# A Forest of Forests:

# Constructing a Centre-Usage Profile as a Source of Outcomes Assessment

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## Abstract

Most writing-centre administrators collect centre-usage information because it can generate one of the most basic forms of assessment. Such assessment can and often does determine resources in the institutional-funding process. In addition to responding to the call since the 1980s for rigorous scientific assessment issued from researchers and professionals in the field of writing centre research, assessment-based activities have also become necessary for accreditation, budget, and educational-accountability purposes at both institutional and programmatic levels. This paper reports on a usage-profile analysis of an outcomes-assessment project in the context of a newly established language-support unit. The centre-usage profile analysis focused on the 2,932 tutoring sessions conducted during the academic year, which involved 1,100 different users. In addition to the findings' implications for writing-centre research and practice, the information about the approach used in implementing this component may be useful to administrators, researchers, and practitioners in academic language-support units across institutions of higher education.

*Keywords:* writing centre, usage profile analysis, outcomes assessment.

## Précis/Résumé

La plupart des centres écrit-administrateurs à collecter centre-utilisation de l'information car elle peut générer l'une des formes les plus élémentaires de l'évaluation. Une telle évaluation peut et ne déterminent souvent les ressources dans le processus institutionnel de financement. En plus de répondre à l'appel depuis les années 1980 pour une évaluation scientifique rigoureuse publiée par des chercheurs et des professionnels dans le domaine de la rédaction de centre de recherche, d'évaluation basées sur des activités sont également devenus nécessaires pour l'accréditation, le budget et l'éducation de responsabilisation des fins à la fois institutionnel et programmatique niveaux. Cet article rend compte

d'une analyse de l'utilisation de profil d'un projet d'évaluation des résultats dans le cadre d'un nouvellement créé support pour langage unité. L'analyse du profil de centre-utilisation axée sur les 2.932 séances de tutorat menées au cours de l'année scolaire, qui impliquaient 1.100 utilisateurs différents. En plus des implications des résultats pour 'écriture centre de recherche et la pratique, l'information sur l'approche utilisée dans la mise en œuvre de ce volet peut être utile aux administrateurs, chercheurs, universitaires et praticiens de la langue unités de soutien entre les établissements d'enseignement supérieur.

## Introduction

Most writing-centre administrators collect centre-usage information because it can generate one of the most basic forms of assessment. Such assessment can and often does determine resources in the institutional-funding process. Language-support units within all academic institutions have resource constraints. As Reardon (2010) stated, "No writing center administrator can ever rest too comfortably in regards to his or her centre's continued support or funding, especially during recessions."

In addition to responding to the call since the 1980s for rigorous scientific assessment issued by both the research and practice-oriented communities in the field of writing-centre research (Hawthorne, 2006; Henson & Stephenson, 2009; Lerner, 2003; Neuleib, 1980, 1982, 1984), assessment-based activities have also become necessary for accreditation, budget, and educational-accountability purposes at both institutional and programmatic levels. Assessment not only helps identify a unit's strengths and weaknesses at different levels, but as many have pointed out, it is also critical to moving the field forward (e.g., Lerner, 2003).

This paper reports on a usage-profile analysis of an outcomes- (or more accurately, progress) assessment project in the context of a newly established language-support unit. The usage-profile analysis is one component of a multi-component assessment project that gathered and analyzed both direct and indirect evidence for the purpose of evaluating the effectiveness of new academic English-language support and services provided by a writing centre at a Canadian university. In addition to the findings' implications for writing-centre research and practice, the information about the approach used in implementing this component may be useful to administrators, researchers, and practitioners in academic language-support units across institutions of higher education.

**Background**

Although academic English-language-support units sometimes resist assessment for immediate practical and longer-term implicational reasons, it has also proven to be beneficial for both evaluating the effectiveness of the services in order to plan and improve and answering the age-old question: Does what we do matter (Henson & Stephenson, 2009; Niller, 2003, 2005)?

Researchers in the field of writing-centre research have emphasized the need for an evidence-based approach to outcomes assessment (e.g., Bell, 2000; Hawthorne, 2006; Henson & Stephenson, 2009; Pemberton, 2003), and cited such challenges as time and resource constraints, the need for expertise in assessment research methods, (mis-)conceptions about purposes of assessment (e.g., Lerner, 2003; Schuh & Upcraft, 2001), and difficulties involved in substantiating the link between the support received and any improvement in students' writing (Enders, 2005; Jones, 2001; Lerner, 1997, 2001; Pemberton & Kinkead, 2003). The field of writing-centre research has developed a rich body of qualitative work, and, in recent years, the field has also witnessed efforts to utilize quantitative methodologies, but to-date, such evaluation studies are still lacking (Hawthorne, 2006; Jones, 2001).

According to Allen (2004), assessment may involve asking questions about "students' satisfaction with their educational experience," "the amount of their engagement or participation," and/or "what they actually gained from that experience" (p. 96). Drawing on Allen's work, as well as that of Schuh and Upcraft (2001) regarding the student-services assessment model, the first component is to "keep track of who participates," which most centre directors do. This paper analyzes the amount of user engagement or participation, which indicates how the centre is being utilized over a

period of time.

