



Catalogue no. 81-595-MIE — No. 006
ISSN: 1704-8885
ISBN: 0-662-34495-2

Research Paper

Education, skills and learning – Research papers

Who goes to post-secondary education and when: pathways chosen by 20 year-olds

by Joanna Tomkowicz and Tracey Bushnik

Culture, Tourism and the Centre for Education Statistics Division
2001 Main Building, Ottawa, K1A 0T6
Telephone: 1 800 307-3382 Fax: 1 613 951-9040



This paper represents the views of the authors and does not necessarily reflect the opinions of Statistics Canada.



Statistics
Canada

Statistique
Canada

Canada

Education, skills and learning

Research papers

Who goes to post-secondary education and when: pathways chosen by 20 year-olds

Joanna Tomkowicz and Tracey Bushnik

Statistics Canada

Published by authority of the Minister responsible for Statistics Canada

© Minister of Industry, 2003

All rights reserved. No part of this publication may be reproduced, stored in a retrieval system or transmitted in any form or by any means, electronic, mechanical, photocopying, recording or otherwise without prior written permission from Licence Services, Marketing Division, Statistics Canada, Ottawa, Ontario, Canada K1A 0T6.

July 2003

Catalogue no. 81-595-MIE2003006

Frequency: Irregular

ISSN 1704-8885

ISBN 0-662-34495-2

Ottawa

La version française de cette publication est disponible sur demande (n° 81-595-MIF2003006 au catalogue).

Statistics Canada

How to obtain more information

Specific inquiries about this product and related statistics or services should be directed to: Client Services, Culture, Tourism and the Centre for Education Statistics, Statistics Canada, Ottawa, Ontario, K1A 0T6 (telephone: (613) 951-7608; toll free at 1 800 307-3382; by fax at (613) 951-9040; or e-mail: educationstats@statcan.ca).

For information on the wide range of data available from Statistics Canada, you can contact us by calling one of our toll-free numbers. You can also contact us by e-mail or by visiting our Web site.

National inquiries line

1 800 263-1136

National telecommunications device for the hearing impaired

1 800 363-7629

E-mail inquiries

infostats@statcan.ca

Web site

www.statcan.ca

Ordering information

This product, Catalogue No. 81-595-MIE2003006, is available on the Internet for free. Users can obtain single issues at: <http://www.statcan.ca/cgi-bin/downpub/studiesfree.cgi>.

Standards of service to the public

Statistics Canada is committed to serving its clients in a prompt, reliable and courteous manner and in the official language of their choice. To this end, the Agency has developed standards of service which its employees observe in serving its clients. To obtain a copy of these service standards, please contact Statistics Canada toll free at 1 800 263-1136.

Acknowledgements

The authors wish to thank all those involved in the development and production of the Youth in Transition Survey at Statistics Canada and Human Resources Development Canada.

The assistance of many people was invaluable to the production of this research paper. Our thanks go to Lynn Barr-Telford and the analytical team in the Analysis and Dissemination Section in the Centre for Education Statistics, Ruth Martin and the analytical team in Special Surveys Division, and Yves Lafortune and Owen Philips in Social Survey Methods Division. We would also like to acknowledge Greg Parsons in the Centre for Education Statistics for his assistance with the literature review. A special thank you is extended to Danielle Baum for her indispensable help in preparing the manuscript for publication.

Note of appreciation

Canada owes the success of its statistical system to a long-standing co-operative effort involving Statistics Canada, the citizens of Canada, its businesses, governments and other institutions. Accurate and timely statistical information could not be produced without their continued co-operation and good will.

Table of Contents

1.	Executive summary	5
2.	Introduction	6
3.	Purpose of the study	7
4.	Three pathways	9
	4a. A comparison of delayers and right-awayers	9
	4b. A comparison of no-goers and right-awayers	10
5.	The effect of selected factors on the odds of delaying or not enrolling in a post-secondary program	12
	5a. Province, level of social engagement in high school, and financing factors were related to delayed enrolment	12
	5b. Personal, family background, and school-related factors were related to non-enrolment in post-secondary education	13
6.	Discussion and conclusion	15
	Appendix A	17
	Definitions and Concepts	17
	I. Selection of study participants	17
	II. Variables included in the analysis	18
	Appendix B	22
	Tables	22
	Appendix C	28
	Analytical Methodology	28
	References	32
	Research Papers Cumulative Index	34

1. Executive summary

This study uses data from the Youth in Transition Survey (YITS) to identify three pathways taken by high school graduates by the age of 20 and to examine the factors related to the choice of one pathway versus another. The three pathways are: participation in post-secondary education right after high school, delayed post-secondary participation, and non-participation in post-secondary education. The young people who took these pathways are referred to as right-awayers, delayers and no-goers, respectively.

A comparison of right-awayers and delayers revealed that the two groups differed with respect to certain demographic, school-related and post-secondary financing factors. Among these factors were province of residence, identification and involvement in the social and academic aspects of school, overall grade average, participation in part-time work during high school, and scholarships received for funding post-secondary education. When the factors were included in an analysis to determine how each predicted that someone might be a delayer instead of a right-awayer, the study found that living in Newfoundland and Labrador, Manitoba or Alberta, not being socially involved in school, and not receiving a scholarship or grant predicted delayed post-secondary education enrolment.

The comparison of right-awayers and no-goers found that these two groups differed regarding demographic, family-related and school-related factors. Some of these factors included gender, having a child, province of residence, parents' highest level of education and their feelings about the importance of post-secondary education, overall grade average, and participation in part-time work during high school. These factors were then included in the analysis to evaluate how each predicted that someone might be a no-goer rather than a right-awayer. It was found that many of them, particularly having a child, having parents with lower levels of education, and having a low overall grade average, predicted non-enrolment in a post-secondary program.

This study of pathways represents a first look at the transition from high school. Subsequent analysis using additional cycles of data over different points in time will allow for a deeper understanding of this transition and its various outcomes.

2. Introduction

The benefits of investing in a post-secondary education have been well documented. In the age of increased globalization and international competition, both the public and private sectors are looking to maximize the potential skills and abilities of individuals. Moving directly to a post-secondary program from secondary school, completing it within the expected time frame, and moving into a career related to one's field of study is believed by some to result in the greatest social, economic, and personal returns from post-secondary education attendance (Hearn, 1992; Henchey, 1998). Many students adhere to this "traditional" post-secondary enrolment pattern. However, many students follow alternative pathways, two of which are delayed entry into a post-secondary program, and not pursuing a post-secondary education at all (Hearn, 1992; Carroll, 1989; Henchey, 1998; Looker, 2001).

Previous research has shown that high school graduates who delay their post-secondary education have certain characteristics that differentiate them from high school graduates who enroll in a post-secondary institution immediately after high school. For example, Hearn (1987, 1992) and Eagle and Schmitt (1990) found that high school graduates who delay their post-secondary education were more likely to be male, to come from lower socio-economic status families, to be enrolled in a non-academic high school program, and to have lower tested ability and lower school grades. Perceived lack of financial support (Government of Newfoundland and Labrador, 1998; Frost, 1980; Erickson, Kimmel, Murphy, & Newcomer, 1976) and indecision about career were also found to be factors that cause delay (Government of Newfoundland and Labrador, 1998).

Young adults who decide not to pursue a post-secondary education at all have been found to be different from those who enroll in a post-secondary program. Several studies have shown that males, rural youth, and Aboriginal youth were more likely to decide not to pursue a post-secondary education (Butlin, 1999; Clift et al., 1997; University of Alberta, 2001; Sarkar & Stallard, 1997). Low parental income, low parental education, and coming from a single parent family were also found to be relevant factors in not pursuing a post-secondary education (Butlin, 1999; Government of Newfoundland and Labrador, 1998; Lowe & Krahn, 2000; University of Alberta, 2001). And, non-academic high school stream and low academic performance have been identified as characteristics of individuals who were less likely to pursue post-secondary education (Andres & Krahn, 1999; Butlin, 1999; Looker, 1994; Perron, 1996).

WHAT IS YITS?

