# MEMORANDUM 

To: Senate
From: B. Krane, Chair Senate Committee on Undergraduate Studies


Subject: Literacy Admissions Criteria (SCUS Reference 06-38)

Date: 22 November 2006

Action undertaken by the Senate Committee on Undergraduate Studies at a meeting held November 7, 2006 gives rise to the following motion:

## MOTION

That Senate approve the proposed revisions to the literacy admissions criteria as follows:

B+ and above (75\%+) English12/English Lit 12: admitted
B-C Band below (<75\%) English 12/English Lit 12: admitted, register in Foundations
$(\angle 75 \%-60 \%$ ) of Academic Literacy course (FAL), or submit an acceptable LPI score (LPI $4 / 50 \%$ or higher) to obtain FAL equivalency
Below C ( $<60 \%$ ) English 12: not admitted.
These revisions would take effect for the Spring 2007 admissions.
Rationale: Based on preliminary data from the Fall 2006 admissions cycle, there is an immediate need to simplify the Literacy Admissions criteria to support successful recruitment. The proposal is intended to streamline the use of LPI test scores, and to adjust the threshold scores in English 12. SCUS will review this policy within 3 years.

# SIMON FRASER UNIVERSITY 

Nello Angerilli, Associate Vice-President Students and International Student Services


8888 UNIVERSITY DRIVE BURNABY, BRITISH COLUMBIA<br>CANADA V5A 156<br>Telephone: (604) 291-3583<br>Fax: (604) 291-4341

October 31, 2006

## To: SCUS Members

Please find attached a proposal to amend the current Literacy Admissions criteria. Based on preliminary data from the Fall 2006 admissions cycle, there is an immediate need to simplify the Literacy Admissions criteria to support successful recruitment. The proposal is intended to streamline the use of LPI test scores, and to adjust the threshold scores in English 12. A full rationale is provided in the attached.

Recommendation: That SCUS approve the revised literacy requirements effective January 2007 (Spring 2007).


Nello Angerilli, Associate Vice-President
Students \& International and Acting Registrar

## Admissions issues: Proposal to Amend Literacy Requirement (High School Applicants)

Based on preliminary data and strong feedback from the university community, high school teachers and counsellors, and Admissions staff in the Office of the Registrar, there is an immediate need to simplify the new Literacy admissions criteria to support competitive admissions of prospective high school students, and for ease of administration.

## Recommendation

Simplify and adjust the Literacy admissions criteria for high school applicants to clarify and better meet current recruitment challenges, and to parallel the Quantitative admissions criteria for high school applicants.

## Revised Literacy requirement (proposed):

B+ and above ( $75 \%+$ ) English 12/English Lit 12: admitted
B and below ( $<75 \%$ English 12/English Lit 12: admitted, register in Foundations of Academic Literacy course (FAL), or submit an acceptable LPI score (LPI 4/50\% or higher) to obtain FAL equivalency
Below C ( $<60 \%$ ) English 12: not admitted
The proposed revision retains SFU's strong commitment to demonstrated literacy at admission. The proposal will make the Literacy admission criteria for high school applicants parallel to the Quantitative requirement, and a better parallel to the criteria for applicants from colleges.

The proposed revision is in keeping with the use of the LPI test as designed (as a placement test, rather than a threshold for admissions), and as used by other BC postsecondary institutions. At both UBC and UVic, for example, applicants with passing grades in English 12 and satisfactory overall averages are admitted. Once admitted, students must then complete the LPI to place into an appropriate English course. While students complete English 12 for admission, there is no minimum threshold in this course for entry other than a passing grade. Students write the LPI to place into or remain registered in one of a number of university level English courses required for UBC and UVic degrees. These courses are integral credit English courses (large enrollment, "composition" courses offered across many sections). At UBC, once admitted, all undergraduate students take first-year English; students must write the LPI with a level 5 or higher on the essay section to remain registered in a credit-bearing English course. At UVic, students must achieve a level 4 or higher on the LPI to remain registered in their required English course.

Under the current Literacy admission requirement, SFU is not admitting students unless they have C ( $60 \%$ ) or better in English 12, students must write the LPI pre-admission, and a combination of high school grades and LPI scores determine eligibility for admission and entry to $W$ certified courses. This is a higher standard than UBC and

UVic in that SFU has a minimum grade requirement in English 12. This proposal is to amend use of the LPI to use post admission, to place into or out of FAL. It is important to note that FAL is not an English composition course, but an additive credit "university writing" course equivalent to UBC's non-credit, full fee remedial writing course. FAL credit does not count towards degree credit totals while UBC's English courses do.

The proposal includes modification of "threshold" admission grades to use the full range of values for the high school grade of B+(75\% to 85\%) in English 12 (or the more challenging English Literature 12). This is a reasonable adjustment given the correspondence between this grade level and the likelihood of achieving an LPI essay score of 4. Based on discussions with the agency administering the LPI and SFU Fall 2006 admissions data, high school students achieving B+ grades in the range of $75 \%$ $79 \%$ in English 12 are as likely to score a 4 on the LPI as are those with $80 \%-85 \%$ in English 12.