Although usage reports are the most commonly implemented component of assessment (and may be the extent of regular assessment attempts for many), most such reports involve tabulating and reporting simple usage counts for total number of users, year of studies, and number of repeat users. This paper presents a way that writing-centre administrators can use the data they have conscientiously collected to help them obtain a picture of their centres' usage profiles. The goal is that more language-support units may engage in and benefit from a systematic self-examination of their programs using the simplest source of data that they collect regularly.

## Institutional Context

This outcomes/progress assessment project was undertaken at a mid-size, comprehensive university in British Columbia, Canada. The university's academic programs include 10 faculties and 2 major divisions. According to the enrollment figures in 2008/09, approximately 8% of its 22,025 undergraduate students and 13% of its 2,593 graduate students are international students. In 2006, the university founded an English-language-proficiency working group to examine policies supporting and challenges facing students. In 2007, the university's Writing Centre was established as part of the Learning and Teaching Centre that serves the academic language-learning needs of both graduate and undergraduate students, as well as faculty members. In 2007, a needs-assessment research project was undertaken to better evaluate students' academic language-learning needs and to review any skill gaps identified by instructors. The needs assessment was conducted for both English-as-an-additional-language (EAL) and English-as-a-first-language (EL1) students (X, 2010). Respondents were asked to provide importance ratings of individual academic language skills across four language domains

(i.e., reading, writing, speaking, and listening) to assess their own or their students' skill status by identifying skills that the instructors or students regarded as needing support. Respondents were also asked to answer open-ended questions. Results from the needs assessment have been used to inform the development and offering of English for Academic Purposes programs and workshops tailored to both graduate and undergraduate students' needs. This then led to the current progress/outcomes assessment.

### Data Collection and Analysis

This is a participation-based analysis using centre-usage data collected from September 2009 to April 2010 (i.e., fall and spring terms). Each user provided information on the date of visit, name, gender, department, degree program, year of study, purpose of visit, for which course or for other writing needs, language background, and type of visit (drop-in vs. appointment) on a voluntary basis. The purpose of this analysis is to understand how the centre is being utilized, by whom, and for what purposes.

To answer the research question (i.e., what is the writing centre's usage profile, in this case, for the academic year 2009-2010?) in this assessment component, the data were analyzed by descriptive statistics that examined the total number of users (i.e., the total user counts, including all repeat users), the number of different users by month (hereafter called "unique" users) (i.e., excluding repeat users within each month, 1 = September and 8 = April), and the number of unique users (i.e., counting each user only once for the entire sample) according to the key variables listed above. Correlational analyses revealed the relationship between time and the usage counts to assess the strength of a trend over time. Chi-square tests were performed to ascertain whether differences in the types of usage (i.e., drop-in vs. appointment) were significant according to gender, degree

level, division, and language background. A larger difference will produce a larger Chi-square value. All analyses were conducted using SPSS Version 15.0, with an alpha level of .05 to determine significance.

## Results

The following sections present the centre's overall usage and usage by key variables, namely gender, degree level, year of study, division, language background, course and subject area, and type of visit.

### Overall Usage and Trends

A total of 2,932 tutoring sessions that involved 1,100 different users were held during the analysis period. Table 1 and Figure 1 present the centre's usage by month in terms of the total number of users, the total number of unique users each month, and the total number of unique users overall. Regarding trend in usage over time, the levels were not significant, but the correlational analysis showed a negative correlation ($r = -.241$) between the total user counts and unique user counts, indicating that the numbers of unique users overall decreased over time, whereas the correlation between the total user counts and counts of unique users within a month showed a positive correlation ($r = .176$), indicating that the number of monthly unique users increased over time.

Table 1: Centre Usage by Month

| Year | 2009 | | | | 2010 | | | | |
|---|---|---|---|---|---|---|---|---|---|
| Month | 9 | 10 | 11 | 12 | 1 | 2 | 3 | 4 | Total |
| Total Users | 119 (4.1 %) | 484 (16.5 %) | 577 (19.7 %) | 232 (7.9 %) | 232 (7.9 %) | 345 (11.8 %) | 710 (24.2 %) | 233 (7.9 %) | 2932 (100 %) |
| Unique users/month | 81 (4.7 %) | 280 (16.4 %) | 321 (18.8 %) | 150 (8.8 %) | 146 (8.6 %) | 201 (11.8 %) | 375 (22.0 %) | 152 (8.9 %) | 1706 (100 %) |
| Unique Users | 81 (4.7 %) | 249 (22.6 %) | 216 (19.6 %) | 76 (6.9 %) | 96 (8.7 %) | 107 (9.7%) | 208 (18.9 %) | 67 (6.1 %) | 1100 (100 %) |