The Youth in Transition Survey (YITS) is a new Canadian longitudinal survey sponsored by Human Resources Development Canada and designed to examine the major transitions in young people's lives, particularly with respect to education, training and work. Survey results provide a deeper understanding of the nature and causes of challenges young people face as they manage these transitions. The survey will help support policy planning and decision making that addresses these problems.

YITS will enable analysis of key transitions in the lives of youth, such as the transition from high school to post-secondary education and from schooling to the labour market. The factors that determine high school completion are examined, as well as the effects of school experiences on educational and occupational outcomes, and the contribution of work experience programs, part-time jobs, and volunteer activities. To collect this information, current plans are to survey the same group of young people every two years, over a period of several years. The first survey cycle of YITS took place in early 2000 and the second cycle followed in 2002.

Two different age groups are participating in YITS, the 18- to 20-year-old cohort, and the 15-year-old cohort who also participated in the Programme for International Student Assessment (PISA). Results for the 18- to 20-year-old cohort can be found in *At a Crossroads: First results for the 18 to 20-year-old cohort of the Youth in Transition Survey* (81-591-XIE, free). Results for the 15-year-old cohort can be found in *Measuring up: the Performance of Canada's youth in reading, mathematics, and science – OECD PISA Study – First results for Canadians aged 15* (81-590-XIE, free). These reports are available through the Internet at www.statcan.ca.

3. Purpose of the study

The purpose of this study is to provide some insight into the demographic, family-related, school-related, and financing factors that may be associated with a young person's choice of an 'alternative' pathway versus 'traditional' pathway to post-secondary education. In other words, what might predict delaying post-secondary attendance versus going right after high school? And what might predict not continuing on to post-secondary at all? To answer these questions, three groups of high school graduates from the Youth in Transition Survey (YITS) data of 18 to 20-year-olds collected in 2000 were examined: 20 year-old 'right-awayers', 20 year-old 'delayers' and 20 year-old 'no-goers' (see box below).

WHAT IS A RIGHT-AWAYER, A DELAYER AND A NO-GOER?

A *right-awayer* is high school graduate who enrolled in a post-secondary program within 12 months of graduating from high school.

A *delayer* is a high school graduate who delayed his/her enrolment in a post-secondary program by more than 12 months after high school graduation.

A *no-goer* is a high school graduate who had been out of high school for more than 12 months and had not yet enrolled in a post-secondary program.

Only those respondents who were 20 years of age at the time of interview were included in these three groups. The age of 20 was selected because it was the one age at which all respondents, regardless of province, had the highest likelihood of being out of high school for at least 12 months, thus allowing for an equal opportunity to fall into any one of the three categories. For a more detailed explanation of the categorization process, please see part I of Appendix A.

Of the study's sample, 62% were right-awayers, 20% were delayers and 18% were no-goers.

Because the respondents included in this study were relatively young and as such could not have been out of high school for a long time, this research study was designed to provide a foundation for further research on the issue of delaying or not going to post-secondary rather than to fully explain the factors associated with these two events. As a longitudinal survey, the YITS will provide more information about these respondents in the next cycles that in turn will help to better explain the factors associated with longer delay of post-secondary education or non-enrolment in post-secondary by a much older age.

For the purpose of this study, a postsecondary program was defined as any formal educational program above high school that would take 3 or more months to complete and would end with the awarding of a diploma, certificate, or degree above the high school level. In the YITS such programs include those offered at: a university, a university college (that may grant a university degree), a community college or CEGEP, a publicly-funded technical institute or a trade/vocational school, a private business school, a private training institute, a Quebec secondary school or school board, or another school above high school.

4. Three pathways

Presented below are comparisons of the alternative pathway takers – ‘the delayers’ and ‘the no-goers’ – with the reference group, ‘the right-awayers’. Only significant differences are discussed. Each characteristic is defined in part II of Appendix A, and all comparisons can be found in Table B1 in Appendix B.

4a. A comparison of delayers and right-awayers

Several basic characteristics were considered to compare delayers and the right-awayers, but only a few significant differences were observed. Provincially, Newfoundland and Labrador had the highest proportion of delayers (31%). The smallest proportions of delayers, on the other hand, were in Nova Scotia (15%), New Brunswick (16%), and Quebec and Saskatchewan (17%). With respect to language, a significantly higher proportion of delayers as compared to right-awayers spoke English as their mother tongue (70% versus 57%).

Regarding high school experience, delayers were not as engaged in school as right-awayers, either academically or socially (see box). Also, delayers tended to have lower marks in high school. While only about 37% of delayers reported having a high school average over 80%, over half of right-awayers reported such an average. A smaller proportion of delayers reported having all friends planning to attend a post-secondary institution as compared to right-awayers (32% versus 41%).

The highest proportion of delayers was in Newfoundland and Labrador

Delayers were less academically and socially engaged in their last year in high school compared to right-awayers

WHAT IS ACADEMIC AND SOCIAL ENGAGEMENT?

Academic engagement refers to a student's identification with and behavioural involvement in the academic aspects of school including their dealings with teachers, curriculum and school governance.

Social engagement refers to a student's identification with and involvement in the social aspects of school life. Social aspects of school life include informal, out-of-classroom interests and activities associated with school such as students' relationships with peers and their extracurricular activities.

A higher proportion of delayers worked at a job for pay during their last year of high school, and also worked longer hours; approximately 20% of delayers reported working 20 to 30 hours a week, while only 12% of right-awayers did so. Also, fewer delayers did not work at all during high school.

Post-secondary financing factors appeared to differentiate the delayers from the right-awayers. A smaller proportion of delayers received scholarships, awards, or prizes (21% versus 33%) compared to right-awayers.

Fewer delayers received money from scholarships

4b. A comparison of no-goers and right-awayers

The patterns of differences between no-goers and right-awayers were in several instances comparable to those observed for delayers and right-awayers, however the magnitude and the significance of the differences varied.

More no-goers were male as compared to right-awayers

There were several individual characteristics that differentiated no-goers from right-awayers. A higher proportion of no-goers were male (58% versus 45%) compared to right-awayers. A much higher proportion of no-goers had learned English as their mother tongue (80% versus 57%). Fewer no-goers were from a visible minority group.

A higher proportion of no-goers had a dependent child as compared to right-awayers

The incidence of marriage and children appeared to be related to post-secondary attendance. Overall, twice the proportion of no-goers compared to right-awayers (12% versus 6%) was married. However, when genders were considered separately, this relationship held for females only as more than twice as many no-goer females were married as compared to female right-awayers. Three times the proportion of no-goers reported having children (6% versus 2%) as compared to right-awayers. When gender was looked at separately, over twice as many female no-goers stated that they had children and four times the proportion of male no-goers reported having dependants.

Although the majority of both right-awayers and no-goers lived in an urban area, a higher proportion of no-goers compared to right-awayers lived in a rural community (25% versus 17%). The provinces with the highest rate of no-goers (approximately 30%) were Prince Edward Island, Saskatchewan, Alberta and British Columbia, whereas Quebec had the lowest rate at 6%.

Parents' education was related to non-enrolment in post-secondary education

A much smaller proportion of no-goers had a parent with a university degree (14%) as compared to right-awayers (36%). With respect to family background, it was observed that a higher proportion of no-goers had three or more siblings (29%) as compared to right-awayers (18%). Also, a higher proportion of no-goers reported less favourable parental influences regarding furthering their education past high school. Where less than 50% of no-goers reported that their parents thought continuing education after high school was very important, about 80% of right-awayers reported the same.

No-goers were less involved in school and worked more hours for pay in their last year of high school compared to right-awayers

When considering high school experience, no-goers tended to be less academically and socially engaged in school. Nineteen percent of no-goers were not very academically engaged as compared to 8% of right-awayers, and 15% of no-goers were not very socially engaged as compared to 9% of right-awayers. No-goers had lower marks. Only about 21% of them reported having a grade average over 80% while about 54% of right-awayers reported such an average. Further, where 17% of no-goers reported that few or none of their friends planned on furthering their education after high school, 6% of right-awayers reported this. And, a lower proportion of no-goers attended a private high school.

