



MINISTRY OF EDUCATION NEW ZEALAND

Te Tāhuhu o te Mātauranga Aotearoa



**Evaluation of Student Facing
Web-Based Services:
Studyit (Nielsen/NetRatings)**

Report to the Ministry of Education

M. Ingrey & T. Marlow

First edition: 2008

New edition (revised): 2009

ISBN: 978-0-478-13985-3

Web Copy ISBN:978-0-478-13986-0

RMR-917

© **Ministry of Education, New Zealand — 2009**

Research reports are available on the Ministry of Education's website Education Counts:
www.educationcounts.govt.nz/publications.

Opinions expressed in this report are those of the authors and do not necessarily coincide with those of the Ministry of Education



MINISTRY OF EDUCATION

Te Tāhuhu o te Mātauranga

Evaluation of Student Facing Web-Based Services: Studyit

Report

Ministry of Education Research Division Wellington

EXTERNAL RESEARCH CONTRACT WITH:

Nielsen//NetRatings

PREPARED BY:

Melanie Ingrey & Tony Marlow

Table of Contents

| | |
|---|-----------|
| Abstract | 1 |
| STUDYIT SERVICE EVALUATION: KEY CONCLUSIONS | 3 |
| Increasing the site's value | 4 |
| Methods | 7 |
| Phase 2 – Quantitative Online Survey | 7 |
| Sample Composition | 7 |
| Findings And Observations | 9 |
| Quality Of Service Provision | 11 |
| Perceptions of Service Performance | 11 |
| Satisfaction | 11 |
| Perceived Contribution On Studyit On Students' NCEA Performance | 16 |
| Perceived Usefulness..... | 18 |
| Operational Characteristics Service Reach..... | 19 |
| Demographic Profile | 19 |
| Level Of Education And Achievements | 20 |
| Representation Across School Decile | 21 |
| Accessibility | 22 |
| Sources Of Awareness Of Studyit Service..... | 23 |
| Immediate Learning For Young People | 25 |
| Patterns Of Usage | 25 |
| Frequency Of Visitation | 25 |
| Studyit Content Consumed..... | 29 |
| Use Of The Forums | 32 |
| Specific Subjects Used..... | 33 |
| Levels Of Engagement | 34 |
| Motivations For Use..... | 35 |
| Type Of Learning Encouraged By Studyit | 35 |
| Thinking | 35 |
| Making Meaning | 36 |
| Relating To Others | 36 |
| Managing Self..... | 36 |
| Participating And Contributing..... | 37 |
| Alignment And Transfer Of Learning | 39 |
| Study Behaviours | 39 |
| Use Of The Internet For Leisure And Learning | 41 |

| | |
|--|-----------|
| Home-Based Usage | 42 |
| School-Based Usage | 45 |
| Use And Perceptions Of Study Resources..... | 45 |
| Learning For Teachers And Other Adults | 49 |
| Awareness And Patterns Of Usage Of Studyit..... | 50 |
| Recommendation Of Resources To Students | 51 |
| Perceptions Of Quality Of Service Of Studyit | 55 |
| Recommendation And Positioning..... | 57 |
| Perceived Barriers To Use..... | 58 |
| Satisfaction across first time users and those who have visited more than once | 60 |
| Detailed satisfaction scores across site elements | 61 |

Abstract

This document is the final service report developed by Nielsen//NetRatings relating to the Studyit website and will be complemented by two similar reports relating to an evaluation of the Any Questions website and Wicked website.

It is a culmination of findings delivered through two phases of research activity relating specifically to the Studyit website – preliminary analysis of existing research materials and the conduct of quantitative research among the site’s current user base. Alongside this evaluation is one conducted by CORE Education, making use of a differing research methodology and analysis techniques to enhance the depth and breadth of the evaluation. This report delivers an evaluation of the extent to which the Studyit service impacts student learning as well as its impact on teachers, parents and other adults. It focuses on the findings from Nielsen//NetRatings’ core research activity for the study – a quantitative online survey among actual users of the Studyit website, both students and adult users; and incorporates key findings from the preparatory stage of research. Detailed findings from the preparatory stage of research are found in a supporting document.

On completion of the evaluations of the Studyit, Any Questions and Wicked websites, an holistic piece of analysis and reporting will be delivered to determine how web-based services (in general) are currently aligning and integrating with children and young people’s overall learning experiences and outcomes.

Studyit Service Evaluation: Key Conclusions

Young New Zealanders are increasingly embracing the online medium and it has become a source for both formal and informal learning. Both of these elements are facilitated by the Studyit service – formal and structured site content areas such as ‘Subjects’ and ‘Study and exam advice’; and the informal learning format of the forums, from which both posters and lurkers are gaining value.

Overall, student satisfaction with Studyit is high, with four in five users satisfied or very satisfied; and over three quarters perceive Studyit to be more useful, or as useful, as other online resources used for school. Those in the key target age for the site (16 to 19 year olds) are marginally more satisfied than younger students aged 10 to 15 years; and more intensive and longer term users of the service are also more satisfied, which is driving their continued visitation throughout the year.

The 24/7 availability of the service, the interaction with peers and teachers and the site’s relevance to NCEA assessments are key drivers of satisfaction and students in years 11 through 13 particularly value connection with other students and teachers. It is important to note, however, that just over one in three students have ever used the forums on Studyit but 16 to 19 year olds are four times more likely to use them than their younger counterparts. Of interest is that students attending lower decile schools reveal less use of the forums than others. Less than one in ten students had ever ‘emailed a teacher’ via the site but those who had displayed high levels of satisfaction with this service and in fact, the collaborative and communication elements of the site elicit the highest levels of satisfaction – the challenge is to encourage more students to use these functions.

The most popular areas of site content are ‘Subjects’, ‘Study and Exam Advice’ and ‘NCEA Requirements’, going against initial assumptions that the site is being used primarily for the forums -though there is a core group of active users of the forums, as evident from the high number of page impressions from this area of the site. Adults are positioning Studyit as a learning service or for study / assignment help – only 18% position the site as a place to communicate with other students. This reveals a need to better promote this aspect of the site to both adult recommenders and students themselves, highlighting the unique and beneficial nature of the forums while educating adults as to the safety of Studyit’s forums. This could be an important barrier to the degree to which adults position Studyit for communication – their hesitation to recommend an online service that may be perceived to have associated risks and dangers for students.

Also going against initial assumptions is the finding that after Maths, English is the most used subject on the site followed by Biology, Chemistry, Science and Physics; though active forum posters are more likely to be using the site for Science or Physics. As anticipated by the Studyit team, however, is that the site has a small group of loyal, frequent users and the survey found that close to one third of student users are first timers. This has implications for site usability practice and content, to ensure first timers have adequate introduction to the site and all its offerings and that they are guided into content areas with simple, straightforward language and explanations. Ultimately, the site should convert these first timers into longer term users who can be confident that the site will respond to their learning requirements or who simply gain value from the forums. While only 14% of students are highly active forum ‘posters’, a further half of students have ever posted but tend to read others’ messages or questions and there is little difference between the satisfaction of

posters versus 'lurkers'. This indicates that students can obtain just as much value from reading the posts, as they can from active participation. This element of the site is an excellent tool for teaching the core skills of relating to others, managing self and participating and contributing and it will be important to encourage greater trial and use of the forums among the two in three students not already doing so. Considerations include the development of an interactive and / or animated demonstration of the forums for new users as well as greater promotion and education of this service, as afore mentioned.

All in all, it appears that the benefits provided by Studyit, particularly to NCEA students, are being missed by a key group of students likely to obtain value from the service either through the formal or informal learning offered. The current student user base of the service has under-representation of students attending lower decile schools (decile 1, 2 or 3) – just 7% compared with 44% of students attending higher decile schools (decile 8, 9 or 10). This appears to be related to recommendation by teachers which is the greatest source of site awareness for students. Higher decile students are almost twice as likely to find out about Studyit from a teacher as are their counterparts at lower decile schools. Communication and education strategies are required to improve teacher awareness and levels of recommendation (particular teachers in lower decile schools), alongside search engine optimization strategies – search engines being the second most popular method of student awareness of the site.

Studyit users are also largely 'achievers' with only 6% not achieving NCEA Maths, Science and English. Overall, almost all student users are studying for NCEA (93%) and over half feel the site contributes to their NCEA performance, though only 9% feel it made a big contribution. While these findings are again testament to the site's overall contribution to learning and its value, it also reveals there is room for improvement unless a measure of success, unrelated to NCEA contribution and performance, is to be more valid. Skills such as communication, social interaction / relationships, empathy and the ability to assist others could be regarded as important take-aways from the site and could be tracked over time, as an additional measure of site performance and success.

Increasing the site's value

While Studyit is performing well among the current user base of students there is great potential to both encourage greater numbers of students to the site, and stimulate more use of the site among the existing user base – in terms of the areas of content and functions used as well as more frequent and ongoing usage. At present there is much 'dipping into' the site in response to a specific question or only at exam or assessment time. Much of the value that can be derived from the service can come from ongoing participation in the forums, meaning either posting and / or lurking, and only regular, ongoing use is likely to begin to build confidence to actually take the next step of communicating with others via the forums or to begin to get real value from reading others' online conversations and interactions. Effective moderation of the forums is vital to this learning and to ensuring recommendation of the service from adults, and this aspect should be maintained at its current high level. Forums are also an ideal function to stimulate repeat and frequent use of the site among students as they can be highly engaging and interesting – for both posters and lurkers. Through the forums, students can also be guided toward other areas of site content by posting links to handy resources which reside on both the Studyit site as well as other external sites.

To encourage more students to the site, teachers hold the key and while many teachers have passed on the message, there is a distinct discrepancy in lower decile schools and awareness and education campaigns

should begin with this group to reduce the present inequality. To account for home Internet accessibility issues among lower decile students, more school-based use of Studyit could also be encouraged, prompting teachers to introduce their students to the site and its content areas, particularly the forums, in a classroom environment, as a starting point for later independent use during study periods or lunch time.

Studyit's reach and contribution to student learning, outside formal NCEA performance, should continue to be measured and tracked over time to ensure that the impact of service refinements and marketing efforts are accurately captured and the continued improvement of the site documented.

Methods

Phase 2 – Quantitative Online Survey

Quantitative research using an online survey was administered via a site-intercept invitation among a random sample of visitors to the Studyit website. Users who wished to participate in the survey did so at the end of their visit to the site, so as not to disrupt or interrupt their experience on the site. Further details include:

Data was collected between 9 May and 1 August 2006

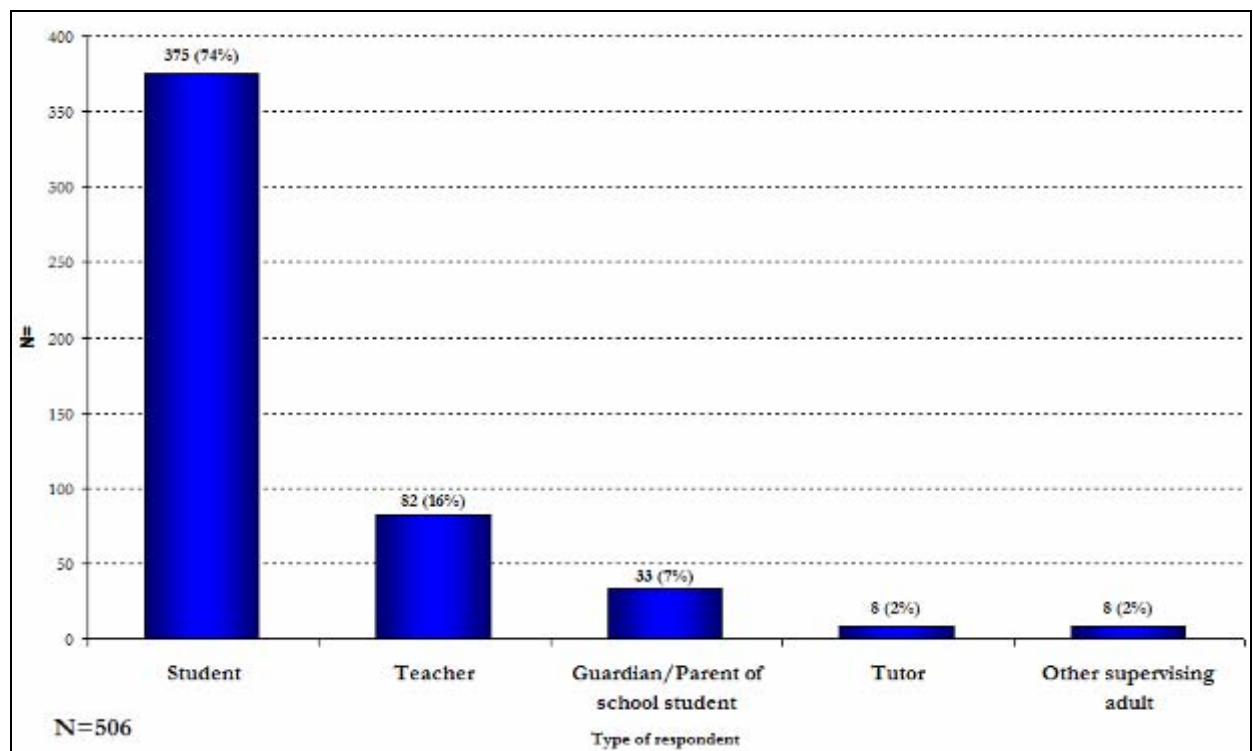
506 surveys were completed in total

Average completion time was 9.6 minutes for students and 5.7 minutes for adults

A 2% completion rate was achieved to date for the survey

Sample Composition

In total, 506 website visitors completed the survey, of which 74.1% were students, 16% teachers and 7% parents / guardians.

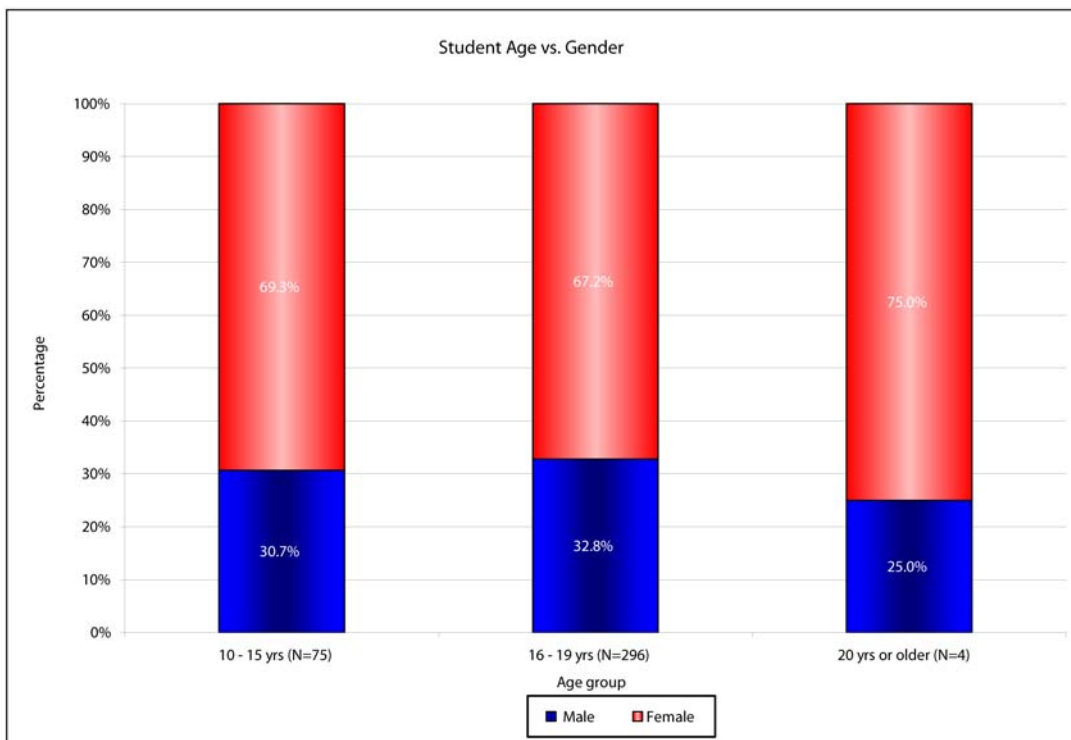


The table overleaf highlights the age breakdown by type of respondent. The majority of student users are aged between 16 and 19 years (close to 80%), which is the key target age for the service; while one in five are between 10 and 15 years of age and very few are aged 20 or above.

| | Student 74.1% | Teacher 16.2% | Guardian/Parent of a school student 6.5% | Tutor 1.6% | Other Supervising Adult 1.6% |
|-------------|--------------------------|--------------------------|---|-----------------------|---|
| 10 - 15 | 20.0% | 0.0% | 0.0% | 0.0% | 0.0% |
| 16 - 19 | 78.9% | 0.0% | 0.0% | 12.5% | 25.0% |
| 20 or older | 1.1% | 100.0% | 100.0% | 87.5% | 75.0% |

There are more female students in the sample than males; 254 of the 375 student respondents are females (67.7%) versus 121 males (32.3%). While this does provide evidence of more use of the site among females than males, it should also be noted that females are typically more likely to respond to surveys so this skew is likely over emphasised.

Across all ages of student, a similar gender breakdown is evident, as seen in the chart below:



Further information relating to the profile of student website visitors can be found within the Section, 'Service Reach'.

Findings And Observations

The findings and observations derived from this research and explored in this report cover four specific areas:

1. Quality of service provision
2. Immediate learning for young people
3. Alignment and transfer of learning
4. Learning for teachers and other adults

Each section of the findings and observations explores one of the four key areas outlined above and is intended to provide insight into how the usage patterns, behaviours and perceptions of site visitors interacts with the key goals for the Studyit service and, more generally, those of the Ministry of Education.

Where possible, this report has incorporated findings, knowledge and general commentary based on Nielsen/NetRatings' expertise in the field of Internet and technology. Particularly, learning's from market reports and non-confidential research concerning youth have been incorporated in some instances to supplement the primary research findings of the Studyit evaluation.

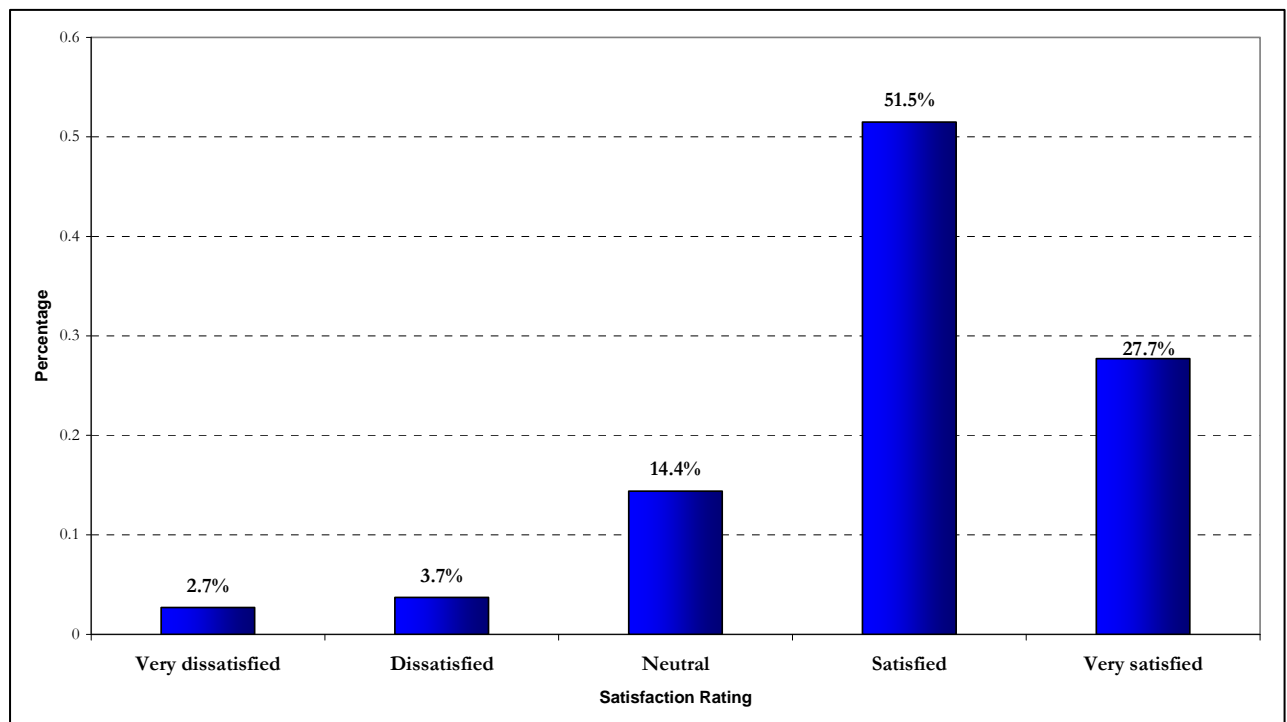
Quality Of Service Provision

- In this section, we explore students' perception and satisfaction with Studyit.co.nz, including that associated with specific areas and elements of the service.
- We also explore the impact of the service on students' performance and their overall perceived usefulness of the site.
- Finally, we look at the reach of the service to students who are diverse by geographical location, ethnicity, language, social status, ability, access to technology, and age; and the means by which they become aware of the site.

Perceptions of Service Performance Satisfaction

Students visiting the Studyit website reveal high levels of satisfaction and only 6.4% display dissatisfaction. Students who use the site more often and who have been using the site for a longer period of time are far more satisfied than first timers and infrequent users; and interestingly, those who visit regularly throughout the year are slightly more satisfied than students who visit mainly for exam preparation or with a specific question (94% vs 84%).

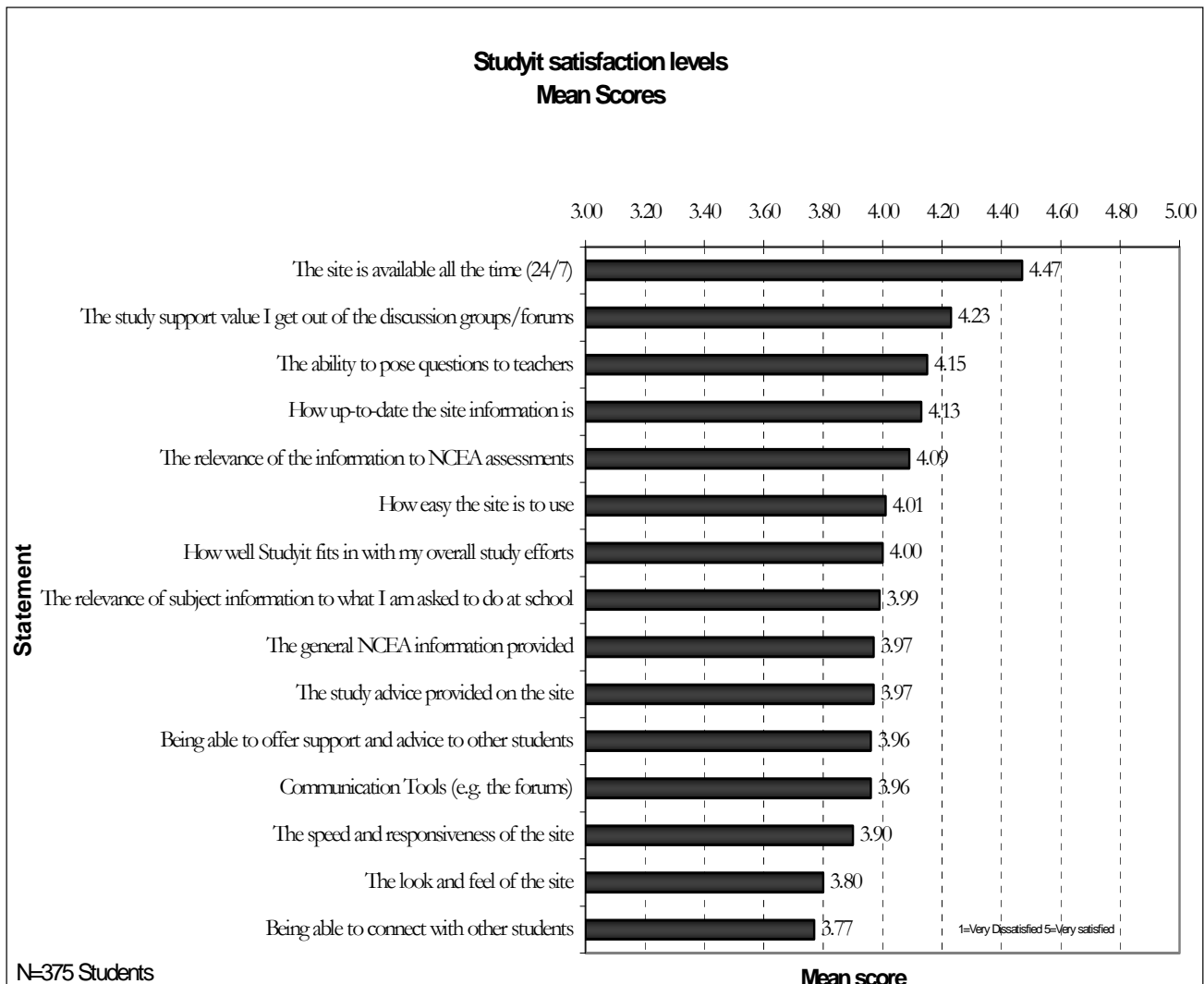
Overall, four in five students (79.2%) are satisfied or very satisfied with the site which is a strong result relative to many websites evaluated by Nielsen//NetRatings across a variety of industries and audiences.



Students within the key target age for the service, ie, 16 to 19 year olds, are marginally more satisfied than younger students aged 10-15, 79.1% compared to 72.0%; and males are more satisfied than females, 84.3% compared to 76.8%.

It is positive to note that students from low decile schools display similar levels of satisfaction with the service than their counterparts attending higher decile schools. The proportion who are ‘very satisfied’ is lower among those in 1-3 decile schools vs 8-10 decile schools (16.7% vs 27.1%) but combining ‘satisfied’ and ‘very satisfied’ measures reveals 75% for lower decile students vs 79.5% for higher decile students. There was no difference between mid decile and high decile students.

Contributing to students’ high levels of overall satisfaction are perceptions of specific elements of the service. As seen in the chart below, students are the most satisfied with the ability to access the website at all times – providing them with study assistance and the facilitation of communication with peers at all hours. The study support value of the discussion forums and the ability to post questions to teachers is also an area of high satisfaction for service users and one which differentiates the service from other tools.