Figure 1: Centre usage by month.
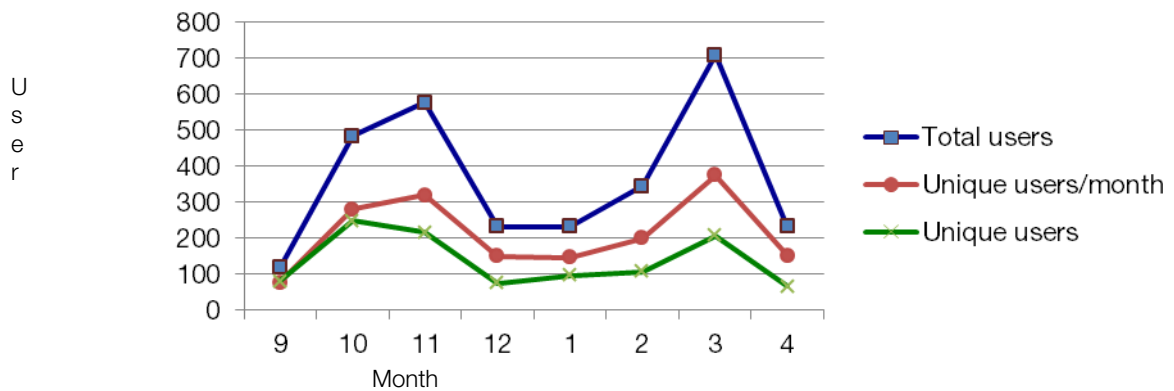


**Centre Usage by Gender**

  Table 2 presents the data analyzed by gender over time. Overall, female students used the centre more than male students, both monthly and in total. In proportion to the total number of sessions conducted that involved male and female students (23.8% and 71.5%, respectively), usage by female students involved fewer unique users than male users did (30.4% and 69.4%, respectively). Regarding the trend in usage over time, the levels were not significant, but the correlational analysis showed a negative correlation between the total user counts and unique user counts for both genders (male: $r = -.166$; female: $r = -.265$, $p > .05$), indicating that the numbers of unique users overall decreased over time.

Table 2: Centre Usage by Gender

| | Year | | 2009 | | | | 2010 | | | Total |
|---|---|---|---|---|---|---|---|---|---|---|
| | Month | 9 | 10 | 11 | 12 | 1 | 2 | 3 | 4 | |
| Male | Total users | 34 (4.1%) | 125 (15.1%) | 165 (19.9%) | 69 (8.3%) | 74 (8.9%) | 85 (10.3%) | 204 (24.6%) | 73 (8.8%) | 829 (23.8%) |

|  |  | 9 | 10 | 11 | 12 | 1 | 2 | 3 | 4 | Total |
|---|---|---|---|---|---|---|---|---|---|---|
|  | Unique users/month | 28 (5.5%) | 76 (15%) | 88 (17.3%) | 49 (9.6%) | 49 (9.6%) | 51 (10%) | 117 (23%) | 50 (9.8%) | 508 (29.7%) |
|  | Unique users | 28 (8.4%) | 68 (20.4%) | 58 (17.4%) | 28 (8.4%) | 33 (9.9%) | 24 (7.2%) | 69 (20.7%) | 25 (7.5%) | 333 (30.4%) |
|  | Total users | 85 (4.1%) | 357 (17.0%) | 411 (19.6%) | 163 (7.8%) | 158 (7.5%) | 259 (12.4%) | 504 (24.0%) | 160 (7.6%) | 2097 (71.5%) |
| Female | Unique users/month | 53 (4.4%) | 204 (17.1%) | 232 (19.4%) | 101 (8.5%) | 97 (8.1%) | 150 (12.6%) | 256 (21.4%) | 102 (8.5%) | 1195 (70.1%) |
|  | Unique users | 53 (6.9%) | 181 (23.7%) | 157 (20.5%) | 48 (6.3%) | 63 (8.2%) | 83 (10.8%) | 138 (18%) | 42 (5.5%) | 765 (69.4%) |

*Note. Percentages of male and female users in the Total column do not add up to 100 because of the cases in which the user did not specify his/her gender.*

## Centre Usage by Degree Levels

The analysis by degree levels indicates that the centre served predominantly undergraduate students, as showed in Table 3. In addition, graduate students tended to make more repeat visits than undergraduate users, as indicated by the percentages of total users vs. unique users (i.e., 75.4% and 83%, respectively, for undergraduate students, and 21.7% and 14.2%, respectively, for graduate students). Results also showed a negative correlation between total user counts and unique user counts for both degree levels (undergraduate: $r = -.094$, $p > .05$; graduate: $r = -.684$, $p < .05$), indicating that the numbers of unique users overall decreased over time, with a significant level for the unique graduate student counts.

Table 3: Centre Usage by Degree Level (Undergraduate vs. Graduate)

| Year |  | 2009 | | | | 2010 | | | | Total |
|---|---|---|---|---|---|---|---|---|---|---|
| Month |  | 9 | 10 | 11 | 12 | 1 | 2 | 3 | 4 |  |

|  |  | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| U G | Total users | 79 (3.6%) | 312 (14.2%) | 442 (20.1%) | 161 (7.3%) | 172 (7.8%) | 269 (12.2%) | 584 (26.5%) | 182 (8.3%) | 2201 (75.4%) |
|  | Unique users/month | 55 (4%) | 210 (15.1%) | 268 (19.3%) | 112 (8%) | 120 (8.6%) | 170 (12.2%) | 330 (23.7%) | 127 (91%) | 1392 (81.6%) |
|  | Unique users | 55 (6.1%) | 188 (20.8%) | 183 (20.2%) | 58 (6.4%) | 79 (8.7%) | 91 (10.1%) | 188 (20.8%) | 63 (7%) | 905 (83%) |
| G | Total users | 28 (4.4%) | 146 (23.0%) | 124 (19.5%) | 63 (9.9%) | 54 (8.5%) | 69 (10.8%) | 107 (16.8%) | 45 (7.1%) | 636 (21.7%) |
|  | Unique users/month | 20 (7.4%) | 60 (22.1%) | 50 (18.4%) | 34 (12.5%) | 20 (7.4%) | 27 (9.9%) | 37 (13.6%) | 24 (8.8%) | 272 (16.1%) |
|  | Unique users | 20 (12%) | 54 (32.5%) | 31 (18.7%) | 16 (9.6%) | 12 (7.2%) | 14 (8.4%) | 15 (9%) | 4 (2.4%) | 166 (14.2%) |