It is possible that during the last year in high school no-goers may have been thinking more in terms of entering the labour force rather than continuing on to post-secondary. A higher proportion of them had taken a course in career planning and an even higher proportion had taken a course that allowed them to spend some time with an employer as compared to the right-awayers. Further, a higher proportion of no-goers compared to right-awayers had worked at a job for pay during their last year of high school, and twice the proportion worked more than 20 hours per week as compared to right-awayers.

Substance use was not frequent for either group during the last year of high school, but a higher proportion of no-goers than right-awayers used marijuana or hash more than once a week. Similarly, a higher proportion of no-goers drank alcoholic beverages more than once a week.

5. The effect of selected factors on the odds of delaying or not enrolling in a post-secondary program

To determine the degree to which the variables described in the previous section were effective in predicting delayed or non-enrolment in post-secondary education, a multivariate logistic regression was used. This allowed for the effect of each variable on the outcome to be considered while accounting for the presence of the other variables. Separate analyses were done to compare delayers to right-awayers and no-goers to right-awayers. The list of all variables included in these analyses appears in Table B2 in Appendix B. The results are presented in Tables B3 and B4 in the same appendix. Details about the methodology are presented in Appendix C.

PREDICTION IS NOT CAUSALITY

The purpose of this type of analysis is to identify the degree to which certain factors predict an outcome. Prediction, however, does not imply causality. There is an important distinction between the two which is illustrated by the following example:

Suppose that a researcher is interested in determining what predicts the advent of winter. Two variables are identified: “trees have lost their leaves” and “birds flying south”. The result of the analysis indicates that both variables are fairly good *predictors* of winter, that is, when they are observed it is very likely that winter is coming. However, clearly neither of these variables *causes* winter.

This example reinforces that one cannot say that prediction is the same as causality. Therefore, although many factors identified in this paper may be good predictors of either delaying or not attending post-secondary, the reader should not assume that they also *cause* these outcomes.

5a. Province, level of social engagement in high school, and financing factors were related to delayed enrolment

Newfoundland and Labrador, Manitoba and Alberta residents were the most likely to delay, whereas residents of Quebec were the least likely to do so

Among demographic characteristics, only province of residence appeared to be a significant predictor of delayed post-secondary enrolment. Respondents who lived in Newfoundland and Labrador, Manitoba, and Alberta were more likely to delay their post-secondary education as compared to Ontario residents¹. Specifically, the odds of delaying post-secondary education were 1.5 to 2 times higher for respondents who lived in these three provinces than for their peers in Ontario. On the other hand, the odds of delaying enrolment in a post-secondary institution for Quebec residents were approximately 1.6 times lower compared to respondents living in Ontario. One possible explanation is that there are several education systems in Canada and they differ by province. For example, the CEGEP system in Quebec facilitates a relatively easy transition from high school to a post-secondary institution thus fewer delays in post-secondary enrolment were expected in this province.

¹ In this study, Ontario was chosen as a reference group because it had the largest sample size.

WHAT DOES THE “ODDS OF DELAYING OR NOT GOING” MEAN?

The “odds of delaying or not going” refers to the interpretation of the odds ratios that are presented in Tables B3 and B4.

Odds ratios allow the user to interpret the *independent* effect of a variable on the outcome in a regression model. An odds ratio is generated for each category within a variable, with one category selected as the “reference category” so that each odds ratio within the variable is interpreted relative to the reference category.

Residents of the other Canadian provinces were similar to Ontarians in terms of the likelihood of post-secondary education delay.

None of the family-related factors were found to be significant predictors of delayed post-secondary enrolment. From among the variables that described the high school experience, only social engagement and grade average were found to be significantly predictive of delaying post-secondary education. The odds of delaying post-secondary enrolment for respondents who reported low social engagement in high school were almost twice as high compared to their peers with high levels of social engagement. A possible explanation may be that a lack of positive social high school experience might have negatively affected pursuing more education immediately after high school.

The odds of delaying post-secondary education were more than twice as high for young people whose high school grade average was 70-79% and more than 3 times as high for young people whose grade average was less than 70% compared to their peers with a grade average of 90% or more. It is not surprising that having lower marks in school was associated with a delay of post-secondary. It is likely that having low marks would have negatively affected one’s chance of getting into certain programs or institutions thus causing a delay in enrolment if one was rejected by a chosen program and had no other program in mind.

Certain sources of funding of post-secondary education were related to the timing of post-secondary enrolment. Respondents who did not receive scholarships or grants or bursaries were more likely to delay their post-secondary program enrolment compared to their peers who did receive such funding. Although receiving a scholarship is often dependent on one’s academic achievement during previous years of schooling, it is important to remember that self-reported grade average had already been accounted for in this analysis. Therefore, not receiving a scholarship or grant or bursary also *independently* increased the odds of delaying post-secondary education.

5b. Personal, family background, and school-related factors were related to non-enrolment in post-secondary education

Several demographic characteristics were found to be significant predictors of not enrolling in post-secondary education. Being male or having a dependent child increased the odds of non-enrolment in post-secondary education (such an association was not observed when the right-awayer and delayer groups were compared). Being a member of a visible minority group, on the other hand, decreased the odds of post-secondary school non-enrolment. Those living in British Columbia (compared

Low social engagement and low grade average in the last year in high school increased the odds of delaying

Young people who had not received scholarship or grants had increased odds of delaying their post-secondary education

Being male and having a child predicted non-enrolment in post-secondary

to their peers living in Ontario) were more likely to not attend a post-secondary program while those living in Quebec were more likely to be in post-secondary school as compared to their Ontario counterparts. The latter finding may be explained by the existence of the CEGEP system in Quebec, as discussed in the previous section.

The odds of not enrolling in post-secondary education were 3 times higher for young people whose parents were less educated

Of the family-related factors, parents' education and attitudes and the number of siblings were significant predictors of not going to post-secondary education. The odds of not going to post-secondary school were over 3 times greater for respondents whose parents had no post-secondary education as compared to respondents whose parents completed a university degree. In addition, the odds of not enrolling in post-secondary program were 1.7 times greater for a young person who had 3 or more siblings as compared to one those with sibling. The odds of not going to post-secondary were 3 times greater if one's parents thought furthering education after high school was not very important.

Young people who worked more than 20 hours per week during their last year in high school had greater odds of not enrolling in post-secondary program compared to those who worked fewer hours

Of the high school experience variables, several predicted post-secondary education non-enrolment. Young people who had a low grade average in high school or had few friends who planned on furthering their education were more likely not to be enrolled in post-secondary education. In addition, young people who worked 20 or more hours per week were more likely not to be in post-secondary program than those who worked 10 to 20 hours per week during their last year of high school.

6. Discussion and conclusion

As expected, certain financial factors appeared to be related to young people's decision to postpone their post-secondary enrolment. Receiving scholarships and grants seemed to be associated with the traditional pathway. This finding was in alignment with previously conducted studies. Also, as suggested by the literature, lower high school academic achievement was associated with delayed post-secondary education. Perhaps having lower marks delayed post-secondary entrance not only because of difficulty in being accepted into a program of one's choice, but because of a decreased chance of receiving a scholarship or a grant to fund post-secondary education.

Respondents living in Quebec were much less likely to delay their post-secondary enrolment. The Quebec post-secondary educational system is different from the educational systems of other provinces. First, CEGEP is very inexpensive and as such accessible to virtually all high school graduates. While in other provinces high school graduates need to rely on student loans, scholarships or grants, family support, or their own savings to pay post-secondary tuition, this is not the case in Quebec where students can enrol in CEGEP with a relatively small financial investment. Also, students who are university bound (and all those who want to keep their educational options open) need to graduate from CEGEP before pursuing more post-secondary education at a higher level. These two factors likely contribute to the fact the majority of Quebec high school graduates enrol in CEGEP immediately after graduation instead of delaying their entrance.

Other demographic factors (gender, having dependents) and family-related factors (parental education and influence) were not found to be associated with delayed post-secondary education, which does not support previous research. One possible explanation for such results may be the fact that respondents who were considered to be delayers were only 20 years old at the time of interview and the majority of them had not delayed their post-secondary enrolment by more than 1 year. In fact, 75% of delayers enrolled in post-secondary institution within 12 to 24 months after high school graduation and 23% of delayers enrolled in a post-secondary institution within 24-36 months after graduation. Less than 2% of delayers went to post-secondary education three years after high school graduation. Given the relatively short delay of post-secondary education, it is not surprising that the group of delayers was found not be very different from the group of right-awayers. The next cycle of YITS data will provide more information on "longer-term" delayers and factors associated with longer postponements of post-secondary education.