Older students (16-19 years) exhibit higher satisfaction with all components of the site than do their younger counterparts. While the 24/7 availability is important to this group, aspects of the site relating to its relevance to NCEA assessments and the facilitation of support, communication and ‘connection’ with other students and teachers appears to be a valuable service for students in years 11 through 13.

| | All Students N=365 | Students 10-15 N=75 | Students 16-19 N=296 |
|---|-------------------------------|--------------------------------|---------------------------------|
| The site is available all the time (24/7) | 4.47 | 4.23 | <u>4.52</u> |
| The study support value I get out of the discussion groups/forums | 4.23 | 4.17 | 4.23 |
| How up-to-date the site information is | 4.13 | 4.06 | 4.13 |
| How easy the site is to use | 4.01 | 3.86 | 4.05 |
| The relevance of subject information to what I am asked to do at school | 3.99 | 3.84 | 4.02 |
| The relevance of the information to NCEA assessments | 4.09 | 3.84 | <u>4.15</u> |
| The study advice provided on the site | 3.97 | 3.82 | 4.00 |
| How well Studyit fits in with my overall study efforts | 4.00 | 3.81 | 4.04 |
| The speed and responsiveness of the site | 3.90 | 3.78 | 3.92 |
| The ability to pose questions to teachers | 4.15 | 3.70 | <u>4.25</u> |
| The general NCEA information provided | 3.96 | 3.64 | <u>4.04</u> |
| Being able to offer support and advice to other students | 3.96 | 3.56 | <u>4.05</u> |
| Communication Tools (e.g. the forums) | 3.96 | 3.55 | <u>4.05</u> |
| The look and feel of the site | 3.80 | 3.54 | <u>3.86</u> |
| Being able to connect with other students | 3.77 | 3.40 | <u>3.84</u> |

Among males and females, levels of satisfaction are fairly similar. The two exceptions relate to the study support value that the discussion groups/forums provide and the ability to connect with other students – females are more satisfied with these elements of the site, than are males. It is interesting to note that where satisfaction with specific components of the site is similar, males are more likely to give a higher rating for their overall satisfaction with the site.

Among students from low decile schools, the website availability (24/7) is favourable, as is its ease of use and the ability to pose questions to teachers. These students are also more satisfied than others, with areas such as the site’s study assistance and relevance, and the ability to connect with other students. They are only

slightly less satisfied with support through the forums and the communications tools generally, than are their counterparts attending mid and high decile schools. Indications are that lower decile students make less use of the forums on Studyit (25% vs 35% of those from higher decile schools) which potentially stems from lower confidence in communicating with, and asking questions of peers¹. These students should be encouraged to make use of these communication tools to elicit more benefit from the service.

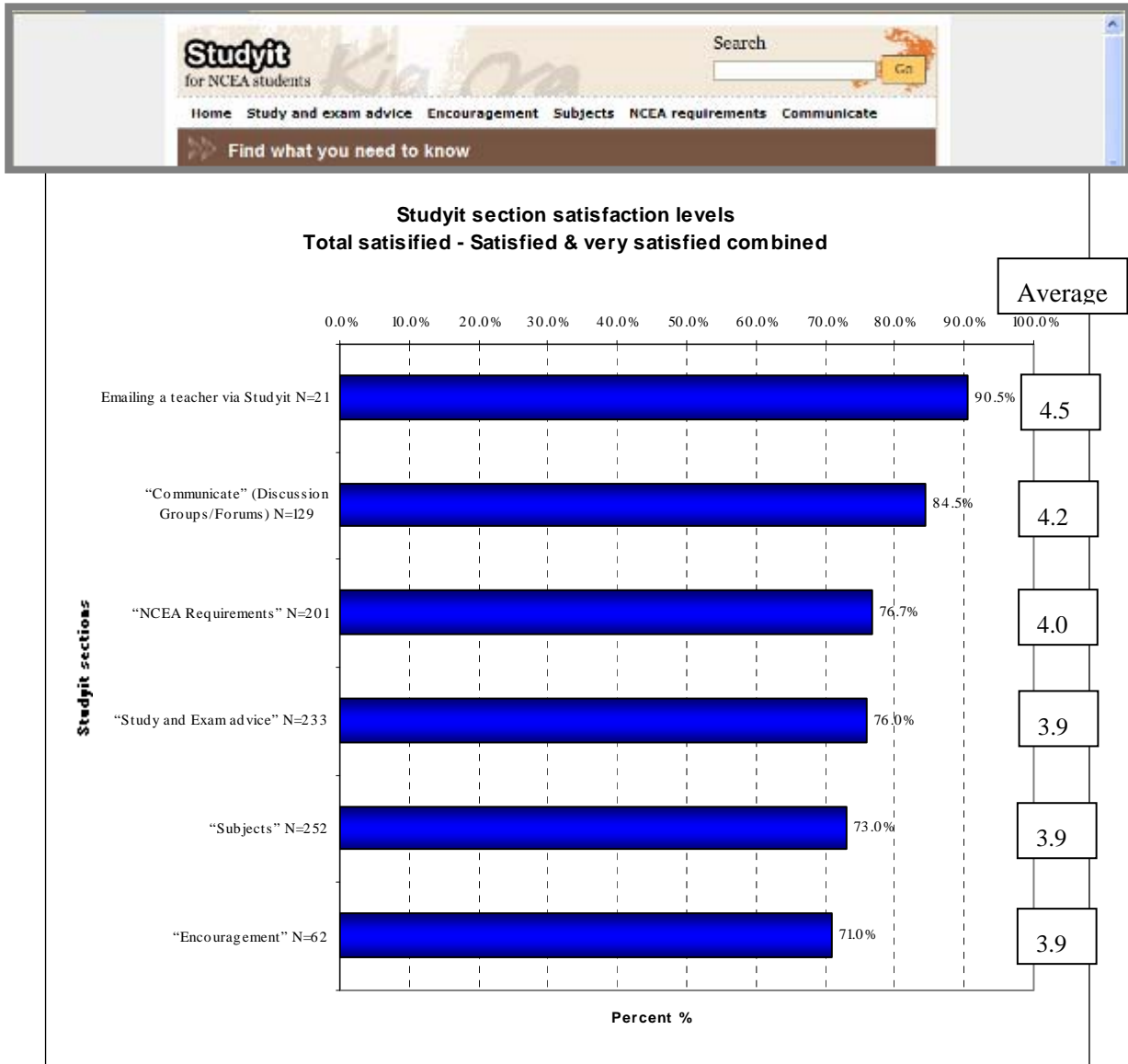
| | All Students N=365 | Low decile 1-3 Students N=121 | Mid Decile 4-6 Students N=254 | High Decile 7-10 Students N=254 |
|---|-----------------------|--|--|---|
| The site is available all the time (24/7) | 4.47 | <u>4.62</u> | 4.55 | 4.41 |
| The study support value I get out of the discussion groups/forums | 4.23 | 3.70 | 3.75 | 3.87 |
| How up-to-date the site information is | 4.13 | 4.09 | 4.18 | 4.12 |
| How easy the site is to use | 4.01 | <u>4.42</u> | 3.98 | 4.01 |
| The relevance of subject information to what I am asked to do at school | 3.99 | <u>4.13</u> | 4.02 | 4.00 |
| The relevance of the information to NCEA assessments | 4.09 | <u>4.22</u> | 4.10 | 4.10 |
| The study advice provided on the site | 3.97 | <u>4.27</u> | 4.07 | 3.93 |
| How well Studyit fits in with my overall study efforts | 4.00 | <u>4.17</u> | 4.03 | 4.02 |
| The speed and responsiveness of the site | 3.90 | 3.91 | 3.81 | 3.99 |
| The ability to pose questions to teachers | 4.15 | <u>4.29</u> | 4.24 | 4.12 |
| The general NCEA information provided | 3.96 | <u>4.17</u> | 4.03 | 3.97 |
| Being able to offer support and advice to other students | 3.96 | 3.84 | 4.05 | 3.94 |
| Communication Tools (e.g. the forums) | 3.96 | 4.00 | 3.94 | 4.06 |
| The look and feel of the site | 3.80 | <u>3.96</u> | 3.78 | 3.80 |
| Being able to connect with other students | 3.77 | <u>4.14</u> | 3.73 | 3.83 |

Of great interest (and as mentioned earlier) is the finding that satisfaction levels increase for all aspects of the site the more frequently users visit the site. While this is not surprising given that higher satisfaction is likely to stimulate repeat visitation, it is also important to ensure that first time users are satisfied with the site from the outset to encourage further visits.

The chart below reveals the proportion of students who were either 'satisfied' or 'very satisfied' across each of the Studyit website sections and functions. "Emailing a teacher via Studyit" has the highest satisfaction rating of all the sections at 90.5%, while "Communicate" has the second highest satisfaction rating at 84.5%. Please note, however, that only 21 students responded to the 'emailing a teacher' rating question and this finding should be treated as indicative only, due to the small sample size.

¹ These results are indicative only based on a low base of lower decile students (n=24)

The three sections with the highest usage “Subjects”, “NCEA Requirements” and “Study and Exam advice” achieve slightly lower measures of satisfaction while the little used “Encouragement” section (only 17% of students had visited this area) is slightly lower again, at 70% satisfaction.



The average score (out of a maximum 5) is also noted for each section.

Across the various student profiles some subtle differences are evident in their satisfaction with specific areas of site content; namely that:

- Older students are more satisfied with “Communicate” (49% are very satisfied and a further 36% satisfied) vs younger students of which 38% are very satisfied and the same proportion satisfied
- Interestingly, students aged 10 through 19 reveal similar levels of satisfaction toward the “Study and exam advice” section and 16-19 year olds are only slightly more satisfied with the “NCEA requirements” section
- Males are slightly more satisfied than females with the “Subjects” section (78% very satisfied or satisfied vs 71%) and females are more likely to feel neutral toward the category (33% vs 22%)

- Females reveal more satisfaction with the “Communicate” section (ie the forums) – 52% are very satisfied and 35% satisfied compared with males, 43% very satisfied and 38% satisfied
- Females are also slightly more likely to be satisfied with “NCEA requirements” than are males
- There is indication that females are more satisfied with the “Encouragement” section²
- Indications are that those in lower decile schools display similar levels of satisfaction with all of the main categories of content³ as their counterparts in mid and higher decile schools

Further charts relating to student satisfaction with the site and its individual areas can be found in the Appendices.

Perceived Contribution On Studyit On Students’ NCEA Performance

Among students using the site, 93% are studying for NCEA; just under half studying Level 3 NCEA.

Of NCEA students, over half (54%) feel that Studyit made a contribution to their performance. 9% feel the site made a very big contribution while 45% feel it had made some contribution.

Males and females felt very similar toward the service’s contribution to their achievements and as seen in the table below, it is positive to note that indications are that students in low decile schools are more positive toward the service having a big contribution to their NCEA performance than are mid and high decile students, though there was a much higher proportion who ‘didn’t know’ what contribution had been made.

High decile students are more likely to feel negative toward Studyit’s contribution to their performance; close to one in five (or more) feel it is not making much of a contribution or had not contributed to their NCEA performance. This correlates with some of the satisfaction ratings for various elements of the site – high decile students were less likely to be satisfied with the study advice and general NCEA information provided, and with the ability to pose questions to teachers, than were those in low and mid decile schools.

| | Low decile students N=24 | Mid decile students N=133 | High decile students N=161 |
|--|-------------------------------------|--------------------------------------|---------------------------------------|
| Studyit made a very big contribution to my NCEA performance | 16.7% | 10.5% | 6.2% |
| Studyit made some contribution to my NCEA performance | 29.2% | 48.9% | 42.2% |
| Studyit didn't make very much of a contribution to my NCEA performance | 16.7% | 10.5% | 21.1% |
| Studyit did not contribute to my NCEA performance at all | 8.3% | 16.5% | 18.6% |
| Don't know | 29.2% | 13.5% | 11.8% |

² Samples are fairly low for this section, n=41 females and n=21 males

³ Samples for lower decile school students are particularly low in some areas; n=19 Study and exam advice, n=5 Encouragement, Communicate and NCEA Requirements, n=14 Subjects

With respect to achievement levels in specific subjects, a pattern emerges whereby those who achieved NCEA with excellence or merit are generally more positive toward Studyit's contribution to their performance. This holds true for Maths and Science but is less pronounced for English, possibly due to the type of learning that takes place for English as opposed to subjects like Maths and Science. Aside from Maths though, English is the next popular subject and just over half of all students use the site as a learning tool for this subject (refer section 'Specific subjects used' for more detail).

Results for the three subjects can be seen below:

| MATHEMATICS | NCEA Students N=348 | Not achieved N= 18 | Achieved N= 107 | Achievement with merit N= 134 | Achievement with Excellence N= 89 |
|--|------------------------|-----------------------|--------------------|-------------------------------------|---|
| Studyit made a very big contribution to my NCEA performance | 9.2% | 0.0% | 6.5% | 9.7% | 13.5% |
| Studyit made some contribution to my NCEA performance | 44.8% | 33.3% | 39.3% | 48.5% | 48.3% |
| Studyit didn't make very much of a contribution to my NCEA performance | 15.8% | 11.1% | 15.9% | 16.4% | 15.7% |
| Studyit did not contribute to my NCEA performance at all | 16.4% | 22.2% | 16.8% | 14.9% | 16.9% |

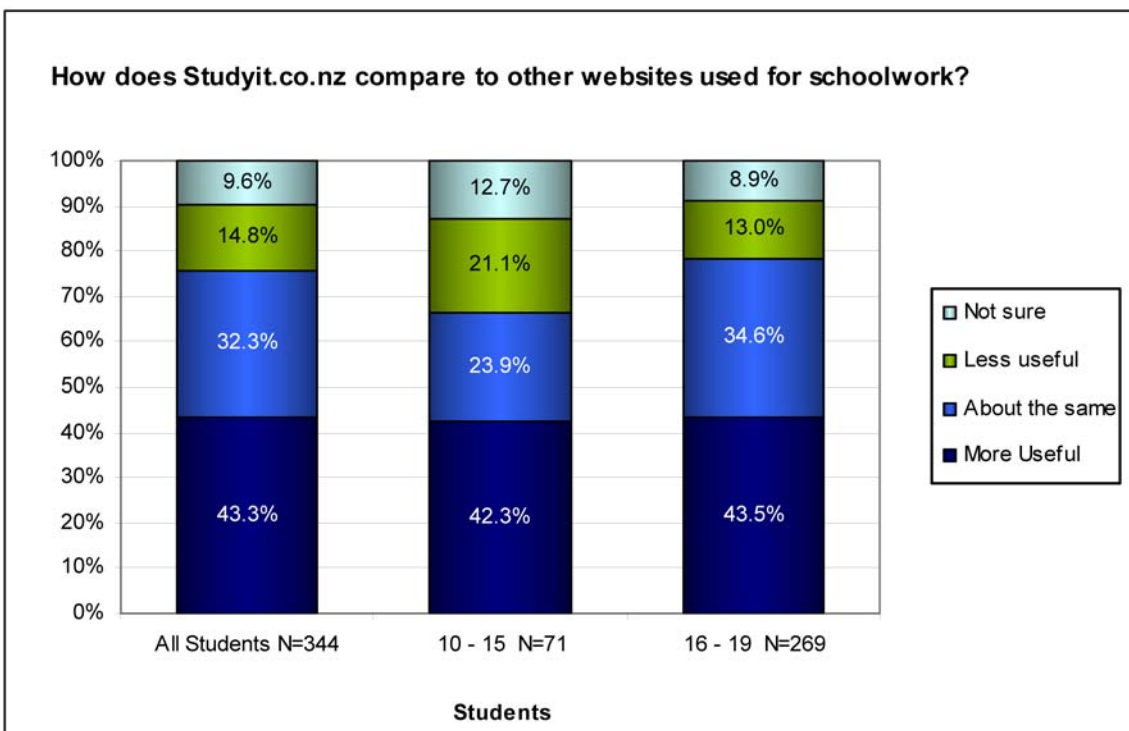
| SCIENCE | NCEA Students N=348 | Not achieved N= 22 | Achieved N= 90 | Achievement with merit N= 130 | Achievement with excellence N= 106 |
|--|------------------------|-----------------------|-------------------|-------------------------------------|--|
| Studyit made a very big contribution to my NCEA performance | 9.2% | 0.00% | 10.0% | 7.7% | 12.3% |
| Studyit made some contribution to my NCEA performance | 44.8% | 22.7% | 37.8% | 51.5% | 47.2% |
| Studyit didn't make very much of a contribution to my NCEA performance | 15.8% | 9.1% | 17.8% | 14.6% | 17.0% |
| Studyit did not contribute to my NCEA performance at all | 16.4% | 27.3% | 14.4% | 14.6% | 17.9% |

| ENGLISH | NCEA Students N=348 | Not achieved N= 22 | Achieved N= 133 | Achievement with merit N= 117 | Achievement with excellence N= 76 |
|--|------------------------|-----------------------|--------------------|-------------------------------------|---|
| Studyit made a very big contribution to my NCEA performance | 9.2% | 4.5% | 9.8% | 10.3% | 7.9% |
| Studyit made some contribution to my NCEA performance | 44.8% | 31.8% | 43.6% | 46.2% | 48.7% |
| Studyit didn't make very much of a contribution to my NCEA performance | 15.8% | 18.2% | 15.0% | 13.7% | 19.7% |
| Studyit did not contribute to my NCEA performance at all | 16.4% | 13.6% | 14.3% | 19.7% | 15.8% |

Perceived Usefulness

Over 43% of students feel Studyit is a more useful website than others they have used. A further 32% believe it is ‘about the same’ which leaves just under a quarter who feel it is less useful or they are not sure. Please note, in-depth examination of the variety of resources used by students (both online and offline) can be found in the section, Alignment and Transfer of Learning, further in this report.

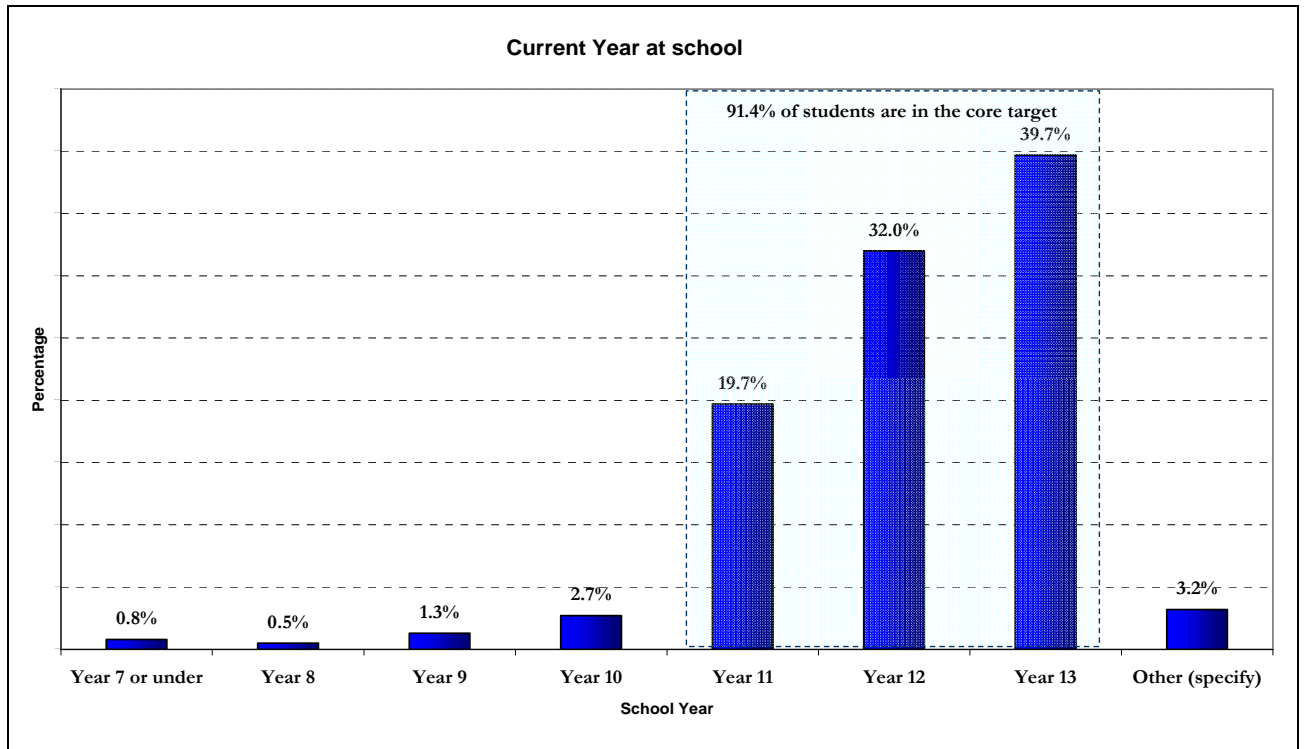
Not surprisingly, students within the site’s core target age (16-19 years) are slightly more likely to hold it in higher regard compared with other online resources they use for their studies. Over three quarters of 16-19 year old students (78.1%) find Studyit to be as useful as, or more useful than, other websites used for schoolwork.



Operational Characteristics Service Reach

Demographic Profile

Studyit.co.nz users are predominantly in School Years 11 to 13, with final year students (Year 13) making up the largest group of students at 39.7%. This representation is consistent with the site target audience and its objective of assisting students with their NCEA exams, assessments and preparation.

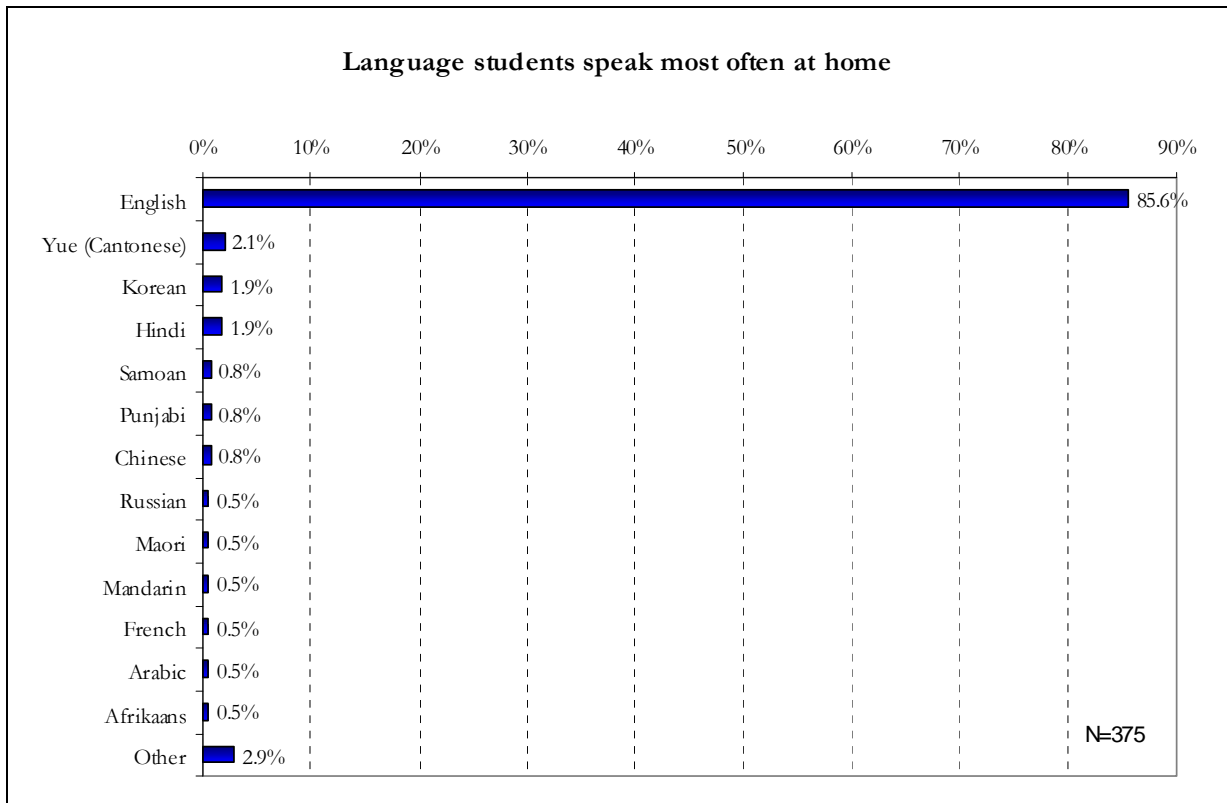


As noted in the Background section, two thirds of student users are female.

Students predominantly state that English is the language most often used at home (85.6%) but a total of 27 different languages were specified overall (as seen in the chart overleaf). Maori is mainly spoken by less than 1% of the user base which is below the New Zealand population rate of x%. As found in the Expert Usability Review activity, there is no option to receive the Studyit content in languages other than English.

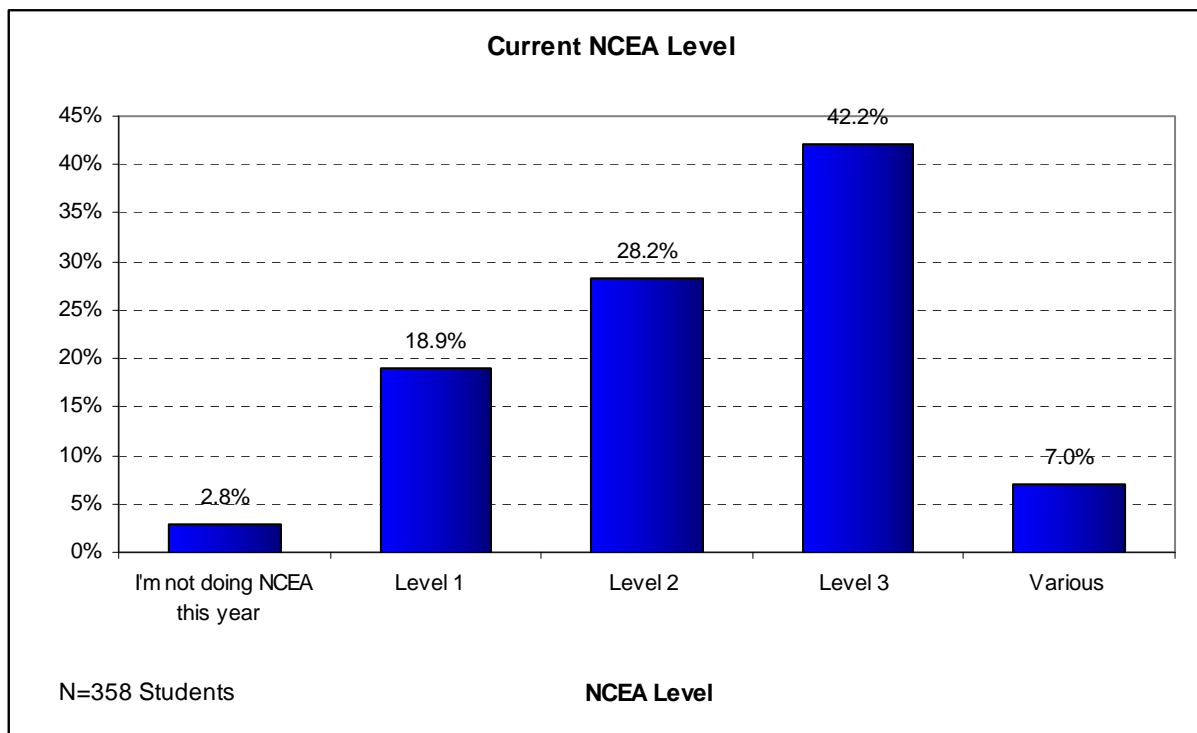
It is positive to note though, that the 14% not speaking English as the main language at home are only slightly less likely to make use of the forums (30% vs 35%) and they are more likely to be 'very satisfied' with the site (33% vs 27%) and more satisfied with the ability to connect with other students (33% vs 22%). Satisfaction with 'ease of use' was very similar across the two groups and those speaking another language are slightly more satisfied.