*Note. UG = undergraduate; G = graduate. Percentages of undergraduate and graduate users in the Total column do not add up to 100 because of a small percentage of "Other" categories that include diploma students, post-docs, and staff, and also 14 unspecified cases.*

**Centre Usage By Year of Study**

The results indicate that students at the initial stage of their degree programs tended to use the centre more than those at later stages. As Table 4 shows, year-one undergraduate students represent 36.2% of total sessions conducted at the undergraduate level, which accounted for 39.2% of the unique users; year-one graduate students represent 61.8% of total sessions conducted at the graduate level, involving 58.3% of the unique users. In addition, the total user counts decreased over time for graduate users ($r = -.176, p > .05$).

Table 4: Centre Usage by Year of Study

| Year of Study | | 1 | 2 | 3 | 4 | 5 | > 6 |
|---|---|---|---|---|---|---|---|
| UG | Total users | 800 (36.2%) | 383 (17.3%) | 507 (22.9%) | 464 (21%) | 38 (1.7%) | 2 (0.1%) |
|  | Unique users/month | 524 (38%) | 275 (19.9%) | 313 (22.7%) | 247 (17.9%) | 18 (1.3%) | 2 (0.1%) |

|   |                    | 350 (39.2%) | 188 (21.1%) | 201 (22.5%) | 140 (15.7%) | 11 (1.2%) | 2 (0.2%) |
|---|--------------------|-------------|-------------|-------------|-------------|-----------|----------|
|   | Unique users       | 350 (39.2%) | 188 (21.1%) | 201 (22.5%) | 140 (15.7%) | 11 (1.2%) | 2 (0.2%) |
|   | Total users        | 393 (61.8%) | 181 (28.5%) | 37 (5.8%)   | 9 (1.4%)    | 9 (1.4%)  | 4 (0.6%) |
| G | Unique users/month | 165 (61.3%) | 63 (23.4%)  | 25 (9.3%)   | 7 (2.6%)    | 7 (2.6%)  | 3 (0.7%) |
|   | Unique users       | 95 (58.3%)  | 41 (25.2%)  | 14 (8.6%)   | 5 (3.1%)    | 6 (3.7%)  | 2 (1.2%) |

*Note. UG = undergraduate; G = graduate.*

## Centre Usage by Division

The analysis by division finds that the largest number of users identified themselves as belonging to the social sciences. The next highest users were those in divisions of humanities, health sciences, and, finally, physical sciences. This pattern applies to the total number of sessions, the number of unique users within a month, and the number of unique users overall. As presented in Table 5, students from the division of social sciences represented 28.8% of overall sessions conducted during the academic year, followed by 28.8% from the humanities, 8.3 from the life sciences, and 6.9% from the physical sciences. Looking at the unique user counts shows that repeated usage was less by students from the divisions of life sciences than students from other divisions. Results from the correlational analyses show a negative correlation between the total user counts and unique user counts for divisions 1 and 2, but a positive correlation for divisions 3 and 4, indicating that the numbers of unique users decreased over time for students from the humanities ($r = -.231$, $p > .05$) and social sciences ($r = -.331$, $p > .05$), but increased over time for students from the physical ($r = .254$, $p > .05$) and life sciences ($r = .105$, $p > .05$).

Table 5: Centre Usage by Division

| | Year | 2009 | | | | 2010 | | | | Total |
|---|---|---|---|---|---|---|---|---|---|---|
| | Month | 9 | 10 | 11 | 12 | 1 | 2 | 3 | 4 | |
| Division 1 | Total users | 29 (3.4%) | 134 (15.9%) | 158 (18.7%) | 55 (6.5%) | 65 (7.7%) | 122 (14.5%) | 201 (23.8%) | 80 (9.5%) | 844 (28.8%) |
| | Unique users/month | 20 (4%) | 86 (17%) | 88 (17.4%) | 36 (7.1%) | 49 (9.7%) | 64 (12.6%) | 113 (22.3%) | 50 (9.9%) | 506 (29.6%) |
| | Unique users | 20 (6.6%) | 77 (25.5%) | 52 (17.2%) | 17 (5.6%) | 29 (9.6%) | 36 (11.9%) | 50 (16.6%) | 21 (7%) | 302 (27.8%) |
| Division 2 | Total users | 67 (4.1%) | 277 (17.0%) | 350 (21.5%) | 151 (9.3%) | 116 (7.1%) | 150 (9.2%) | 392 (24.1%) | 124 (7.6%) | 1627 (55.5%) |
| | Unique users/month | 46 (5%) | 158 (17.2%) | 192 (20.9%) | 94 (10.3%) | 64 (7%) | 97 (10.6%) | 187 (20.4%) | 79 (8.6%) | 917 (53.8%) |
| | Unique users | 46 (7.6%) | 142 (23.5%) | 134 (22.2%) | 50 (8.3%) | 37 (6.1%) | 53 (8.8%) | 107 (17.7%) | 35 (5.8%) | 604 (54.6%) |
| Division 3 | Total users | 12 (6.0%) | 26 (12.9%) | 28 (13.9%) | 17 (8.5%) | 13 (6.5%) | 21 (10.4%) | 68 (33.8%) | 16 (8.0%) | 201 (6.9%) |
| | Unique users/month | 7 (5.6%) | 11 (8.9%) | 17 (13.7%) | 13 (10.5%) | 6 (4.8%) | 12 (9.7%) | 45 (36.3%) | 13 (10.5%) | 124 (7.3%) |
| | Unique users | 7 (8.5%) | 9 (11%) | 12 (14.6%) | 6 (7.3%) | 4 (4.9%) | 8 (9.8%) | 32 (39%) | 4 (4.9%) | 82 (7.6%) |
| Division 4 | Total users | 8 (3.3%) | 40 (16.5%) | 40 (16.5%) | 8 (3.3%) | 36 (14.8%) | 50 (20.6%) | 48 (19.8%) | 13 (5.3%) | 243 (8.3%) |
| | Unique users/month | 5 (3.5%) | 19 (13.3%) | 23 (16.1%) | 6 (4.2%) | 25 (17.5%) | 26 (18.2%) | 29 (20.3%) | 10 (7%) | 143 (8.4%) |
| | Unique users | 5 (5.2%) | 15 (15.5%) | 17 (17.5%) | 2 (2.1%) | 24 (24.7%) | 9 (9.3%) | 18 (18.6%) | 7 (7.2%) | 97 (8.7%) |