Agreement with previous research was also found when no-goers and right-awayers were compared. Being male, having dependents, having parents with lower levels of education, or having a low grade average in high school were significant predictors of not enrolling in post-secondary institution. Other demographic, family, and high school experience related factors were also associated with not going to

post-secondary education. Factors such as parental influence, number of siblings, peer influence, and number of hours worked for pay in high school proved to be predictors of not going to post-secondary education versus going right away. However, these factors have not been considered in similar Canadian studies before and thus require more research. As expected, fewer no-goers were found in Quebec. As discussed earlier, the Quebec CEGEP system facilitates pursuing post-secondary education more than in other provinces.

Family structure (coming from single parent versus two-parent family) and rural/urban status were not found to be significant predictors of not going to post-secondary education despite prior research findings to the contrary. Again, a possible reason for lack of better alignment with previous research could be the young age of respondents; that is, no-goers in this study were only 20 years-old at the time of interview. Because it is expected that some of the members of the no-goer group will become delayers in the future, the dynamics of the no-goer group will likely change over time. Therefore, it is entirely possible that as more time elapses, a different set of factors may be found to be associated with not enrolling in post-secondary education.

There are economic and academic implications of timely and effective transitions from high school to post-secondary education and work. For example, one possible advantage of earlier investment in post-secondary education is the longer time period for the benefits to accrue (Corman, 1983). Understanding the factors associated with the timing of post-secondary education is important because it helps explain what may influence young people's planning of their education beyond high school. This research provides valuable information on the selected characteristics of young high school graduates and the educational pathways chosen by the age of 20. However, it should be kept in mind that only selected factors that may affect delaying or not enrolling in post-secondary institution were considered in this paper. There are several other possible dynamics that may influence young people's behaviour. Future research could consider additional factors that might improve the explanation of the actions of delayers and no-goers. For example, controlling for such factors as unemployment rates, wages, or cost of post-secondary education attendance may shed more light on the educational pathways young people choose. Also, to better understand the pathways and their outcomes, data collected over several points in time would be beneficial; therefore, as they become available, subsequent cycles of YITS data could be used to further pursue this kind of analysis.

APPENDIX A

Definitions and Concepts

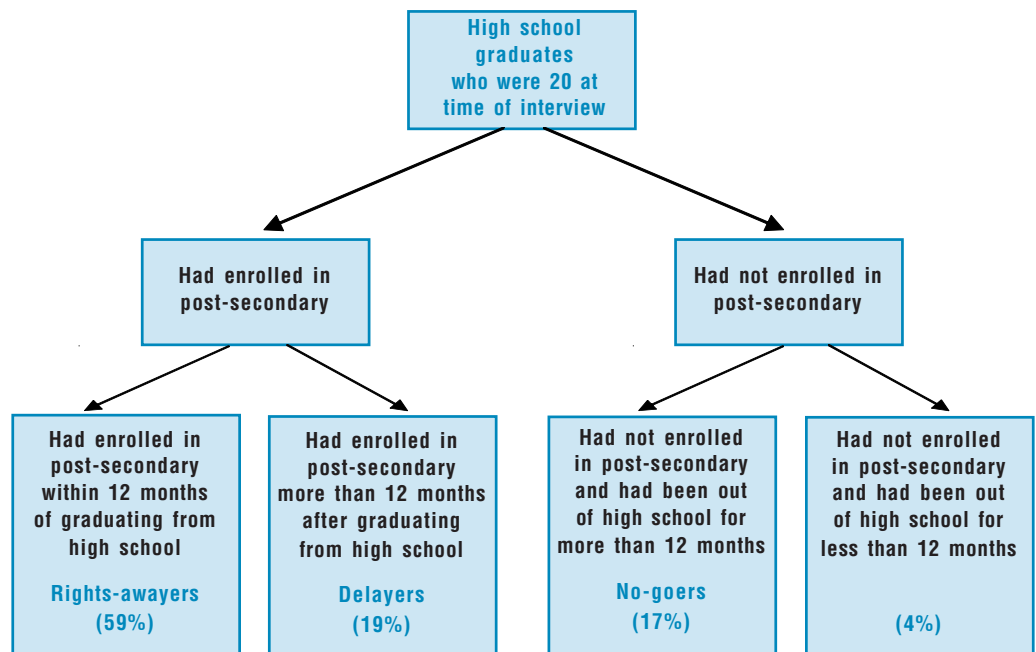
I. Selection of study participants

One main group of YITS respondents, high school graduates who were 20 years-old at the time of interview, was identified as appropriate for this study. Being a graduate was essential because of the relatively equal availability of various post-secondary and alternative pathways to graduates; such pathways may have been less available to those who remained in high school or were high school leavers.

Twenty year-olds were selected because of the differences in Canada's provincial education systems. In the majority of provinces, students graduated from the highest grade in high school by the age of 18; however this was not the case in Ontario or Quebec. In Ontario, students who chose to take Grade 13 often did not graduate until they were 19 years old. In contrast, students in Quebec graduated, on average, at the age of 17. At 20 years of age, almost all young people in all provinces had the opportunity to graduate from the highest grade level in high school and still have some time elapse since high school to allow them to choose a post-secondary pathway. Specifically, the majority of 20 year-olds had been out of high school for at least 12 months. Consequently, selecting graduates who were 20-years old at the time of interview minimized any bias towards either the respondents' age or their provincial educational system.

A minimum of 12 months since high school was used because previous research points to a "12 month cut-off" as a means to differentiate among students who take the traditional "right-away" pathway to post-secondary education, and those students who take alternative pathways (NCES, 1997; Hearn, 1992). Using the 12 month threshold, the graduates who were 20 years-old at time of interview were divided into four groups (see Figure 1).

Figure 1
Classification of high school graduates who were 20 years of age at the time of interview



Using previous research as a guide, the graduates who were 20 years-old at time of interview and had enrolled in post-secondary within 12 months of graduating from high school were categorized as “right-awayers”, and they represented 59% of the total graduates who were 20 years-old at the time of the YITS. The graduates who were 20 years-old at the time of interview and had enrolled in post-secondary more than 12 months after graduating were categorized as “delayers”, and they represented 19% of the total. The graduates who were 20 years-old at the time of interview and had not enrolled in post-secondary and had been out of high school for more than 12 months were categorized as “no-goers”, and they represented 17% of the total. All three of these groups were retained for the analysis. The fourth group, that is, the graduates who were 20 years-old at the time of interview, had not enrolled in post-secondary, and had been out of high school for less than 12 months were excluded from the analysis because not enough time had elapsed since high school for them to be categorized as either a delayer or a no-goer.

II. Variables included in the analysis

There are two types of variables included in this analysis: variables that are simply the direct response given to a specific question in the questionnaire; and variables that represent the combination of responses given to more than one question (known as *derived* variables). Both types are defined in the following section.

Gender: respondents were asked to state their gender.

Language first learned and still understood (mother tongue): Respondents were asked to indicate the language they first learned at home in childhood and still understood.

Visible minority status: This variable was derived using the respondents' answers when asked their cultural or racial background. The concept of visible minority applies to persons who are identified according to the Employment Equity Act as being non-Caucasian in race or non-white in colour. Under the Act, Aboriginal persons are not considered to be members of visible minority groups.

Siblings (total): This variable was derived by combining the answers to the questions regarding the number of older, same age and younger siblings of the respondent.

Province of residence: Respondents were asked the province of residence for their household.

Community type (urban/rural): This variables was derived using the household address information matched to 1996 Census geography. This variable should be interpreted with caution as the personal address given by respondents may not reflect where the respondent lived throughout the year. Also, because the urban/rural status was based on the Metropolitan Zone coding, the rural status may not necessarily reflect living in an actual rural area. An urban area was defined as census metropolitan or census agglomeration area, or No Census Tract. A rural area was defined as an area with a strong, moderate, weak, or No Metropolitan Influence Zone. Given such classification of urban/rural status it is entirely possible that some respondents who were classified as having a rural status but lived in a strong Metropolitan Influence Zone were more similar to the respondents who were classified as having urban status than to those who lived in a rural area.