This provides indication that there are no barriers to ease of use among those of a 'non English speaking background'.



Level Of Education And Achievements

Correlating with students' age and school year, over two in five students are currently working on level 3 NCEA, as seen in the chart below.



The table below shows students’ level of achievement for three core NCEA subjects. Studyit students are “Achievers” – with just 5.2% of students using the website not achieving NCEA Maths and 6.3% of users not achieving NCEA for Science and English.

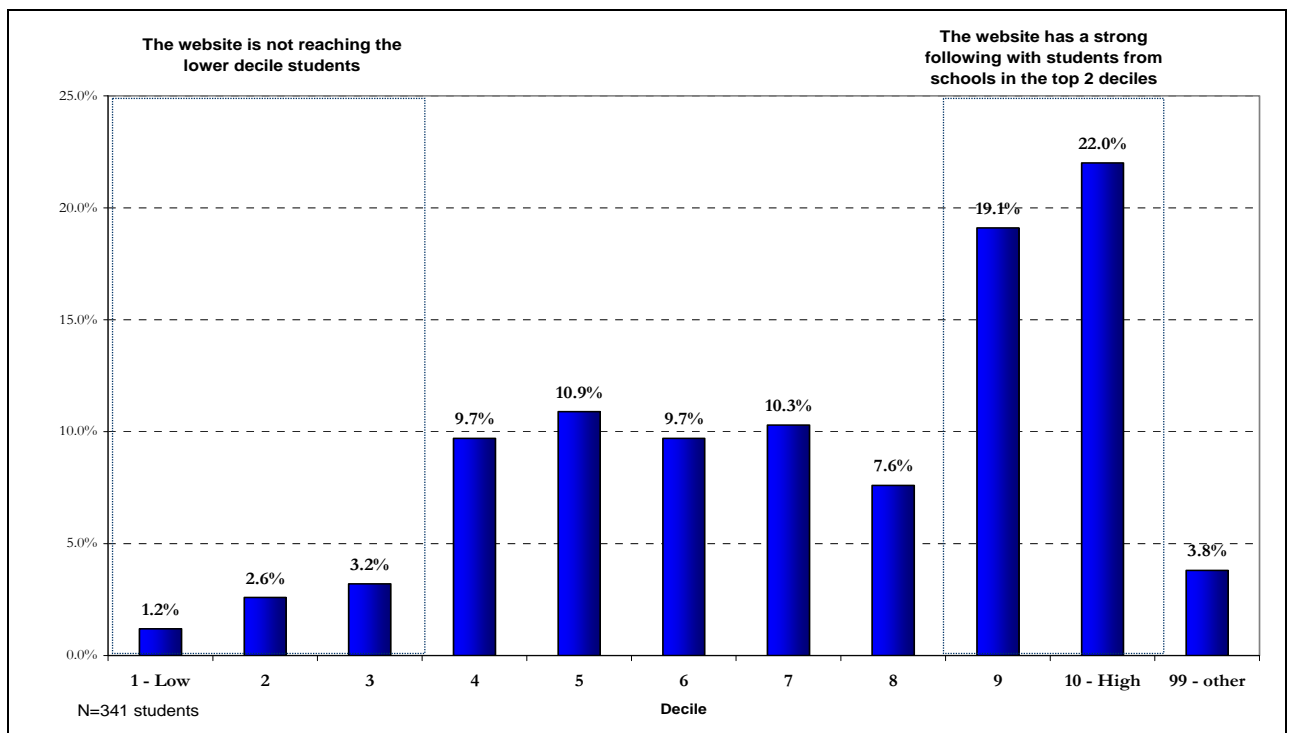
| | Not achieved | Achieved | Achieved with merit | Achieved with excellence |
|----------------|--------------|----------|---------------------|--------------------------|
| NCEA – Maths | 5.2% | 30.7% | 38.5% | 25.6% |
| NCEA – Science | 6.3% | 25.9% | 37.4% | 30.5% |
| NCEA – English | 6.3% | 38.2% | 33.6% | 21.8% |

Across gender, males are achieving higher levels of NCEA in both Mathematics and Science, whereas females are achieving higher levels of excellence in English. This follows males’ and females’ use of the site for specific subjects, though females were stronger users for Science. A table of these results can be found in the Appendices.

Representation Across School Decile

The chart below plots the school deciles of students visiting the Studyit website. The website does not seem to be reaching many students in the lower deciles one through three, and is over-represented in the top two deciles, 9 and 10.

As seen in the section, Sources of Awareness, there is far less encouragement and promotion of the site among teachers in lower decile schools and this is an important finding from the research.



Accessibility

Almost all student users (95.7%) have access to the Internet at home – this is higher than seen among the general population of 15 to 17 year olds in New Zealand of which 78% have Internet access at home. Almost three quarters of all student users of Studyit have access to the Internet via the school computer room (74.1%) and 73.6% have access through the school library (73.6%). Internet access is mirrored for both students of 10-15 and 16-19 age groups. The one exception is location “somewhere else” where 20% of students aged 10-15 years have access compared to half the proportion (10.8%) of students aged 16-19 years.

Students attending lower decile schools are less likely to have Internet access at home compared to students in mid to high decile schools, but they are more likely to have access to the Internet in the classroom and ‘somewhere else’ than other students. This may relate to relatives’ or friends’ homes.

| | Low decile student 1-3 N=24 | Mid decile students 4-7 N=138 | High decile students 8-10 N=166 |
|------------------------|--|--|--|
| Home | 87.5% | 96.4% | 97.0% |
| Computer room @ school | 79.2% | 72.5% | 81.3% |
| School library | 83.3% | 70.3% | 78.9% |
| Class @ school | 58.3% | 32.6% | 39.8% |
| School study centre | 4.2% | 10.9% | 15.7% |
| Somewhere else | 16.7% | 10.1% | 13.3% |

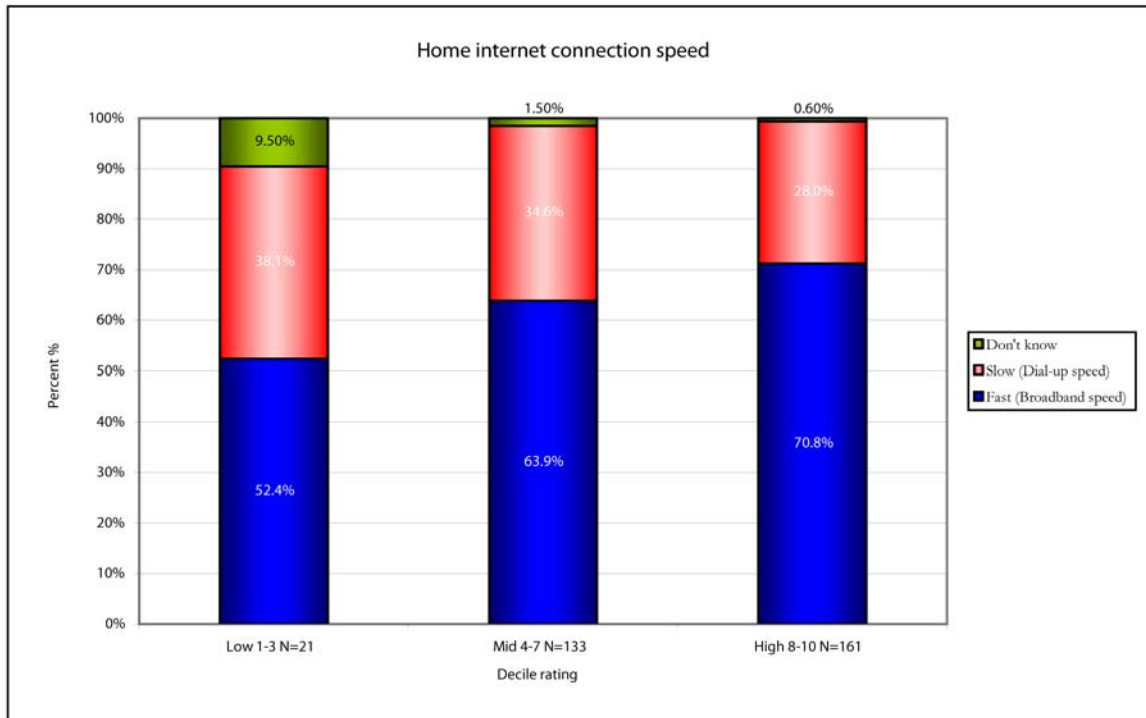
These findings are consistent with those from Nielsen//NetRatings’ NetWatch Internet Audience Monitor in which Maori children have been found to have less access to the online medium than other children of the same age; particularly in relation to home access (49% vs 78% of 15-17 year olds).⁴

Two in three (65.7%) student users also have broadband Internet access at home. This compares to just 22% of the total New Zealand population⁵ who have home access to broadband and reinforces that the user group is largely comprised of a high access user base. Not surprising given the cost of broadband, high decile students are more likely to have broadband at home (70.8%) compared to just over half (52.4%) of lower decile students.

However, those with broadband are not more satisfied than those who access Studyit via dial up – which is an important finding considering the fairly low level of broadband penetration within New Zealand households and the access differential seen between higher and lower income homes.

⁴ Nielsen//NetRatings NetWatch, Q3 2005

⁵ Nielsen//NetRatings NetWatch Market Report, Q2 2006



Sources Of Awareness Of Studyit Service

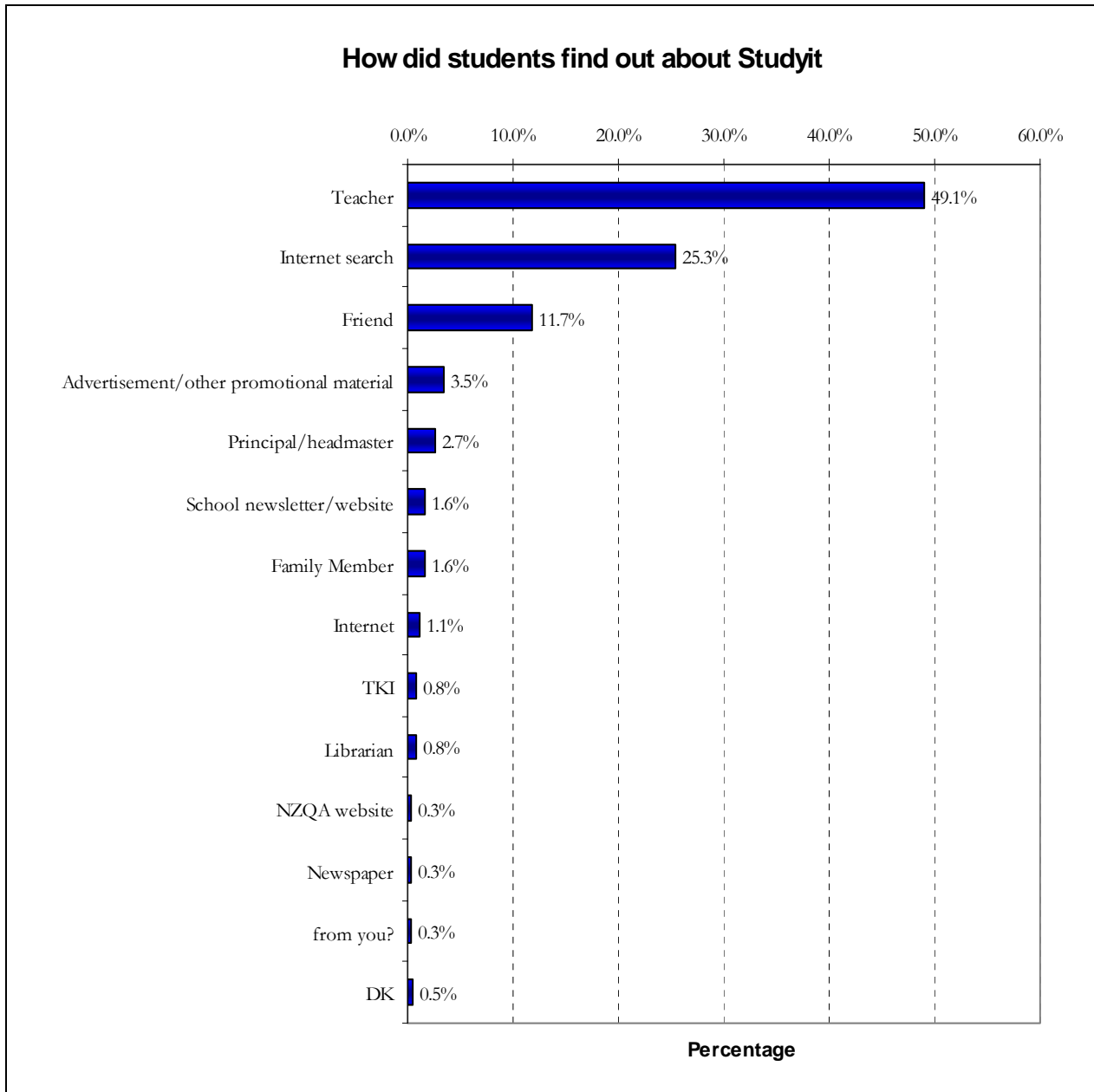
Teachers are by far the greatest source of awareness of the site for student users, followed by search engines and then word of mouth from peers. Offline advertising plays an extremely minor role. This is a far different story to that seen generally for website awareness whereby word of mouth from friends is stronger at 46%, search engines are slightly less important (14%) and teachers are far less influential – just 5% of children and young adults mainly find out about websites this way.⁶

An important finding is that students from higher decile schools are almost twice as likely to find out about the Studyit website from a teacher compared to lower decile students, 59.0% compared to 33.3% for students from a decile 1-3 school. Lower decile students are more likely to find the website through an Internet search or from a friend. This highlights a significant difference in the encouragement given by teachers in differing types of schools.

While there are few differences between younger and older students, recommendation from friends is far more important for older students' awareness of Studyit (14% vs 4%) while search is slightly more prevalent for younger students (31% vs 24%).

Female students are more likely to find out about the site by using a search engine than males, 28.7% vs 18.2%.

⁶ Nielsen//NetRatings eGeneration NZ study, 2005-2006



Immediate Learning For Young People

In this section, we explore the kinds of learning that are happening through the use of Studyit.co.nz – breaking down student learning into the five core areas: Thinking, Making Meaning, Relating to others, Managing Self and Participating and Contributing.

We also ascertain students' motivations for using the site and their patterns of usage of the Studyit service.

Patterns Of Usage

Since launch, the number of users to the Studyit site has seen a great upward trend with 149% growth in unique visitor numbers for the period of May to December 2004 versus 2005 (there was little traffic between January and April 2004 as this was the pre-launch period of the site and comparisons against these periods would skew the results). November, which was proven to be the heaviest usage month for the site in both 2004 and 2005 as students prepare in earnest for the completion of their NCEA studies, showed an increase of 57% in unique visitors in 2005 versus 2004. The number of repeat visits also improved slightly in 2005 to 1.49 visits per unique visitor per month versus 1.42 in 2004.

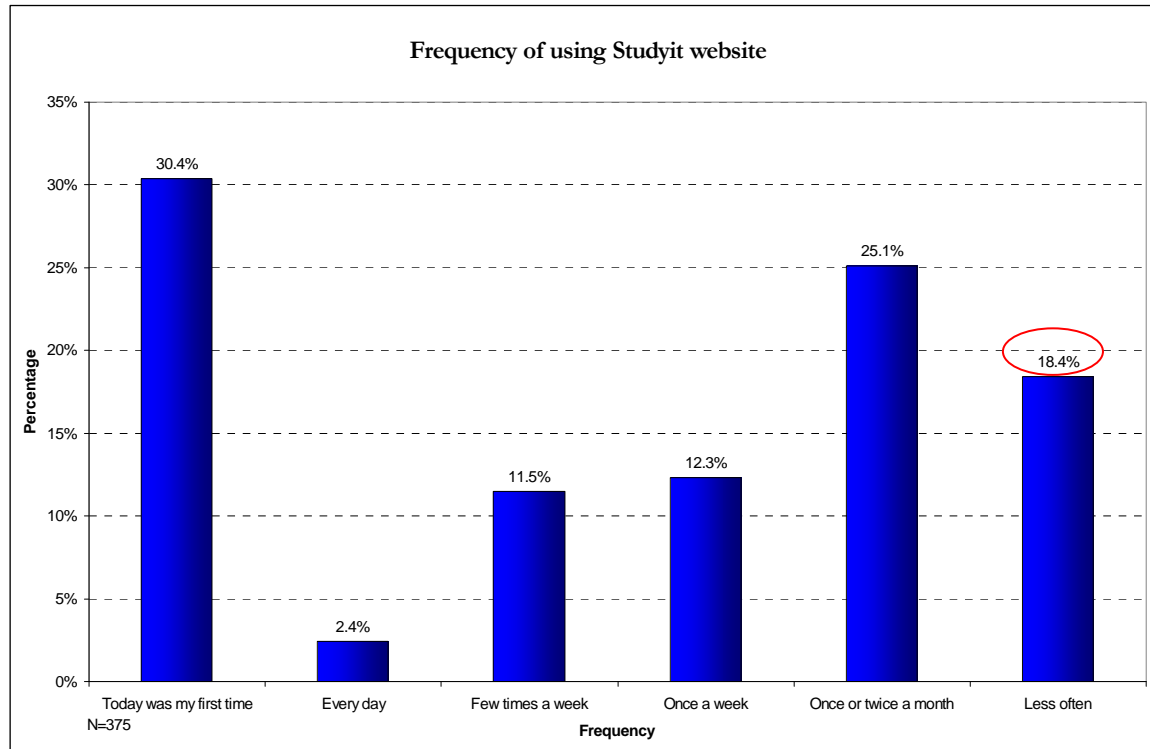
These findings are consistent with those from the survey – over half of student users mainly visit the site to prepare for exams or assignments (further discussed later in this section).

Frequency Of Visitation

Just under one in three student users of the site are first time visitors (30.4%) and just over one in four (26.2%) visit Studyit once a week or more often. This reveals a core group of loyal, frequent users. On further investigation, this group is more likely to:

- be in Year 13 (47% vs 32% of infrequent or first time users); and far less likely to be in Year 11 (14% vs 26%)
- be studying for NCEA Level 3 (51% vs 34%)
- achieve Maths, Science and English NCEA with merit or excellence
 - Maths: 74% vs 54%
 - Science: 78% vs 57%
 - English: 60% vs 51%
- feel that Studyit contributed to their performance (13% vs 5% 'big contribution' and 65% vs 23% 'some contribution')
- use all areas of Studyit than infrequent users, particularly the forums (52% vs 16%)
- spend more time studying (42% spend more than 5 hours each week studying vs 26%)

- be only slightly more likely to spend more time online (65% spend more than 5 hours each week vs 59%)
- feel that student forums / chat groups are important, if not very important, to helping their study (77% vs 30%⁷)

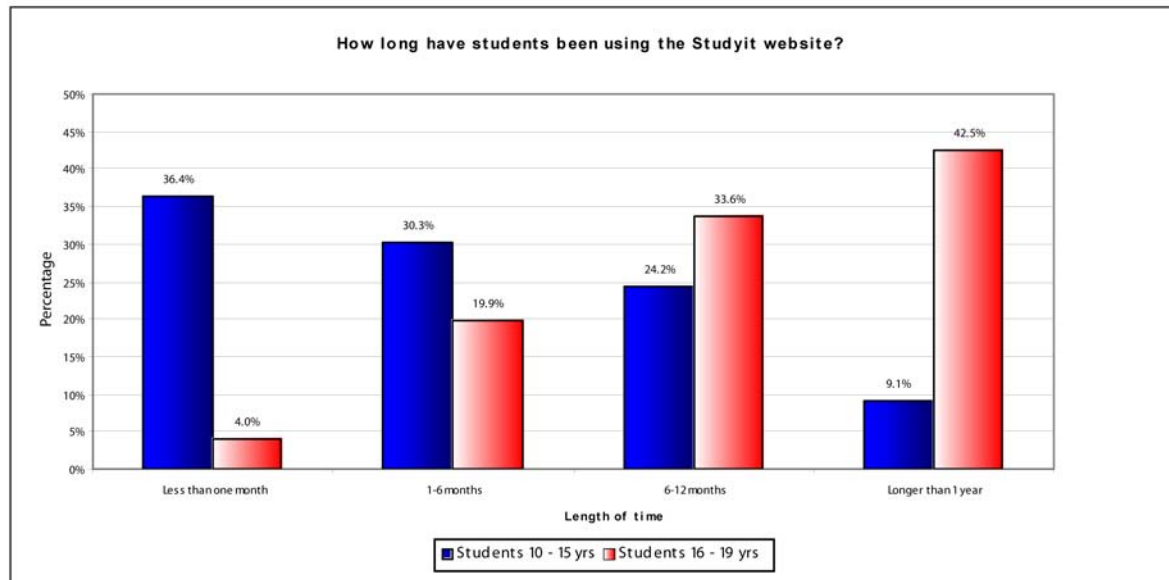


There is no significant difference in the frequency of use amongst male and female students.

Younger students are far more likely to be first time users than those aged 16-19 years (56% vs 24%) while the core target age group (16-19 years) are more regular users of the service – 55.4% visit at least once a month compared with 34.6% of 10-15 year olds. Just under one in three 16-19 year olds visit Studyit at least once a week though the site does not stimulate much daily use as do some online resources like instant messaging services, search engines and perhaps webmail.

⁷ Please treat this finding as indicative only, based on a small sample of infrequent users who answered this question (only 10); the 77% among frequent users is accurate though, based on a sample of n=39

Website tenure is another important measure that supports perceived usefulness and satisfaction with the site. Testament to Studyit's appeal and usefulness among repeat visitors, close to two in five have been using the website for more than a year. This is predominantly those aged 16 to 19, as highlighted in the chart below.



It is interesting to note that, with the exception of those who have only been using Studyit for less than a month, patterns in frequency of visiting the site are very similar across long and medium term users (6 months to more than one year) and newcomers (1-6 months). This indicates that once the site has been deemed valuable enough to prompt repeat usage (which generally occurs after only a visit or two), frequency of visitation remains similar.

Those in high decile schools are slightly more likely to have been using the site for more than a year (40% vs 31% of those from low decile schools). Consequently, they are also far less likely to have been using the site for less than a month (6%) compared with low decile students (23.1%). This may be a ramification of less encouragement to use the site from teachers (refer section 'Sources of Awareness') but also potentially that lower decile schools have lagged in their widespread access to technology like PCs and Internet access.

With regards to the place of accessing the Studyit website, the largest proportion of students access from home and cite 'home' as the main place of access (85%). This correlates with their main Internet access point as found through this survey and NetRatings' market study of 6 to 17 year olds.⁸

Over one in five students access the Studyit website via the school library (24.3%) or the classroom (22.4%), though fewer students name these locations as their 'main' place of accessing the site (8% and 4% respectively). While 'home' is the main location for all decile groups, only 71% of those in low decile schools are mainly accessing at home compared with 88% for mid decile schools and 86% for high decile schools. This is not surprising given the differing levels of home Internet access and speed afforded to low

⁸ Nielsen//NetRatings New Zealand eGeneration Study 2005 - 2006

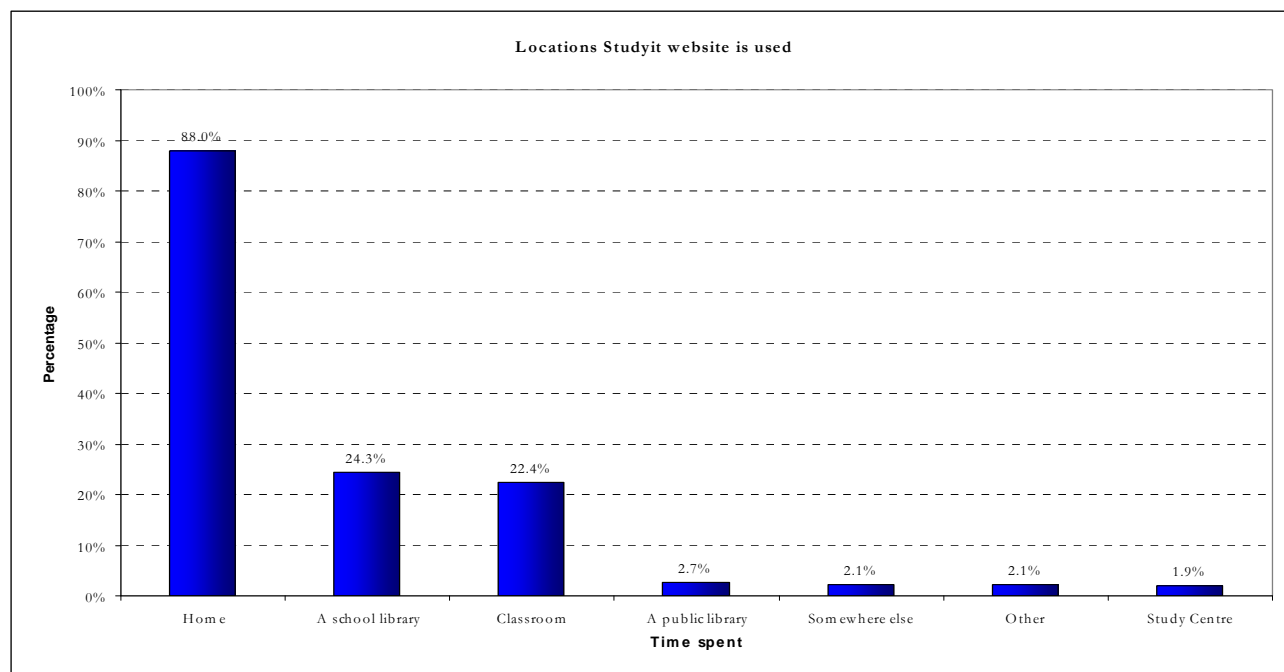
decile students - 87% vs 97% among high decile students. This finding reinforces the need to encourage school-based usage to ensure that all students have access to the benefits of online resources like Studyit.