Furthermore, because of the difference in grading notation at the high school level, SFU must "translate" letter grades used by high schools into a percentage, and then to a grade point on SFU's scale. If a $B+$ high school grade ranges from $75 \%$ to $85 \%$ ( 3.33 SFU equivalent), it is an arbitrary practice to set the threshold at the median value in the range, rather than the lowest value in the range. In other words, picking the mid-range value of $80 \%$ means that SFU is effectively disqualifying or second-guessing some $B+$ high school grades as less valid than other B+ grades. SFU should not be disadvantaging or discouraging high school applicants as a result of an imperfect system of grade correspondences.

Setting a threshold above a B+, or not fully utilizing the full B+ range for English 12, was found in the 2006 admissions cycle to significantly and negatively impact recruitment efforts at a time of highly competitive recruitment across universities and colleges. SFU had (and will continue to have) a harder time than UBC attracting quality students with higher averages in all other academic subjects (eg. Science and Applied Science disciplines) who have $\mathrm{B}^{+}$grades in the $75-79 \%$ range in English 12. These students were less apt to attend SFU after application. Furthermore, a significant proportion of admits in the lower B+ range of $75-79 \%$ chose to delay writing the LPI, likely hoping that their English 12 grade would rise to $80 \%$ or above. While these students did subsequently write the LPI and achieve satisfactory scores, such delays significantly hampered their enrollment options and again, made SFU a less attractive option

Under the proposed revision, parallel with the Q admissions criteria, students receiving a grade below the B+ threshold in English 12 would be required to register in FAL unless they subsequently achieve an LPI score that grants "FAL equivalency".

Basing offers of admission on interim grades received in May from the Ministry of Education supports the early admission process at this time of competitive recruitment, provides more certainty for applicants and the university, and allows students better access to course selection in the early July registration period.

SFU's recruitment publications have been printed and were distributed to schools this Fall. The proposed revision to the Literacy criteria is still in keeping with the spirit of the printed material promoting competence in high school English and encouraging students to write the LPI as early as possible. Prospective students know that SFU places a premium on literacy and quantitative preparation, and that the university looks closely at both high school Math and English in order to make offers of admission.

The proposed revision to the Literacy admissions criteria will continue to allow sufficient lead-time every semester to ensure capacity in FAL 099 to accommodate students who require this course immediately upon admission, and those students who may still write the LPI following admission and later register in FAL. FAL or FAL equivalency will continue to act as a de facto prerequisite for W certified courses, the minimum standard for literacy previously approved by Senate is crucial and would be retained, and, taken together the elements of the proposed changes will continue to ensure that students are still well-prepared for SFU's commitment to writing across the curriculum.

## Background

## Literacy Requirement

Preliminary feedback from Admissions, academic departments, applicants, and high schools was that the new English 12 and LPI score admission requirements were too complex, and/or too stringent.

The new Literacy admission standard as approved by Senate in June 2004 was essentially a drill-down on English 12 grades. The English 12 grade in combination with an LPI score was to be used as a threshold to admit or decline, and if admitted, then to place a student into FAL or award FAL equivalency. Although the top-level English score required was reduced somewhat in June 2004 from the $86 \%$ originally proposed, the $80 \%$ cut-off was regarded as a high but appropriate standard. The following graphic shows the Literacy admissions criteria.


A further distinction was the exception made for international and out-of-province students, who were conditionally admitted pending submission of LPI scores or FAL registration upon arrival at SFU. Students applying to SFU from within BC were required to submit an LPI score as part of data for admission decision, but students from outside BC could write the LPI upon arrival or go straight to FAL registration. This added one more permutation of options, and contributed to inconsistent treatment of groups of applicants.

In addition to the complexity of the literacy admission criteria as approved, in the 2005/06 academic year, it quickly became apparent that in BC the competition for new students entering post-secondary education had increased significantly, for a number of reasons:

- Declining population of 17-24 year olds
- Increase in the number of post-secondary seats (gov't access targets)
- Increase in the number of degree granting institutions
- Rising tuition fees
- Improving economy resulting in higher employment

As the 2005/06 admissions cycle unfolded, it became clear that a lower-than-predicted number of high school applicants had written the LPI in the Fall 2005 period. This delayed the submission of test scores during the early admissions period in Spring 2006. A further difficulty arose in April 2006 when the LPI test administration office experienced high volume and technical difficulties sending test scores to institutions. This was particularly problematic for SFU in that the test scores were to be used for determining admissibility rather than placement.

Delays with receipt of LPI scores and lower-than-expected "conversion" rates of applicants in the Spring 2006 admission period led to the creation of a temporary process for accepting students on a "conditional" basis, somewhat parallel to the process for out-of-province students. The requirement to submit an LPI score early was suspended for Fall 2006 applicants on their SIMS checklists, which enabled these applicants to be conditionally admitted pending receipt of LPI scores once they became available. Emails were sent to applicants explaining that they were conditionally admitted but still were required to meet the Literacy requirement by various means prior to courses beginning in September.