Marital status: Respondents were asked if they were married, living common-law or living with a boyfriend or girlfriend.

Dependent children: Respondents were asked if they had any dependent children.

Family status: This variable was derived using responses regarding which parents and/or guardians lived in the family home with the respondent during most of high school.

Parents' highest level of education: This variable is based on the parent with the highest level of education.

Friends planning on furthering their education: Respondents were asked how many of their friends were planning on furthering their education or training beyond high school.

Education after high school: Respondents were asked the degree to which their parents thought getting more education after high school was important.

Type of school: Respondents were asked whether their last high school was a private school.

Class in career planning: Respondents were asked if they had taken any classes in career planning, how to search for job, write a résumé or prepare for an interview while in high school or junior high.

Class with work experience: Respondents were asked if they had taken any special courses to gain work experience or job skills where they actually spent time with an employer.

Academic engagement scale: This variable was derived using the respondents' levels of agreement with the following statements: I got along well with teachers; I did as little work as possible - I just wanted to get by; I paid attention to the teacher; I was interested in what I was learning in class; I completed my homework on time; I thought that many of the things we were learning in class were useless; and, school was often a waste of time. It also included the number of times per month the respondent reported skipping class without permission. IRT (Item Response Theory) was used to calculate a single continuous scale variable using the responses to all of the items. For this analysis, a categorical variable was then derived from this continuous variable. The category "very engaged" includes those responses that fell above plus one standard deviation from the mean; "not very engaged" includes those responses that fell below minus one standard deviation from the mean; and "engaged" includes the responses that fell within plus or minus one standard deviation from the mean.

Social engagement scale: This variable was derived using the respondents' levels of agreement with the following statements: I felt like an outsider at school or like I was left out of things at school; I was treated with as much respect as other students in my class; I had friends at school whom I could talk to about personal things; and, people at school were interested in what I had to say. IRT (Item Response Theory) was used to calculate a single continuous scale variable using the responses to all of the items. For this analysis, a categorical variable was then derived from this continuous variable. The category "very engaged" includes those responses that fell above plus one standard deviation from the mean; "not very engaged" includes those responses that fell below minus one standard deviation from the mean; and "engaged" includes the responses that fell within plus or minus one standard deviation from the mean.

Hours worked for pay during high school: This variable was derived using the respondents' reported weekly hours of work at a job for pay during their last year in high school.

Frequency of alcohol consumption: Respondents were asked how often per month they drank alcoholic beverages during their last year in high school.

Frequency of drug use: Respondents were asked how often per month they used marijuana or hash during their last year in high school.

Money for education that respondent does not have to pay back: Respondents were asked if one of the sources of funding of their post-secondary education was money from parents, partner, or other people that they do not have to pay back.

Money for education from jobs: Respondents were asked if one of the sources of funding of their post-secondary education was money received from jobs since leaving high school (i.e., part-time, co-op, summer).

Money for education from loans: Respondents were asked if one of the sources of funding of their post-secondary education was money received from loans including those from government, family, or directly from a bank.

Money for education from savings: Respondents were asked if one of the sources of funding of their post-secondary education was money coming from their personal savings (excluding money from jobs since leaving high school).

Money for education from scholarships: Respondents were asked if one of the sources of funding of their post-secondary education was money from scholarships, awards, and prizes.

Money for education from grants and bursaries: Respondents were asked if one of the sources of funding of their post-secondary education was money from grants and bursaries.

Appendix B

Tables

Table B1
Selected characteristics of Right-awayers, Delayers and No-goers

		Right-awayers	Delayers	No-goers
Estimated total number of 20 year-olds in Canada		203,000	67,000	60,000
Variable name		%	%	%
Demographics				
Gender				
	gender			
Male		45	51	58
Female		55	48	42
Language first learned and still understood (mother tongue)				
	frstlang			
English		57	70	80
French		30	19	10
Other		13	10	10
Visible minority status				
	vismin			
Visible minority		14	10 *	8 *
Not visible minority		86	90	92
Marital status				
	married			
Married		6	7	12
Male		4 *	4 ***	8 *
Female		8	11 *	18
Not married		94	93	88
Male		96	96	92
Female		92	89	82
Children				
	kids			
Had a child		2 *	2 *	6
Male		0 ***	2 ***	4 **
Female		4 *	3 **	9
No children		98	98	94
Male		100	98	96
Female		96	97	91
Community type				
	urbrur			
Rural		17	16	25
Urban		83	84	75

Table B1 (continued)
Selected characteristics of Right-aways, Delayers and No-goers

		Right- aways	Delayers	No-goers
	Variable name	%	%	%
Province of residence¹				
	prov			
Newfoundland and Labrador		49	31	19
Prince Edward Island		50	20 *	30
Nova Scotia		66	15	19 *
New Brunswick		58	16	26
Quebec		77	17	6 *
Ontario		62	21	17
Manitoba		51	25	23
Saskatchewan		53	17	30
Alberta		45	25	29
British Columbia		51	19	30
Family background				
Parents' highest level of education				
	paredu			
Bachelor degree or higher		36	34	14
Some post-secondary education		33	34	31
High school diploma or less		31	32	56
Number of siblings				
	siblings			
None		7	7 *	5 *
One		43	42	35
Two		32	28	31
Three or more		18	23	29
Parents' thoughts on importance of furthering education beyond high school				
	parimp			
Very important		80	76	46
Not very important		20	24	54
Family structure				
	family			
Two parents		80	83	79
Single parent		17	15	16
Other		3	2 *	5 *
High school experience				
Academic engagement				
	academic			
Very engaged		18	12	10
Engaged		73	75	71
Not very engaged		8	13	19
Social engagement				
	social			
Very engaged		22	15	9
Engaged		69	71	76
Not very engaged		9	15	15
Grade average				
	average			
90-100		9	4 *	2 *
80-89		45	33	19
70-79		38	48	46
69 or less		7	16	33
Number of friends planning on furthering their education after high school				
	friends			
All		41	32	15
Most		42	43	40
Some		10	16	27
Few or none		6	9	17
Type of last high school				
	sctype			
Private		11	9 *	5
Public		89	91	95

Table B1 (concluded)

Selected characteristics of Right-aways, Delayers and No-goers

		Right-aways	Delayers	No-goers
	Variable name	%	%	%
Took course in career planning	career			
Yes		63	64	72
No		37	36	28
Took course that provided work experience	wkexp			
Yes		26	27	44
No		74	73	56
Hours worked per week for pay	wkhours			
30 hours or more		4	6 *	11
20 to less than 30 hours		12	20	20
10 to less than 20 hours		25	24	18
1 to less than 10 hours		16	16	16
Zero hours		43	34	34
Frequency of use of marijuana or hash	drugs			
More than once a week		4	7 *	11
Once a month to once a week		9	12	9
Less than once a month		87	81	80
Frequency of alcohol use	alcohol			
More than once a week		9	13 *	14
Once a week		19	24	23
Once or twice a month		27	26	21
Less than once a month		14	12	9
Never		30	25	32
Funding of post-secondary education				
Received money that does not need to be paid back	nopaybk \$			
Yes		64	57	n/a
No		36	43	n/a
Received money from jobs since leaving high school	jobs \$			
Yes		73	69	n/a
No		27	31	n/a
Received money from loans	loans \$			
Yes		39	39	n/a
No		61	61	n/a
Used money from personal savings (money earned before leaving high school)	savings \$			
Yes		52	51	n/a
No		48	49	n/a
Received money from scholarships, awards or prizes	scholar \$			
Yes		33	21	n/a
No		67	79	n/a
Received money from grants or bursaries	grants \$			
Yes		14	11	n/a
No		86	89	n/a

Notes: As a measure of sampling error,

* indicates coefficient of variation (CV) between 16.6% and 25%;

** indicates CV greater than 25% and less or equal to 33.3%; and

*** indicates CV greater than 33.3%. Caution should be used when interpreting these results.

Estimates in bold indicate that the right-aways are significantly ($p \leq .05$) different from the other group(s)

¹ The estimates for province are unique in this table. They represent the proportion of 20 year-olds in each province that are either right-aways, delayers or no-goers. Therefore the estimates add up to 100% within each province as opposed to 100% across all provinces. The estimates in bold indicate significant differences between the provinces with the highest and lowest proportions of delayers and no-goers.