Other access points such as public libraries see very little usage.

There is no significant difference between male and female students' location for accessing the website, though older students (16-19) are three times more likely to connect via the school library than younger students. Similarly, almost one in four (24%) 16-19 year olds are accessing the Studyit website in the classroom compared to less than one in five (17.3%) students aged 10-15 years.

Interestingly, the pattern reverts for 'main place of access' as 16% of younger students mainly access in the classroom compared to only 6% of older students. Both groups predominantly name home as the main place of access though (87% of 16-19s and 79% of 101-15s).

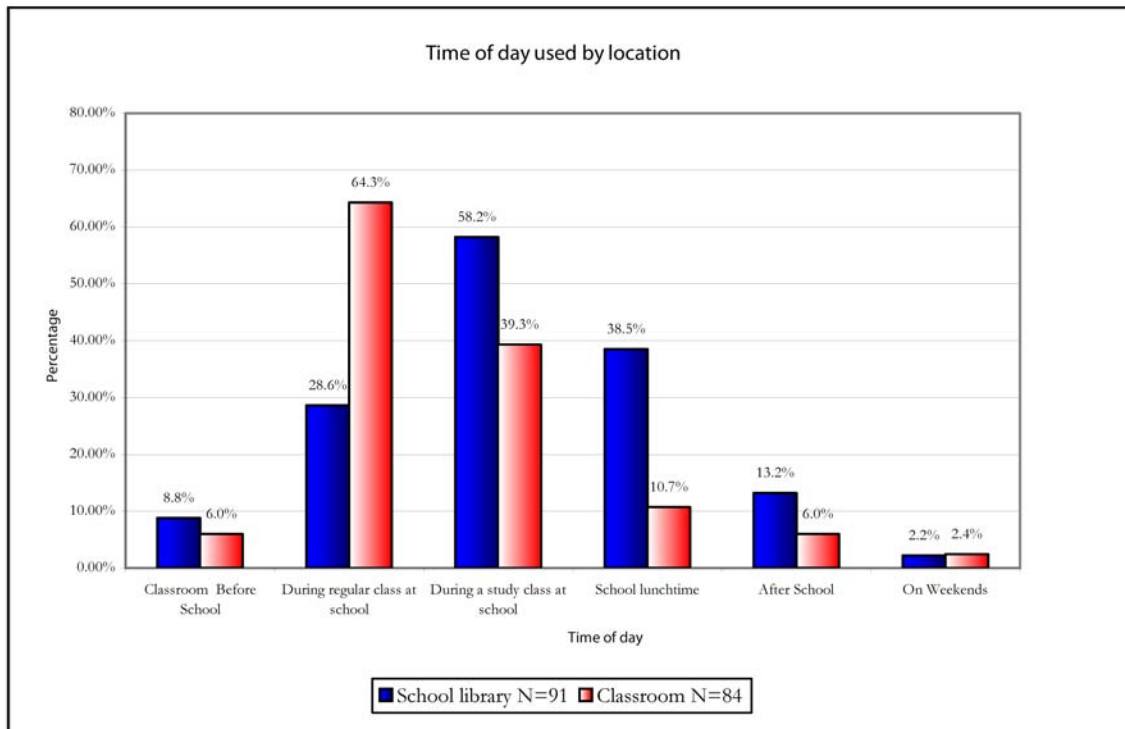
This may correlate with teacher-directed or encouraged use for younger students as opposed to independent use among older students – however, there was little difference between the extent to which older vs younger students were told about the site by a teacher.



Among the majority of students who access the site from home, 85% do so after school and 64% do so on the weekends. As found in the preparatory analysis, little pattern was found in the average visit duration during weekdays and weekends.

Among students making use of the site in the school library, over half access during a school study class and over one third at lunch time. A further 28% claim to access Studyit from the school library during a regular class and 13% do so after school.

The majority of those accessing in the classroom do so as part of a regular school class while a further 39% do so as part of a study class.

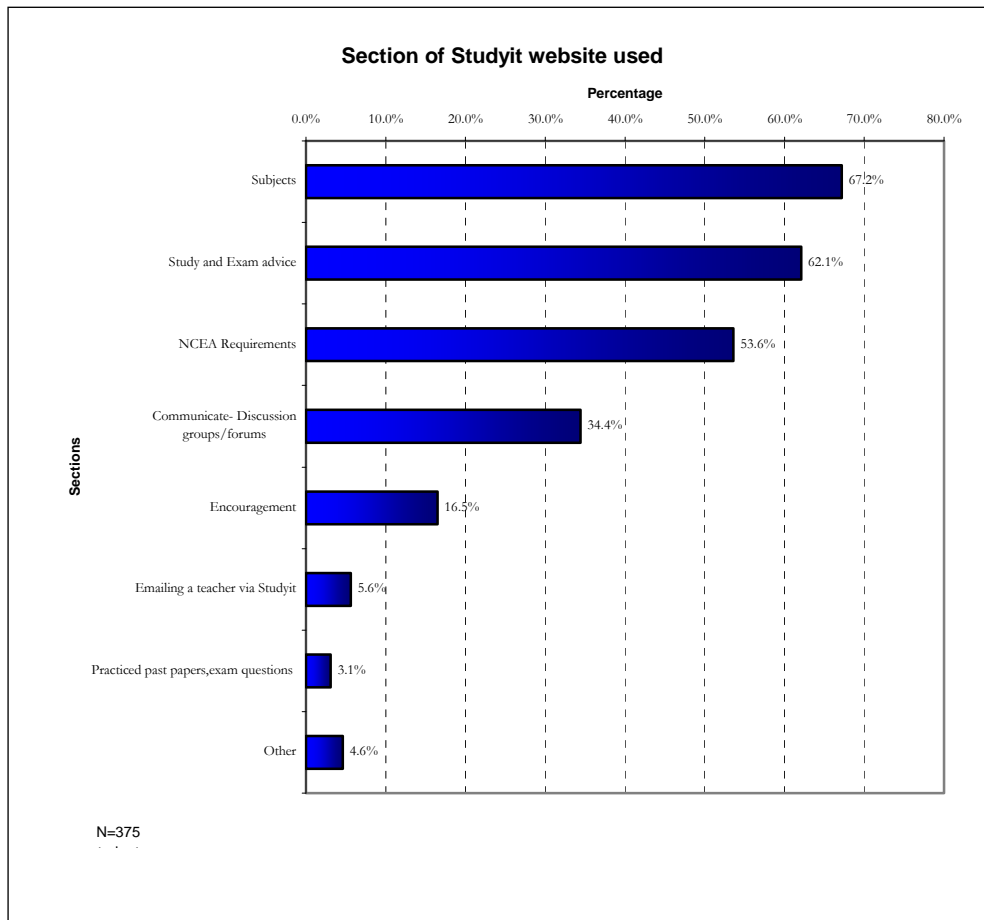


Studyit Content Consumed

Students are making use of a fairly good cross section of the site's functions and content areas as seen in the chart below. The "Subjects" section has the highest usage overall with two thirds (67.2%) of students using the section. "Study and Exam advice" and "NCEA requirements" are also popular, which correlates with the 93% who are studying for NCEA.

These findings are largely consistent with those from the analysis of site measurement data, but based on page impressions only, the 'Subject' areas are the second most heavily used section behind the forums. However, this inconsistency between survey and site measurement findings is likely a ramification of the number of pages that each user 'clicks into' within the forums in contrast to fewer within 'subjects'. Similarly, the measurement data sees around one fifth of the page impressions within each subject area attributed to the 'Links' and 'Practice Questions' pages while the survey found that only around 3% of students had visited this content.⁹ This suggests that the few who do visit these content areas consume a fairly large number of pages – though this finding is indicative only.

⁹ Note, all site measurement statistics quoted are from the month of November 2005; selected as a sample month for analysis

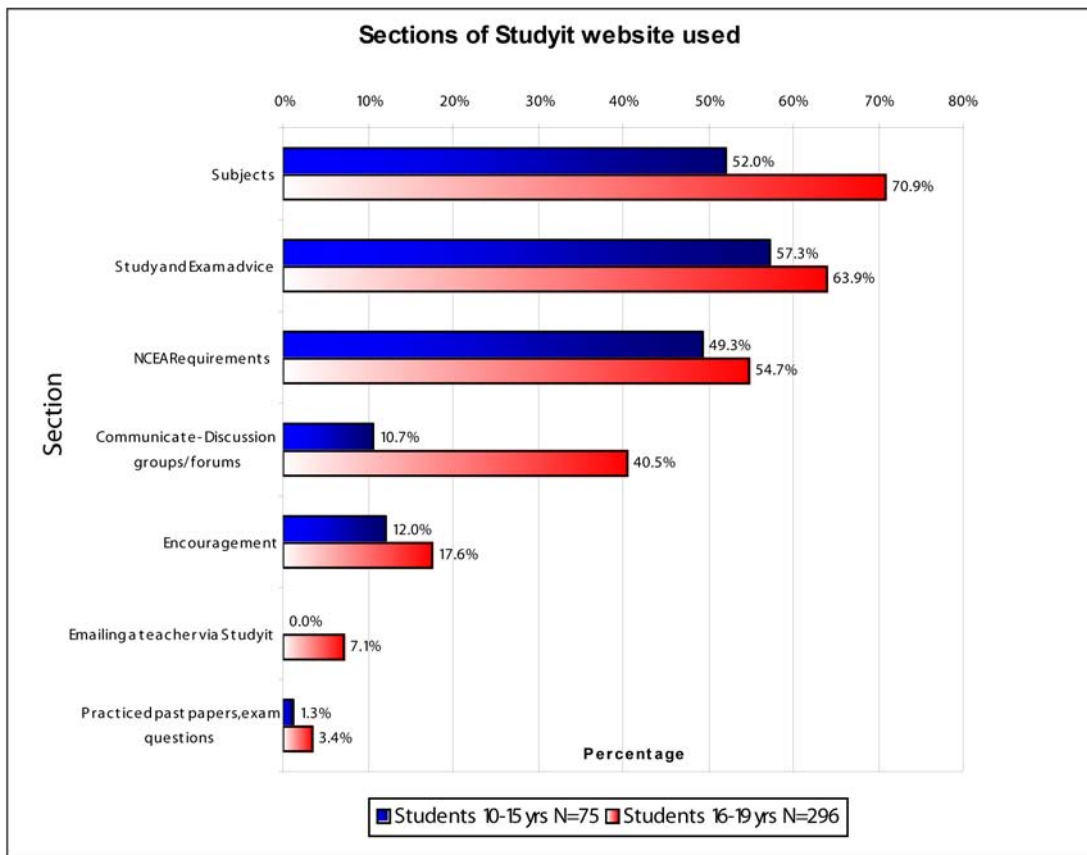


The forums are used by one in three students and very few students have ever emailed a teacher via Studyit (just 6%)¹⁰. As mentioned on the previous page, the site measurement analysis found that the forums were the most heavily used area of the site in terms of page impressions – the forums accounted for 39% of all page impressions (PIs) during August 2005 and 50% of PIs during November 2005.

The discussion boards are very popular amongst 16-19 years – they are four times more likely to use this section compared to students aged 10-15 years.

Older students aged 16-19 are using all sections of the site more than 10-15 year olds which is not surprising given they are more frequent users of the site overall and have been making use of the site for a longer time period. The “Subject” section is the most used section among 16-19 years (70.9%) while slightly more younger students visit ‘Study and Exam Advice’.

¹⁰ This may be an issue with the prominence of the function. CORE Education’s testing may shed some light.



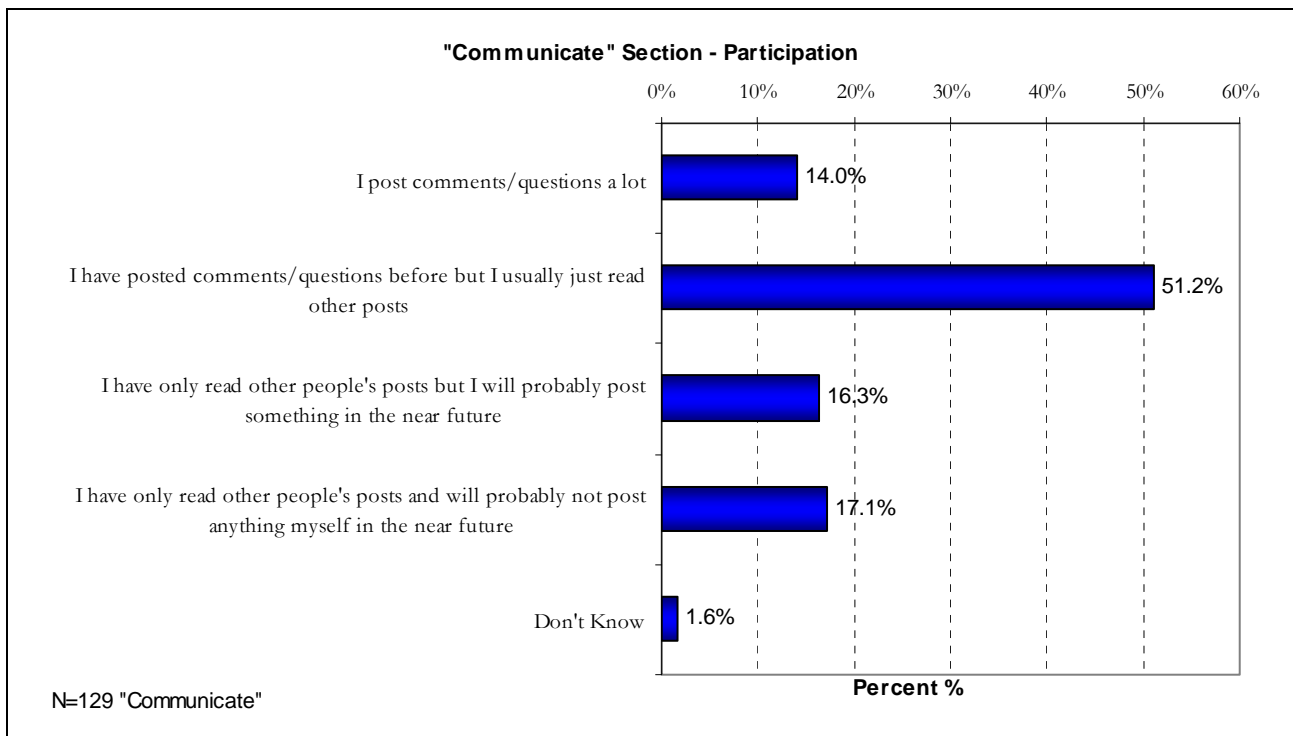
Interestingly, those at lower decile schools are more likely to use ‘Study and Exam advice’ and the ‘NCEA Requirements’ sections of the site than are their counterparts at higher decile schools, but less likely to use the forums. These findings are consistent with the satisfaction levels exhibited by these groups of students, with lower decile students being more satisfied with the site’s study assistance and relevance and slightly less satisfied with the support offered through the forums. These results are indicative only, based on a sample of only 24 students from lower decile schools.

| | Low 1-3 N=24 | Mid 4-7 N=138 | High 8-10 N=166 |
|--------------------------------------|-----------------|------------------|--------------------|
| Subjects | 58.3% | 68.1% | 68.1% |
| Study and Exam advice | 79.2% | 67.4% | 61.4% |
| NCEA Requirements | 70.8% | 60.1% | 48.2% |
| Communicate-Discussion groups/forums | 25.0% | 35.5% | 35.5% |
| Encouragement | 20.8% | 17.4% | 16.3% |
| Emailing a teacher via Studyit | 0.0% | 5.8% | 6.6% |
| Practice past papers, exam questions | 4.2% | 2.1% | 2.4% |

Use Of The Forums

An important and unique element of the Studyit site and service are the online forums – moderated by teachers but largely facilitating support and communication from and with peers. This aspect of the site is consistent with the means by which young people now connect with one another, obtain social skills and social confidence and communicate with others across town and city, and even national, borders. A website launched last year in the US, myowncafe.org, was developed on this principle and one of the site managers stated “The site has to have an interactive component. Adults mainly use the Internet for research but teens use it mainly for communication.”¹¹

A healthy one in three (34.4%) students use the ‘Communicate’ section of the Studyit website. The chart overleaf looks at students’ level of participation of this section. Only 14% of students are very active and post questions and comments ‘a lot’ while just over half have posted comments or questions but tend to read others’ messages or questions. One in three have never posted a comment / question – around half of this group feel they will post something in the future but the other do not intend to post comments or questions. It is promising to note that forum behaviour is not impacted by Internet connection speed – those with dial up at home behave the same way as those with broadband.



Male students are more likely to have posted in the past (72% vs 62%) but females have intentions to post (19%) and similar proportions intend to keep reading posts but not contributing (17%).

While there may be some relationship between students’ confidence and the degree to which they post messages on the site, there is little difference in the levels of satisfaction with the site, between those who

¹¹ “Libraries using Web to snare teens”, Christine Wallgren, The Boston Globe (www.globe.com), 15 December, 2005

actively post messages vs those who simply read the comments on the forums. This is evidence that just as much value can come from reading the posts as making comments or asking questions. In some cases, however, the samples became too small for a thorough analysis.

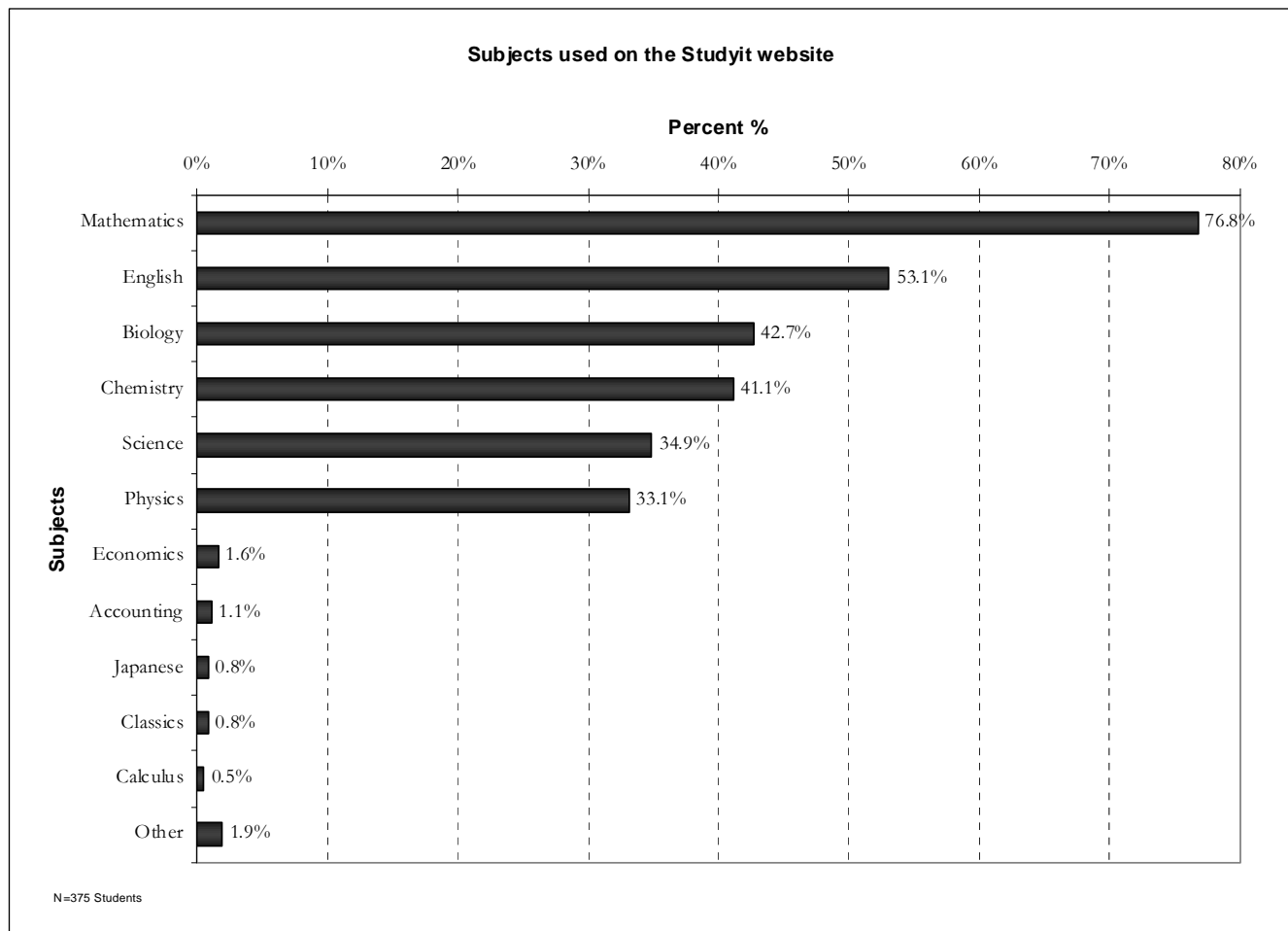
It is interesting to note some subtle differences between participation in the forums across various subject areas. Those using the site for Science and Physics are slightly more likely to have posted comments and questions on the forums in the past (75% and 70% respectively) followed by English and Biology (67%), Maths (66%) and Chemistry (62%).

The postings are also largely made by 'high achievers' and those who are highly positive about the site – 41% of those who post comments / questions a lot feel that Studyit made a very big contribution to their NCEA performance vs less than one in ten of those who mainly read others' posts. Interestingly, those who post a lot are far more likely to be high achievers in Maths and Science, while both lower and higher achievers in English reveal similar patterns in their use of the forums. This provides some indication that students of varying abilities in English are willing to post questions on the forums, while largely confident students are asking and responding to questions about Maths and Science.

Specific Subjects Used

Over three quarters of students are drawing on the Studyit service to support their learning of Maths and this is very similar among younger and older students; as is Science (37% younger vs 34% older students). English, biology, chemistry and physics is far more popular among 16 to 19 year olds.

On average, students have used the site to support their learning of 3.2 different subjects.



Likely correlating with the types of subjects being chosen by males vs females, female students are more likely to use the site for English, Biology and Science while males turn to it for Maths, Chemistry and Physics. Indications among lower decile students are more use for Maths and English but far less use for Biology, Chemistry, Science and Physics.

Levels Of Engagement

As noted in the preparatory analysis findings, one indication of the degree to which users are engaged with the site is to monitor the growth in unique visitors relative to growth in the number of pages consumed. The average number of pages viewed as a proportion of visits was 8.3 in 2005 versus 10.2 in 2004, indicating a slightly shallower visit depth and suggesting that visitors are exploring fewer pages on each visit overall.

Furthermore, average length of site visitation should be tracked and measured against 'ideal' durations. The average time spent by a visitor to the site in 2005 fluctuated by a reasonably large margin throughout the year, and while the average was nine minutes and thirty-four seconds, the average visit length increased steadily from June and rose to a peak of 14 minutes and 49 seconds in November; probably coinciding with exam and assessment time. Just over half (54.2% of visits) were under 2 minutes.

When setting performance benchmarks for site duration the following elements should be considered:

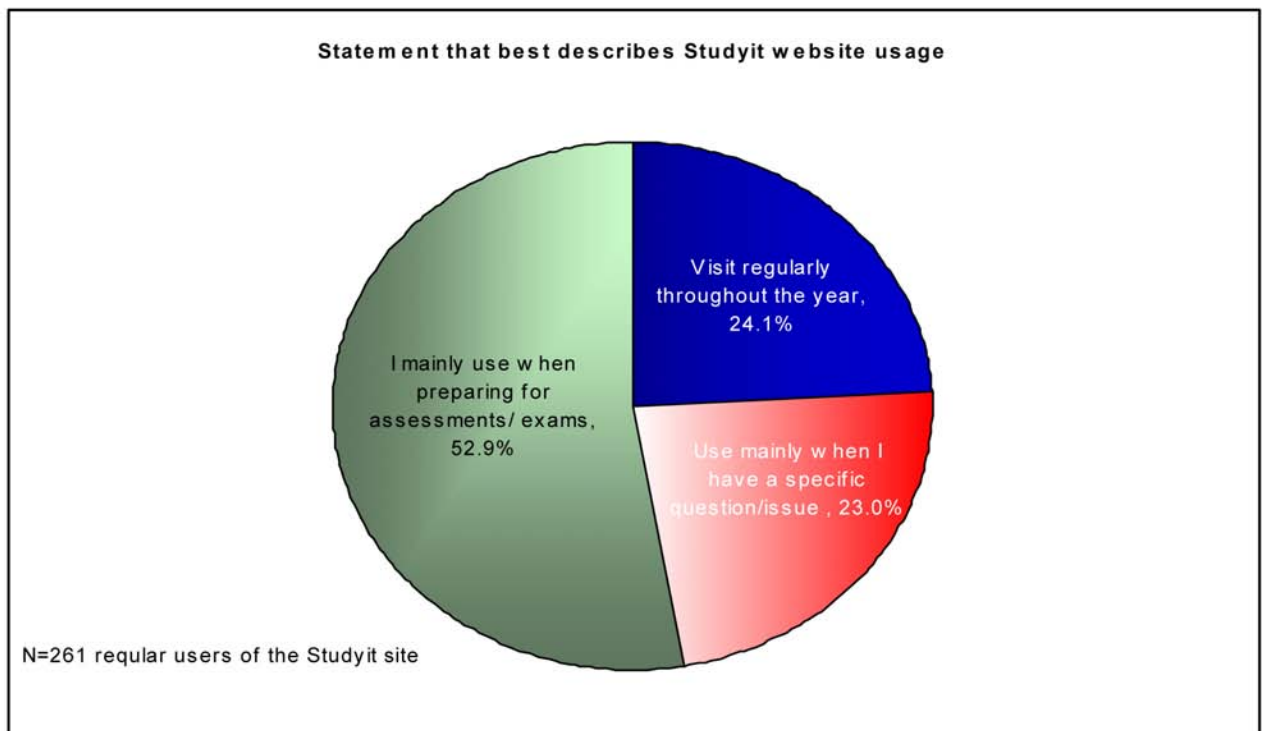
- longer site duration is not always indicative of an improvement – it can indicate usability weaknesses which result in users taking longer to find the areas of interest or conduct ‘tasks’ on the site
- duration metrics should be reviewed at a specific content level – longer interaction in the forums section is likely a positive indication of engagement

Motivations For Use

The Studyit service attracts good levels of usage and repeat visitation across the student user base. The majority of students comment on the contribution that the site has on their NCEA performance.

