Dear word nerds,

We hope that this summer has been relaxing and you are revitalized as we head into the next semester. Actually, on our end, I (TJ) recently relocated to New Zealand where I have begun my PhD studies at Victoria University of Wellington. I left Japan when winter was just about to end and arrived in Wellington when it was just starting. We are into spring here now, and one year of winter was not exactly fun. What will be fun (and educational) is this issue of VERB. We have a lot of great work here and hope that you will feel the same.

This issue comes just after our annual SIGposium, meaning in addition to the short papers contributed, there are also synopses from some of the poster presentations at the conference. The short papers begin with Mutahar Al-Murtadha who examines the relationship between sentential writing and L2 vocabulary acquisition. Next, TJ Boutorwick shares a study investigating the affects of extensive reading on productive vocabulary knowledge. Finally, "To delete or not to delete?" is the question Masaya Kaneko examines as he looks at proper nouns and text coverage studies.

In the poster synopses section, Sam Barclay starts off with a test of aural vocabulary for Japanese students. After you (hopefully) pass the test, Keith Barrs discusses high-frequency English vocabulary as high-frequency loanwords in Japanese. Next, Alex Cameron & Aaron Gibson discuss visual word recognition through assessing reaction times in Japanese-English bilinguals. Ian Munby follows up with i-lex, a method of assessing L2 associational vocabulary knowledge. After associating yourself with Ian's test, Kaori Nakao re-examines what knowing a loanword actually means for Japanese students. Last, but certainly not least, Malcolm Prentice introduces TextGrader, an open-source vocabulary analysis tool.

We would like to thank all of the contributors for their work. There has been a lot of quality material in VERB, and this issue is no exception. We would also like to thank all of the reviewers for their help optimizing the articles. VERB would not be the same without you.

All of that being said, we hope that you enjoy reading this issue as much as we enjoyed putting it together. Please check out the SIG News section so that you know when the call for papers deadline is for an upcoming SIG event, as well as VLI; It's these contributions that keep our SIG alive.

The VERB Editors,
Tomoko Ishii & TJ Boutorwick

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Investigating the impact of sentence writing on second language vocabulary acquisition

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Background

In ESP vocabulary teaching/learning contexts, the greater emphasis has, over time, been laid on receptive skills rather than productive skills (Webb, 2005; de la Fuente, 2002). Unfortunately, ESP learners themselves frequently seem to favor receptive vocabulary learning. In the Japanese ESP context, for example, many ESP learners tend, to a large extent, to memorize the vocabulary they encounter in the reading texts without actually using it to communicate. By doing this, learners cannot, according to the research literature, retain the words for longer periods of time (Laufer, 2003; Folse, 2006) and may not be able to communicate using vocabulary learned previously. To improve students’ vocabulary knowledge, it is essential to develop their productive skills (Schmitt, 2008). Research on L2 vocabulary knowledge indicates that learners have a greater receptive vocabulary size than productive vocabulary size, and that learners’ productive vocabulary knowledge can be increased through study and productive practice (Laufer & Paribakht, 1998).

ESP students who have difficulty in vocabulary learning seem to lack basic insight into effective vocabulary learning strategies. For many ESP learners, the classroom seems to be the ideal place where students can be introduced to effective vocabulary learning strategies, along with practicing and improving productive skills: speaking and writing. ESP teachers need to raise their students’ awareness of productive vocabulary learning strategies, especially using vocabulary in sentences.

Research has shown that one of the most effective strategies to learn new vocabulary is to use them in sentences (Laufer, 2003; Folse, 2006; Schmitt, 2008; Pichette, de Serres, & Lafontaine, 2011). It is of crucial importance to move from memorization to usage through writing sentences which include new vocabulary.

Aims

This study aims at investigating Japanese ESP learners’ perceptions of the effectiveness of a collaborative vocabulary usage strategy used in the classroom. The research literature shows that it is of crucial importance to investigate learners’ perceptions of language learning experiences (Barkhuisen, 1998).

Methods

A collaborative vocabulary usage activity, followed by a survey, was used over a course of one semester at Kanazawa Institute of Technology in Japan. Students worked collaboratively in groups of four and created sentences using vocabulary they had studied previously. After finishing the activity, each group was asked to write their sentence on the board and then feedback was provided. Throughout the semester, the researcher tracked students’ progress in sentence-building mastery.

At the end of the semester, a survey was distributed to all the participants to investigate their perceptions of the effectiveness of this activity. All the participants answered the survey in class after they received their final grades. The survey questions were translated into Japanese to make sure students understood them.

Sample

The data sample consisted of Technology university students enrolled in required English classes at a Technology University in Japan. All the participants were the researcher’s students for one semester. They attended one 90-minute class session a week. A reading textbook was used to teach this course with a focus on all language skills. In each unit of the book, students encountered ten new words.

Preliminary results

Questions 1-2 in the survey investigated whether students have used this vocabulary strategy before taking this course, and whether they intend to use it in future. The responses to question 1 show that 30% of the students have not used this strategy before taking this course. The responses to question 2 show that 14% of them do not intend to use it in future while 41% were undecided. Only 45% actually intend to use the strategy in the future compared to 70% who have used it in the past. Below is a summary of the numerical results of questions 1 and 2:

1. Have you used this vocabulary usage strategy before taking this course?
   - Yes, every time I learn new vocabulary: 8%
   - Yes, most of the time: 31%
   - Yes, but only sometimes: 31%
   - No, not particularly: 24%
   - No, not at all: 6%

2. I intend to use this strategy in the future.
   - Strongly Agree: 10%
   - Agree: 35%
   - Undecided: 41%
   - Disagree: 9%
   - Strongly Disagree: 5%

In regard to motivation, Table 1 shows the results of the motivation section of the survey. Students were asked to rate their perceptions using a five-point Likert scale: Strongly agree (SA), Agree (AG), neither agree nor disagree (NA), Disagree (DA), and Strongly disagree (SD).

<table>
<thead>
<tr>
<th>Survey Statements</th>
<th>SA</th>
<th>AG</th>
<th>NA</th>
<th>DA</th>
<th>SD</th>
</tr>
</thead>
<tbody>
<tr>
<td>3 I enjoyed working in groups to write sentences.</td>
<td>22%</td>
<td>46%</td>
<td>25%</td>
<td>5%</td>
<td>2%</td>
</tr>
<tr>
<td>4 I could learn from students in my group.</td>
<td>24%</td>
<td>48%</td>
<td>21%</td>
<td>3%</td>
<td>4%</td>
</tr>
<tr>
<td>5 This strategy made my class more interesting.</td>
<td>19%</td>
<td>41%</td>
<td>33%</td>
<td>4%</td>
<td>3%</td>
</tr>
<tr>
<td>6 This is a useful strategy to learn vocabulary.</td>
<td>27%</td>
<td>45%</td>
<td>22%</td>
<td>3%</td>
<td>3%</td>
</tr>
</tbody>
</table>

According to the responses to questions 3-6, the majority of students believed that this strategy is interesting and
useful, and that they could learn collaboratively. They believed they enjoyed working in groups and that they could learn from other students in their groups.

Preliminary Conclusions
The majority of students enjoyed working in groups to write new vocabulary in sentences, and they also believed that this strategy is effective for learning vocabulary. For effective productive vocabulary learning, the study recommends writing sentences which include new vocabulary. If students’ English proficiency level is low, it might be more effective to get students to work collaboratively so they can learn from each other.

Future Directions
Future studies that can include both a control group and an experimental group might reveal different results regarding learners’ perceptions of the effectiveness of this vocabulary usage strategy. Furthermore, this study was qualitative in nature, so other qualitative studies that track and investigate students’ morphological, syntactical, and semantic development are recommended. More in-depth analysis of these aspects might provide significant results concerning the impact of this vocabulary usage strategy on students’ lexical development.