Although well intentioned, great confusion was created for applicants and the university community due to the adoption of this amended process late in the admissions cycle. Although an expanded group of students received offers of admission, earlier applicants at these levels may have been rejected at the same standard, and it became clear that there were complications in determining who would retain offers of admission if final grades had dropped from earlier self-reported or interim grades. It also became clear later in the summer that, due to confusion, the process had been applied more broadly than originally discussed, advancing conditional offers to students falling into the lowest English 12 band of $60 \%-69 \%$. The end result for a small number of students was revocation of their admission offers after being led to believe they had gained admission. This was upsetting for the students, and frustrating to programs struggling to meet enrollment targets.

For students who retained admission, there was confusion about the use of final grades and the impact of these grades on course registration; due to staffing issues, the business process in Admissions was not adaptable to using the final grades received in late July to fully update student status regarding the Literacy criteria. This latter issue will continue to present problems until reorganization of Student Services is completed.

As a related issue, consideration was given to admitting fully (not conditionally) on interim grades only, rather than waiting for final grades. In the past, admission based on interim grades provided some remedy to the problem of Admissions' limited capability to update student records with final English (and Math) grades from Ministry TRAX data. However, this remedy did not address the question of whether some offers of admission should be revoked when there is a significant drop between interim and final grades. Nor did it address the fact that some students exempted from FAL or FAN should have been taking those courses based on final grades, while other students directed to take those courses should have been exempted if final grades were considered. It continues to be challenging for Admissions to update student records in a timely way due to current business processes and staffing limitations.

To summarize, pure application of the original Literacy criteria was found to be too stringent and hampered conversion of applicants, but conditional application of the criteria in the manner adopted was been found too complex and created new problems.

## Options Considered

1. Use the LPI as intended, as a placement instrument, and require students with interim grades in English 12 below a set level to register in FAL immediately (in their first semester). They will then be prepared early for higher-level W work, and will experience no delays in their remaining degree requirements. This solution will allow Admissions to admit students on the basis of interim English 12 grades, and those students whose final grades fall below the threshold could also be directed into FAL.

This solution will not resolve the bottleneck issue for programs such as Engineering Science, which has certified a required first-semester course as $W$. All $W$ courses have FAL or FAL equivalency as a prerequisite. Engineering Science should consider removing the W from ENSC 100/101; this was advised when the certification was first requested. TechOne has used this solution, removing the W from TECH 100, but retaining it on TECH 101 (second semester required course). Discussions will also begin soon as to the feasibility of newly admitted students taking FAL immediately prior to the beginning of the official "admit term".
2. Abandon the use of the LPI altogether and base admission solely on English 12 grades, e.g. students entering with a certain grade range in English 12 go directly into FAL. At present, modifications to SIMS are frozen pending an upgrade to Version 8.9, which would make removal of the LPI requirement from the admissions modules (and consequential changes to other modules) problematic. Further, the LPI has proven to be a useful instrument at other universities for placement into differentiated English or writing courses.
3. Stay the course for a pre-determined number of admissions cycles and let programs struggle with enrollments, in the hopes that FTEs will adjust as applicants and the internal community adjust to the new requirements. If predictions of ongoing recruitment
challenges for the coming years are accurate, this is not advisable and would result in significant cost (monetary and reputational) to the university.
4. Without changing the criteria as written, allow Admissions more discretion to admit around the margins (low final English or low LPI scores). The numbers of students entering SFU with low English and/or LPI scores would fluctuate year to year, resulting in more students admitted with weak backgrounds in more competitive recruitment years. More students admitted in this way would result in more students delayed in taking W courses in their first semesters, and potentially higher downstream attrition for students who cannot subsequently pass FAL at the required grade level. FAL capacity would have to be adjusted year-to-year on short notice, making enrollment planning difficult. Demands for academic supports would likely also fluctuate. Unless Admissions could significantly and quickly improve business processes and communications, this would not be a transparent or smooth process for applicants or for the university community. It would require more manual processing, and given the likelihood of high variability in exceptions made admitting students on a case-by-case basis, it would be difficult to track or assess the real impacts of the new requirements.

## Quantitative Requirements

Complications arising from the adoption of the Quantitative admissions criteria have not been apparent. Some early issues arose regarding overlaps between material covered in Math 100 and FAN 099, but these were quickly resolved.

Math 100 and FAN interaction

- FAN content addressed weaker background as defined by new requirements;
- Math 100 was originally designed for students with good grades in Math 11 but who need to ramp-up to calculus and programs that require calculus at the Math 12 level (ApSci, some Sci, Bus. Admin, Physical Geog.);
- Math 100 was certified as Q , and in some respects was equivalent to FAN , but students needed FAN to register in this $Q$ course. It would have been problematic to remove the Q from this course due to college transfer admissions and the large number of college courses that articulate to this course thereby providing a means for students to meet the Q admissions criteria;
- Math 100 was better suited as a prerequisite course than FAN for students with less than $70 \%$ in Math 12 (FAN required for above programs), and more than $70 \%$ in Math 11;
- Math 100 enrollments fell by about $50 \%$ with FAN prereq. in place.