The Studyit website is predominantly used for exam preparation, reinforced by the spike in visitation levels during November of both 2004 and 2005; though one in four students visit the site regularly throughout the year. These students were the most likely to cite frequent visitation – 79% of this group visit the site at least once a week, compared with around one quarter who do the same among those who ‘dip into’ the site at exam time or to answer a specific question.

There was no difference between older and younger students or any significant differences among students in lower vs higher decile schools. However, male students are more likely to visit for an answer to a specific question or issue (31% vs 19%) and females more likely to use at exam time (59% vs 44%).



Type Of Learning Encouraged By Studyit Thinking

The site provides several areas where students can explore each of the subjects covered on the site (Biology, Chemistry, English, Maths, Physics and Science) in detail and, in fact, the ‘subjects’ category is the most used section of the site.

The site includes subject areas which provide students with additional information in each subject area's achievement criteria, a breakdown of content to be learned and tips and other options for students to explore the subject matter. These site areas also provide students with resources to delve into subject matter in more detail (beyond achievement criteria level). These subject areas also include links and practice areas, which students can visit for additional revision – however, these sections achieve little visitation (eg, only 3.1% of students had used the past exam papers).

Making Meaning

After the forums, site analysis indicates that the subject areas of the site tend to be the most heavily used parts of the site. As a proportion of overall page impressions, the math subject area accounted for 19.3% of page impressions in August 2005 and 11.3% in November 2005. Their relatively heavy use suggests that students are making use of the site's content to dig deeper into different subject areas, though using the page impressions metric to determine this does not provide a complete picture of how the information is actually being used and how much time students are actually spending in each subject area. The site statistics are consistent with the popularity of maths among site users (as found through the survey).

As found in the survey, more unique visitors use 'subjects' than the forums, though it is not surprising that the forums see a greater number of page impressions based on the volume of pages in this section.

Relating To Others

The site's format, where students are provided with a framework (the forums) within which they communicate with others, provides them with a structure where they can interact with their peers on many levels. The forums are the most heavily used parts of the site, based on the number of page impressions. As a proportion of overall page impressions, the forums accounted for 38.5% of page impressions in August 2005 and 49.9% of page impressions in November 2005 though the survey has found that just one in three students have used the forums. Among these users, however, the popularity of this type of content and interaction is clear.

The structure of the forums allows students to take a variety of roles in group situations, where students can comment on other student's problems and provide support on queries. While few users make regular posts, the survey provides evidence that reading the posts can be just as satisfying and valuable for students.

Managing Self

The site encourages students to explore at their own pace, with no specific direction provided for 'expected' activities to be performed on site. Students are thus provided with ample opportunity to take ownership of managing their own time and activities on the site.

Feedback from students (provided directly to Studyit administrators either directly via the site or via email and forwarded to Nielsen/NetRatings in hard copy) indicates an appreciation for the support the site provides to them in their studies, and an acknowledgement of the help provided on the site. Suggestions were made for expansion of the site's forums into other curriculum areas (including geography, economics), indicating students' continuing interest in self study. Comments also seem to indicate that participation in the forums on the site increased students' own self confidence ("thank you ST {name of moderator} for being awesome!! I feel a lot more confident now ...", "I've got the hang of it now!"). Clearly, there exists a strong

support base for the site, and these students could be harnessed as ambassadors to encourage other non-users to visit the site's resources.

Overall, the site behaviour statistics reveal good growth in usage among students and the task is now to encourage greater repeat visitation outside the core group of regular users. The site itself is a great teacher of self management and this is likely the reason for overrepresentation among high achievers (as found through the survey).

Participating And Contributing

The forum structure of the site allows students to provide feedback and encouragement to other students as they prepare for the completion of their NCEA qualifications, giving them the opportunity to participate in the wider community of students beyond the classroom environment.

Forums and the 'chat' environment online often make heavy use of abbreviations which can be hard for outsiders/new participants to understand. While these same abbreviations are used in mobile phone SMS, there may be children whose lack of abilities in this area may put them at a disadvantage in the forums.

The survey has found the need to encourage greater levels of usage of this section of the site – either for posting or reading – and particular encouragement among those from lower decile schools. Introduction to the forums could take place through additional promotion and education for teachers, highlighting the benefits of the forums and the safety of Studyit's teacher-moderated forums. An interactive or animated forum intro / demo is also an idea for consideration for the site.

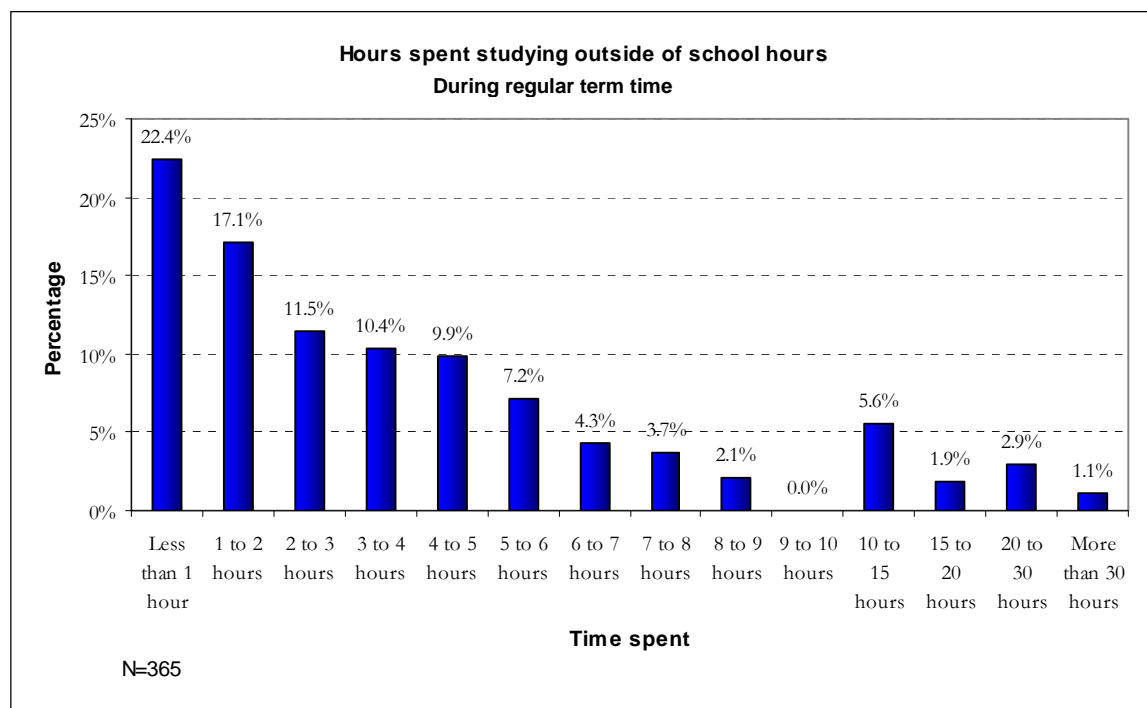
Alignment And Transfer Of Learning

- Studyit.co.nz is part of a broader network of learning contexts and learning goals in students' and young people's lives.
- As such, the service must ultimately align with and support learners' wider education endeavours, and in this section we explore this alignment.
- We will also explore the impact of online as a resource used by students in their learning endeavours more generally

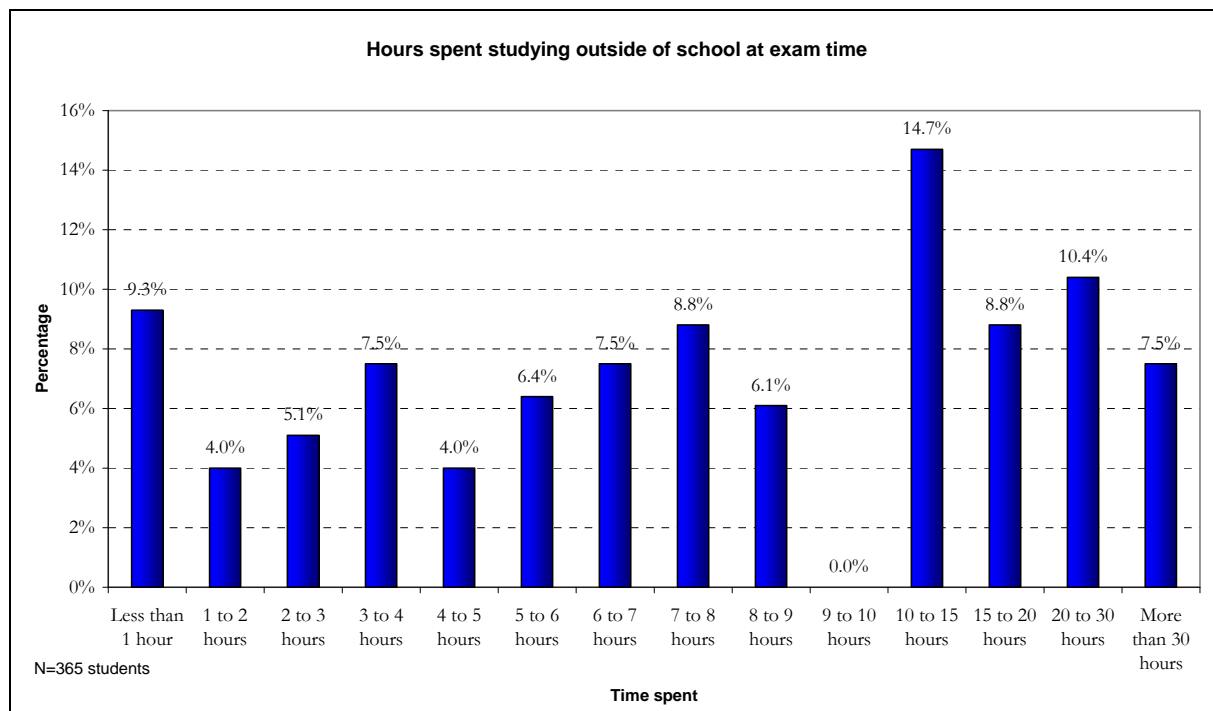
Study Behaviours

The study behaviours of students can effectively be investigated by understanding the number of hours dedicated to various study activities at various points in time. Another important area to understand are the behavioural differences between regular school term and exam periods – to guide the Studyit site to tailor content to accommodate the appropriate 'seasonal' needs.

During regular term (outside of exam periods), students appear to be dedicating relatively little time to study outside of school hours. On average, students are spending just over four and a half hours per week studying outside of school hours (4.68 hours per week) and the majority of students using the Studyit service (61.4%), study for approximately 4 hours or less in any given week outside of school hours (only 11.5% study for more than ten hours per week during regular term time). Interestingly, males report dedicating more time to study outside of school hours than females, spending approximately five and a half hours studying compared to less than four and a half hours for females (Males 5.51 hours vs. Females 4.29 hours per week).



During exam time, the number of hours spent studying increases significantly. The chart below outlines the number of hours students spend studying outside of school hours each week during exam time. They spend, on average, almost eleven hours per week studying at exam time (10.91 hours) - more than double the time dedicated to the same activity during regular term. Additionally, 41.4% study for 10 hours or more during exam time – representing a large increase compared to the 11.5% spending the same amount of time during regular term (and only 25.9% study for less than 4 hours during exam time compared to 61.4% during regular term).



While the number of hours dedicated to studying outside of school is markedly increased during exam periods, a considerable number of students are also conducting study activities at school during exam periods. Over one third of student visitors to Studyit report studying during free periods at school (35%) and 13% report studying at lunchtime during school hours when in exam period. The majority of students, however, report to conduct their study activities weekdays after 6pm (59.3%) or on the weekend (54.7%). This is consistent with their patterns of usage of Studyit across weekdays and weekends.

Students aged over sixteen years display a greater inclination to study after 6pm on weeknights than their younger, 10-15 year old, counterparts (80.3% older students vs. 76% younger students). The table below outlines the time of day when students do their homework and assignments by age group and highlights that older students, in particular, are taking advantage of free periods and study periods at school, while younger students are more likely to do homework straight after school than older students:

| | All Students N=375 | Students 10-15 yrs N=75 | Students 16 - 19 yrs N=296 |
|--|-----------------------|----------------------------|-------------------------------|
| At school during free periods or study periods | 35.0% | 32.0% | 50.5% |
| At school during lunch | 13.0% | 22.7% | 15.7% |
| Weekdays, before school | 8.3% | 20.0% | 8.4% |
| Weekdays, after school but before 6pm | 35.4% | 60.0% | 44.1% |
| Weekdays after 6pm | 59.3% | 76.0% | 80.3% |
| Weekends | 54.7% | 78.7% | 72.6% |

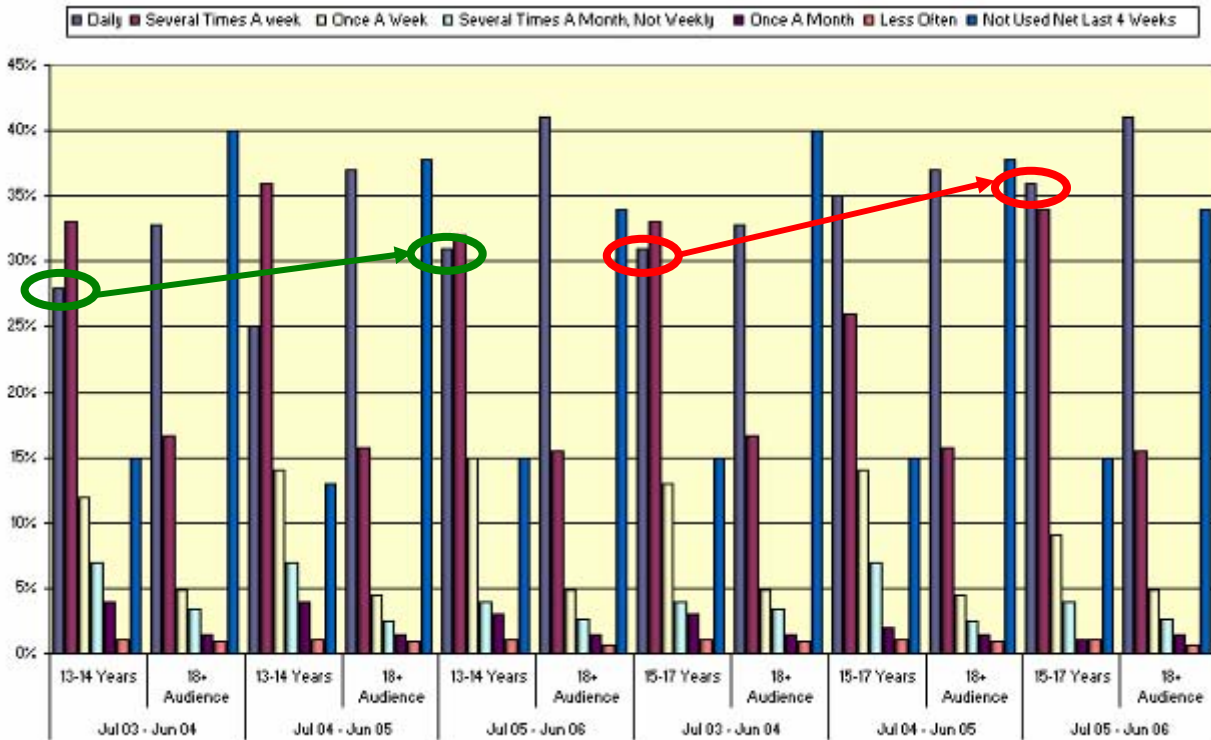
Again, this is reinforced in the specific Studyit behaviours – 16 to 19 year olds are far more likely to use the site in the school library as well as the classroom – than 10 to 15 year olds.

Use Of The Internet For Leisure And Learning

Young New Zealanders are, for the most part, using the Internet actively, and it is being embraced as a tool for learning and leisure alike. Today's New Zealand youth live in a world enveloped by communications technologies, the Internet and mobile communications as central forces that increasingly have become a central component of daily life.

In recent years Nielsen//NetRatings has observed an increase in the number of adopters of the Internet, amongst other technologies, across several countries and the range of age categories. Not only is there an increasing number of Internet users, but also the variety of technologies available for young people to use in support of research, entertainment and learning has grown rapidly over the past decade.

The recent proliferation of communications technologies enables a variety of methods and channels by which youth can communicate with one another as well as access information for personal or school-related purposes. The Internet plays a central role amongst the range of technologies readily available amongst today's youth, and the chart below highlights that 15 to 17 year olds are increasingly becoming daily users (just over 30% in 2003 to over 35% in 2005), as highlighted in red. This group also exhibit similar patterns to adult users. A less pronounced increase has been seen in daily uptake among the secondary audience (13 – 14 year olds), as highlighted in green.



Students’ overall time spent on the Internet for any type of activity or purpose is, on average, approximately eight hours per week (7.9 hours). Of all students, 14.9% are spending less than one hour a week on the Internet overall, while more than one quarter of students (27.7%) are spending more than 10 hours a week or more on the Internet. This represents fairly substantial Internet usage duration amongst many students, providing further indication that the online medium is realising considerable up-take amongst young New Zealanders for a variety of purposes.

On average, male students report using the Internet (for any purpose) for longer in a given week than females. Males spend just over ten hours per week using the Internet (10.11 hours) compared to less than eight hours of Internet usage for females (7.81 hours). Older students are using the Internet only marginally more than younger students (8.52 hour vs 8.15 hours). These findings are fairly consistent with young New Zealanders generally - Nielsen//NetRatings’ eGeneration study of July 2005 found that 15 to 17 year olds were spending an average of 8 hours each week online and 12 to 14 years 5.9 hours per week.

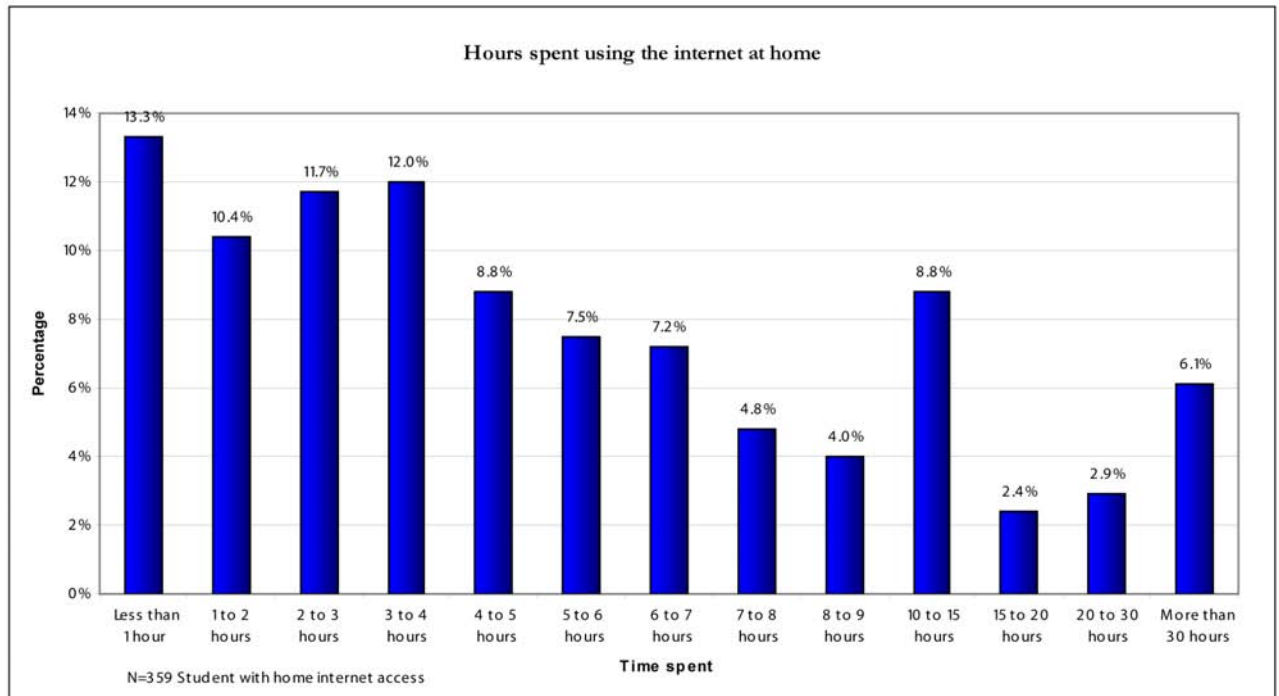
Students from lower decile schools (1-3) spend less time per week accessing the Internet compared to students from mid to high decile schools (6.92 hours vs 8.61 hours for mid decile students and 8.53 hours per week on average for students in high decile schools). However, they are accessing the Internet from school to a greater degree than those at higher decile schools, and those lower decile students with access from home use the Internet proportionately more for school purposes, than their counterparts from higher decile schools.

Home-Based Usage

The chart below illustrates the number of hours Studyit visitors spend using the Internet at home for any purpose in a typical week.

On average, students report spending just over seven hours per week on the Internet at home (7.1 hours), close to their total time online in any location.

More than one third of students (35.4%) use the Internet for three hours or less per week while a similar proportion (35.5%) are connecting between three and seven hours a week and 29% connect for more than seven hours a week.



Younger students are more likely to spend more time on the Internet at home than older students which is in contrast to the total hours spent online (higher among older students). Students aged between 10-15 years old spend, on average, 7.8 hours a week compared to 6.8 hours for those over 15 years of age. This could be explained by greater school-based usage among older students.

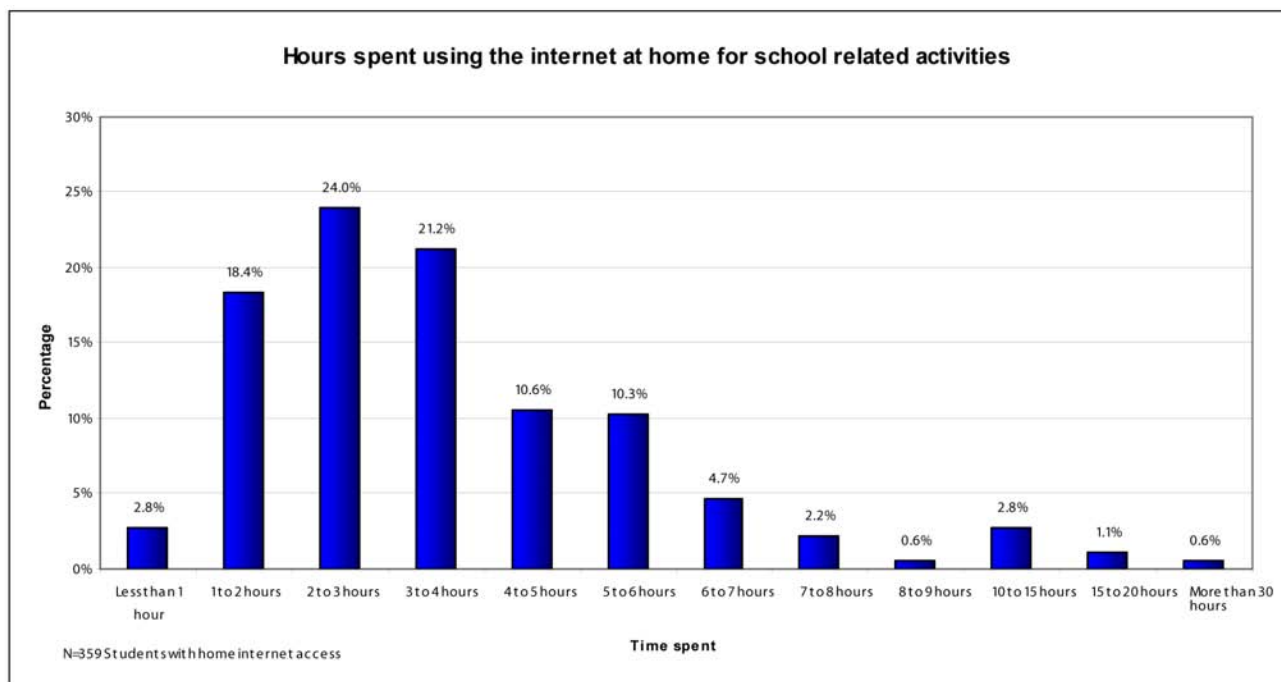
Male visitors to Studyit spend more time using the Internet at home than their female counterparts, on average just under nine hours per week (8.7 hours), compared to slightly more than six hours for females (6.4 hours). This is consistent with the profile of young New Zealanders generally, with 57% of highly active Internet users under 16 years of age being male¹².

Students in low decile schools are spending approximately five hours per week using the Internet (5.14 hours), which represents over two hours less per week than students in mid-decile schools (7.34 hours) and more than two and a half hours less time than students from high-decile schools (7.68 hours). This finding may directly relate to the disparity in home Internet accessibility across the various deciles of school, rather than a decreased preference for Internet use amongst students from lower decile schools compared to others. Reasonable access for all students is optimally desired, as it is widely believed, and supported by this current research, that the Internet is playing an increasingly important role in the acquisition of information and as a tool for learning amongst young New Zealanders.

¹² Nielsen//NetRatings New Zealand eGeneration Report 2005/06

For **school-related activities**, students are spending, on average, almost four hours per week using the Internet at home (3.9 hours) which represents over half of their total time spent online each week. Two thirds of students (66.4%) are connecting to the Internet for up to four hours per week for school related activities while one third are higher users.

Female students spend slightly more time using the Internet at home for school-related activities than males, four hours a week compared to approximately three and a half hours for males (3.6 hours). This represents a greater proportion of their total online usage than males' (62.9% of females' Internet usage is spent on school activities compared with only 41.7% of males').



Not surprisingly, older students spend slightly more time at home using the Internet for school related activities, with those aged between 16-19 years spending on average approximately four hours a week accessing online content for educational purposes (3.9 hours) compared to less than three and a half hours a week for younger students (3.4 hours). This is an interesting finding given that younger students are dedicating more of their leisure time to the Internet so, similar to female students, school activities comprise a greater proportion of online time for 15 to 17 year olds.