References

Productive vocabulary knowledge acquisition through extensive reading

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Background
One important aspect in vocabulary knowledge is the distinction between receptive knowledge and productive knowledge. Most research examining vocabulary acquisition through extensive reading (ER) has focused on receptive knowledge, ignoring productive knowledge. How productive vocabulary knowledge is affected by ER is important to investigate. First, this understanding would add to our knowledge of ER and the benefits it has on language learning. Second, combining receptive knowledge and productive knowledge covers "all the aspects of what is involved in knowing a word" (Nation, 2001, p.26).

Aims
The research question this study addressed was: Are unknown words learned productively through ER? Productive knowledge, in the current study, is defined as the knowledge required for writing (Nation, 2001). Very few studies have attempted to assess productive knowledge as a function of ER (e.g., Pellicer-Sanchez & Schmitt, 2010).

Methods
Participants
Thirty first and second-year university science-majors at a private university in Japan participated in the study. All students had had 6 years of formal English study before coming to university. Of the 30 students, 25 were male and 5 were female. All students attended three 90-minute English courses per week. The researcher taught them for two of the three courses. To avoid interference from the third course, respective teachers were contacted and agreed to avoid the graded readers administered in the current study.

Target Words
Twenty-eight pseudowords were used in the current study. This number was chosen to maintain a 97% coverage rate, favorable for incidental learning to occur (Nation, 2001). The pseudowords were borrowed from Clements-Stephens, et al. (2012). The words that were substituted (hereafter target words) were all in the British National Corpus’ 1,000 most frequent words. Of the 28 target words, 20 nouns and 8 verbs were substituted in an attempt to approximate the 6-to-4, noun-to-verb proportional frequency of occurrence in English (Kucera & Francis, 1967). Pseudowords were used in this study because high-frequency words were being analyzed and would likely be known to the participants. Replacing the target word’s form ensures that they have no previous knowledge of the word (Elgort, 2007; Waring & Takaki, 2003).

Tests
Three tests were used in this study. In order of administration, the first test was Nation & Beglar's (2007) Vocabulary Size Test (VST), of which students sat the first two levels. The second test was the Penguin Graded Readers Placement Test (PGRPT) (Fowler, 2005). All students took levels one and two, version A. The third test was developed for the current study, using the Productive Levels Test as a framework (hereafter the cued-recall test). In the test, each pseudoword was presented in a defining context, with the first couple of its letters given. Students were to insert the correct pseudoword. A pilot test (using the target words) was carried out on a group of students not involved in the main study. All sentences with an item difficulty of 60% or less were modified to create a more informative context.

Graded Readers
There were ten graded readers used in this study. All of them were from the Penguin Readers series. Five of the books were level 0 (starter), and the other 5 books were level 1 (beginner). The books are written in British English using 200 and 300 headwords for the start and beginner levels, respectively. The book levels were chosen based on the participants’ results from the VST and PGRPT, in order to achieve a 97% coverage rate.

Procedure
On the first day of class, students sat the two diagnostic tests. From the second week, for the following 10 weeks, all
students were given the same book at the beginning of class. They were told to read and enjoy the story. After finishing the book, each student returned it to the teacher and had 30 minutes to compose a summary/response of the story on a computer. The compositions were collected electronically after the 30 minutes. This process repeated for each book, one book per week, for 10 weeks. After the tenth book, the participants sat the cued-recall test. No assistance was allowed during reading, and all assessments were unannounced.

Preliminary Results
Diagnostic tests
Table 1 shows the results for the 2 diagnostic tests. Students exhibited a strong command of the 1,000-level words on the VST, with a moderate understanding of the 2,000 level. Regarding the PGRPT, scores suggest the students are able to read and understand stories at both level 1 and 2 of the Penguin series (the minimum scores for the PGRPT were 21 and 18, respectively). Fowler (2005) notes that 60% (i.e., 18 out of 30) or higher is considered passing for a given level; Any student who earns this score should be able to understand a graded reader at that level. To increase the lexical coverage rate however, level 0 and level 1 books were chosen for this study.

Preliminary Conclusions
Extensive reading allows for a sufficient amount of context to be understood which helps inferring an unknown word’s meaning. Accordingly, the participants in this study were able to correctly infer meaning of 9% of the pseudowords. In addition, when prompted on the cued-recall test, they were able to apply this newly-learning pseudoword in a novel context.

Future Directions
The data described here represent a subset of a larger study which includes scores from the cued-recall test administered as a delayed post-test 3 weeks after the immediate post-test. Initial results suggest a similar trend to Knight (1994); scores significantly increased over time.

References


Treatment of proper nouns: Does the deletion of proper nouns affect the outcome of text coverage studies?

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Background
Text coverage, that is the percentage of running words known to a reader, has been considered as one of the crucial
indicators determining reading comprehension. Researchers have estimated the lexical level of Japanese university entrance examinations employing text coverage research. However, as Brown (2010) points out, the treatment of proper nouns in text coverage studies varies and this may be affecting the results of these studies. Table 1 shows how the proper nouns in past text coverage studies on the National Center Test have been treated.

Table 1

<table>
<thead>
<tr>
<th>Study</th>
<th>Materials</th>
<th>Deletions from texts</th>
</tr>
</thead>
<tbody>
<tr>
<td>Chujo (2004)</td>
<td>2001 and 2002 written sections</td>
<td>proper nouns, numerals, interjections, symbols, units, abbreviations, and prepositional phrases were deleted</td>
</tr>
<tr>
<td>Chujo &amp; Hasegawa</td>
<td>1993-2002 reading passages and comprehension questions</td>
<td>proper nouns, numerals, abbreviations and words with glossary were deleted</td>
</tr>
<tr>
<td>Hasegawa (2003)</td>
<td>1993-2002 written sections</td>
<td>proper nouns, abbreviations, numerals, and interjections were deleted</td>
</tr>
<tr>
<td>Hasegawa, Chujo, &amp; Nishigaki (2006)</td>
<td>2004 written sections</td>
<td>proper nouns, numerals, abbreviations, interjections, symbols, and words with glossary were deleted</td>
</tr>
<tr>
<td>Kaneko (2012)</td>
<td>1990-2011 written sections, and 2006-2011 listening sections</td>
<td>No deletions</td>
</tr>
<tr>
<td>Matsuo (2000)</td>
<td>1991-1997 reading passages</td>
<td>proper nouns and words with glossary were deleted</td>
</tr>
<tr>
<td>Tani (2008)</td>
<td>2002-2007 written sections</td>
<td>proper nouns, symbols, abbreviations, and numerals were deleted</td>
</tr>
</tbody>
</table>

In almost all studies except for Kaneko’s (2012), proper nouns were deleted from texts. However, as Kaneko found from his small-scale study (2013), there seems to be a difference in results if proper nouns are deleted from texts. Kaneko examined the text coverage on the reading passages from the 2004 Tokyo University entrance examination and found that there was a 1,000 word-family-size difference to reach 98% text coverage if the proper nouns were deleted from the text (2013).

Aims

The aim of the present study is to examine whether there is a difference in results of text coverage studies if proper nouns are deleted. In the present pilot study, the text coverage on the reading and listening passages from the latest two National Center Tests administered in 2012 and 2013 was calculated in two different ways: one for the treatment text in which all the proper nouns were deleted, and the other for the non-treatment text in which the proper nouns were left intact.

Methods

**RANGE and the most frequent 3,000 word families**

The treatment text and the non-treatment text were examined with RANGE (Hearley, Nation, & Coxhead, 2002). In the present study, the text coverage was calculated using the most frequent 3,000 word families on Nation’s British National Corpus fourteen 1,000 word family lists (2006). The figures were then compared to find out whether there was a difference. The rationale behind setting the 3,000 word families was that the new Course of Study guidelines for upper secondary school issued by the Japanese Ministry of Education, Culture, Sports, Science, and Technology (MEXT), enacted in April 2013, state that the lexical size target for senior high school graduates is 3,000 word items and that the unit of counting can be lemmas or word families (MEXT, 2009).