Mathematics was given permission to waive FAN to register some students directly into Math 100 provided they had appropriate grades in Math 11. This was communicated to the Registrar's Office, advisors, and those departments directly impacted. Enrollments in Math 100 were subsequently reinstated close to expected levels, and students in Math 100 requiring FAN will be given the Q test as a final exam in Math 100 in order to meet FAN equivalency.

It is interesting to compare the short-term impacts of the Literacy admission criteria with the Quantitative criteria. Because there was no effective Q parallel to the LPI, a simpler $Q$ criteria was back-stopped by a home-grown placement test for FAN. This combination created less confusion in Admissions and departments regarding which students were admitted or not, and what courses students needed to take once admitted. With the Q admissions criteria there also seemed to be better predictability from interim high school grades to final grades, which for the Literacy criteria was complicated by the LPI requirement.

The following demonstrates the differences in the complexity of the decision matrices for Quantitative and Literacy.

## Decision matrix: High School Math

Above B-70\% Math: admitted
Below B-70\% Math: admitted, write Q test, go to FAN or Q course
Below C 60\% Math: not admitted

## Decision matrix: High School English

Above B+ 80\% English 12 : admitted
LPI $5 / 60 \%$ or above: admitted
B- to lower B+70\%-79\% English $12+$ LPI 4: admitted, no FAL required unless final grade dropped
(conditional admission arrangements changed this, admitting students without an LPI score. What happened for these students next depended on final grades and LPI scores. There was then reluctance in Admissions to revoke offers or direct students to take FAL immediately)
B- to lower B+70\%-79\% English $12+$ LPI 3: not admitted (conditional admission arrangements changed this also.)
B- to lower B+70\%-79\% English 12, outside of BC: conditionally admitted, write LPI upon arrival. (FAL requirement determined following receipt of LPI results.) C to C+60-69\% English $12+$ LPI 4 : admitted and required FAL.
Below C 60\% English 12: not admitted unless achieving an LPI of 5 or higher.
At this early point in the implementation of the new admissions criteria, it seems clear that the level of complexity for the Literacy admissions requirement for high school applicants far exceeded the complexity for the Quantitative admissions requirement.

# The Efficacy of the LPI in predicting success in First Year English at the University of British Columbia June 23, 2005 

## Introduction

For several years now, the LPI (Language Proficiency Index) has been administered at The University of British Columbia to measure writing proficiency in English. Students who want to register in first year English courses are required to present either a grade greater than $80 \%$ ) in English 12 or English Literature 12 or an LPI score of 5 or higher. With recent discussions about curriculum changes and the proposal to introduce Writing through the Curriculum, the Faculty of Arts commissioned this study to examine the LPI and it's efficacy as an indicator of success in first year English.

## Methodology

All first year New to UBC, Undergraduate Degree program students registered in 2004W were selected resulting in 4906 records.

We then extracted their English 12 and English Literature 12 grade and their LPI score if LPI was taken prior to December 31, 2004. For multiple LPI scores, the highest score was selected.

First year English grades were added for students who took English in term one.
Grades for other courses considered to have a strong writing component were also added. These courses included Anthropology 100 / 140, Political Science 100 / 101 and History 125. Grades are for these courses were from either term one or term two.

Of the 4906 students registered in 2004W, 609 did not have an English/Literature 12 grade; 2790 or $65 \%$ were exempt from the LPI; 637 students had an Engl/Lit 12 grade between $75 \%$ and $80 \% ; 702$ students had an Engl/Lit 12 grade between $65 \%$ and $75 \%$ and $4 \%$ or 168 students had an Engl/Lit 12 grade below 65\%.

New to UBC, First year Undergraduate Students, 2004W, distribution of Engl/Literature 12 grade

12.

## Analysis of First Year English:

We excluded students who did not have English 12 or English Literature 12 and who had not written the LPI. Students who have English 12 and/or English Literature 12 and who were exempt from the LPI were included.

## Results:

Students who do not have $80 \%$ or higher in English or Literature 12 are required to pass the LPI before they can register in first year English. Students who are exempt from the LPI will take the LPI prior to knowing their grade in English/Literature12. Since we examined students who took first year English in term one, we did not capture those students who failed the LPI, took a remedial writing composition course (WRIT 098) in first term and then subsequently passed the LPI and were allowed to take first year English in term two.

The graph below shows the relationship between performance in first year English and English/Literature 12 for three groups of students:

1. Those who passed the LPI (irrespective of whether they were exempt)
2. Those who failed the LPI (irrespective of whether they were exempt)
3. Those who did not take the LPI

There is a correlation between students' performance in first year English and their English/Literature 12 grade as shown by the positive slope of the graph. For all three groups of students, there are some who will fail first year English. However the graph does show that the LPI provides some additional reassurance about performance in first year although the difference is small and both groups (those who passed the LPI or those who failed the LPI) passed first year English by a wide margin. Of the 2124 students registered in first year English in term one, only 1.1\% or 23 students failed first year English.