Table B2
List of variables included in logistic regression models

Variable name	Delayers versus Right-awayers		No-goers versus Right-awayers	
	Stage 1	Stage 2	Stage 1	Stage 2
Demographics				
Gender	✓	✓	✓	✓
Visible minority status	✓	✓	✓	✓
Children	✓		✓	✓
Province of residence	✓	✓	✓	✓
Community type	✓		✓	✓
Family background				
Number of siblings	✓		✓	✓
Family structure	✓		✓	
Parents' highest level of education	✓		✓	✓
Parents' thoughts on importance of furthering education beyond high school	✓		✓	✓
High school experience				
Number of friends planning on furthering their education after high school	✓		✓	✓
Grade average	✓	✓	✓	✓
Academic engagement	✓		✓	
Social engagement	✓	✓	✓	
Type of last high school	✓		✓	
Hours worked per week for pay	✓	✓	✓	✓
Frequency of use of marijuana or hash	✓	✓	✓	✓
Funding of post-secondary education				
Received money that does not need to be paid back	✓	✓	n/a	n/a
Received money from jobs since leaving high school	✓		n/a	n/a
Used money from personal savings (money earned before leaving high school)	✓		n/a	n/a
Received money from scholarships, awards or prizes	✓	✓	n/a	n/a
Received money from grants or bursaries	✓	✓	n/a	n/a

Table B3
Results of logistic regression, stage 2: Right-awayers vs. Delayers
(Right-awayers = 0, Delayers =1).

Variable name	Odds ratio	Confidence intervals	
		Lower 95% limit odds ratio	Upper 95% limit odds ratio
Demographics			
Province of residence			
Newfoundland and Labrador	2.04 *	1.29	3.23
Prince Edward Island	1.18	0.60	2.30
Nova Scotia	0.69	0.45	1.06
New Brunswick	0.80	0.51	1.24
Quebec	0.63 *	0.45	0.89
Ontario	1.00	1.00	1.00
Manitoba	1.56 *	1.04	2.32
Saskatchewan	1.04	0.71	1.55
Alberta	1.75 *	1.15	2.67
British Columbia	1.45	0.98	2.12
High school experience			
Grade average			
90-100	1.00	1.00	1.00
80-89	1.55	0.92	2.60
70-79	2.29 *	1.34	3.92
69 or less	3.37 *	1.82	6.24
Social engagement			
Very engaged	1.00	1.00	1.00
Engaged	1.19	0.88	1.61
Not very engaged	1.84 *	1.18	2.89
Funding of post-secondary education			
Received money from scholarships, awards or prizes			
Yes	1.00	1.00	1.00
No	1.58 *	1.23	2.05
Received money from grants or bursaries			
Yes	1.00	1.00	1.00
No	1.39 *	1.02	1.90

* Odds ratio significant at $p \leq 0.05$

Table B4

**Results of logistic regression, stage 2: Right-awayers vs. No-goers
(Right-awayers = 0, No-goers =1).**

Variable name	Odds ratio	Confidence intervals	
		Lower 95% limit odds ratio	Upper 95% limit odds ratio
Demographics			
Gender			
Male	1.57 *	1.20	2.07
Female	1.00	1.00	1.00
Visible minority status			
Visible minority	0.39 *	0.23	0.65
Not visible minority	1.00	1.00	1.00
Children			
Had a child	2.46 *	1.26	4.81
No children	1.00	1.00	1.00
Province of residence			
Newfoundland and Labrador	1.28	0.73	2.25
Prince Edward Island	1.20	0.61	2.39
Nova Scotia	0.63	0.37	1.07
New Brunswick	0.97	0.64	1.49
Quebec	0.23 *	0.14	0.39
Ontario	1.00	1.00	1.00
Manitoba	1.01	0.59	1.72
Saskatchewan	1.13	0.75	1.70
Alberta	1.49	0.98	2.26
British Columbia	2.30 *	1.48	3.57
Family background			
Number of siblings			
None	0.96	0.57	1.62
One	1.00	1.00	1.00
Two	1.08	0.80	1.46
Three or more	1.70 *	1.23	2.34
Parents' highest level of education			
Bachelor degree or higher	1.00	1.00	1.00
Some post-secondary education	1.72 *	1.18	2.51
High school diploma or less	2.98 *	2.13	4.17
Parents' thoughts on importance of furthering education beyond high school			
Very important	1.00	1.00	1.00
Not very important	3.28 *	2.51	4.27
High school experience			
Number of friends planning on furthering their education after high school			
All	1.00	1.00	1.00
Most	1.85 *	1.34	2.55
Some	3.58 *	2.32	5.54
Few or none	3.32 *	2.04	5.41
Grade average			
90-100	1.00	1.00	1.00
80-89	2.12 *	1.14	3.93
70-79	6.66 *	3.61	12.30
69 or less	17.04 *	8.67	33.50
Hours worked per week for pay			
30 hours or more	2.62 *	1.41	4.86
20 to less than 30 hours	1.74 *	1.15	2.62
10 to less than 20 hours	1.00	1.00	1.00
1 to less than 10 hours	1.68 *	1.08	2.62
Zero hours	1.24	0.87	1.76

* Odds ratio significant at $p \leq 0.05$

Appendix C

Analytical Methodology

Given the Youth in Transition Survey's complex design, the 1000 bootstrap weights included with the data were used to produce the study results. This ensured that the appropriate estimates of variance were calculated for each estimate.

Descriptive statistics were used to compare the groups of interest: post-secondary education delayers with right-awayers, and post-secondary education no-goers with right-awayers. The variables selected to describe these groups were based on the literature review as well as the authors' interest. Ninety-five percent (95%) confidence intervals were constructed around the proportion values for each category of each variable and used to assess whether the differences between the two groups of comparison were statistically significant.

The multivariate logistic regression (LR) analyses were conducted to assess how demographic, family-related, school-related, and financial factors affected the odds of delaying entry into a post-secondary institution or not going to PSE versus entering into it directly after high school. In the LR analyses the effect of each predictor on the outcome was assessed while controlling for the presence of all other predictors. These analyses were conducted in two stages.

At Stage 1, two stepwise forward logistic regressions were used to identify the strongest predictors of delaying post-secondary education or not going to post-secondary, both as compared to enrolling in post-secondary immediately after high school. A stepwise forward logistic regression is an appropriate method for predictive research, such as this study, where causality is not the primary goal, and the main objective is to identify a model with a set of predictors that provides as accurate as possible prediction of a studied phenomenon (Menard, 1995). Due to the complexity of the stepwise procedure the analyses at the first stage were conducted without using the bootstrap weights.

At Stage 2, two subsequent logistic regressions were run with variables that were identified at Stage 1 as significant predictors of either delaying or not going to post-secondary. At this stage the appropriate variables were entered into each model along with the 1000 bootstrap weights to produce the final results. A list of variables included in the LR models at each stage is presented in Table B2 in Appendix B. The final results are presented in Tables B3 and B4 in the same appendix.

For each predictor variable one category was chosen as a reference group against which all other categories were compared. The level of significance was set at $p \leq 0.05$. The missing data were deleted listwise. In the final stage, Stage 2, approximately 2% of cases were deleted in the LR run for delayers versus right-

awayers model and about 7% of cases were deleted in the no-goers versus right-awayers model.

It should be noted that not all variables used to descriptively compare delayers with right-awayers, and no-goers with right-awayers were included in the logistic regression analyses. Two criteria were used to select variables for the LR runs. First, in order to avoid the confounding of variables in each analysis, where the correlation between two independent variables was greater than $r=.30$, only one was included in the data run. Second, the decision whether a variable should be included in the logistic regression analysis was made based on the literature review and an evaluation of the contextual relevance of the variable to the outcome. The correlation matrices for both initially considered sets of variables are presented in Tables C1 and C2 in this appendix.

