	19	14	33
Collège Militaire Royal de St-Jean	1	2	3
Université de Sherbrooke	57	53	110
Total	445	429	874
ONTARIO			
Brock University	15	9	24
Carleton University	29	30	59
University of Guelph	64	52	116
Lakehead University	17	17	34
Laurentian University of Sudbury	6	4	10
McMaster University	44	48	92
University of Ottawa	36	34	70
Queen's University	61	60	121
Redeemer Reformed Christian College	2	0	2
Royal Military College of Canada	4	6	10
Ryerson Polytechnical Institute	5	7	12
University of Toronto	116	116	232
Trent University	18	9	27
The University of Waterloo	116	116	232
The University of Western Ontario	63	63	126
Wilfrid Laurier University	5	4	9
University of Windsor	17	17	34
York University	37	36	73
Total	655	628	1 283
MANITOBA			
Brandon University	4	4	8
The University of Manitoba	45	44	89
The University of Winnipeg	15	6	21
Total	64	54	118
SASKATCHEWAN			
The University of Regina	10	11	21
University of Saskatchewan	50	38	88
Total	60	49	109

Institution	Women	Men	Total
ALBERTA			
University of Alberta	76	70	146
Augustana University College	3	2	5
University of Calgary	39	41	80
Concordia College	1	0	1
Grande Prairie Regional College	1	2	3
Grant MacEwan Community College	1	1	2
Keyano College	2	0	2
The King's College	1	1	2
Lakeland College	1	0	1
University of Lethbridge	4	3	7
Medicine Hat College	2	1	3
Red Deer College	3	3	6
Total	134	124	258
BRITISH COLUMBIA			
The University of British Columbia	61	61	122
British Columbia Institute of Technology	1	1	2
Camosun College	2	1	3
Capilano College	3	1	4
The University College of the Cariboo	3	1	4
Douglas College	1	0	1
East Kootenay Community College	0	1	1
University College of the Fraser Valley	1	1	2
Kwantlen Community College	0	1	1
Malaspina College	1	2	3
College of New Caledonia	1	2	3
North Island College	1	1	2
Northern Lights College	2	0	2
Northwest Community College	1	0	1
Okanagan College	2	3	5
Royal Roads Military College	4	5	9
Selkirk College	2	2	4
Simon Fraser University	20	12	32
Trinity Western University	3	1	4
Vancouver Community College	0	1	1
University of Victoria	20	17	37
Total	129	114	243
YUKON			
Yukon College	1	0	1
Total	1	0	1
CANADA	1 658	1 536	3 194

DATE DUE - DATE DE RETOUR

[illegible]

INDUSTRY CANADA/INDUSTRIE CANADA



138818