Materials

The National Center Test consists of a written and listening section. There are six parts in a written test. Part 3 to 6 are reading comprehension tests. The reading and listening passages from the 2012 and 2013 National Center Tests were examined in the present pilot study. The Center Tests replace some proper nouns with abbreviations. For instance, in the 2013 Center Test, after the initial appearance of the World Health Organization in the text, it is subsequently abbreviated as WHO. Such abbreviations were put back into the original form for the purpose of the present study because RANGE cannot distinguish homonyms as Nation acknowledged (2006).

Preliminary Results

The text coverage of the reading passages from the 2012 and 2013 Center Tests for the most frequent 3,000 word families is described in Table 2. It should be noted that the texts with proper nouns removed always yielded better coverage figures than non-treatment texts, with an average difference of 0.395%. Table 3 illustrates the text coverage on the listening passages. A similar result was found: The treatment texts provided better coverage counts, with an average difference of 0.23%. These findings support the hypothesis proposed by Brown (2010) and Kaneko (2013) that the different treatment of proper nouns in text coverage studies may lead to different results.

Table 2

<table>
<thead>
<tr>
<th>Frequency band</th>
<th>2012 Proper nouns deleted</th>
<th>2012 Proper nouns included</th>
<th>2013 Proper nouns deleted</th>
<th>2013 Proper nouns included</th>
</tr>
</thead>
<tbody>
<tr>
<td>1,000</td>
<td>85.36%</td>
<td>84.11%</td>
<td>82.98%</td>
<td>80.71%</td>
</tr>
<tr>
<td>2,000</td>
<td>7.03%</td>
<td>7.02%</td>
<td>10.41%</td>
<td>10.52%</td>
</tr>
<tr>
<td>3,000</td>
<td>2.72%</td>
<td>2.89%</td>
<td>3.92%</td>
<td>3.92%</td>
</tr>
<tr>
<td>Proper nouns</td>
<td>0%</td>
<td>0.71%</td>
<td>0%</td>
<td>1.75%</td>
</tr>
<tr>
<td>Cumulative %</td>
<td>95.11%</td>
<td>94.73%</td>
<td>97.31%</td>
<td>96.90%</td>
</tr>
</tbody>
</table>

Table 3

<table>
<thead>
<tr>
<th>Frequency band</th>
<th>2012 Listening passages Proper nouns deleted</th>
<th>2012 Listening passages Proper nouns included</th>
<th>2013 Listening passages Proper nouns deleted</th>
<th>2013 Listening passages Proper nouns included</th>
</tr>
</thead>
<tbody>
<tr>
<td>1,000</td>
<td>85.00%</td>
<td>83.51%</td>
<td>88.48%</td>
<td>86.99%</td>
</tr>
<tr>
<td>2,000</td>
<td>8.18%</td>
<td>8.49%</td>
<td>5.89%</td>
<td>6.34%</td>
</tr>
<tr>
<td>3,000</td>
<td>1.96%</td>
<td>2.08%</td>
<td>1.76%</td>
<td>1.88%</td>
</tr>
<tr>
<td>Proper nouns</td>
<td>0%</td>
<td>0.92%</td>
<td>0%</td>
<td>0.60%</td>
</tr>
<tr>
<td>Cumulative %</td>
<td>95.14%</td>
<td>95.00%</td>
<td>96.13%</td>
<td>95.81%</td>
</tr>
</tbody>
</table>
Preliminary Conclusions and Future Directions
The aim of the present study was to examine whether there is a difference in text coverage studies if proper nouns are deleted from texts. In particular, the proper nouns appearing in the reading and listening passages from the 2012 and 2013 National Center Tests were deleted and then the text coverage on the two texts was compared to see whether there is a difference.

As Table 2 and 3 show, there is a difference in text coverage figures. The treatment texts always yielded a slightly better coverage than the non-treatment texts although the difference may make no practical difference to test-takers. One primary reason for the small-size difference is that few proper nouns appear in the text. According to Nation’s counts (2006), which examined various written sources such as novels, newspapers, and graded readers, the proper nouns accounted for an average of 2 to 4% of tokens whereas the average coverage by the proper nouns in the present study was 1.23% for the reading passages and 0.76% for listening.

The findings of the present study suggest that a standard treatment of proper nouns in text coverage studies should be established. As mentioned, most of the past text coverage studies on the National Center Test deleted proper nouns from the texts. However, in two of the most widely cited text coverage studies, Hu and Nation (2000) and Nation (2006) left the proper nouns in the text, calculated the coverage for the proper nouns separately, and then incorporated the figure into the counts for the base word list. The first reading/lexical study to compare reading comprehension to lexical coverage was made by Laufer (1989). She did not mention how the proper nouns were treated in her study. However, approximately two decades later, Laufer and Ravenhorst-Kalovski (2010) examined Laufer’s original study (1989) and conducted a large-scale text coverage study. In the recent study, Laufer and Ravenhorst-Kalovski (2010) calculated text coverage figures for the proper nouns and added the counts to the base word list. Thus, in major text coverage studies, proper nouns tend to be left, not deleted from texts.

Lastly, the findings of the present pilot study should be considered provisional at this stage due to the limited sample. More varied sets of reading/listening sources should be involved in future studies to confirm the results of the present study.

References


A test of aural vocabulary for Japanese students

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Numerous tests have been developed to measure knowledge of the written form of English vocabulary at various frequency levels (e.g. Schmitt, Schmitt & Clapham, 2001). Unfortunately, the same cannot be said for measures of receptive spoken knowledge (Read, 2000, 236). Such a test is important because the frequency of the vocabulary in a text affects the listenability of that text (ibid.). Therefore, if teachers are to provide level-appropriate listening material, it is essential they first gain an understanding of their students’ receptive spoken lexical level.

Previous Tests

The vocabulary-based graded dictation test (Fountain & Nation, 2000) requires test-takers to listen to and transcribe a 150-word text that is broken into chunks. Lexical difficulty, chunk length, and voice speed increase as the test progresses. However, as the instrument is an integrated assessment of listening ability (i.e. it also measures features of connected speech such as elision, assimilation, etc.), it does not explicitly indicate whether or not a learner understands the receptive spoken form of a target item (ibid.).

Aural Lex (Milton & Hopkins, 2005) is a discrete, selective, context-independent measure of aural lexical breadth (see Read & Chappelle, 2001, for a definition of terms). It uses a yes/no format to test receptive spoken knowledge at various frequency bands. However, as the yes/no format does not formally test knowledge of word meaning, a more comprehensive instrument is required.

The instrument discussed in this paper, the Vocabulary Levels Translation Test (VLTT), differs from the above tests in terms of test composition, question composition, and marking system.

Aims

The principle aim of the VLTT is to measure the receptive spoken vocabulary knowledge of Japanese students of English to enable teachers and/or course designers to make informed decisions regarding the appropriateness of listening texts. It is a discrete, selective, context-independent test of spoken vocabulary size. Test-takers hear target items twice: first without context and then embedded in a short sentence with a non-defining context. The test uses a translation format. This format was chosen as it reduces the effect of random guessing, offers an accurate and efficient translation format. This format was chosen as it reduces the effect of random guessing, offers an accurate and efficient translation format. It uses a yes/no format to test receptive spoken knowledge at various frequency bands. However, as the yes/no format does not formally test knowledge of word meaning, a more comprehensive instrument is required.

The instrument discussed in this paper, the Vocabulary Levels Translation Test (VLTT), differs from the above tests in terms of test composition, question composition, and marking system.

The Instrument

The VLTT consists of 180 items separated into five subtests based on frequency (1000, 2000, 3000, 5000, Academic Word List). Following the ratio used by Schmitt et al. (2001), each subtest contains eighteen nouns, twelve verbs, and six adjectives. The target items were sampled from the 1000 word British National Corpus word family lists (accessed at: <http://www.victoria.ac.nz/lals/about/staff/paul-nation>) since they are primarily based on the 10 million-token spoken section of the BNC, and thus considered more relevant to a test of listening than other lists based on data from written corpora. Next, homophones and polysemes were deleted to aid the scoring of the test. This was considered necessary for the pilot due to logistical constraints with grading. However, the final instrument will include homophones and polysemes. Cognates were not removed as it was felt they constitute a legitimate part of a learner’s L2 knowledge. Subsequently, target items were chosen at random from the remaining words. The ten subsets of the AWL are equally represented on the instrument.