Students with LPI Result, English/Lit 12 grade and LPI Result


## Students who have taken English or Literature 12 with LPI scores

Exempt Failed L Passed L

| English/Lit 12 |  |  |  |
| :--- | :---: | :---: | :---: |
| Count | 2804 | 580 | 685 |
| Mean | 87 | 70 | 的 |
| Minimum | 60 | 50 | 60 |
| Maximum | 100 | 79 | 79 |
| Median | 86 | 71 | 76 |

**Passing the LPI is consistent with a higher English or Literature 12 grade

Is the data statistically significant? We examined students who were registered in first year English and their LPI score and found that the LPI has a statistically significant effect on first year English grades but the effect size is only 1/10th that of English/Literature 12. Hence the predictive power of the LPI is relatively small, but is statistically significant.

| Tests of Between-Subjects Effects |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Dependent Variable: First year English grade |  |  |  |  |  |  |  |
|  | Type III Sum of |  | Mean |  |  |  | Partial Eta |
| Source | Squares | df | Square | F | Sig. |  | Squared |
| Corrected 0.000 |  |  |  |  |  |  |  |
| Model | 16562.4 | 2 | 8281.199 | 128.0436 |  | 0.00 | 0.11 |
| Intercept | 3940.874 | 1 | 3940.874 | 60.93365 |  | 0.00 | 0.03 |
| finaleng | 13189.2 | 1 | 13189.2 | 203.931 |  | 0.00 | 0.09 |
| LPIENGL | 1201.526 | 1 | 1201.526 | 18.57796 |  | 0.00 | 0.01 |
| Error | 137110.7 | 2120 | 64.67484 |  |  |  |  |
| Total | 11645814 | 2123 |  |  |  |  |  |
| Corrected |  |  |  |  |  |  |  |
| Total | 153673.1 | 2122 |  |  |  |  |  |
| a | R Squared $=.108$ (Adju | sted R | Squared $=.107$ |  |  |  |  |

Controlling for English/Literature 12 (i.e. for the same grade in English/Literature 12) a failure in LPI results in a first year English grade which is lower on average by -2.9 points.

| Parameter Estimates |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Dependent Variable: First year English Grade |  |  |  |  |  |  |  |
|  |  | Std. |  |  | 95\% Confidence Interval |  | Partial Eta |
| Parameter | B | Error | t | Sig. |  |  | Squared |
|  |  |  |  |  | Lower |  |  |
|  |  |  |  |  | Bound | Upper Bound |  |
| Intercept | 27.06 | 3.07 | 8.80 | 0.00 | 21.03 | 33.09 | 0.04 |
| finaleng <br> [LPIENGL=Exempt | 0.58 | 0.04 | 14.28 | 0.00 | 0.50 | 0.66 | 0.09 |
|  |  |  |  |  |  |  |  |
|  | (2.94) | 0.68 | (4.31) | 0.00 | (4.28) | (1.60) | 0.01 |
| [LPIENGL=Passed LPI |  |  |  |  |  |  |  |
| $]$ |  |  |  |  |  |  |  |
| a | This p | meter is | to zero | ause | dundant |  |  |

## Performance in non English courses.

## Anthropology 100 (students with grade $>0$ )

The mean grade in Anthropology 100 for students who have passed the LPI is higher than the grade for those who failed the LPI but the mean grade in English 12 for these students was also one point higher.

## Students who have taken Anth 100 with Engl 12 and

 LPI score|  | Exempt | Failed LPI | Passed LPI |
| :--- | ---: | ---: | ---: |
| English 12 grade |  |  |  |
| Count | 266 | 31 | 45 |
| Maximum | 99 | 79 | 79 |
| Mean | 87 | 73 | 74 |
| Minimum | 73 | 60 | 60 |
| Anth 100 grade |  |  |  |
| Count | 266 | 31 | 45 |
| Maximum | 97 | 76 | 82 |
| Mean | 72 | 66 | 67 |
| Minimum | 17 | 50 | 35 |

When we examine the statistical significance, we find that performance in LPI is not statistically significant as a predictor of performance in Anthropology 100.

| Tests of Between-Subjects Effects |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Dependent Variable: Anth 100 grade |  |  |  |  |  |  |  |
|  | Type III Sum of |  | Mean |  |  | Partial Eta |  |
| Source | Squares | df | Square | F | Sig. | Squared |  |
| Corrected |  |  |  |  |  |  |  |
| Model | 2942.969 | 3 | 980.99 | 11.35 | 0.00 |  | 0.09 |
| Intercept | 1589.027 | 1 | 1589.03 | 18.39 | 0.00 |  | 0.05 |
| finaleng | 1058.667 | 1 | 1058.67 | 12.25 | 0.00 |  | 0.03 |
| LPIENGL | 23.10585 | 2 | 11.55 | 0.13 | 0.87 |  | 0.00 |
| Error | 29211.62 | 338 | 86.42 |  |  |  |  |
| Total | 1753054 | 342 |  |  |  |  |  |
| Corrected |  |  |  |  |  |  |  |
| Total | 32154.58 | 341 |  |  |  |  |  |

Political Science 100 and 101 (all students who have taken either course with grade $>0$.