*Note. Division 1 = humanities; division 2 = social sciences; division 3 = physical sciences; division 4 = life sciences. Percentages of users across divisions in the Total column do not add up to 100 because of the cases in which the user did not specify his/her division.*

**Centre Usage by Language Background**

As shown in Table 6, of all the sessions conducted, 53.3% served EL1 students and 45.2% served EAL students. The analysis of unique users indicates that EAL users (representing 31.8% of total unique users) tended to repeat more than EL1 users (representing 65.2% of total unique users). Usage patterns were similar over time for both EL1 and EAL students. The top-five languages that users speak as their first languages

are English, followed by Chinese, Japanese, Farsi, and French, as shown in Table 7. The

analysis of unique users shows that Japanese EAL students tended to repeat more than

other language groups. Consistent with other variables, results from the correlational

analysis for the variable of language background shows a negative trend line, indicating

that the number of unique users decreased over time for both EL1 ($r = -.214, p > .05$) and

EAL ($r = -.331, p > .05$) students.

Table 6: Centre Usage by Language Groups

| | Year | 2009 | | | | 2010 | | | | Total |
|---|---|---|---|---|---|---|---|---|---|---|
| | Month | 9 | 10 | 11 | 12 | 1 | 2 | 3 | 4 | |
| EL1 | Total users | 52 (3.3%) | 254 (16.3%) | 311 (19.9%) | 119 (7.6%) | 112 (7.2%) | 189 (12.1%) | 404 (25.8%) | 122 (7.8%) | 1563 (53.3%) |
| | Unique users/month | 43 (4%) | 185 (17.2%) | 209 (19.4%) | 90 (8.3%) | 86 (8%) | 128 (11.9%) | 243 (22.5%) | 94 (8.7%) | 1078 (63.2%) |
| | Unique users | 43 (6%) | 168 (23.6%) | 146 (20.5%) | 52 (7.3%) | 55 (7.7%) | 67 (9.4%) | 136 (19.1%) | 45 (6.3%) | 712 (65.2%) |
| EAL | Total users | 60 (4.5%) | 224 (16.9%) | 265 (20.0%) | 111 (8.4%) | 114 (8.6%) | 151 (11.4%) | 295 (22.3%) | 105 (7.9%) | 1325 (45.2%) |
| | Unique users/month | 33 (5.6%) | 90 (15.3%) | 111 (18.8%) | 58 (9.8%) | 54 (9.2%) | 68 (11.5%) | 121 (20.5%) | 55 (9.3%) | 590 (34.6%) |
| | Unique users | 33 (9.3%) | 76 (21.4%) | 69 (19.4%) | 23 (6.5%) | 36 (10.1%) | 35 (9.9%) | 62 (17.5%) | 21 (5.9%) | 355 (31.8%) |

*Note. EL1 = Students who speak English as their first language; EAL = Students who speak English as an additional language. Percentages of EL1 and EAL users in the Total column do not add up to 100 because of the cases in which the user did not specify his/her language background.*

Table 7: Centre Usage by Top-five Language Backgrounds

| Language | English | Chinese | Japanese | Farsi | French |
|---|---|---|---|---|---|
| Total users | 1579 (53.9%) | 427 (14.6%) | 335 (11.4%) | 112 (3.8%) | 76 (2.9%) |
| Unique users/month | 1091 (64%) | 217 (12.7%) | 97 (5.7%) | 39 (2.3%) | 47 (2.8%) |

| Unique users | 727 (66.2%) | 146 (13.3%) | 38 (3.5%) | 20 (1.8%) | 26 (2.4%) |
|---|---|---|---|---|---|

**Centre Usage by Course and Subject Area**

When examined by individual courses, the data show that users indicated 463 different courses as their reason for visiting the centre. Among those, the top five included four English courses and one sociology course: ENGL 115 (47 unique users), ENGL 135 (133 unique users), ENGL 146 (49 unique users), ENGL 147 (35 unique users), and SOCI 100 (46 unique users).[1] To facilitate analysis, courses were grouped into 42 different subject areas, with the top areas presented in Table 8. Students taking English and political science courses represent the top-two subject areas, whereas the order for the remaining nine areas differed, depending on whether the data were examined according to the total number of sessions conducted or according to the total number of unique users involved.