Grading

To reward partial knowledge, a three-level scale is used: accurate translation = 2 points; acceptable translation = 1 point; unacceptable translation = 0 points. Read (2000) recognized that L2-L1 translation tests can be troublesome for teachers not proficient in the test-takers’ L1. To circumvent this problem the VLTT is automatically graded using an answer bank consisting of all responses graded to date. Thus, if a test-taker types an answer that has previously been awarded 2 points, her response is automatically awarded the same score. If a test-taker enters a new response, it is marked as needing to be categorized. Once a new response is graded it is added to the answer bank. Thus, as the test is administered to more learners the coverage of the answer bank will improve and include a larger proportion of possible responses.

Procedure

The VLTT was piloted to verify it functioned as intended, to validate the necessity of the short sentences with embedded target items, and to get feedback on the instrument. Ten Japanese L1 university students participated in the study. Each participant completed the subtests for the 1000-word and AWL levels. Following this, semi-structured interviews were conducted to elicit reactions to the test. Subsequently, the tests were graded by a native speaker of Japanese fluent in English and the grades were added to the answer bank to examine the efficacy of the automated grading system.

Results

In general, the VLTT functioned as intended and the grading system worked well; however, some participants reported being distracted by poor audio quality. For example, one participant stated “it’s difficult to hear because the volume changes.” Both subtests produced a large range of responses and thus the pilot must be extended to register as many answers as possible and improve the coverage of the answer bank before it is more widely used.

The participants reported that the short sentences with a non-defining context were useful and gave them “confidence in the answer.” Furthermore, participants stated that the short sentences did not disambiguate the target items. For instance, one participant remarked that even after hearing the sentence, he did not know the meaning of the target word.

The participants’ responses verified the need for a test of spoken vocabulary knowledge. In fact, one participant stated that she thought she could have recognized the written form of some items, but was unable to understand the spoken form.

Conclusion

There has long been a need for a diagnostic test of aural vocabulary (Read 2000). Although the instrument outlined in this paper is only in a developmental phase, I hope it can
become a useful tool for those interested in determining the listening vocabulary ability of Japanese learners of English.

Future Directions

The most pressing tasks are the professional recording of the instrument and the formation of a team of graders to evaluate test-takers’ translations as accurate, acceptable, or unacceptable. Subsequently, through extensive piloting the answer bank containing accurate and acceptable translations needs to be expanded to improve the reliability of the instrument.

References


High frequency English vocabulary as high frequency loanwords in Japanese

Keith Barrs

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Background

Positive transfer can occur in vocabulary learning where cognates similar in form and meaning can be found between languages (Barrs, 2013; Daulton, 2008; Nation, 2008; Ringbom, 2007). This potential for positive transfer depends not only on the similarity relationships between the cognates but also, importantly, on whether or not the loanwords are generally intelligible to the speech community which uses them (Daulton, 2008). High-frequency borrowed words which correspond to high-frequency target language words, and are also similar in form and meaning, may offer students a ‘head start’ in their target language vocabulary learning (Ellis, 1994, p. 304) by acting as pegs onto which learners can hang new information by making use of old knowledge (Daulton, 2008, p. 91).

The Japanese language includes tens of thousands of English loanwords (英語外来語/eigogairaigo). Whilst many of these are obscure, low frequency items which have been shown to be generally unintelligible to the Japanese community, for example コンソーシアム/consoshiamu/ consortium (Irwin, 2011, p. 194), a large number of them have become high-frequency essential parts of the Japanese lexicon, such as ダンス/dansu/dance. If these loanwords which are high-frequency in Japanese are also cognate with high-frequency source words in English, then there is great potential for these to be cross-linguistically useful to Japanese learners of English (Ringbom, 2007, p. 77).

Aims

In Barrs (2013) it was reported that the list of 8000 high-frequency English words constructed by the Japanese Association of College English Teachers (JACET) contained an ‘interesting linguistic phenomenon’ in that English loanwords in Japanese were often being used as definitions of the English language words. For example, entry number 773 on the list, ‘dance’, is defined in Japanese with the English loanword ダンス/dansu. It was hypothesised that these loanwords would be widely intelligible to the general Japanese public, because of their function as Japanese language definitions of the English words (p. 2). If this were to be true then Japanese learners of English would be helped in their learning of these high-frequency words by the high-frequency cognate loanwords in their native language, given that the cognate pairs were also similar in form and meaning. This help would come in the form of the ‘learning burden’ of the words being reduced (Nation, 1990, 2001). Therefore, the aim of this current research is to test the hypothesis above and examine the frequency in Japanese of the English loanwords found in the definitions of entries in the JACET8000 list.

Methods

In Barrs (2013), the first 1000 words on the JACET8000 list were studied and a small corpus of 89 English loanwords was created. For the current research the number of words studied was extended to 2000. In order to discern whether the loanwords found in the definitions of the high-frequency English words on the list were also high-frequency in Japanese, their frequency was checked using the Vocabulary Database for Reading Japanese (VDRJ: 日本語を読むための語彙データベース Ver. 1.1) This is a freely available list of 60,894 Japanese words, ranked by a usage coefficient which combines frequency with dispersion. The list is based on the Balanced Corpus of Contemporary Written Japanese (BCCWJ) produced by the National Institute for Japanese Language and Linguistics/国立国語研究所 (NINJAL).

Sample

It was found that 215 of the 2000 words studied (10.75%) included English loanwords in their definitions. To test the hypothesis that these loanwords would be high-frequency words in Japanese, they were fed into the VDRJ to find out their ranking. A high ranking on the list would suggest that the word is an essential part of the language, one that is well known in the general community (Irwin, 2011).

Preliminary Results

Checking the 215-loanword sample against the VDRJ database resulted in the word rankings summarised in Table 1. As can be seen, 97.2% of the words (209 words) were found to have a match in the VDRJ database. 82.8% (178 words) are within the top 10,000 words of the Japanese language, with around half being in the top 4000 and 15.8% (34 words) being within the ‘core’ 1000 most frequent words. This suggests that many high-frequency English loanwords in Japanese have become fully integrated into the Japanese language, so much so that they have consequently also become high-frequency words in Japanese.

Conclusions and Future Directions

This small-scale study has shown that Japanese people are likely to be already familiar with a large number of high-frequency words of English, because of the fact that the respective cognate loanwords are also high-frequency within their native language. These loanwords are potentially helpful in the studying of the cognate English language words, although modifications made to the form and meaning as they are incorporated into Japanese would have an influence on the extent of this helpfulness.

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This has important implications for language pedagogy in Japan, in that students, teachers and materials writers can take advantage of this built-in lexicon of English-based loanwords in the Japanese language (Daulton, 2008). If teachers have knowledge of which words students are already likely to be familiar with, they can focus on giving guidance on the cross-linguistic similarities and differences. This can be an effective vocabulary development technique (Barrs, 2012; Daulton, 2008; Ellis, 1994; Nation, 1990, 2001; Ringbom, 2007). Future expansions of the project will investigate the remaining 6000 entries, allowing a larger sample to be fed into the VDRJ database, and will also involve developing a measurement of formal and semantic similarity between the cognates.