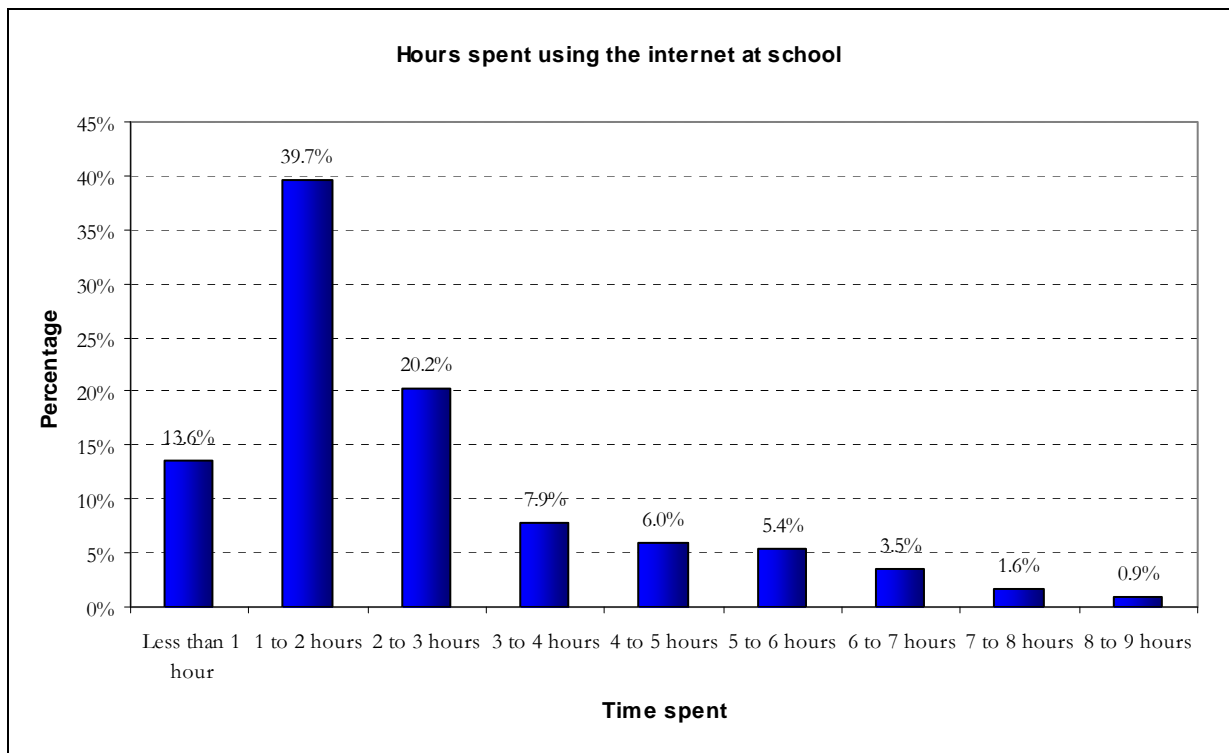
An interesting finding is that students in low decile schools are spending more time per week accessing the Internet at home for school related activities (4.38 hours), than those in mid (3.67 hours) and high decile schools (4.03 hours). This indicates that while students from lower decile schools display lower levels of home Internet access, those who do have access make use of the medium for school work to a greater extent than their counterparts at higher decile schools. More than four fifths of their home Internet use is spent on school related activities (85%) compared with just over 50% among higher decile students.

School-Based Usage

While relatively lengthy periods of Internet access are observed amongst students outside of school hours, overall, students are spending less time online during school, just as they spend far less time using the Studyit site at school.

Students are dedicating approximately two and a half hours per week, on average, to using the Internet at school (2.47 hours) for any activity, while only 26.5% use the Internet at school for more than three hours in a given week. The level of school Internet access among males and females is comparable but older students spend more time on the Internet at school compared to younger ones (2.54 hours vs 2.1 hours for students aged 10-15 years).

Students attending a low decile school are spending marginally more time accessing the Internet at school compared to students in mid to high decile schools which is again consistent with findings highlighted earlier in the report – lower decile students are more likely than others, to access Studyit from school.



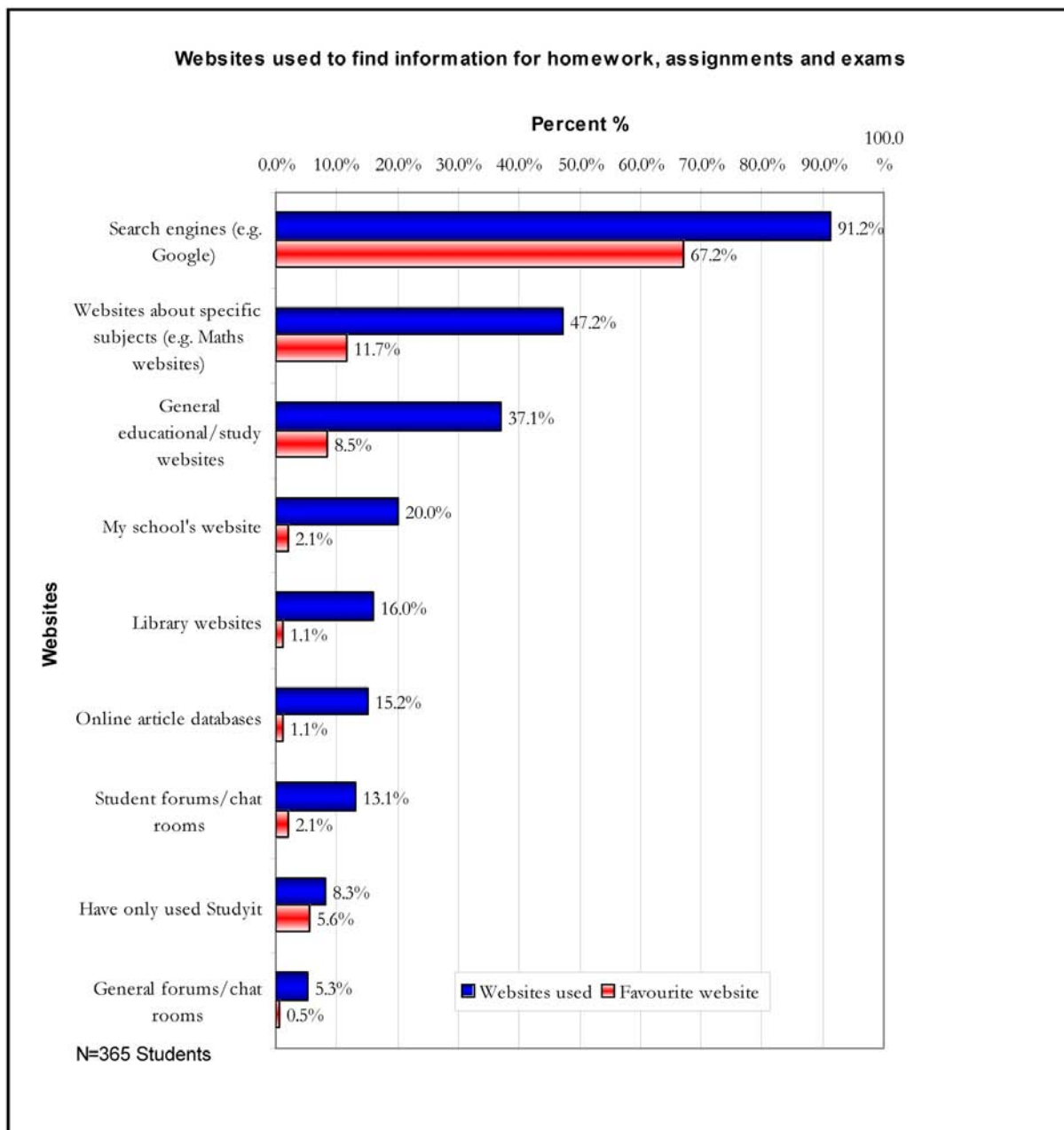
Use And Perceptions Of Study Resources

Understanding the resources currently used and preferred by students is important for educators to direct students to appropriate materials, whether online or offline. When looking at students' usage and perceptions of various resources for school related activities, online resources initially emerge as heavily used and preferred tools (used for the acquisition of information). However, upon closer inspection, it appears that students are drawing upon a variety of resources, both online and offline to assist in their studies and they are using these resources in different ways.

Identifying the current behaviours amongst students in the area of resource consultation provides direction and context for the Studyit service, in understanding how the service fits in amongst the wide range of services available, which can enable the provision of content relevant for needs and usage patterns.

The survey reveals that over nine in ten students are using search engines such as Google to track down information for homework, assignments and exams (91.2%) and more than two thirds of students list search engines as their favourite online method of finding information for the same purpose (67.2%).

Search engines are clearly the preferred online tool for the search of information with the next most preferred option, 'websites about specific subjects', preferred by only slightly over one in ten students (11.7%). This finding is consistent with Nielsen//NetRatings' eGeneration report amongst young New Zealanders, which found that the search engine Google, is the most preferred and recognisable online brand amongst 6 to 17 year olds.



While search engines are preferred as a means of acquiring information online, students still engage actively with offline resources. Over half of all students use the school library for help with schoolwork (54.9%).

Help from the family and using the public library are also very important resources for students with 45.9% of students seeking advice from family and 43.7% using public libraries as resources.

While students report consulting a variety of resources, both online and offline, for assistance with school-related projects and work – the perceived importance of each resource does differ to the usage reported. The most important resources perceived by students are private tutors and study groups. More than eight out of ten students believe that tutors and study groups are either ‘important’ or ‘very important’ as study resources (83.8% for tutor and 83.4% for study group). This bodes well for Studyit’s online forums which in some ways, can be regarded as a study group style of learning from peers.

While search engines are the most widely used resource for these kinds of activity, they trail other resources on importance and are ranked fifth overall out of all the resources measured. Resource importance rankings are outlined in the table below:

| Rank | Resource | ‘Important’ or ‘Very important’ ¹³ |
|------|---|---|
| 1 | Tutor | 83.8% |
| 2 | Study group | 83.4% |
| 3 | General educational/study websites | 74.1% |
| 4 | Websites about specific subjects (e.g. Maths) | 74.0% |
| 5 | Search Engines (e.g. Google) | 67.6% |
| 6 | Student forums / chat rooms | 67.4% |
| 7 | Family | 65.7% |
| 8 | Public Library | 60.3% |
| 9 | School Library | 52.4% |
| 10 | School's website | 49.4% |
| 11 | Online article databases | 45.6% |
| 12 | General forums / chat rooms | 35.0% |
| 13 | Library websites | 30.0% |

The table below compares the average frequency of using particular resources over a month (measured in the number of times a particular resource is consulted) by students’ age and gender. It is interesting to note that across the range of resources available, students are most frequently consulting family members for help (average 8.83 times per month) while the popular website search comes a close second – it is easy to ‘dip in and out’ of search resources quickly.

Despite perceiving family assistance to be of lesser importance than many other resources, it is an easily accessible resource for most, and provides some indication that accessibility can be considered to be an important contributing factor to the uptake of any learning resource. When considered in the context of the

¹³ A five point scale was used: Very important, important, neutral, not important, not at all important

online medium, increased accessibility amongst students will almost certainly increase the uptake of Internet usage and may have a positive impact on the medium's frequency of use and perceived importance.

| | All students | 10-15 yrs | 16-19 yrs | Males | Females |
|---|--------------|-----------|-----------|-------|---------|
| Family n=172 | 8.83 | 8.81 | 8.89 | 9.03 | 8.73 |
| Search Engines n=342 | 8.63 | 7.92 | 8.67 | 9.11 | 8.41 |
| Study group n=42 | 7.21 | 8.80* | 6.99 | 9.31* | 6.69 |
| Student forums/chat rooms n=49 | 6.05 | 11.79* | 5.10 | 2.88 | 7.18 |
| School library n=206 | 5.47 | 4.72 | 5.62 | 5.42 | 5.49 |
| A tutor n=80 | 5.39 | 4.74 | 5.58 | 6.68 | 4.76 |
| School's website n=75 | 5.30 | 3.06 | 5.97 | 8.06 | 4.48 |
| General educational/study websites n=139 | 4.57 | 5.02 | 4.47 | 3.5 | 4.96 |
| Websites about specific subjects (e.g. Maths) n=177 | 4.46 | 3.04 | 4.70 | 4.27 | 4.55 |
| Public library n=164 | 3.40 | 3.89 | 3.24 | 3.69 | 3.31 |
| Online article databases n=57 | 3.23 | 3.40 | 3.19 | 4.68 | 2.73 |
| Library websites n=60 | 3.13 | 2.73 | 3.22 | 3.19 | 3.10 |

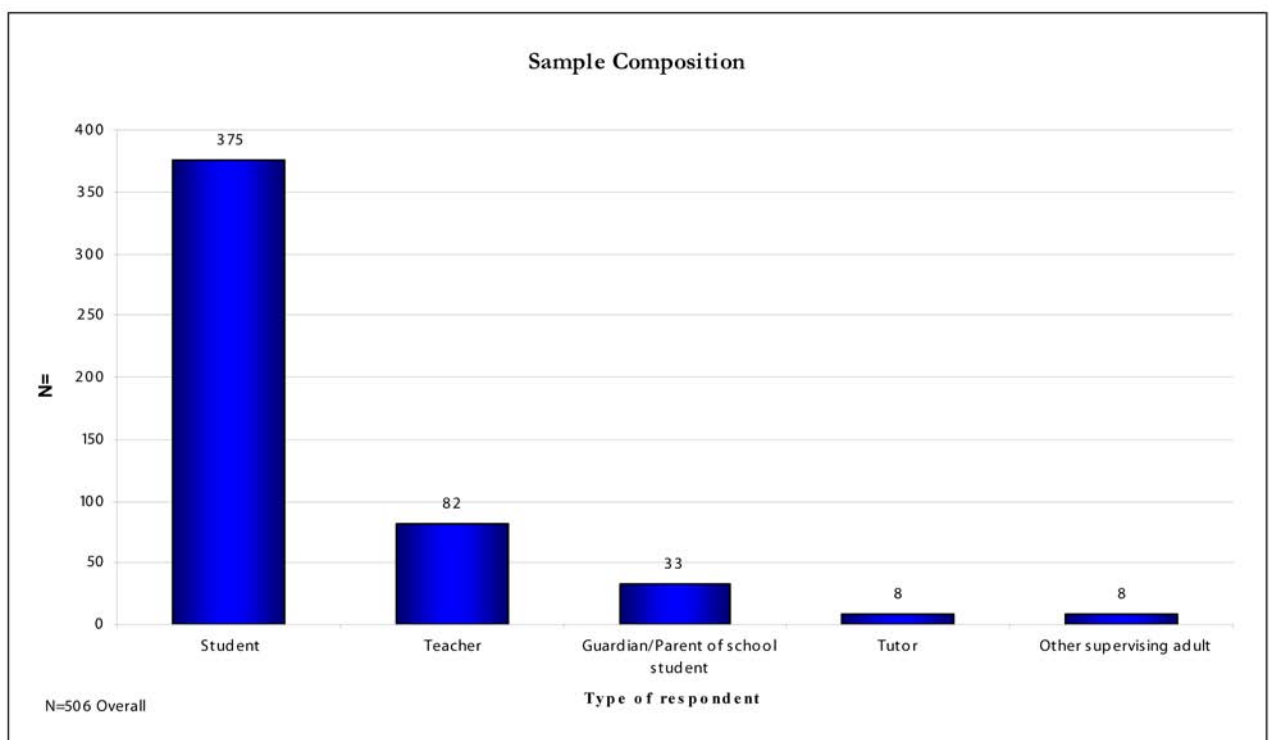
***Caution small sample size**

Learning For Teachers And Other Adults

While the core target audience for use of the Studyit service is NCEA students; parents and teachers also play a role interacting with the resource and in influencing and guiding students' use of the tool.

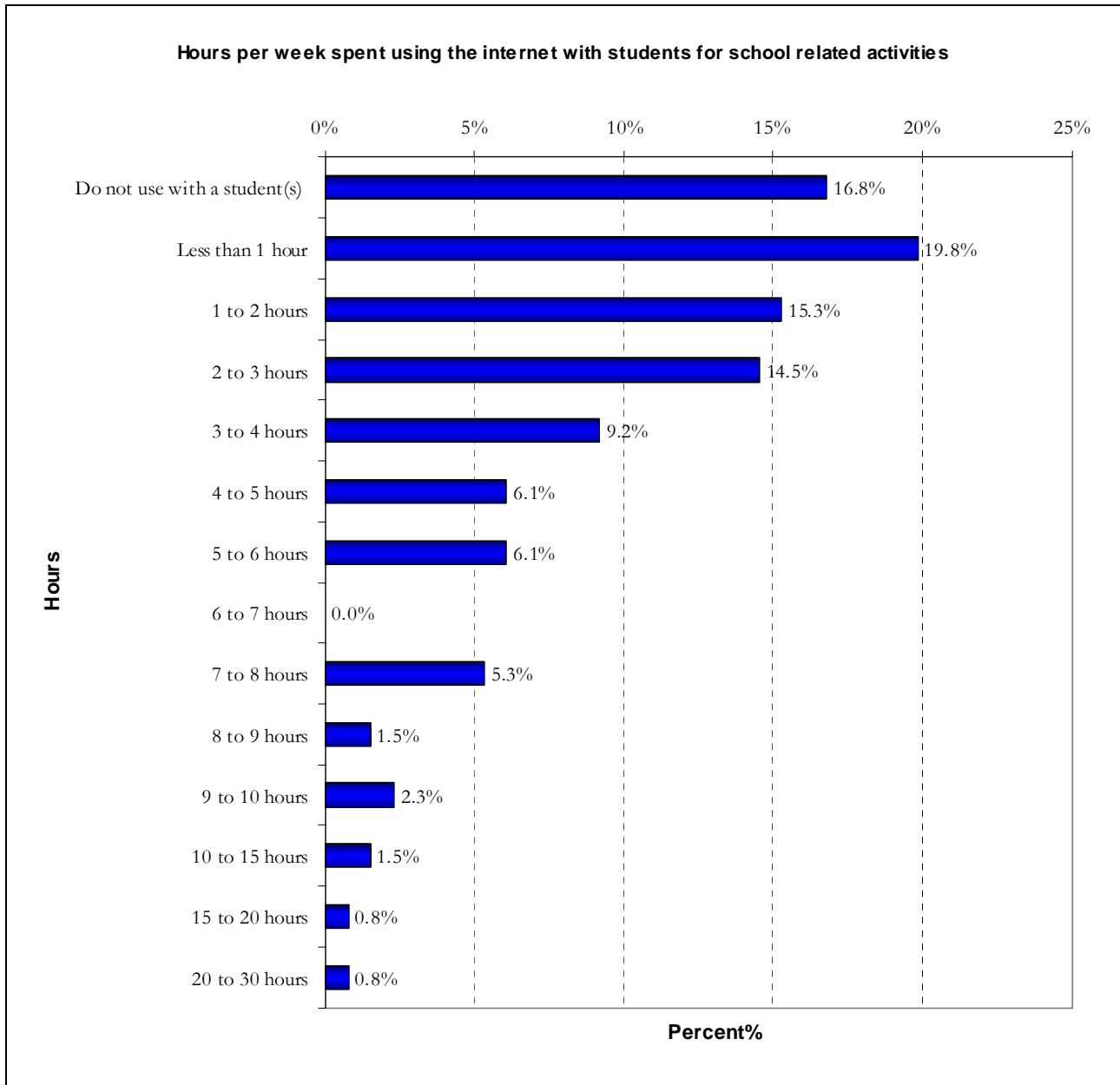
As a component of evaluating the impact of Studyit on learning outcomes, research was also conducted amongst adult users. This element of the evaluation aims to provide some insight into the impact of Studyit on school and teacher practices. It also explores how Studyit is positioned as a learning environment to students by teachers and parents.

The majority of visitation to the Studyit site is driven from student usage, however, adults comprise over one quarter of visitors, representing a significant portion of all site users. The sample composition observed is outlined in the table below and shows that a total of 131 adults responded to the survey overall - 62.6% of the adults were teachers and 25% were parents or guardians and the remainder tutors or other supervising adults.



Teachers visiting Studyit are primarily those working with students at the NCEA level; half teaching years 11-13 and only 13% are teaching year 7 and 8. On average, adult visitors are spending approximately four hours accessing the Internet each week (3.98 hours); teachers are accessing the Internet for marginally less than the average time at 3.70 hours a week and parents are using it more at 4.83 hours a week. Regardless, the time spent online among adults is far lower than that for students (7.9 hours per week, average).

Two thirds of teachers report using the Internet with students for less than four hours in a given week which is consistent with the low level of school usage reported by students. Seventeen per cent do not spend anytime online with students.



Awareness And Patterns Of Usage Of Studyit

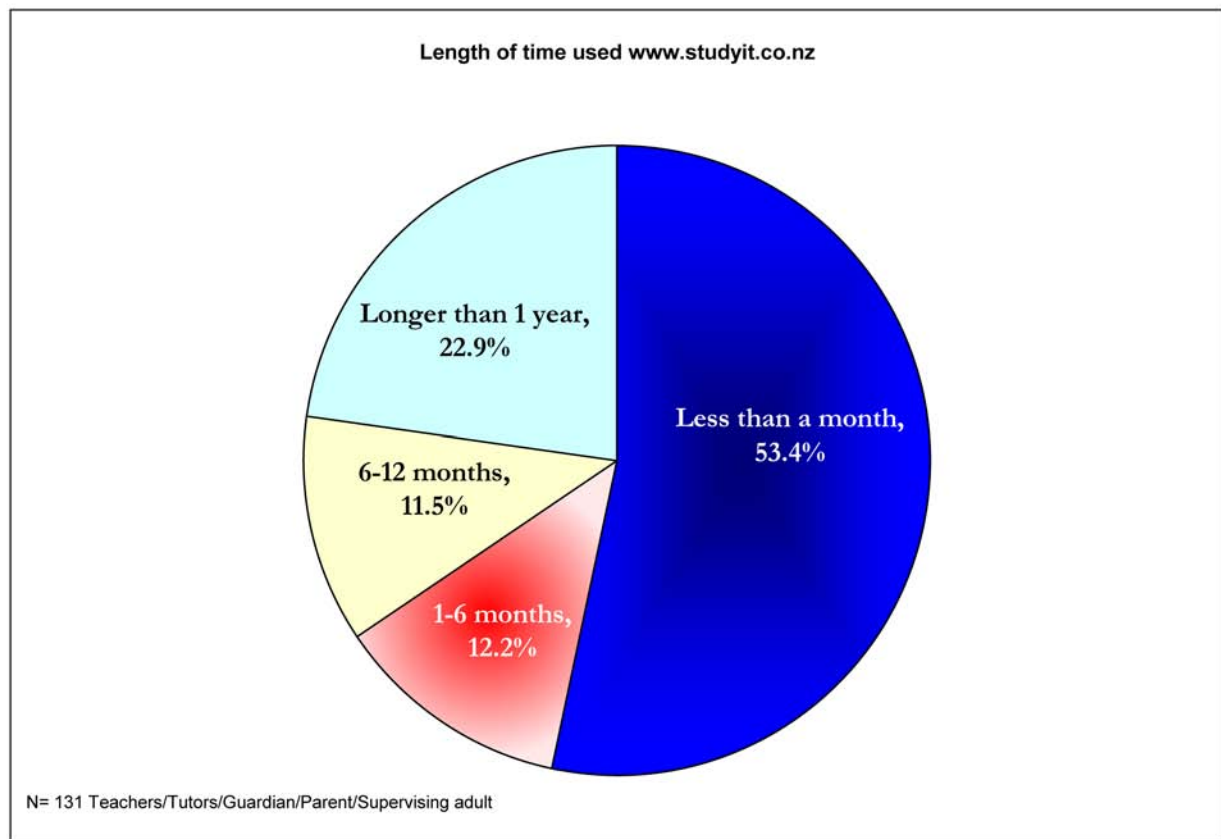
Adults are primarily initially finding the Studyit site through Internet searches – indicating that they are proactively searching for study resources using search engines (38.5%) rather than being prompted to the service via marketing. Approximately one quarter of adults find out about Studyit from a teacher (or another teacher) and only 15% from promotional material. Recommendation from teachers to other adults is far lower than it is between teachers and students (27% vs. 49%). There may be more opportunities to encourage teachers to “spread the word” among peers and parents.

Parents are more likely than teachers to have proactively sought out Studyit with almost half of parents finding the site via an Internet search (45.5%) compared to only one third of teachers (33.3%).

Over half of all adults using the Studyit website are new users, with just 22.9% using for longer than a year. This compares with 36% of students who have been using the site for less than a month and 26% for more than a year.

Teachers are more likely to be long term users with 31.7% using for a year or more while a very high proportion of parents (78.8%) have only started using Studyit in the past month.

With students leading the tenure of usage, followed by teachers, this indicates that while many parents are actively engaged in the search for study resources for their children, they are less likely to continue using the site for extended periods of time and typically refer their child to the site then discontinue use.