For Political Science, students who have failed the LPI have a mean grade slightly below those who have passed but the result is not statistically significant.

## Students who have taken Poli 100/101 with Engl 12 and LPI score

|  | Exempt | Failed LPI | Passed L |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| English 12 grade |  |  |  |  |  |  |
| Count | 274 | 13 | 42 |  |  |  |
| Maximum | 99 | 78 | 79 |  |  |  |
| Mean | 87 | 75 | 75 |  |  |  |
| Minimum | 72 | 68 | 67 |  |  |  |
| Poli 100/101 grade |  |  |  |  |  |  |
| Count | 274 | 13 | 42 |  |  |  |
| Maximum | 89 | 80 | 80 |  |  |  |
| Mean | 73 | 66 | 67 |  |  |  |
| Minimum | 13 | 44 | 7 |  |  |  |
| Tests of Between-Subjects Effects |  |  |  |  |  |  |
| Dependent Variable:POLI 100/101 grade |  |  |  |  |  |  |
|  | Type III Sum of |  | Mean |  |  | Partial Eta |
| Source S | Squares | df | Square | F | Sig. | Squared |
| Corrected |  |  |  |  |  |  |
| Model | 3,967.16 | 3.00 | 1,322.39 | 14.47 | 0.00 | 0.12 |
| Intercept | 500.72 | 1.00 | 500.72 | 5.48 | 0.02 | 0.02 |
| finaleng | 2,197.98 | 1.00 | 2,197.98 | 24.04 | 0.00 | 0.07 |
| LPIENGL | 30.06 | 2.00 | 15.03 | 0.16 | 0.85 | 0.00 |
| Error | 29,711.33 | 325.00 | 91.42 |  |  |  |
| Total 1 | 1,741,087.00 | 329.00 |  |  |  |  |
| Corrected |  |  |  |  |  |  |
| Total | 33,678.49 | 328.00 |  |  |  |  |
| a R | R Squared $=.11$ | justed R Sq | ared $=.110$ |  |  |  |

## History 125 (students with grade $>0$ )

There were only two students registered in History 125 who had failed the LPI. These two students had a mean grade higher than those who passed the LPI but again the results are not statistically significant.


## Conclusion:

The predictive power of the LPI in determining writing proficiency is weak given that performance in first year is correlated with students' grades in English 12 or English Literature 12. Failure on the LPI is related to a small decrease in first year English performance but not related at all to performance in any of the other courses which require writing. While the LPI does provide some additional reassurance about performance in first year English, it should be noted that most students seem to pass first year English at UBC.

For the bulk of UBC's first year students, the LPI requirement is arduous, requires testing at a separate agency and does not provide much additional information beyond the English 12 or English Literature 12 grade. The high schools in B.C. seem to be doing a good job in grading for writing ability and final grades in English 12 or English Literature 12 should provide sufficient reassurance to the University of writing proficiency in English.

Furthermore, administering the LPI is labour intensive for the First Year English office, results are often not available until late August and placement in first year English which is a requirement for most students is not determined until September causing anxiety among students. Interim English 12 or English Literature 12 grades are available as early as January and final grades are available in July for B.C. High School students. Course planning and placement for first year English can be accomplished well in advance of course start dates.

The data would suggest that a grade of $75 \%$ in English/Literature 12 is sufficient for determining success in first year writing intensive courses as well as in first year English. Students below $65 \%$ in English 12 or its equivalent would appear to lack the English language skills necessary to succeed at UBC and should not even be admitted to the University. Those between $65 \%$ and $75 \%$ may require remediation by way of a writing intensive course (Writing 098/099 or alternative) prior to being allowed to register in first year English.

Further investigation will be required to determine what the role of the LPI should be for international students or for those who do not present an equivalent grade for English/Literature 12. There are 609 students in this category. The TOEFL may provide sufficient data and should be examined for its reliability as a predictor for success at UBC.

## English-12 Grades versus LPI Scores

Liny Chan and Jessica Tilley, Office of Analytical Studies, Simon Fraser University November 16, 2006

This report was prepared by the Office of Analytical Studies (OAS), and summarizes our findings regarding the relationship between Grade 12 English grades and LPI (Language Proficiency Index) Scores. This analysis is restricted to new students in the Fall 2006 term, whose basis of admission was B.C. Grade 12. The analysis includes only students with no English-12 grade, or with a grade of less than $80 \%$. At SFU, LPI scores of 4 or 5 are acceptable, while scores of 0 are not.