### Table 1
**Number of Loanwords by Word Ranking Level, with Cumulative Percentage**

<table>
<thead>
<tr>
<th>VDRJ Rank Level</th>
<th>Loanword Types</th>
<th>%</th>
<th>Cumulative %</th>
<th>Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>0001-1000</td>
<td>34</td>
<td>15.8</td>
<td>15.8</td>
<td>Pocket</td>
</tr>
<tr>
<td>1001-2000</td>
<td>33</td>
<td>15.3</td>
<td>31.1</td>
<td>Computer</td>
</tr>
<tr>
<td>2001-3000</td>
<td>25</td>
<td>11.6</td>
<td>42.7</td>
<td>Model</td>
</tr>
<tr>
<td>3001-4000</td>
<td>21</td>
<td>9.8</td>
<td>52.5</td>
<td>Access</td>
</tr>
<tr>
<td>4001-5000</td>
<td>19</td>
<td>8.8</td>
<td>61.3</td>
<td>Risk</td>
</tr>
<tr>
<td>5001-6000</td>
<td>14</td>
<td>6.5</td>
<td>67.8</td>
<td>Training</td>
</tr>
<tr>
<td>6001-7000</td>
<td>10</td>
<td>4.7</td>
<td>72.5</td>
<td>Campaign</td>
</tr>
<tr>
<td>7001-8000</td>
<td>8</td>
<td>3.7</td>
<td>76.2</td>
<td>Market</td>
</tr>
<tr>
<td>8001-9000</td>
<td>7</td>
<td>3.3</td>
<td>79.5</td>
<td>Mystery</td>
</tr>
<tr>
<td>9001-10000</td>
<td>7</td>
<td>3.3</td>
<td>82.8</td>
<td>Commercial</td>
</tr>
<tr>
<td>10001-36279</td>
<td>31</td>
<td>14.4</td>
<td>97.2</td>
<td>Fiction</td>
</tr>
<tr>
<td>Off List</td>
<td>6</td>
<td>2.8</td>
<td>100</td>
<td>Plant</td>
</tr>
</tbody>
</table>

### Visual word recognition: A temporal representation of English L2 proficiency in Japanese-English bilinguals

**Alex Cameron & Aaron Gibson  
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#### Background
Measuring response times (RT) from lexical decision tasks (LDTs) can be highly effective in gauging L2 proficiency. Despite a paucity, to date, of RT studies in SLA (Jiang, 2012, p.13) they can inform us about how bilinguals access their L2 mental lexicon and elucidate a proficiency continuum that ranges from very low proficiency to very high. While standardized tests can measure language proficiency by testing such variables as vocabulary knowledge, the temporal dimension of ‘lexical access’ remains largely unexplored in SLA.

Schmitt states of visual word recognition in L2 learners, that it would be “…informative to measure how quickly they could recognize its written form when reading” (2010, p.107). Speed of recognition can provide a direct measure of the underlying process of *automaticity* (LaBerge & Samuels, 1974) - the ability to perform a set task without effortful control, the result of exposure and practice. A learner of an L2 is becoming increasingly automatic in their recognition of words and sentences. Therefore they exist on a continuum “stretching from very non-automatic to very automatic” (Segalowitz, 2003, p.384). Segalowitz and Hulstijn (2005, p.371), describe automaticity as “the prime psychological construct invoked for understanding frequency effects and how repetition leads to improvement in L2 skill…”.

Lower level learners were observed to elicit slower mean RTs for familiar words than higher-level learners. The differing proficiency levels of language learners, therefore, should be reflected by the variable of time, determined by the degree of automaticity to which lexical access takes place after visual fixation on the stimulus. Given the promising and foundational research in this field further exploratory research is necessary to account for the processing variability in lexical access between L2 learners and natives. In short, it should be possible to illustrate a measurable lexical access scale above described by Segalowitz that stretches from very non-automatic to very automatic.

#### Aims
To explore and represent a time-based lexical access scale from RTs provided by Japanese learners of English at different stages of proficiency and compare them to the baseline responses given by native English speakers. Following on from Iso’s study (2012), lexical decision tasks (LDTs) were used to test for a correlation between proficiency and response time for familiar words. This also involved testing for a word-length effect.

#### Methods
Three computer-based tests were administered measuring response times: 1) A Yes/No lexical decision task. Randomized target word lists were used with pseudoword fillers. 2) A multiple-choice confirmation test. 3) A simple reaction time task that provided a baseline visual response time to a non-linguistic stimulus presented on the screen. Cedrus Superlab 4.5 stimulus presentation software was used. ANOVAs were performed to examine differences according to proficiency level.

The list of target words consisted of 36 high frequency words (2k) from the Longman Corpus (see Appendix A). Word lengths were 4, 5, 6, 7 and 8 letters, with an approximately equal number of verbs, nouns, and adjectives. A filler list of 15 pseudowords, taken from the ARC Database (Rastle et al, 2002), was also randomized into the target wordlist, to ensure that word recognition overrode
habitual button pressing. These were also 4-8 letters in length, pronounceable, comprised of orthographically existing onsets and bodies, and legal bigrams. Instructions in all tests were given in the native language of the participants. Subjects were asked to answer as quickly and accurately as possible. Ten practice trials were given for the LDT with instructions given in the native language of each group.

Sample
This study involved twenty-five native English speakers and three hundred and seven Japanese first-year students from Kyushu Sangyo University, divided into four distinct levels of proficiency - Native Speaker; High; Mid; and Low. These levels were determined by a TOEIC Bridge placement test. Subjects under 100 were categorized as Low; 100-120 as Mid; and above 120 as High. Students were also measured by an independent vocabulary test used at Kyushu Sangyo University (the MYSCORE) that was taken within a month of the experiment. The MYSCORE is used as an in-house vocabulary placement that involves a multiple choice pre-test and a post-test that examine overall vocabulary acquisition in the course of a single semester. Native speakers were given a full score on this scale, as all vocabulary items were high frequency.

Preliminary Results
False alarms and items correctly answered ‘No’ were removed from the analysis, leaving only correctly answered ‘Yes’ items. Figure 1 and Table 1 show that higher proficiency was reflected in more correctly answered ‘Yes’ scores. This indicates, as would be expected, an increasingly larger English lexicon as one moves from Low to Native level. Figure 2 and Table 2 show that as proficiency increased response time decreased, indicating quicker lexical access. There was also a word length effect. Both native speakers (see Figure 3a and Table 3) and L2 learners (see Figure 3b and Table 4) experienced this effect. The more letters in a word, the longer the response time. As predicted, we found that the lower the respondent’s proficiency, the longer their proportional response time. This provides a secondary confirmation that automaticity varies according to proficiency level but also according to the degree of information (in this case the number of letters) that needs to be decoded.

Figure 1. Average number of Yes/No items correct by level.

Table 1
Sum of Correct Yes/No Reaction Times by Level

<table>
<thead>
<tr>
<th>Level</th>
<th>Number</th>
<th>Mean</th>
<th>Std Dev</th>
<th>Std Err</th>
<th>Lower 95%</th>
<th>Upper 95%</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 NS</td>
<td>25</td>
<td>35.8</td>
<td>0.41</td>
<td>0.082</td>
<td>35.6</td>
<td>34.0</td>
</tr>
<tr>
<td>2 HIGH</td>
<td>115</td>
<td>30.4</td>
<td>3.85</td>
<td>0.359</td>
<td>29.7</td>
<td>31.1</td>
</tr>
<tr>
<td>3 MID</td>
<td>124</td>
<td>25.0</td>
<td>4.91</td>
<td>0.441</td>
<td>24.1</td>
<td>25.9</td>
</tr>
<tr>
<td>4 LOW</td>
<td>68</td>
<td>17.7</td>
<td>5.84</td>
<td>0.708</td>
<td>16.2</td>
<td>19.1</td>
</tr>
</tbody>
</table>

Figure 2. Average Yes/No reaction times by level.