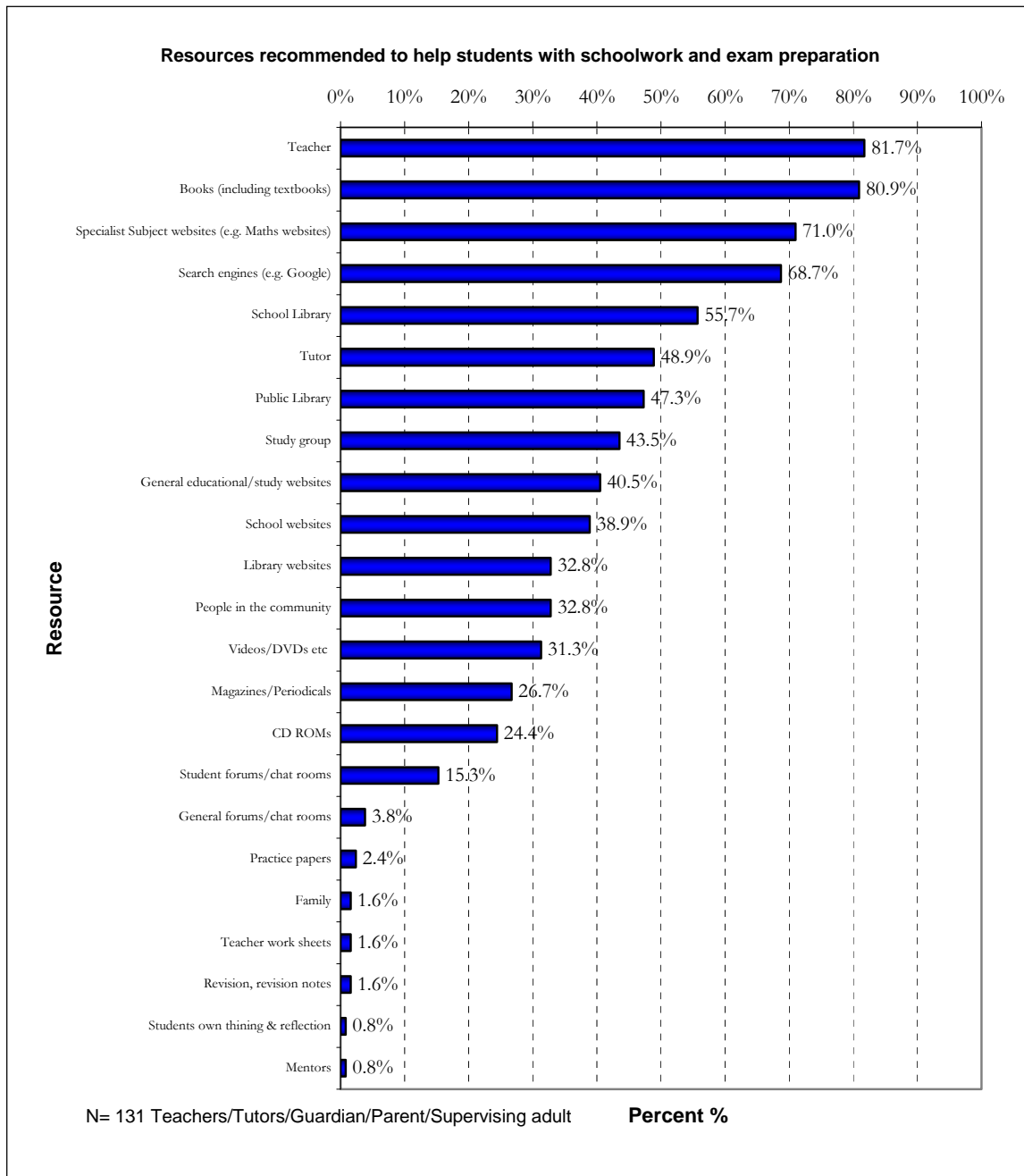


Recommendation Of Resources To Students

Adults are more likely to recommend a traditional resource such as the teacher or a book to students looking for help with school work or exam preparation.

Specialist subject websites or an Internet search engine, such as Google, are the next tier of resources recommended to students at 70.0% and 68.7% while it is interesting to note that student online forums / chat rooms receive far less recommendation (15% of adults) likely due to perceptions of online dangers associated with online contact with 'strangers'. This is an important finding for the way in which Studyit is

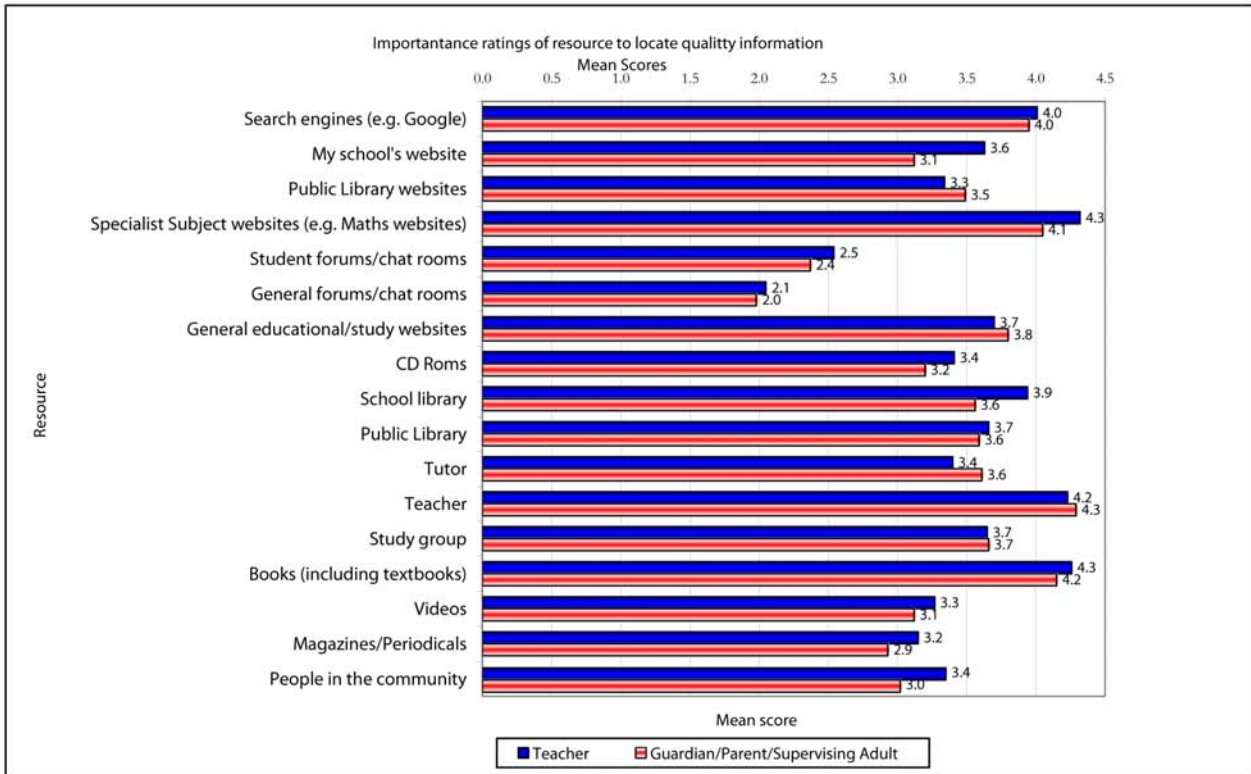
positioned. Too much emphasis on the forums may have a negative impact on referral unless the value and safety of this online tool is also communicated in promotions and marketing. Education programmes for teachers and parents are also a consideration to boost their level of confidence in online forums and online interaction.



Adults were also asked to rate individual resources based on their importance in helping students locate quality information. The adults were asked to rate each resource on a scale from one to five, where a score of one indicated the resource was of not important at all and a score of five was very important. Specialist subject websites achieved the highest importance mean score from teachers (4.32), followed by books with a score of 4.26.

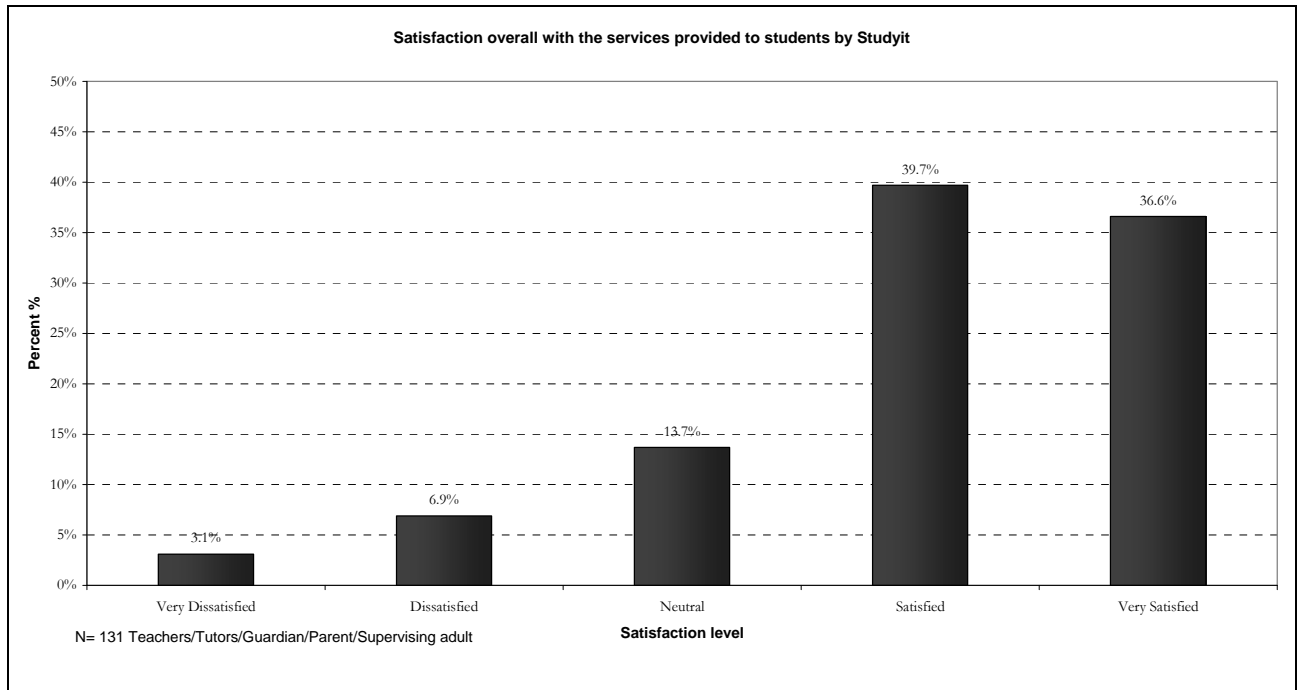
Not surprisingly, parents rated ‘teachers’ as the most important resource available to students with a mean importance score of 4.29.

Further charts highlighting perceived importance scores for each resource can be found in the appendices.



Perceptions Of Quality Of Service Of Studyit

The majority of adult users are satisfied with the Studyit website which is likely one of the reasons behind their strong recommendation of the site to students (refer section below). In fact, proportionately more adults are 'very satisfied' with the site than are students (37% vs 28%).



One in ten adults are dissatisfied with Studyit, though overall dissatisfaction is lower amongst teachers (7.3%) and slightly higher amongst parents and guardians (12.1%). While drivers of dissatisfaction have not been measured quantitatively, some of the comments among this group indicate that the minority of adults that report some level of dissatisfaction indicated qualitatively that the inclusion of past exam papers for practice purposes would improve the site and many commented on the need to “advertise” the site more widely to increase awareness.

The table below lists the areas in which teachers feel the Studyit website is performing well. Teachers feel the site is useful and informative, helping students with key skills and techniques. More than one in ten teachers also feel the Studyit website is a good teacher aid or resource.

| | Teachers | N= |
|--|-----------------|-----------|
| Useful site, informative | 22.2% | 12 |
| Highlights key skills, techniques and achievement objectives | 16.7% | 9 |
| Subject specific information | 13.0% | 7 |
| Teacher aid, resource | 11.1% | 6 |
| Has exam advice & examples | 11.1% | 6 |
| A good site | 11.1% | 6 |
| A forum for students | 9.3% | 5 |
| Good links to other sites | 9.3% | 5 |
| Available outside school hours | 9.3% | 5 |
| A one stop shop for students | 7.4% | 4 |
| Easy to navigate | 7.4% | 4 |
| Good quality content | 5.6% | 3 |
| NCEA related, linked | 3.7% | 2 |
| Reinforces information from teacher | 3.7% | 2 |
| Parents have a resource students | 3.7% | 2 |
| Ability to contact experts | 3.7% | 2 |

On the other hand, some teachers expressed worries regarding the links to other websites; that they were not regularly updated (16.2%). 13.5% of teachers thought that there was a need to increase the awareness to all potential users. They also thought the inclusion of more examples would be useful (13.5%).

Parents and guardians thought the website was performing well in providing a forum for students (18.5%), providing students with exam examples (14.8%) and advice and many like the fact it is linked to NCEA objectives (14.8%).

As with teachers, parents felt that the Studyit website should try and increase its awareness. The inclusion of more examples, and revision tasks for students to use was also highlighted, as was the possible increase in number of subjects available on the website.

Recommendation And Positioning

Almost all adults (91.6%) have recommended the Studyit website to students, increasing to 93.9% among just teachers.

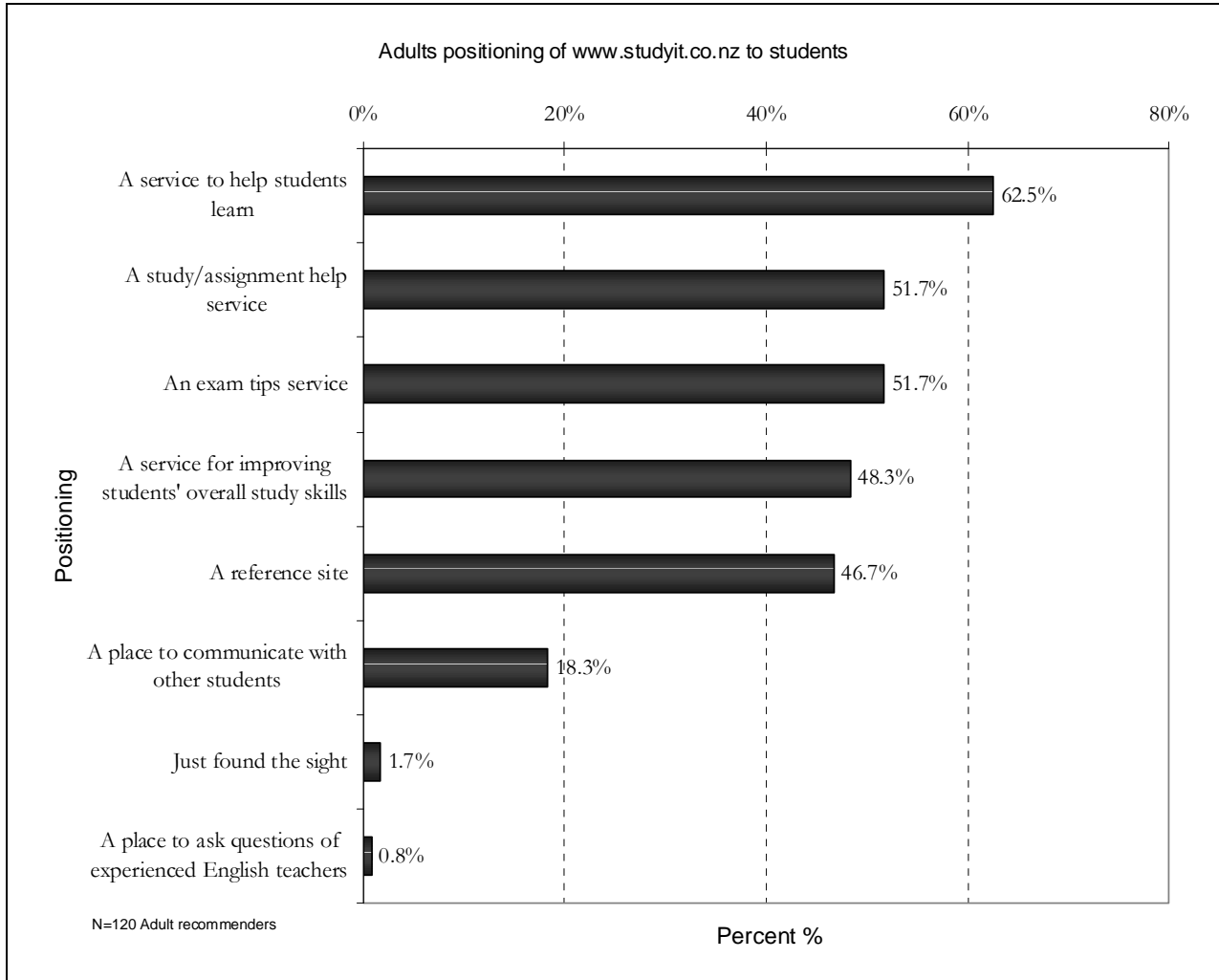
The table below shows the length of time adults have been recommending the Studyit website to students based on the length of time they have actually been using the site.

| | All adults N=131 | Used Studyit for less than one month N=60 | Used Studyit for 1-6 months N=15 | Used Studyit for 6-12 months N=15 | Used Studyit for longer than 1 year N=30 |
|---------------------|---------------------|---|---|--|--|
| Less than one month | 51.7% | 95.0% | 6.7% | 13.3% | 6.7% |
| 1-6 months | 19.2% | | 86.7% | 46.7% | 3.3% |
| 6-12 months | 8.3% | | | 40.0% | 10.0% |
| Longer than 1 year | 20.8% | | | | 80.0% |

It appears that the majority of adults, who become aware of Studyit, recommend the website immediately to students, with 86.7% of 1-6 months adult users of the site recommending the site within the same time frame.

On average adults who recommend the site to students are giving them three reasons for using the site (2.86).

Studyit is commonly perceived as being a service for general learning or for study skills, study/assignment help or exam tips. Far fewer position Studyit to students as a place to communicate with other students – an element of the site that is unique in nature but which also has negative connotations for some – in relation to safety online.

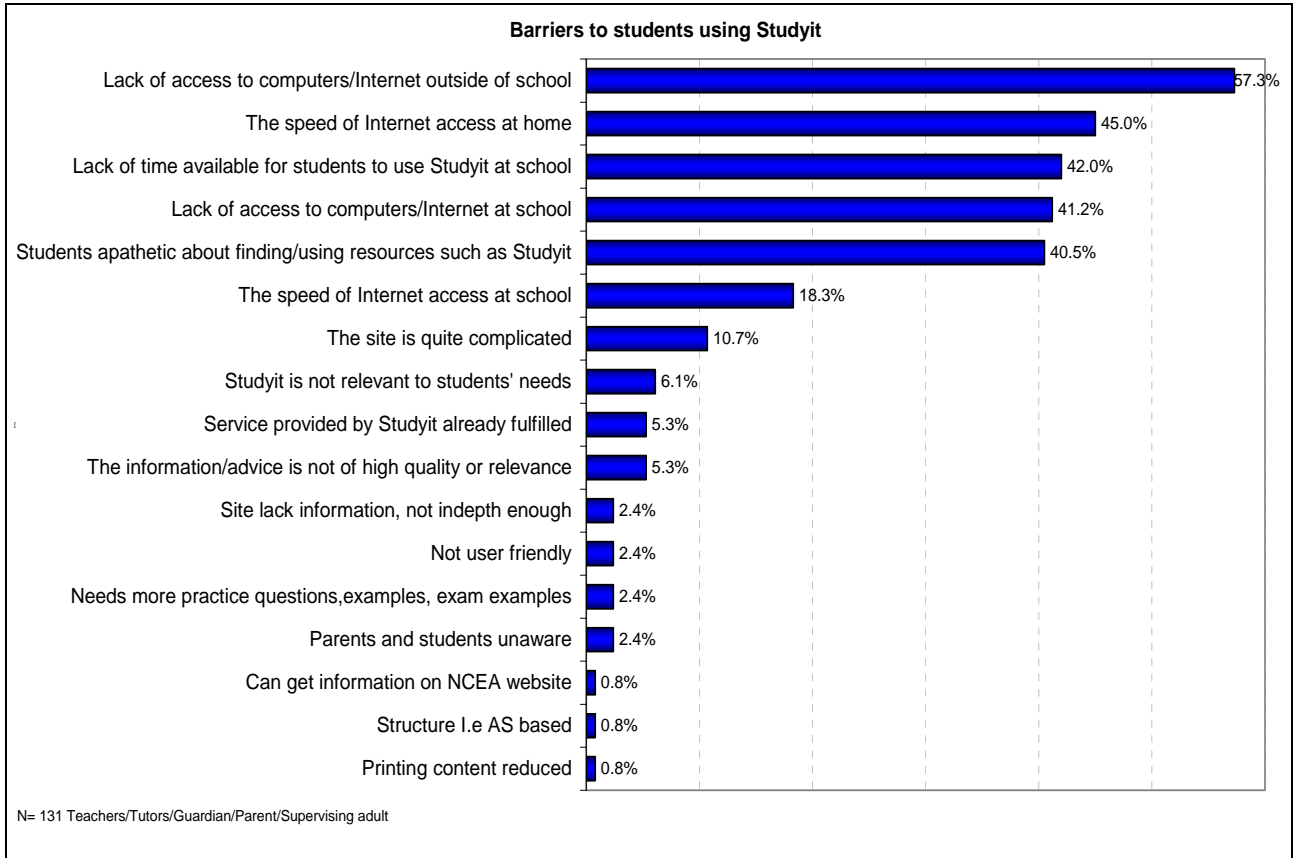


Perceived Barriers To Use

Adults felt the main barriers to students using the Studyit website was a lack of access to a computer at home (57.3%) and the speed of connection at home (45.0%). Analysis of students’ survey results has found, however, no differences in patterns of usage nor perceptions of the service between those with dial up versus broadband Internet connections at home.

The amount of time students have to use Studyit (42.0%) and the access to a computer or the Internet at school was also felt to be a barrier among more than four out of ten adults surveyed (41.2%).

Students’ apathy with using resources such as Studyit was also listed by 40.5% of adults; teachers rated this higher than parents and guardians – 43.9% compared to 36.4%. This is a key element relating to the core skill of ‘managing self’ and greater encouragement should be given to students to make use of such resources. Particular emphasis should be placed on students attending lower decile schools to stimulate greater use and reduce the under-representation currently seen among this demographic segment. This group may correlate with lower academic achievers and those with less access to online resources, but those who would really benefit from both the formal content and informal learning that can take place on the site.