Table 1 gives the distribution of English-12 grades among students who achieved the different LPI scores. This data is plotted in Figures 1 and 2. The Figures and Table show very little difference in English-12 grades between students receiving each of the LPI Score. The three groups ( $\mathrm{LPI}=0,4$, and 5 ) have similar average English-12 grades, as well as similarly shaped distributions. A Spearman Correlation ${ }^{1}$ of 0.02 confirms that there is essentially no relationship between English-12 grades and LPI scores.

Table 1: LPI Scores versus English-12 Grades

|  | LPI score |  |  |  |
| :--- | ---: | ---: | ---: | ---: |
| Engl12 | 0 | 4 | 5 | No Score |
| 54 |  |  |  | 1 |
| 61 |  | 2 |  | 1 |
| 62 |  | 1 |  | 1 |
| 63 |  | 1 |  |  |
| 64 | 2 | 4 | 2 | 1 |
| 65 |  | 2 | 1 | 1 |
| 66 | 2 | 2 | 1 | 2 |
| 67 |  |  | 5 | 2 |
| 68 | 1 | 5 | 6 |  |
| 69 | 8 | 13 | 2 | 2 |
| 70 | 7 | 5 | 5 | 4 |
| 71 | 8 | 5 | 6 | 5 |
| 72 | 9 | 15 | 16 | 5 |
| 73 | 19 | 12 | 12 | 10 |
| 74 | 16 | 17 | 10 | 11 |
| 75 | 15 | 18 | 18 | 17 |
| 76 | 11 | 13 | 23 | 20 |
| 77 | 19 | 12 | 31 | 19 |
| 78 | 26 | 13 | 20 | 14 |
| 79 |  |  |  | 1 |
| No Score | 75.2 | 73.8 | 75.2 | 75.1 |
| Average ENGL 12 Grade |  |  |  |  |

Note: As per Nancy Stothers in Admissions, not all students have to have LPI scores.
Note: For 1067, students with $80 \%$ or better in ENGL 12 do not have to submit LPI score.
Note: For students with $74-79 \%$ in ENGL 12 , student is allowed to register at SFU but must submit LPI score later
Note: or fulfill FAL requirement. For students with ENGL 12 grade below $74 \%$, not admitted until
acceptable LPI score submitted.

[^0]Figure 1: Distribution of English. 12 Grades for each LPI Score


Figure 2: English-12 grades vs LPI score
$\rightarrow$ - LPI score - -4 LPI score 5 LPI score


Summary of English-12 Grade Study<br>Jessica Tilley, Office of Analytical Studies, Simon Fraser University

November 16, 2006

## INTRODUCTION

This report summarizes the analyses undertaken thus far by the Office of Analytical Studies (OAS) in support of the Senate Committee on Undergraduate Studies' (SCUS) recommendation to Senate to revise the literacy requirements for admission to SFU. To that end, the OAS has examined the relationship between Grade-12 English grades and student performance at SFU.

## METHODOLOGY

The dataset for the analysis consists of students admitted to SFU directly from a B. C. Secondary School in the Fall terms of 2000 to 2005. The students are followed up to the Summer 2006 term. The primary group of interest is 2,201 students admitted to SFU with English-12 grades of $75-79 \%$. The dataset also includes a secondary group of 2,201 students with English-12 grades below $75 \%$ ( $67-74 \%$ ), and a control group of 2,201 students with English-12 grades above $79 \%(80-84 \%)^{1}$.

The following performance measures are included in the analysis:

- CGPAs at first term, 30 -credits, 60 -credits, and graduation
- Academic Standing: \% OAP (On Academic Probation) and \% RTW (Required To Withdraw) within 2 years of admission to SFU
- 5-Year Graduation Rates
- 60-Credit Survival Rates

Average performance is compared across the three groups of students (based on English-12 grades). The relationship between performance and English-12 grades is also graphed, to determine whether a natural cut-off presents itself. For each performance measure, a regression model is then fit, which controls for the following baseline student characteristics: sex, entry Faculty, admission GPA, and average creditload. Although there are 6603 students in the dataset, not all students are included in all analyses. For example, the analyses of 60 -credit GPA include only those students who have completed at least 60 credits at SFU, and analyses of 5 -year graduation rates are restricted to students admitted at least five years ago.

## RESULTS

## GPA (See Table 1 and Figure 1):

All four GPA measures show an increase in GPA with increasing English- 12 grades. In all cases, the differences between the three groups of students is statistically significant. However, these differences are quite small. For example, when you control for baseline student characteristics, students who enter SFU with English-12 grades of $75-79 \%$ have graduating GPAs that are on average only 0.08 lower than the average graduating GPAs of students who had English-12 grades of $80-84 \%$. Even in the raw comparisons ${ }^{2}$ the difference is only 0.11 .

[^1]Students admitted to SFU with higher English-12 marks are less likely to be put on academic probation or required to withdraw from the university. Students in the $75-79 \%$ group have 1.4 -times the odds of being put on academic probation over students in the $80-84 \%$ group. Students in the $67-74 \%$ group perform even worse, with 1.9 -times the odds of being OAP over those entering with English-12 grades of $80-84 \%$.