Evaluation of the logistic regression results

Delayers versus Right-awayers analysis

Of the 21 variables entered in Stage 1 (the stepwise logistic regression), 10 were retained as significant predictors affecting the odds of delaying post-secondary education versus enrolling in a post-secondary program within 12 months of graduating from high school. These variables were included in Stage 2 of the logistic regression run and 5 of them remained significant. The Stage 2 results including odds ratio and odds ratio 95% confidence intervals for the significant predictors are presented in Table B3 in Appendix B.

The 10 variables at Stage 2 explained approximately 8% of the variance in the dependent variable (Cox and Snell $R^2 = 0.077$). The model predicted about 75% of the cases correctly. However, while over 97% of right-awayers were classified correctly, only about 9% of delayers were predicted correctly. Because the model classification indicates how well individual cases fit into actual membership group and predicts membership by assigning each case to the group for which it has the highest probability, in this case it appears that the five significant predictors of delaying PSE were not strong (despite their significance). The low percent of variance explained by the predictor variables and fairly weak prediction suggest that there may be many other unexplained factors underlying delaying of post-secondary education.

No-goers versus Right-awayers analysis

Of the 15 variables entered in Stage 1 (the stepwise logistic regression), 12 were retained as significant predictors of not being enrolled in a post-secondary education program. Of those variables, 10 were identified as significant predictors at Stage 2. The Stage 2 results including odds ratio and odds ratio 95% confidence intervals for the significant predictors are presented in Table B4 in Appendix B.

The 12 variables at Stage 2 accounted for approximately 29% of the variance in the dependent variable (Cox and Snell $R^2 = .290$). The model's prediction was good. Overall, over 79% of respondents were categorized correctly as being a right-

awayer or a no-goer. Among them, the model correctly predicted about 49% no-goers and about 95% right-awayers. It was expected that the prediction of no-goers would not be as good as the prediction of right-awayers, as there may be several constructs underlying the did-not-go-to-post-secondary-education behaviour that were not measured by the YITS survey.

Table C1
Correlation matrix: Sub-sample of right-awayers and delayers

	Vismin	Frstlang	Married	Kids	Prov	Urbrur	Family	Siblings	Paredu	Parimp	Friends	Academic	Social	Average	Schtype	Career	Wkexp	Wkhours	Alcohol	Drugs	Nopaybk \$	Jobs \$	Loans \$	Savings \$	Scholar \$	Grant \$
Gender	0.01	0.01	-0.08	-0.09	0.03	0.00	0.04	0.05	0.08	-0.03	0.08	0.17	0.08	0.12	-0.02	-0.01	-0.04	0.07	0.18	0.08	0.01	0.04	-0.05	0.04	-0.06	-0.03
Vismin		0.46	-0.07	0.00	0.21	-0.16	0.03	0.06	0.05	0.11	0.04	0.05	0.08	0.04	0.03	-0.03	0.04	0.11	0.26	0.10	0.03	-0.13	0.01	-0.03	0.02	-0.01
Frstlang			0.09	0.04	0.86	0.15	0.15	0.15	0.05	0.08	0.16	0.09	0.21	0.08	0.14	0.22	0.29	0.19	0.20	0.10	0.04	0.12	0.01	0.11	0.16	0.19
Married				0.34	0.10	0.07	0.04	0.05	0.02	-0.05	0.05	0.00	0.02	0.06	-0.01	0.08	-0.02	0.06	0.06	0.02	-0.05	-0.03	0.08	-0.02	-0.01	-0.01
Kids					0.08	0.03	0.08	0.07	0.04	-0.06	0.09	0.03	0.03	0.05	-0.04	0.02	0.01	0.03	0.03	0.02	-0.09	-0.06	0.09	-0.06	-0.01	0.06
Prov						0.21	0.16	0.15	0.10	0.08	0.24	0.12	0.21	0.15	0.19	0.42	0.37	0.25	0.16	0.10	0.10	0.09	0.17	0.19	0.26	0.23
Urbrur							0.11	0.07	0.10	-0.10	0.05	0.02	0.06	0.01	-0.06	0.05	0.02	0.04	0.09	0.03	0.00	0.02	0.10	0.05	0.07	0.07
Family								0.07	0.11	0.03	0.04	0.03	0.04	0.08	0.07	0.01	0.01	0.07	0.05	0.09	0.11	0.05	0.14	0.04	0.04	0.01
Siblings									0.06	0.06	0.10	0.05	0.09	0.07	0.03	0.03	0.02	0.10	0.10	0.05	0.14	0.06	0.12	0.06	0.05	0.09
Paredu										0.17	0.11	0.04	0.03	0.18	0.10	0.09	0.11	0.12	0.09	0.07	0.20	0.06	0.18	0.07	0.12	0.06
Parimp											0.15	0.08	0.06	0.06	0.03	-0.07	0.00	0.03	0.02	0.02	0.10	-0.01	-0.06	-0.03	0.00	-0.01
Friends												0.14	0.20	0.11	0.14	0.05	0.05	0.11	0.16	0.09	0.09	0.08	0.06	0.06	0.07	0.05
Academic													0.26	0.11	0.05	0.02	0.02	0.09	0.28	0.26	0.04	0.05	0.03	0.04	0.10	0.03
Social														0.22	0.07	0.06	0.08	0.08	0.09	0.08	0.05	0.09	0.03	0.06	0.07	0.03
Average															0.04	0.10	0.04	0.14	0.17	0.13	0.10	0.10	0.06	0.06	0.36	0.10
Schtype																0.04	-0.11	0.10	0.04	0.06	0.04	-0.08	-0.10	-0.09	-0.05	-0.05
Career																	0.11	0.05	0.07	0.05	0.02	0.01	-0.02	-0.05	-0.02	-0.09
Wkexp																		0.15	0.08	0.06	-0.08	0.03	0.01	0.09	0.05	0.09
Wkhours																			0.22	0.08	0.14	0.18	0.03	0.11	0.06	0.07
Alcohol																				0.39	0.05	0.10	0.04	0.06	0.09	0.03
Drugs																					0.07	0.01	0.07	0.07	0.08	0.19
Nopaybk \$																						0.01	-0.37	0.04	0.04	-0.11
Jobs \$																							-0.05	0.29	0.06	0.00
Loans \$																								-0.04	0.05	0.20
Savings \$																									0.08	0.06
Scholar \$																										0.20

Table C2

Correlation matrix: Sub-population of right-awayers and no-goers

	Vismin	Frstlang	Married	Kids	Prov	Urbrur	Family	Siblings	Paredu	Parimp	Friends	Academic	Social	Average	Schtype	Career	Wkexp	Wkhours	Alcohol	Drugs	
Gender	0.00	0.01	-0.08	-0.09	0.05	0.02	0.03	0.07	0.06	-0.06	0.11	0.19	0.08	0.13	-0.03	0.02	-0.02	0.09	0.19	0.09	
Vismin		0.48	-0.08	0.02	0.20	-0.16	0.05	0.05	0.07	0.13	0.02	0.07	0.10	0.03	0.02	-0.02	0.06	0.11	0.24	0.08	
Frstlang			0.09	0.03	0.85	0.15	0.11	0.16	0.06	0.08	0.18	0.10	0.23	0.11	0.14	0.16	0.30	0.18	0.20	0.09	
Married				0.32	0.11	0.06	0.01	0.08	0.07	-0.09	0.08	0.01	0.01	0.05	-0.03	0.08	-0.01	0.08	0.06	0.02	
Kids					0.06	0.03	0.09	0.09	0.07	-0.07	0.09	0.04	0.01	0.06	0.00	0.03	0.03	0.04	0.03	0.01	
Prov						0.21	0.14	0.19	0.08	0.11	0.27	0.14	0.23	0.21	0.19	0.40	0.39	0.24	0.16	0.13	
Urbrur							0.10	0.09	0.10	-0.11	0.05	0.01	0.05	0.02	-0.07	0.04	0.02	0.05	0.06	0.05	
Family								0.10	0.09	0.02	0.05	0.05	0.06	0.08	0.06	0.03	0.01	0.06	0.07	0.11	
Siblings									0.06	0.07	0.08	0.05	0.08	0.06	0.03	0.04	0.05	0.11	0.07	0.05	
Paredu										0.22	0.18	0.03	0.09	0.23	0.11	0.11	0.13	0.13	0.09	0.07	
Parimp											0.21	0.12	0.10	0.13	0.06	-0.06	-0.06	0.06	0.05	0.06	
Friends												0.16	0.20	0.21	0.15	0.05	0.11	0.12	0.15	0.12	
Academic													0.24	0.30	0.05	0.02	0.05	0.12	0.29	0.28	
Social														0.15	0.10	0.05	0.09	0.11	0.09	0.12	
Average															0.07	0.11	0.05	0.15	0.19	0.16	
Schtype																0.03	-0.11	0.09	0.05	0.07	
Career																	0.12	0.02	0.08	0.05	
Wkexp																		0.15	0.08	0.02	
Wkhours																			0.22	0.10	
Alcohol																					0.41