Table 2
Means of Correct Yes/No Reaction Times by Level

<table>
<thead>
<tr>
<th>Level</th>
<th>Number</th>
<th>Mean</th>
<th>Std Dev</th>
<th>Std Err</th>
<th>Lower 95%</th>
<th>Upper 95%</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 NS</td>
<td>25</td>
<td>543</td>
<td>57</td>
<td>11.4</td>
<td>519</td>
<td>566</td>
</tr>
<tr>
<td>2 HIGH</td>
<td>115</td>
<td>754</td>
<td>127</td>
<td>11.8</td>
<td>730</td>
<td>777</td>
</tr>
<tr>
<td>3 MID</td>
<td>124</td>
<td>837</td>
<td>145</td>
<td>13.0</td>
<td>811</td>
<td>862</td>
</tr>
<tr>
<td>4 LOW</td>
<td>68</td>
<td>966</td>
<td>171</td>
<td>20.7</td>
<td>925</td>
<td>1008</td>
</tr>
</tbody>
</table>

Figure 3a. Oneway ANOVA of reaction times by length groups of native speakers. (F(3, 891) = 4.48, p = .004, \(\eta^2 = .014\)).

Table 3
Means and SDs of Yes/No Reaction Times by Length of the Word for Native Speakers

<table>
<thead>
<tr>
<th>Level</th>
<th>Number</th>
<th>Mean</th>
<th>Std Dev</th>
<th>Std Err</th>
<th>Lower 95%</th>
<th>Upper 95%</th>
</tr>
</thead>
<tbody>
<tr>
<td>4</td>
<td>199</td>
<td>523</td>
<td>116</td>
<td>8.21</td>
<td>506</td>
<td>539</td>
</tr>
<tr>
<td>5</td>
<td>250</td>
<td>531</td>
<td>137</td>
<td>8.68</td>
<td>514</td>
<td>548</td>
</tr>
<tr>
<td>6</td>
<td>198</td>
<td>561</td>
<td>138</td>
<td>9.83</td>
<td>542</td>
<td>580</td>
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<tr>
<td>7plus</td>
<td>248</td>
<td>555</td>
<td>119</td>
<td>7.56</td>
<td>540</td>
<td>570</td>
</tr>
</tbody>
</table>
traditional classroom instruction. Programs could prove to be highly effective in aiding software and courses in recent years, the incorporation of this provided with regularly updated information that visually clearer goals based on this feedback because they would be their desired level. Students could theoretically be able to set progress over time and could visually represent the mean for this task to infer a mean RTs of the lexical access time and were therefore unable to subtract the considerably faster than linguistic decision tasks. We were the onset of a visual stimulus on screen and the participant's of trials were used to get a baseline simple response time in automatic to very automatic. Access times for familiar words ranges from due to time constraints in this study, only a small number of trials were used to get a baseline simple response time in Test 3. This measured for a baseline response time between the onset of a visual stimulus on screen and the participant’s pressing a button. As it is a non-linguistic test it is considerably faster than linguistic decision tasks. We were unable to obtain what we considered to be a reliable mean RT for this task and were therefore unable to subtract the mean simple response time from the mean RTs of the lexical decision task (Test 1) to infer a mean lexical access time for each proficiency level. As a result, a follow-up study that increases a greater number of simple response trials is necessary. Regardless of this detail our main findings provide a reliable foundation for quickly determining a subject's proficiency level. Harrington and Carey (2009) had success in a regular source of feedback to a student involved in EFL study such as in a university course. Such software could furthermore provide ongoing statistical summaries of learner progress over time and could visually represent the mean distance between a student’s current proficiency level and their desired level. Students could theoretically be able to set clearer goals based on this feedback because they would be provided with regularly updated information that visually plotted their progress. Given the increase in e-learning software and courses in recent years, the incorporation of this extra dimension of vocabulary knowledge into CALL programs could prove to be highly effective in aiding traditional classroom instruction.

References

Iso, T. (2012). Examining the validity of the lexical access time test (LEXATT2). Vocabulary Learning and Instruction. 01(1), 78–82. doi:10.7820/rl.v01.1.iso

Preliminary Conclusions
This study confirms a proficiency scale with different degrees of automatic lexical processing, directly dependent on proficiency. Response time data indicate that along with a larger vocabulary size, higher proficiency is indicated by quicker response times to familiar words. Furthermore, there is a word-length effect that makes response time increase as word length increases. However, benchmark native speeds were clearly faster in all conditions when compared to L2 learner speeds. This confirms that as English proficiency increases familiar words become increasingly automated in their processing. The underlying mechanisms that decode semantic and phonological information from orthographic forms become more efficient. The measurement of reaction time offers great potential in better understanding proficiency of Japanese learners of English as an L2. It is clear that word comprehension is not simply a matter of yes or no. Lexical access times for familiar words ranges from very non-automatic to very automatic.

Future Directions
Due to time constraints in this study, only a small number of trials were used to get a baseline simple response time in Test 3. This measured for a baseline response time between the onset of a visual stimulus on screen and the participant’s pressing a button. As it is a non-linguistic test it is considerably faster than linguistic decision tasks. We were unable to obtain what we considered to be a reliable mean RT for this task and were therefore unable to subtract the mean simple response time from the mean RTs of the lexical decision task (Test 1) to infer a mean lexical access time for each proficiency level. As a result, a follow-up study that increases a greater number of simple response trials is necessary. Regardless of this detail our main findings provide a reliable foundation for quickly determining a subject’s proficiency level. Harrington and Carey (2009) had success with an online Yes/No test used in tandem with other more comprehensive tests for placement purposes. It would be extremely useful if software along these lines could be developed to provide immediate feedback to an L2 learner by using response time information from Yes/No tests. Not only could it be used to assist placements it could also be used as a regular source of feedback to a student involved in EFL study such as in a university course. Such software could furthermore provide ongoing statistical summaries of learner progress over time and could visually represent the mean distance between a student’s current proficiency level and their desired level. Students could theoretically be able to set clearer goals based on this feedback because they would be provided with regularly updated information that visually plotted their progress. Given the increase in e-learning software and courses in recent years, the incorporation of this extra dimension of vocabulary knowledge into CALL programs could prove to be highly effective in aiding traditional classroom instruction.

Appendix A: Stimulus Word Lists
Table A1
Word List used in Test 1 and Test 2

<table>
<thead>
<tr>
<th>Verbs</th>
<th>Letters</th>
<th>Nouns</th>
<th>Letters</th>
<th>Adjectives</th>
<th>Letters</th>
</tr>
</thead>
<tbody>
<tr>
<td>make</td>
<td>4</td>
<td>part</td>
<td>4</td>
<td>sure</td>
<td>4</td>
</tr>
<tr>
<td>know</td>
<td>4</td>
<td>life</td>
<td>4</td>
<td>only</td>
<td>4</td>
</tr>
<tr>
<td>give</td>
<td>4</td>
<td>woman</td>
<td>5</td>
<td>good</td>
<td>4</td>
</tr>
<tr>
<td>leave</td>
<td>5</td>
<td>world</td>
<td>5</td>
<td>alone</td>
<td>5</td>
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<tr>
<td>point</td>
<td>5</td>
<td>place</td>
<td>5</td>
<td>early</td>
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<tr>
<td>bring</td>
<td>5</td>
<td>member</td>
<td>6</td>
<td>major</td>
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<td>happen</td>
<td>6</td>
<td>number</td>
<td>6</td>
<td>whole</td>
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<tr>
<td>expect</td>
<td>6</td>
<td>company</td>
<td>7</td>
<td>white</td>
<td>5</td>
</tr>
<tr>
<td>decide</td>
<td>6</td>
<td>country</td>
<td>7</td>
<td>little</td>
<td>6</td>
</tr>
<tr>
<td>develop</td>
<td>7</td>
<td>question</td>
<td>8</td>
<td>strong</td>
<td>6</td>
</tr>
<tr>
<td>consider</td>
<td>8</td>
<td>business</td>
<td>8</td>
<td>social</td>
<td>6</td>
</tr>
<tr>
<td>remember</td>
<td>8</td>
<td>research</td>
<td>8</td>
<td>possible</td>
<td>8</td>
</tr>
</tbody>
</table>

i-lex: An improved method of assessing L2 learner ability to see connections between words

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Background
Knowing a word’s associations is considered an aspect of word knowledge (Richards,1976; Nation, 2001). It follows that L2 learner ability to see connections between words may improve with gains in vocabulary knowledge and proficiency (Meara, 1983). Meara (1996) also suggests that WATs (word association tests) may measure the degree of organization of the L2 learner lexicon, which plays a role in the development
of lexical competence. Existing WATs seek to measure learner ability to make associations between words using a variety of formats. These can be broadly divided into receptive WATs and productive WATs, yet both types are susceptible to design weaknesses which may undermine results. Receptive WATs (e.g. The Word Associates Test, Read, 1993) allow testees to guess word associations among sets through elimination processes without knowing why the TWs (target words) are associated. With productive WATs, where the task is to supply free associations to TWs, Schmitt (1998) observes that scoring responses with lists of word association norms is problematic because results depend on the cue words and norms lists used.