Table 8: Centre Usage by Top Subject Areas

| | Engl | Poli Sci | Nurs | Soc | Hist | Edu | Psyc | Enviro | Eng |
|---|---|---|---|---|---|---|---|---|---|
| Total users | 704 (24%) | 186 (6.3%) | 144 (4.9%) | 135 (4.6%) | 126 (4.3%) | 107 (3.7%) | 86 (2.9%) | 69 (2.4%) | 62 (2.1%) |
| | Engl | Poli Sci | Hist | Nurs | Soc | Edu | Psyc | Eng | Econ |
| Unique users/month | 460 (27%) | 99 (5.8%) | 97 (5.7%) | 78 (4.6%) | 77 (4.5%) | 59 (3.5%) | 58 (3.4%) | 43 (2.5%) | 32 (1.9%) |
| | Engl | Poli Sci | Hist | Soc | Nurs | Edu | Psyc | Econ | Com |
| Unique users | 283 (25.8%) | 65 (5.9%) | 65 (5.9%) | 54 (4.8%) | 48 (4.4%) | 39 (3.5%) | 39 (3.5%) | 25 (2.3%) | 22 (2%) |

*Note. Engl = English; Poli Sci = political science; Nurs = nursing; Soc = sociology; Edu = education; Psyc = psychology; Enviro = environmental studies; Eng = engineering; Hist = history; Econ = economics; Com = commerce.*

**Centre Usage by Type of Visit**

The centre provides both drop-in services and scheduled appointments. Findings

indicate that 62.8% of all the sessions were appointments, whereas 31.4% were drop-ins.

Overall, month-by-month usage patterns in terms of peak and declining periods were

similar over time. As presented by Table 9 and illustrated in Figures 2 and 3, however,

the percentages of unique users who made appointments did not increase as dramatically

as the total number of users. The percentage of unique users who dropped in actually

decreased over time. Results from the correlation analyses, although not statistically

significant, support a stronger tendency for the percentages of total users ($r = .341$) and

unique users ($r = .028$) with appointments to increase over time; however, the drop-in

rate decreased over time among unique users ($r = -.347$).

Table 9: Centre Usage by Types of Visit (Drop-in vs. Appointment)

| | Year | 2009 | | | | 2010 | | | | Total |
|---|---|---|---|---|---|---|---|---|---|---|
| | Month | 9 | 10 | 11 | 12 | 1 | 2 | 3 | 4 | |
| A | Total users | 40 (2.1%) | 265 (14.4%) | 365 (19.8%) | 132 (7.1%) | 156 (8.5%) | 234 (12.7%) | 477 (25.9%) | 173 (9.39%) | 1842 (62.8%) |
| | Unique users/month | 25 (2.3%) | 141 (13.3%) | 197 (18.5%) | 81 (7.6%) | 103 (9.7%) | 138 (13%) | 259 (24.3%) | 121 (11.4%) | 1065 (62.4%) |
| | Unique users | 25 (4%) | 126 (20.4%) | 127 (20.5%) | 33 (5.3%) | 61 (9.9%) | 66 (10.7%) | 132 (21.3%) | 49 (7.9%) | 619 (56.3%) |
| D | Total users | 28 (3%) | 187 (20.3%) | 184 (20%) | 91 (9.9%) | 66 (7.2%) | 101 (11%) | 211 (22.9%) | 52 (5.7%) | 920 (31.4%) |
| | Unique users/month | 22 (4.2%) | 121 (22.8%) | 104 (19.6%) | 62 (11.7%) | 38 (7.2%) | 55 (10.4%) | 103 (19.4%) | 25 (4.7%) | 530 (31.1%) |
| | Unique users | 22 (5.6%) | 109 (27.7%) | 75 (19%) | 38 (9.6%) | 32 (8.1%) | 35 (8.9%) | 68 (17.3%) | 15 (3.8%) | 394 (35.8%) |

Figure 2: Trend of Appointments from September 2009 to April 2010
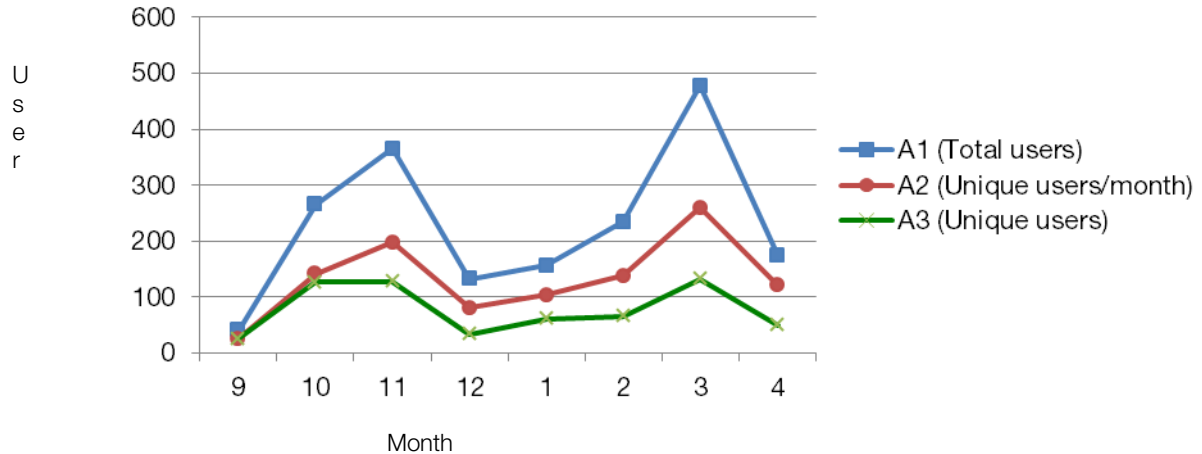