References

- Andres, L., & Krahn, H. (1999). "Youth pathways in articulated postsecondary systems: Enrolment and completion patterns of urban young women and men." *Canadian Journal of Higher Education*, v 29, No 1, pp. 47-82.
- Butlin, G. (1999). "Determinants of post-secondary participation." *Education Quarterly Review*, v 5, No 3, pp. 9-35. Statistics Canada catalogue number 81-003-XPB.
- Carroll, C. D. (1989). *College persistence and degree attainment for 1980 high school graduates: Hazards for Transfers, Stopouts, and part-timers*. Survey Report CS 89-302 of the National Center for Education Statistics. Washington, DC: U.S. Department of Education, Office of Educational Research and Improvement and National Center for Education Statistics.
- Clift, R., Hawkey, C., & Vaughan, A. M. (1997, June). *A background analysis of the relationships between tuition fees, financial aid, and student choice*. Paper presented to the Canadian Society for the Study of Higher Education, Memorial University of Newfoundland.
- Corman, H. (1983). "Postsecondary Education Enrollment Responses by Recent High School Graduates and Older Adults." *The Journal of Human Resources*, v18, No. 2, pp. 247-267.
- Eagle, E. & Schmitt, C. (1990). *Patterns and consequences of delay in postsecondary education: 1972, 1980, and 1982 high school graduates*. Survey Report NCES 90-346 of the National Center for Education Statistics. Washington, DC: U.S. Department of Education, Office of Educational Research and Improvement and National Center for Education Statistics.
- Erickson, L., Kimmel, E. W., Murphy, M. T., & Newcomer, W. J. (1976). Back to school: The older-than-average student. *College and University*, 51, pp. 679-692.
- Foley, K. (2001). *Why stop after high school?: A descriptive analysis of the most important reasons that high school graduates do not continue to PSE*. Paper prepared for the Canada Millennium Scholarship Foundation.
- Frenette, M. (2002). *Too far to go on?: Distance to school and university participation*. Research paper 11F0019MIE - No. 191, Statistics Canada.
- Frost, M. E. (1980). *Toward understanding the needs of college students who delay entrance*. Paper presented at the 88th Annual Convention of the American Psychological Association, Montreal, QC, September 1-5, 1980.
- Government of Newfoundland and Labrador (1998). *On the road to success. The report of the follow-up of 1995 and 1996 high school graduates*.
- Hearn J. C. (1987). *An exploration of nontraditional postsecondary enrollment patterns*. Paper presented at the Annual Meeting of the Association for the Study of Higher Education, Baltimore, MD, November 21-24, 1987

- Hearn, J. C. (1992). "Emerging variations in postsecondary attendance patterns: An investigation of part-time, delayed, and nondegree enrollment." *Research in Higher Education*, v 33, No 6, pp.657-687.
- Henchey, N. (1998). *Learner pathways and transitions in postsecondary education: Background to the issues*. A discussion paper prepared for the Council of Ministers of Education, Canada, Postsecondary expectations project, Learner pathways and transitions.
- Looker, E.D. (2001). *Why don't they go on? Factors affecting the decision of Canadian youth not to pursue post-secondary education*. Paper prepared for Canada Millennium Scholarship Foundation.
- Looker, E. D. (1994). Active capital: The impact of parents on youths' educational performance and plans. Pages 164-187 in L. Erwin and D. MacLennan (Eds.) *Sociology of Education in Canada: critical perspectives on theory, research and practice*, Toronto, ON: Copp Clark Longman.
- Lowe, G. S., & Krahn, H. (2000). "Work aspirations and attitudes in an era of labour market restructuring: A comparison of two Canadian youth cohorts." *Work, Employment, and Society*, v 14, No 1, pp.1-22.
- Menard, S. (1995). *Applied logistic regression analysis*. Thousand Oaks, CA: Sage Publications.
- National Center for Education Statistics (1997). *Findings from the Conditions of Education 1997: Postsecondary persistence and attainment..* US Department of Education, Office of Educational Research and Improvement, NCES 97-984.
- Perron, J. (1996). Ethnicity and educational aspirations of high school students. Pages 127-134 in B. Galaway and J. Hudson (Eds.) *Youth in transition: Perspectives on research and policy*. Toronto, ON: Thompson Educational Publishing.
- Sarkar, G., & Stallard, C. (1997, October). *Do equity groups have a fair chance in our education institutions?* Paper presented at the CIRPA conference "Back to the future for higher education: The more things change...", Toronto, ON
- University of Alberta (2000). *Degrees of opportunity: Examining access to post-secondary education in Alberta*. Final report of the Senate Task Force on Access to Post-Secondary Education. Edmonton, AB: Author.

Culture, Tourism and the Centre for Education Statistics

Research Papers

Cumulative Index

Statistics Canada's **Division of Culture, Tourism and the Centre for Education Statistics** develops surveys, provides statistics and conducts research and analysis relevant to current issues in its three areas of responsibility.

The **Culture Statistics Program** creates and disseminates timely and comprehensive information on the culture sector in Canada. The program manages a dozen regular census surveys and databanks to produce data that support policy decision and program management requirements. Issues include the economic impact of culture, the consumption of culture goods and services, government, personal and corporate spending on culture, the culture labour market, and international trade of culture goods and services. Its analytical output appears in the flagship publication *Focus on Culture* (www.statcan.ca/english/IPS/Data/87-004-XIE.htm) and in *Arts, culture and recreation – Research papers*.

The **Tourism Statistics Program** provides information on domestic and international tourism. The program covers the Canadian Travel Survey and the International Travel Survey. Together, these surveys shed light on the volume and characteristics of trips and travellers to, from and within Canada. Its analytical output appears in the flagship publication *Travel-log* (www.statcan.ca/english/IPS/Data/87-003-XIE.htm) and in *Travel and tourism – Research papers*.

The **Centre for Education Statistics** develops and delivers a comprehensive program of pan-Canadian education statistics and analysis in order to support policy decisions and program management, and to ensure that accurate and relevant information concerning education is available to the Canadian public and to other educational stakeholders. The Centre conducts fifteen institutional and over ten household education surveys. Its analytical output appears in the flagship publication *Education quarterly review* (www.statcan.ca/english/IPS/Data/81-003-XIE.htm), in various monographs and in *Education, skills and learning – Research papers* (www.statcan.ca/english/IPS/Data/81-595-MIE.htm).

Following is a cumulative index of Culture, Tourism and Education research papers published to date

Arts, culture and recreation – Research papers

Forthcoming

Travel and tourism – Research papers

Forthcoming

Education, skills and learning – Research papers

- | | |
|-------------------|---|
| 81-595-MIE2002001 | Understanding the rural-urban reading gap |
| 81-595-MIE2003002 | Canadian education and training services abroad: the role of contracts funded by international financial institution. |
| 81-595-MIE2003003 | Finding their way: a profile of young Canadian graduates |
| 81-595-MIE2003004 | Learning, Earning and Leaving – The relationship between working while in high school and dropping out |
| 81-595-MIE2003005 | Linking provincial student assessments with national and international assessments |
| 81-595-MIE2003006 | Who goes to post-secondary education and when: pathways chosen by 20 year-olds |