Aims

The aim of this study is to circumvent these weaknesses with a new WAT inspired by Meara (1994), who mused upon possible uses of a Spanish word association norms list. He suggests presenting learners with the three most common associates of a cue word and asking them to supply the missing word. The instructions of this new WAT, i-lex, are as follows: What word is associated with the following sets of 3 words? Example: drink, red, glass > w [4]. The first letter, “w”, is given for you and the word has 4 letters [4]. The answer is wine. From this aim, the following three research questions were formulated:

RQ1 Does i-lex distinguish between native and non-native speakers?
RQ2 Is there a significant, positive correlation between learner i-lex scores & vocabulary test scores?
RQ3 Does i-lex satisfy initial, basic scrutiny for validity?

Methods

The three cue words (CWs) in each test item are chosen from the five most common associates on the Edinburgh Associative Thesaurus, or EAT (Kiss et al, 1973). The following criteria for item selection were established. First, to ensure that all the words used in the test are known to even elementary level testees, all the TWs and CWs are selected from the BNC 1K range, with words from this range not commonly known to low-level learners (e.g. accept, account, and achieve) also excluded according to the author’s classroom experience. Second, each set of CWs must include the most common associate on the EAT, listed first. Third, all TWs must be verbs and must not have a past tense form with the same number of letters e.g. lose / lost. Additionally, the TW must not also be a CW in another item, and the CWs and TWs are not part of the same word family e.g. tell, taller > story. Also, the first CW must not account for more than 50% of the responses to the TW on the EAT. Finally, function words or non-content words such as through were avoided.

A sample of the test appears in Appendix 1. For scoring purposes, one point was awarded for each correct TW supplied, whether it was spelled correctly or incorrectly, but only if the specified number of letters was provided e.g. club, up, together > join for the TW join.

A total of three trial versions of i-lex were conducted with two groups of learners (n=22 and n=25) in order to: (i) estimate appropriate time limits for a 50-item test, (ii) identify and remove problematic items, such as items which no subjects could answer, and (iii) sort the items in order of difficulty from the easiest to the most difficult. The experimental group comprised 99 Japanese learners of English at four different universities who ranged in level from elementary to intermediate. There were 25 native speakers of English in the control group. After completing i-lex (25 minutes), the non-native group completed a kanji translation test adapted from Webb (2008) in 20 minutes (see Appendix 2). The task is to write English translations for a series of 160 single words of varying levels of word frequency written in L2 (Japanese). Misspelled responses are accepted.

Results

With regard to RQ1, on average, native speakers outperform non-natives (see Table 1). A one-tailed unpaired t-test confirms that the difference between the means of the two groups is significant at t = 11.153, p < 0.0001. See Figure 1 for a graphic representation of the distribution of i-lex scores.

Table 1

A comparison of the means and standard deviations of all test scores for the native group (n=25) and the non-native group (n=98*)

<table>
<thead>
<tr>
<th></th>
<th>Mean</th>
<th>SD</th>
<th>Hi</th>
<th>Low</th>
<th>Max</th>
<th>Reliability</th>
</tr>
</thead>
<tbody>
<tr>
<td>i-lex (natives)</td>
<td>41.76</td>
<td>4.28</td>
<td>49</td>
<td>33</td>
<td>50</td>
<td>0.960</td>
</tr>
<tr>
<td>i-lex (non-natives)</td>
<td>25.00</td>
<td>7.23</td>
<td>42</td>
<td>6</td>
<td>50</td>
<td>0.990</td>
</tr>
<tr>
<td>Translation test</td>
<td>96.26</td>
<td>20.20</td>
<td>145</td>
<td>44</td>
<td>160</td>
<td>0.990</td>
</tr>
</tbody>
</table>

*Note that scores for one non-native subject were removed because the inclusion of her i-lex score of 4 resulted in a set of scores which was not normally distributed, a pre-condition for performing correlational analysis.

Since the highest scoring non-natives outperform the lowest scoring native, one could conclude that i-lex is not useful for establishing L2 ability beyond a certain level of proficiency. However, as Bachman (1990) points out, native speakers neither perform uniformly well, nor uniformly better than non-natives in tests designed for L2 language learners.

With regard to RQ2, Pearson correlations among i-lex scores and translation test scores are .729 (1-sided p value, significant at p < 0.01), see Figure 2 below. This indicates that the ability of this group of subjects to see links between highly frequent English words is related to their vocabulary knowledge.
With regard to RQ3, reliability coefficients for all measures are high, indicating a high degree of reliability. On the other hand, there was an issue with a small number of items wherein the same incorrect TWs were provided by members of both groups. The most serious case concerned item #47 (see Table 2), representing a challenge to the validity of i-lex in its current form.

Table 2

<table>
<thead>
<tr>
<th>Non-natives</th>
<th>Natives</th>
</tr>
</thead>
<tbody>
<tr>
<td>Correct [baby]</td>
<td>Incorrect [body]</td>
</tr>
<tr>
<td>9</td>
<td>8</td>
</tr>
<tr>
<td>19</td>
<td>5</td>
</tr>
</tbody>
</table>

Conclusions & Future Directions

The results of this study indicate that native speakers generally obtain higher i-lex scores than learners. Further, learner i-lex scores correlate positively and significantly with translation test scores, suggesting that, with gains in vocabulary knowledge or proficiency, the ability of learners of English to recognize and produce word associations generally improves in line with growth in the number of words they know. However, further refinement of items is required to improve the test. Items for which incorrect responses are commonly provided by both native and non-native subjects need to be replaced with new items. This process is likely to involve selecting and trialing items from the BNC 2K range since it had become increasingly difficult to find good items from BNC 1K list in earlier trials. This said, the results of this study suggest that i-lex may not be sensitive at higher levels of proficiency.

References


Appendix 1: Sample of i-lex

What word is associated with the following sets of 3 words?
Example: drink, red, glass >>>>> w (ice) [4]
The first letter, “w”, is given for you and the word has 4 letters [4]. The answer is “wine”.

Write the answers on the spaces below. If you don’t know the answer, leave it and go on to the next one.

1. coffee, cup, time
2. eat, drink, good
3. science, painting, music
4. post, write, box
5. country, city, village

6. past, future, here
7. boy, face, girl
8. over, out, fast
9. out, kind, of
10. shopping, words, names

Appendix 2: Sample of Translation Test

What does knowing a loanword mean for Japanese students? Kaori Nakao Kaorinewyork[at]hotmail.com

Introduction

Second-language researchers agree that vocabulary acquisition is an essential part of language learning, both for low and high proficiency students (Grabe, 1991; Laufer & Nation, 1999; Nation, 1990; Schmitt, 2000). Knowledge of the top 2,000 headwords is sufficient for a learner to read and understand more than 80 percent of the words of any given text (Nation, 1990). Nation (1990) also suggests that the teacher or the course designer draw the students’ attention to the similarities and patterns between the first language and the second language in order to encourage adaptive language acquisition.

While Nation has noted that loanword knowledge may assist in language acquisition, empirical research has indicated that some Japanese language speakers have inconsistent knowledge of loanwords (Daulton, 2008). For Japanese students learning English there are several ways in which loanword knowledge may also impede language
acquisition. Uchida’s (2001) review of the literature suggests that when English words enter into the Japanese language, the words’ phonetics, morphology and semantics often change. In this way loanwords may inhibit the processing and acquisition of some English vocabulary. For example, two English words ‘glove’ and ‘globe’ are both represented as ‘guroobu’ (グローブ) in Japanese, which might confuse second/foreign language learners.