A chi-square test of independence was performed to examine the relations between types of visits (i.e., drop-in vs. appointment) and key variables (i.e., gender, degree level, and language backgrounds). The results show that the relation between types of visits (drop-in vs. appointment) and gender (male vs. female) was significant, $\chi^2(1) = 29.1$, $p < .001$, $N = 2756$. For female students, the proportion of their visits that were by appointment rather than drop-in (75.4%) was significantly higher than that for male students (24.5%). Between types of visits and degree levels (i.e., undergraduate vs. graduate), undergraduate students tended to drop in (83%) and make appointments (75%) more than graduate students did. The chi-square test indicated that the relation was significant, $\chi^2(1) = 18.72$, $p < .001$, $N = 2686$. The relation between types of visits and divisions of study was also significant, $\chi^2(3) = 8.80$, $p < .05$, $N = 2748$. Overall, students across divisions tended to prefer appointments to dropping in. Among these groups, students from the division of physical sciences (39.8%) tended to prefer dropping in and

students from the division of life sciences (73.4%) seemed to prefer making appointments

more than students from the other divisions. Finally, the relation between type of visit

and language group (i.e., EL1 vs. EAL), was not significant, $p > .05$. The relation

between the types of visits and the top-five language backgrounds, however, was

significant, $\chi^2(4) = 12.69$, $p < .001$, $N = 2396$, with percentages of appointments in the

order of French (72%), Chinese (71%), Japanese (66.9%), English (65.4%), and Farsi

(53.9%).

## Discussion

The importance of usage counts, which many have identified as one of the most

"basic" forms of assessment (e.g., Lerner 2003; Muldoon 2008), has been acknowledged,

but few have delved into what specifically can be "counted" other than such common

variables as the total number of users, the total number of EAL students, and repeat users.

The implications of systematically examining usage data in ways that go beyond

the conventional method of tabulating the total number of users are multi-fold. First, the

information obtained regarding user's types of visits, days of visits, degree programs,

year of study, gender, division, purpose of visits, and language backgrounds helps

construct a profile of who uses the writing centre, and when and why they use it. The

constructed profile should help determine whether the centre is serving the needs of the

students whom it intends to serve: Users are mainly female (69%), undergraduate (83%),

first and second year (60%), EL1 (65%) students in the division of social sciences (55%).

If the profile indicates a mismatch between intention and reality, then measures can be

taken to reach out to the target clients that the centre is designed to support.

Second, the analysis contributes to developing an understanding of how resources

are being utilized. In this case, comparing total users and unique users points to the need

to examine repeated usage beyond calculating the number of repeat users. Students'

repeated usage can be an indication that the centre is providing the types of support that

users need. If there are fewer unique users in proportion to the total number of sessions,

however, and the proportion of unique users seems to decrease over time, the numbers

may suggest that the increase in tutoring sessions may not be optimally serving or

benefiting more users, but instead helping only a select group of repeat users. As also

indicated in Carino and Enders' (2001) report, the number of visits by users might not

necessarily correspond with high levels of satisfaction, depending on whether one is

examining the satisfaction level in terms of students' perceptions of tutors' performance

or users' satisfaction regarding their own performance; for the former, the answer tends

to be an "yes," and for the latter, the answer tends to be a "no." With most centres facing

limited funding, available resources may be best directed toward generating the most

benefits for more users.

In addition, this repeated use might indicate that some students have become overly

reliant on the support, and the natural question would then be whether students were sent

away with the strategies they need to continue developing their own writing. This would

mean that other sources of information should be obtained to understand repeated usage.[2]

The usage information shows that 55.7% of the students were single-session users. For

the rest, 35% of the students visited the centre between 2 and 5 times, 5% visited between

6 to 10 times, 41 unique users visited the centre more than 10 times, 11 unique users

visited more than 20 times, and 6 unique users visited more than 30 times. The repeated

usage analysis, in combination with other sources of information at this point, supports

limiting[3] the number of repeat visits to ensure that the centre's practice is in line with its

mission statement: "We will help you acquire the skills necessary to tackle any of the

challenges that arise in the academic writing process. We won't edit or 'fix' your papers

for you; rather, we focus on *your* role in the process, allowing you to develop your

abilities and confidence as a writer."