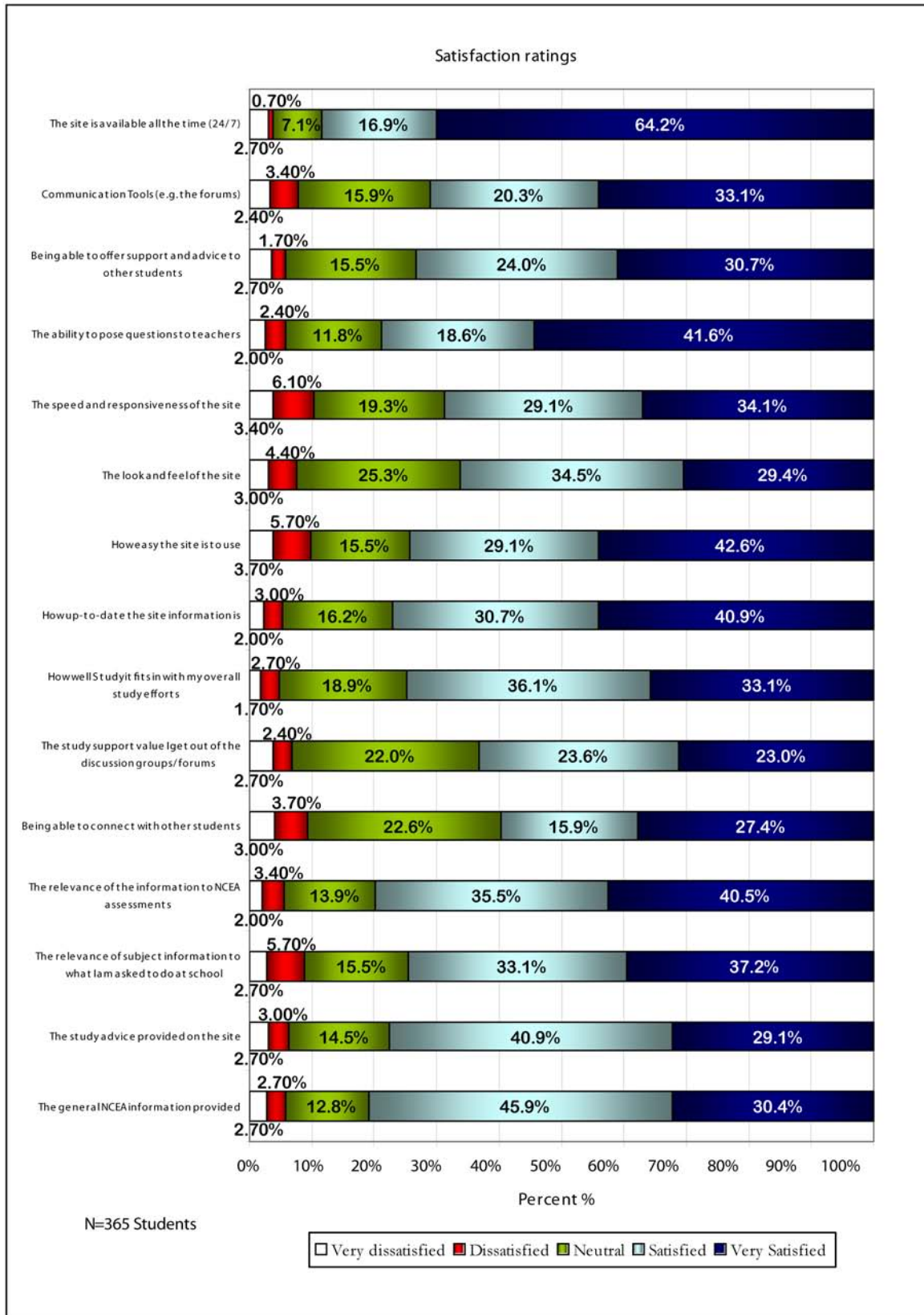


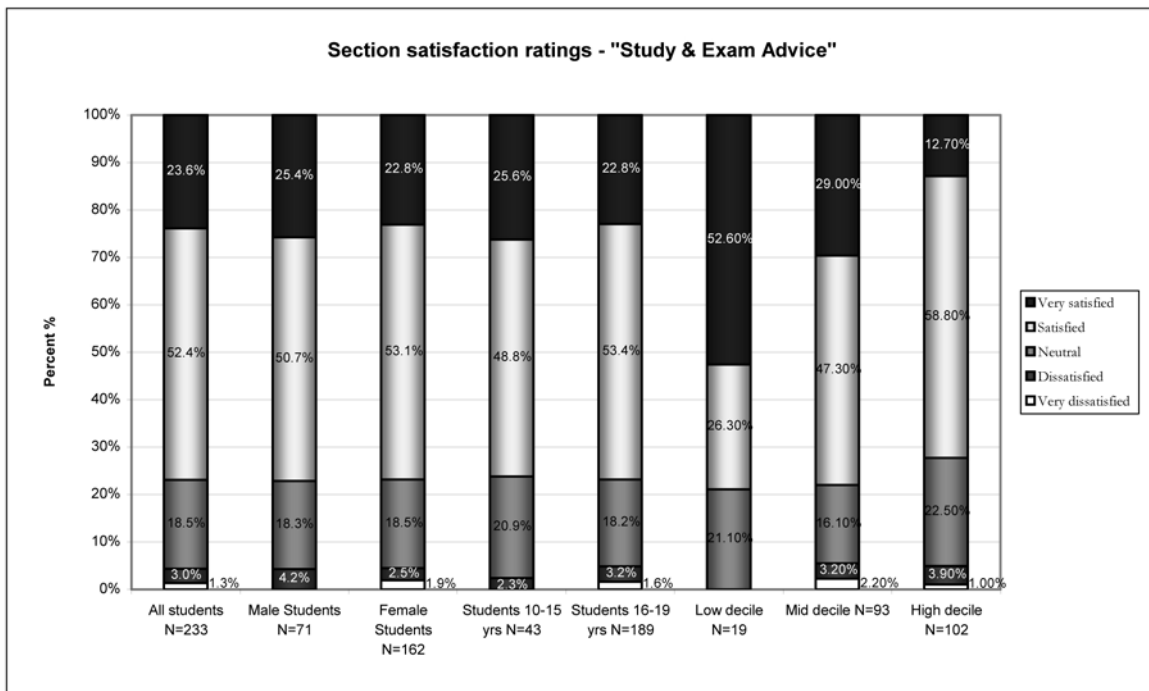
Appendices

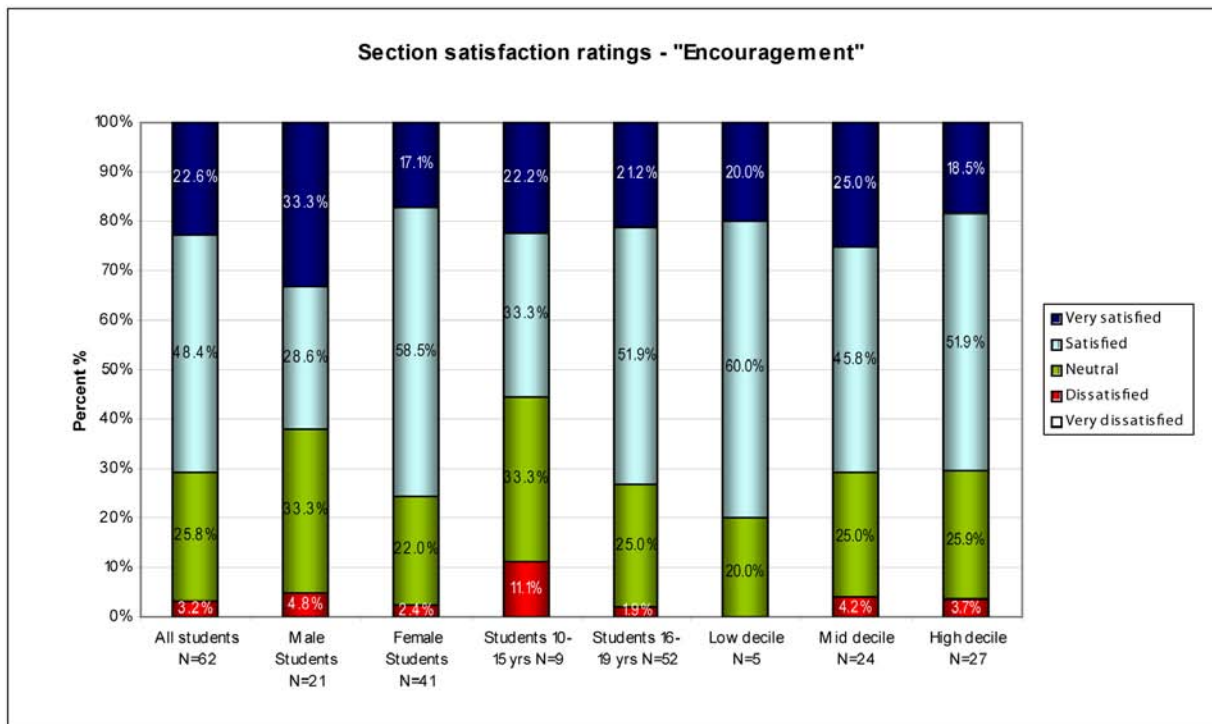
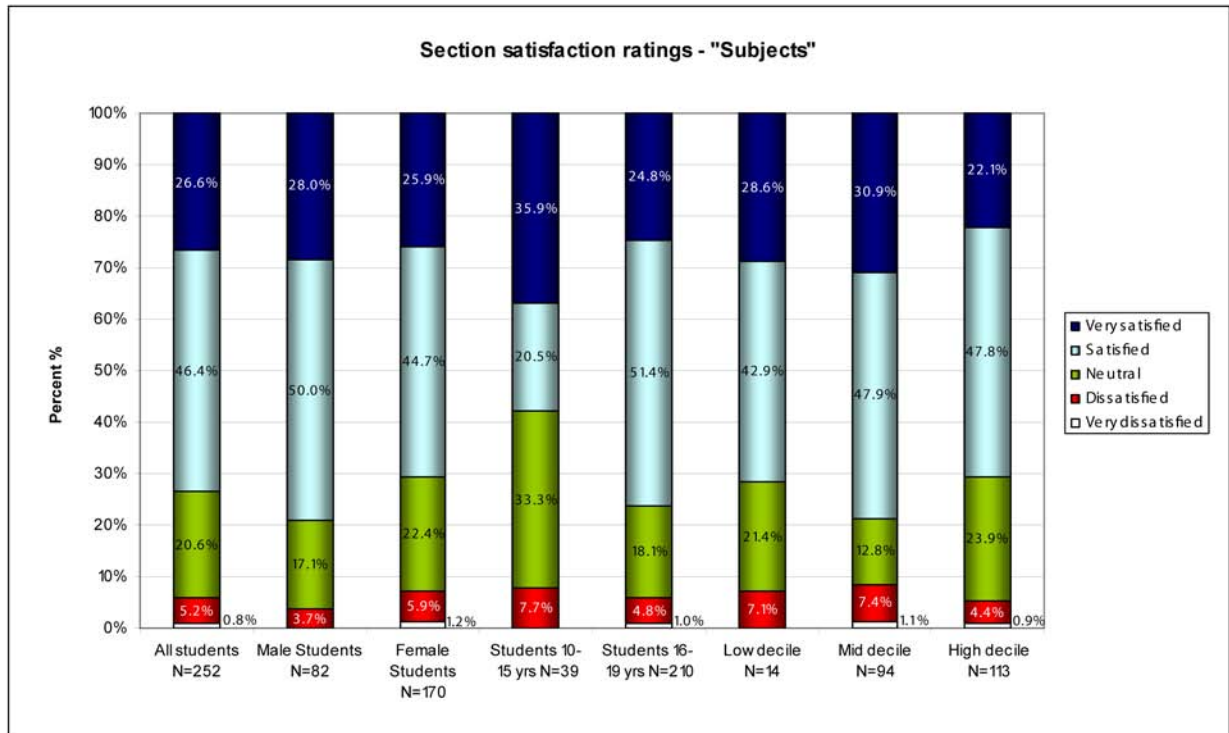
Satisfaction across first time users and those who have visited more than once

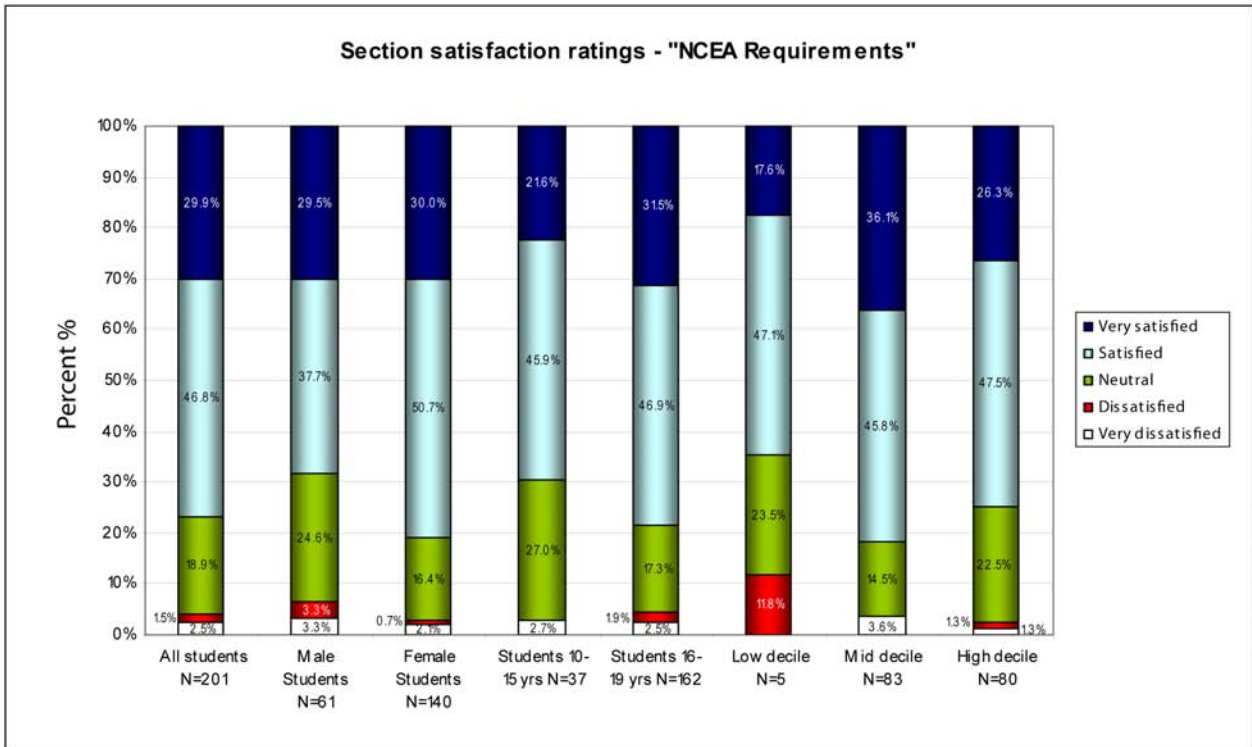
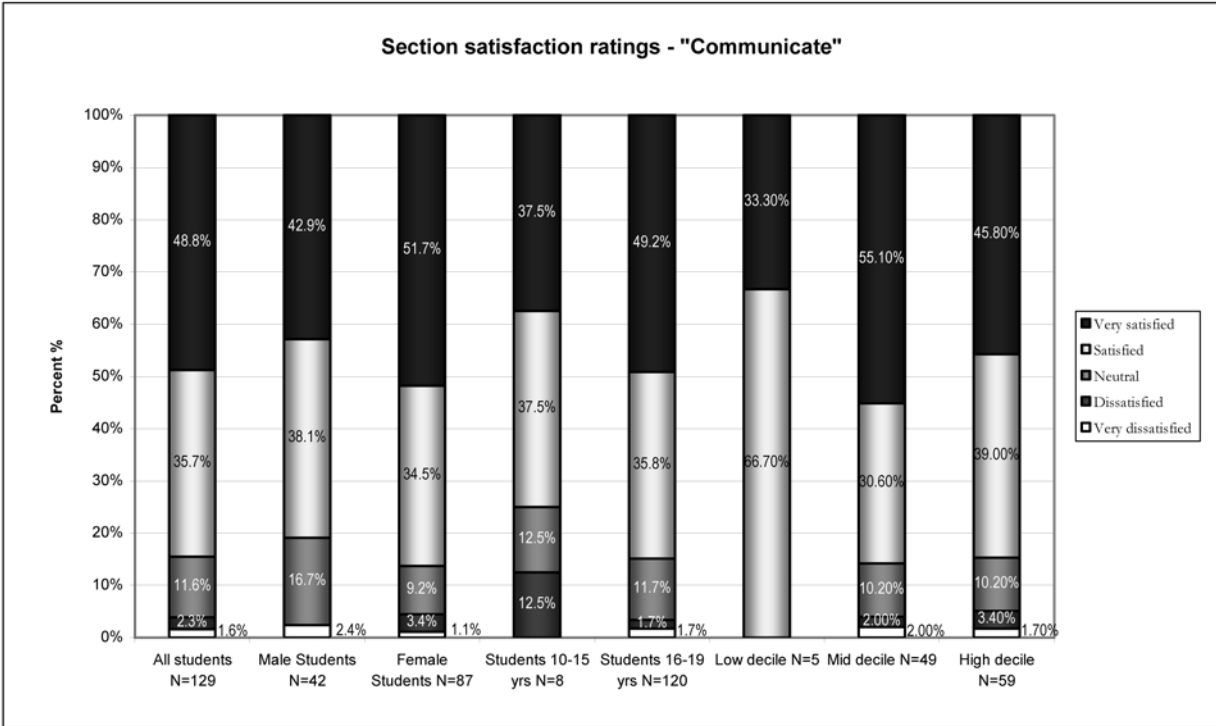
| | All Students N=365 | First time users N=121 | Used two or more times N=254 |
|---|-----------------------|---------------------------|---------------------------------|
| The site is available all the time (24/7) | 4.47 | 4.18 | 4.59 |
| The study support value I get out of the discussion groups/forums | 4.23 | 3.88 | 4.25 |
| How up-to-date the site information is | 4.13 | 3.97 | 4.19 |
| How easy the site is to use | 4.01 | 3.82 | 4.08 |
| The relevance of subject information to what I am asked to do at school | 3.99 | 3.76 | 4.08 |
| The relevance of the information to NCEA assessments | 4.09 | 3.78 | 4.21 |
| The study advice provided on the site | 3.97 | 3.81 | 4.03 |
| How well Studyit fits in with my overall study efforts | 4.00 | 3.81 | 4.07 |
| The speed and responsiveness of the site | 3.90 | 3.76 | 3.95 |
| The ability to pose questions to teachers | 4.15 | 3.87 | 4.27 |
| The general NCEA information provided | 3.96 | 3.74 | 4.07 |
| Being able to offer support and advice to other students | 3.96 | 3.78 | 4.04 |
| Communication Tools (e.g. the forums) | 3.96 | 3.74 | 4.06 |
| The look and feel of the site | 3.80 | 3.63 | 3.87 |
| Being able to connect with other students | 3.77 | 3.66 | 3.80 |

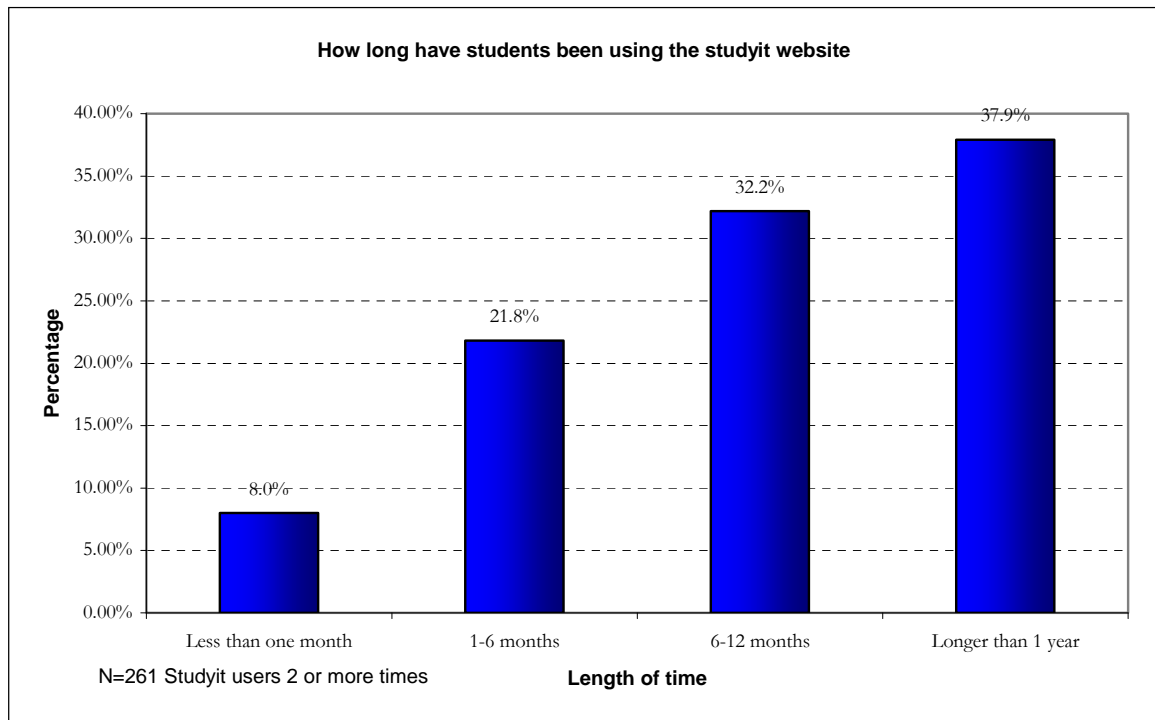
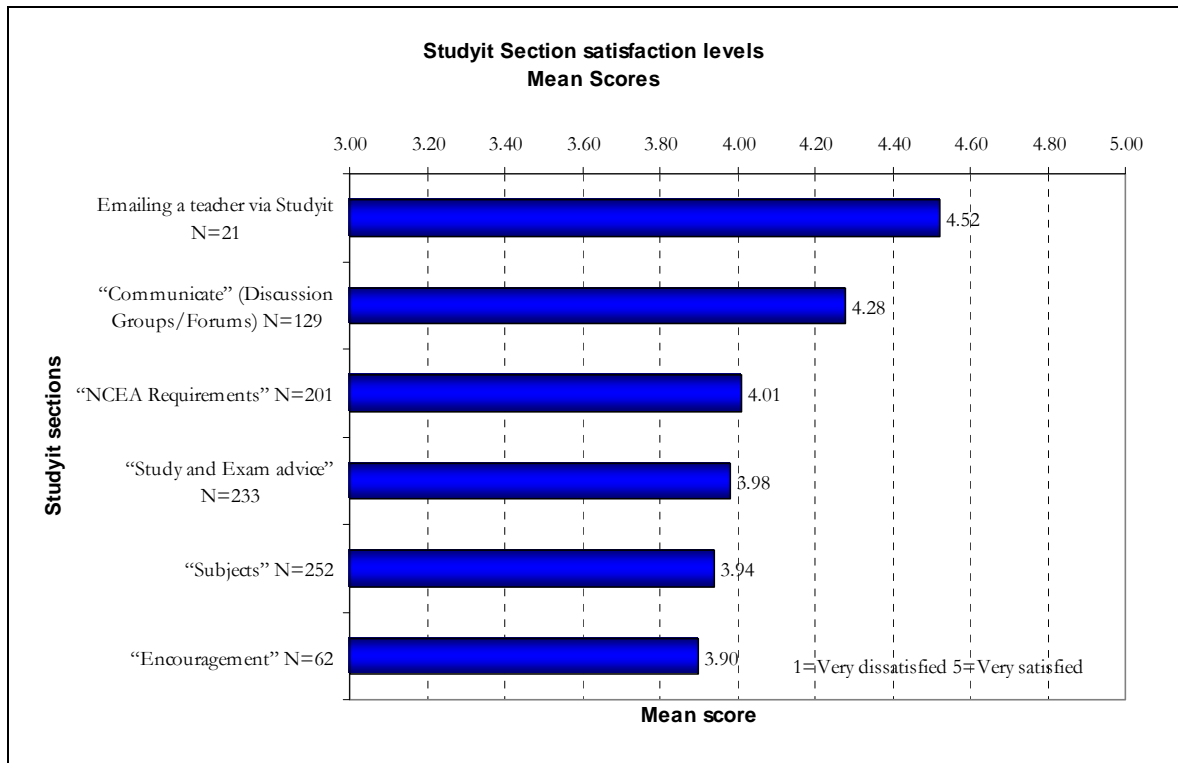
Detailed satisfaction scores across site elements





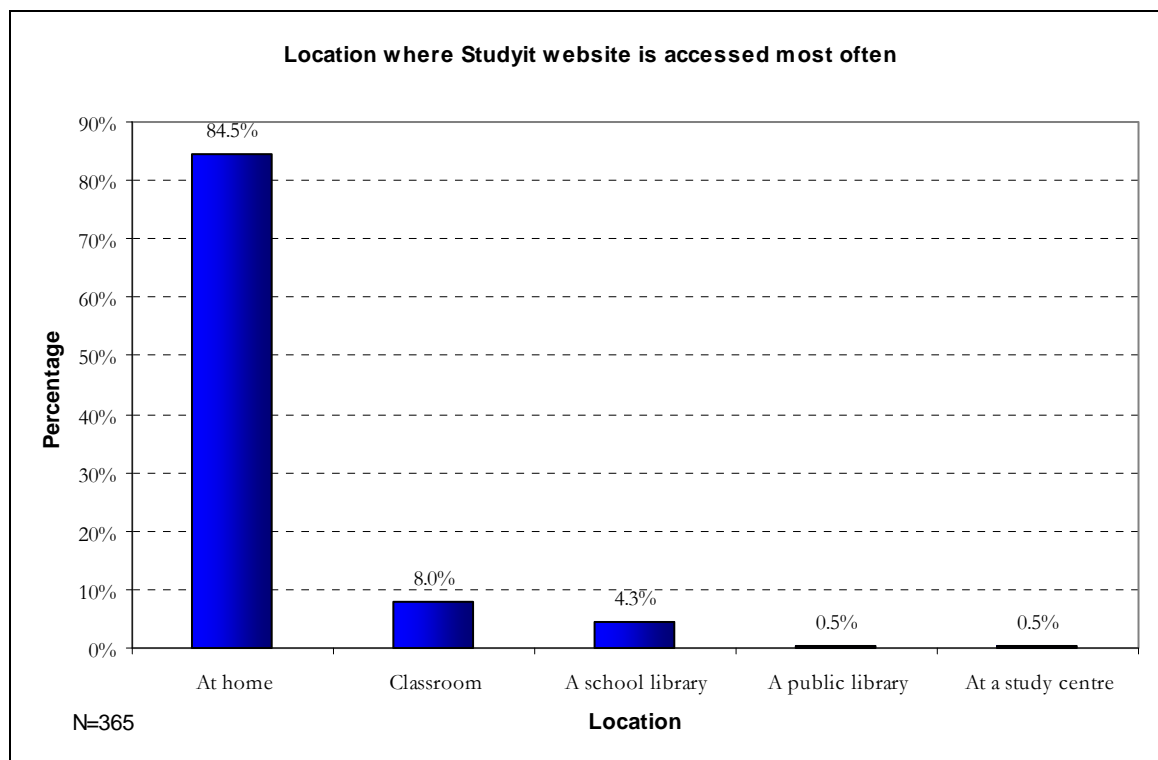






Locations where Studyit is used

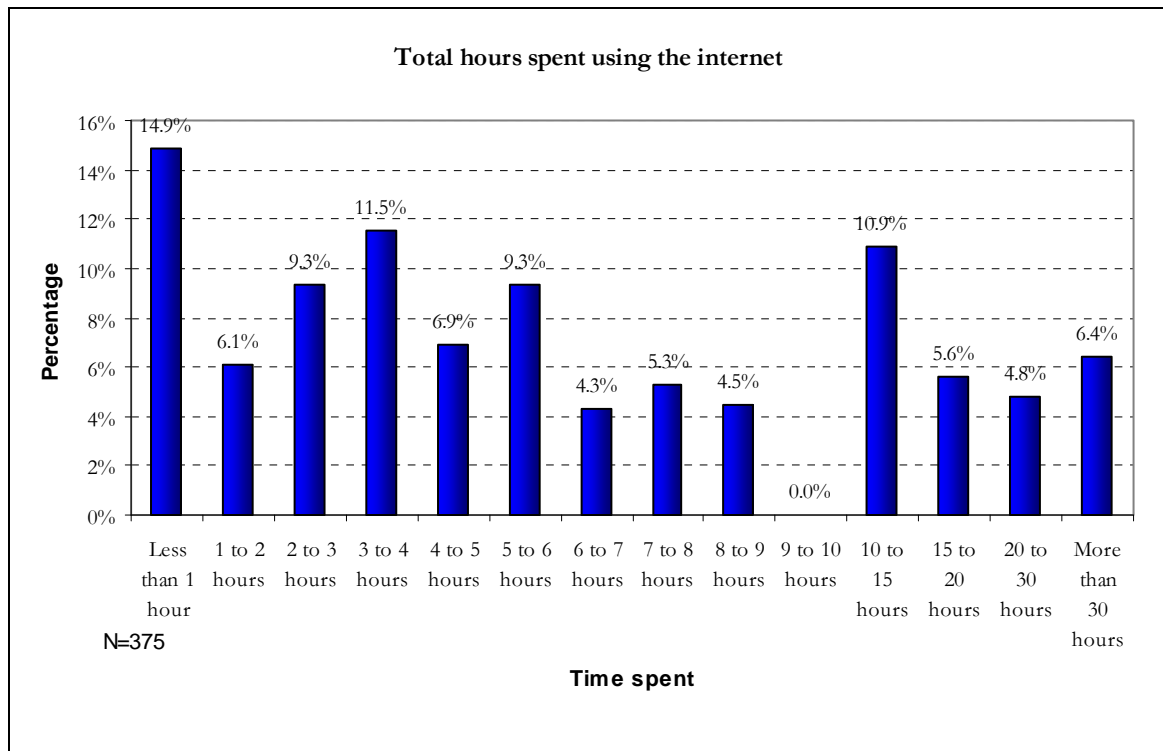
| | All Students N=129 | Students 10-15 years N=296 | Students 16-19 years N=75 |
|------------------|-----------------------|----------------------------------|---------------------------------|
| Home | 88.0% | 84.0% | 89.5% |
| School library | 24.3% | 9.3% | 28.4% |
| School classroom | 22.4% | 17.3% | 24.0% |
| Public library | 2.7% | 1.3% | 3.0% |
| Study Centre | 1.9% | 0% | 2.0% |
| Somewhere else | 2.1% | 1.3% | 2.0% |



Male students' vs Female students' achievement levels across specific subjects

| | Males | | | | Females | | | |
|----------------|--------------|----------|--------------------|-------------------------|--------------|----------|--------------------|-------------------------|
| | Not achieved | Achieved | Achieve with merit | Achieve with excellence | Not achieved | Achieved | Achieve with merit | Achieve with excellence |
| NCEA – Maths | 3.7% | 22.9% | 36.7% | 36.7% | 5.9% | 34.3% | 39.3% | 20.5% |
| NCEA – Science | 3.7% | 29.4% | 31.2% | 35.8% | 7.5% | 24.3% | 40.2% | 28.0% |
| NCEA – English | 8.3% | 43.1% | 35.8% | 12.8% | 5.4% | 36.0% | 32.6% | 25.9% |

Students' total time spent using the Internet (for any activity) in an average week



Adult users' perceived importance of resources to provide access to quality information