There is no statistical difference in the odds of being RTW between students in the 75-79\% group and those in the $\mathbf{8 0 - 8 4 \%}$ group. However, the $67-74 \%$ group has 1.6 -times the odds of being RTW over the $80-84 \%$ group.

## Survival/Graduation (See Table 2 and Figure 3):

60 -credit survival rates are quite stable across different English-12 grades. There are no statistically significant differences in this performance outcome among the grade groups.

Figure 3 suggests that $\mathbf{5}$-year graduation rates decrease slightly as English-12 grades increase. This seems counterintuitive. It may be that students coming in with higher grades are more likely to be qualified for co-op or honours programs, which would cause them to take longer to finish their degree. The differences between the $\mathbf{7 5 - 7 9 \%}$ group and the $\mathbf{8 0 - 8 4 \%}$ group are not statistically significant, while students in the $67-74 \%$ group are more likely to graduate within five years of admission.

## Natural Cut-Off for English-12 Grades:

Figures 1-3 illustrate that there is no natural cut-off for English- $\mathbf{1 2}$ grades that is common to all performance measures. For example, graduating GPA splits the students into three natural groups based on English-12 grades: $<=71 \%, 72-80 \%,>80 \%$. However, OAP rates improve fairly continuously with increasing English- 12 grades (with a possible cut-off at $\sim 72 \%$ ).

## CAVEATS AND FURTHER STUDY

Some of the models exhibit poor fit. This suggests that there are important variables related to performance that we are unable to capture in our models, such as whether the student is a financial aid recipient, or whether the student is employed. It is possible that including such variables could change our conclusions about the relationship between English-12 grades and performance at SFU.

Also, it is possible that students who were admitted to SFU with English-12 grades below 80\% are not representative of all applicants below $80 \%$. Students who were admitted with lower English- 12 grades may have had high grades in other Grade-12 courses ${ }^{3}$. It is important to note that we are analyzing admitted students, but we wish to generalize our results to all applicants.

The Office of Analytical Studies is pursuing a further analysis of grades achieved by these students in selected SFU courses (several English, Philosophy, and Communications courses). The results of this analysis will be available before December $4^{\text {th }}$.

[^2]Figure 1:


Figure 2:


Figure 3:


Table 1: Differences among ENGL-12 Grade Groups for Continuous Performance Measures

| Performance Measure | Average in Grade 12 English Grade Groups |  |  | Raw Difference from 80-84 Group |  | Corrected Difference from 80-84 Group |  | Statistically Signif. Difference? |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 67-74\% | 75-79\% | 80-84\% | 67-74\% | 75-79\% | 67-74\% | 75-79\% | 67-74\% | 75-79\% |
| Term 1 GPA | 2.42 | 2.50 | 2.63 | -0.21 | -0.13 | -0.13 | -0.08 | * | * |
| 30-Credit GPA | 2.56 | 2.63 | 2.73 | -0.17 | -0.10 | -0.09 | -0.04 | * | * |
| 60-Credit GPA | 2.71 | 2.77 | 2.86 | -0.15 | -0.09 | -0.11 | -0.07 | * | * |
| Graduating GPA | 2.86 | 2.94 | 3.05 | -0.19 | -0.11 | -0.16 | -0.08 | * | * |

Note: A "raw" difference is a straight subtraction between averages. A "corrected" difference comes from the regression model, and is the difference after controlling for baseline student characteristics.

Table 2: Differences among ENGL-12 Grade Groups for Binary Performance Measures

| Performance Measure | Average in Grade 12 English Grade Groups |  |  | Raw Difference from 80-84 Group |  | Corrected Odds Ratios against 80-84 Group |  | Statistically Signif. Difference? |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 67-74\% | 75-79\% | 80-84\% | 67-74\% | 75-79\% | 67-74\% | 75-79\% | 67-74\% | 75-79\% |
| OAP | 43\% | 35\% | 26\% | 18\% | 9\% | 1.9 | 1.4 | * | * |
| RTW | 20\% | 14\% | 10\% | 9\% | 3\% | 1.6 | 1.2 | * |  |
| 5-Year Graduation | 45\% | 40\% | 39\% | 6\% | 1\% | 1.5 | 1.2 | * |  |
| 60-Credit Survival | 74\% | 74\% | 76\% | -2\% | -2\% | 1.0 | 1.0 |  |  |

Note: An odds ratio of 1 implies no difference between the two groups


[^0]:    ${ }^{1}$ The Spearman Correlation Statistic is a non-parametric statistic, which is appropriate because the LPI score is ordinal, and so the numeric difference between the categories are not meaningful.

[^1]:    ${ }^{1}$ These groups were created by selecting an equal number of students as close as possible above and below the cutoffs of the primary group of interest ( $75 \%$ and $79 \%$ ).
    ${ }^{2}$ Raw comparisons are those in which we have not controlled for baseline student characteristics through regression models.

[^2]:    ${ }^{3}$ In fact, we found very little correlation between English-12 grades and Admission GPA.