Third, the trend-line analyses can reveal the centre's current and projected

developmental trajectory over time in terms of key variables that institutions identify as

important to track. The analyses performed on the basis of the fall and spring terms

clearly indicate that the percentage of unique visits decreased over time, whereas the

percentage of total visits increased over time. Future analyses involving multiple years

will facilitate assessments of the strength of trends over longer periods of time. In

addition, in this context, a growing segment of the student population has English as an

additional language and the university, like many others, is actively engaged in recruiting

international EAL students. Trend-line analyses will help the centre ascertain whether it

is dealing with changes in demographics and working in sync with the institution's

recruitment plan.

Fourth, information about preferences in types of visits (for example, females

tended to prefer appointments, and students across divisions tended to prefer

appointments, but students from the life-sciences division tended to prefer dropping in

more than students from other divisions), along with usage patterns over time and the

participation of students from various divisions, could be relevant to plans for staffing. In

our institutional context, the centre currently employs 15 tutors from 10 disciplines,

including English, Cultural Studies and Political Thought, History in Art, Geography,

Mathematics, Computer Science, Mechanical Engineering, and Law.[4] The fact that over

55% of users are from the social-sciences division has implications for tutor recruitment

and training, if the centre's philosophy is to involve tutors with specializations that match

users' degree choices. Recruitment and staff planning should carefully take into account

patterns of usage in terms of the key variables that a unit chooses as its focus.

Finally, as the framework for assessing students' first-year experience proposed by

Upcraft and Schuh (2000, as cited in Lerner, 2003), and adapted for writing-centre

assessment work by Lerner (2003), one of its components is to "use nationally accepted

standards to assess" (Lerner, 2003, p. 64). As Lerner pointed out, the field lacks

"standards" that writing centres can use to gauge their own effects. Furthermore, creating

such standards presents another challenge. Although the concept of "talent development"

proposed by Astin (1993) and supported by Lerner (2003) is a noble one, it seems to take

one back to the place where one started: How does one go about providing evidence to

determine whether the centre has "affect[ed] its students and faculty favorably,

[enhanced] their intellectual and scholarly development, [and made] a positive difference

in their lives" (cited in Lerner, 2003, p. 72)? Instead, through a systematic collection of

data, information about writing centres' usage, such as the summaries in the repository

maintained by the Writing Centers Research Project at the University of Arkansas, a

more detailed, categorized body of data can be used as a source for comparing the profile

of a centre that may have its own specific focus with centres at comparable universities.

## Conclusions

Few would argue that usage-profile data alone can address the efficacy of a

program or unit, or measure its impact fully. To understand the overall functioning of a

unit, broader and deeper measures must be taken at a well-integrated level, using multiple

sources of data, as in the current project, in which usage-profile analysis is one of the

components. Having said that, the reality may be that usage counts are the only form of

assessment that writing centres are conducting for various reasons. Findings from the

current study may prompt those who are currently collecting usage data to reconstruct their own usage profile and understand what makes their centres effective, or not. As Carino and Enders (2001) stated in their study about student satisfaction and frequency of visits, the quantitative approach taken in the present study, which can be replicated to suit the local context, can "add information to the intuitions, observations, hunches, suspicions, and guesses of daily experience" (p. 101). Furthermore, the figures in this paper provide what Carino and Enders called "footprints" to follow with other sources of information. Together, such endeavours can help demonstrate or validate what a language-support unit is doing for students and for the institution that it has been designed to strengthen. Most importantly, such programmatic thinking encourages those involved in writing-centre work to view the writing centre not just as a service unit, but as a part of each student's entire educational experience. Such broad-level thinking can be made concrete by the process of systematic assessment.

**Notes**

[1]The course titles are as follows: ENGL 115: University Writing; ENGL 135: Academic Reading and Writing; ENGL 146: Introduction to Literary Genres, Themes and Styles; ENGL 147: Introduction to Literary Traditions and Transformations; and SOCI 100: Introduction to Sociology: Institutions and Social Change.

[2]Users' perceptions related to the project's writing component showed that, for example, 74% of users perceived that they have learned how to teach themselves to find and correct grammatical problems. A total of 70% of users visited the centre for help with grammar in a piece of writing, and only 10% of students were not satisfied with the help

they received from the centre; 40% indicated that they were satisfied with the support received.

[3] In the current assessment project, qualitative and quantitative analyses of users' responses from writing-related perception and satisfaction surveys were considered as sources of data that corroborate with the recommendation.

[4] At the time of the study (i.e., 2009-2010), the centre had 11 tutors from across 11 fields, namely, English, political science, law, geography, mathematics, computer science, mechanical engineering, linguistics, applied linguistics, history in art, and education.

[5] A case in point: In the writing-related perception survey component of the project, 42% of users agreed with the statement that "When I sought help from the Writing Centre, the grade I received for that assignment improved." Rather than interpreting this as a direct indication of users' satisfaction or the centre's effectiveness, the interpretation about a centre's effectiveness must take into account such factors as the length of tutoring sessions (30 minutes at this institution) and other relevant sources of information, such as the centre-usage profile data, which showed that 55.7% ($n = 612$) were single-session users; the areas where users made a statistically significant improvement in their pre- and post-writing-centre-visit drafts, and a comparison with the data provided by 121 universities to the repository, which showed that 60% have tutoring sessions of 50 to 60 minutes, while 16.1% are 30 minutes in length. This information provides a firmer ground for recommending an extension of the current 30-minute session to 50 minutes, because an improvement in grades after a 30-minute session may not be a realistic goal or expectation.

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