Despite the potential difficulties loanwords might cause Japanese students of English, however, scant research has been carried out in this area of language learning. By examining the relationship between active L1 knowledge of loanwords, relative to word difficulty—self-reported difficulty determined with large sample checklists—the current study aims to contribute to this field.

**Aims**

This study has two aims: 1) examine the validity of students’ self-reported difficulty; 2) explore the pattern of difficulty and active word knowledge.

**Methods**

**Sample**

One hundred thirty undergraduate students of mixed major, studying in a compulsory course (Eigo/Eigokaïwa), at a private university in southern Japan, participated in this exploratory study.

**Procedure**

In a prior study, Gibson and Stewart (2011) explored the self-reported difficulty of 900 of the first 2,000 most frequent words of English, based on the Longman English corpus employed in the Longman English-Japanese dictionary (Bullon, 2007). Self-reported difficulty data was collected through yes/no checklists (n = 2768), with multiple forms using anchor items to connect the test forms under the Rasch model (Linnacre, 2012). Word difficulty was calculated using the single parameter difficulty measure taken from the collective student responses regarding their self-reported vocabulary knowledge.

For the current study, students were asked to write one English and one Japanese sentence for ten loanwords selected from a prior curriculum-wide test. The words for this test were selected from the top 2,000 high-frequency words. The task took between eight and fifteen minutes for students to complete.

The instructions which prefaced the test asked the participants to write one English and one Japanese sentence for each of the ten loanwords listed. Students were encouraged to try to write a sentence for all words.

**Analysis**

Japanese translations of target vocabulary were coded into incorrect and correct. Correct translations were then coded based on hiragana/kanji or katakana usage. Sentences were coded based on sentence structure: just the word, a subject-verb sentence employing the word, and more than a subject-verb sentence employing the word. Table 1 presents coding employed in the current study.

**Table 1 Coding for Japanese and English Vocabulary Examined**

<table>
<thead>
<tr>
<th>Definition</th>
<th>Writing type</th>
<th>Score</th>
<th>Sentence level</th>
<th>Score</th>
</tr>
</thead>
<tbody>
<tr>
<td>Incorrect</td>
<td>Word</td>
<td>0</td>
<td></td>
<td>1</td>
</tr>
<tr>
<td>Correct</td>
<td>Hiragana/kanji</td>
<td>1</td>
<td>S+V</td>
<td>2</td>
</tr>
<tr>
<td></td>
<td>Katakana</td>
<td>2</td>
<td>More than S+V</td>
<td>3</td>
</tr>
</tbody>
</table>

Categories were graphed with difficulty data for each word. Graphs were then employed to enable a comparison of the self-reported difficulty and students’ active knowledge of the words.

**Results**

**Pattern of difficulty and active knowledge**

Broadly speaking, students’ active knowledge of the eight target loanwords (two words did not have difficulty data available), matched the words’ self-reported difficulty (Figure 1). Two exceptions to this pattern, however, were evident. Students’ active knowledge of the loanwords “combination” and “announce” were far stronger than self-reported difficulty suggested. Over half (52 percent) of students’ use of “combination” in Japanese, however, was as katakana rather than the original hiragana/kanji usage. For example, for the word “combination” students generally used konbi/konbineshon rather than kumiawase or suuji/ moji/no kumiawase (組み合わせ，数字 [文字] の組み合わせ），which, based on the Longman English-Japanese dictionary’s Japanese frequency corpus, are the two most common definitions of “combination”. This suggests that many students’ knowledge of “combination” might be restricted to the katakana definition. Similarly the inconsistency between students’ active knowledge and the self-reported difficulty “announce” might be attributed partially to katakana use (30 percent). Furthermore, in Japanese, “announce” has a range of meanings, which allowed for flexible active use in Japanese.

![Figure 1](image)

**Common mistakes resulting from shared katakana phonology**

Seventy percent of students’ Japanese definition for “roll” were correct. Seventeen percent of students, however, reported役割を果たす (yakuwari wo hatsu) meaning “role”; these two words share the same katakana as ロール (rooru).

Seventy-three percent of students reporting Japanese definition of “tool” were correct. Nine percent of students, however, reported役割を果たす (yakuwari wo hatsu) meaning “role”; these two words share the same katakana as ロール (rooru).

Seventy-three percent of students reporting Japanese definition of “tool” were correct. Nine percent of students, however, reported役割を果たす (yakuwari wo hatsu) meaning “role”; these two words share the same katakana as ロール (rooru).

It is reasonable to assume that this type of error may be due to students thinking in katakana and therefore miss-decoding the word. Rather than translating “tool” into Japanese, students may simply be seeking phonically similar Japanese words then providing those words’ Japanese meaning. A student may read “tool” and then think役割を果たす (yakuwari wo hatsu) which is the loanword for “tall”.

**Preliminary Conclusions and Future Directions**

Self-reported difficulty and active knowledge were broadly consistent; however, katakana knowledge may be inflating students’ active knowledge of some loanwords. For many students’ within the sample for this study, their knowledge of loanwords was often limited to the katakana translation, despite the meaning being of low frequency within the Japanese language.

Error analysis of students’ Japanese sentences indicated that katakana knowledge may be interfering with students’
interpretation of loanwords. Having a single katakana form for two loanwords, such as “ロール”, may confuse both low and high proficiency students. This suggests that Japanese learners of English as a foreign language are experiencing a very specific type of interference: processing interference due to polysemy katakana words.

In the current study only loanwords were included in the active test of students’ vocabulary knowledge, however, an even proportion of loanwords and non-loanwords should be included in future tests. Testing of loanwords with non-loanwords will enable future research to isolate vocabulary acquisition difficulties specific to loanwords.

The effect of students’ field of study on their loanword knowledge and use may also be a fruitful avenue of investigation. It is possible that students in departments such as Information Studies and Fine Arts interpret loanwords through the lens of their studies. For example, in the current study, students in the department of Information Studies all translated “version” as “バージョン”(vaajyion) and employed the word in sentences describing software. Finally, it is important to test existing theories of loanword acquisition (e.g., Uchida, 2001) towards an empirically robust loanword theoretical framework. This might be undertaken by categorizing the loanwords within the top 2,000 words of English into a theoretical framework such as that suggested by Uchida (2001). Self-reported difficulty of the same loanwords might then be used to validate the framework. Analyses could examine the amount of variance in difficulty explained by the loanword theoretical framework.

References

Introducing an open-source vocabulary analysis and text-grading tool
Malcolm Prentice malc@alba-english.com

Background
This paper introduces a software tool, TextGrader, currently under development. The program's main function is to assist in writing or adapting materials to meet specific vocabulary requirements. For example, a version of the tool was used to help create reading texts for a university entrance exam, to a specification which required the use of newspaper articles originally written for native English-speakers, rewritten so that the vocabulary stayed within a provided list of High School-level word families.

Tools of this kind assist editing by visually highlighting each word in a colour indicating which (if any) of a set of provided word family lists it is from. This speeds identification of candidates for replacement or glossing; and offers an alternative to relying on intuition to perform a task it is not especially accurate at (Hunston, 2002, p. 20). The meaning of each colour depends on the list used, but typically represents frequency/utility of the word family in English.

The assumptions underlying the use of frequency lists for materials creation are that students are more likely to know words which occur more frequently in English, and that comprehension is related to the proportion of words known. For more on this, see Hu and Nation (2000), who found that at least 98% of words in a text need to be known for most students to have adequate comprehension without using a dictionary. Therefore, one use of such tools is to help create extensive reading materials, which allow students at various levels to reach that 98% threshold. However, this requires access to lists in narrower bands than those typically distributed with these tools.

Another use for tools of this kind is helping make texts intended for intensive reading reasonably accessible, and minimising student time spent learning words with frequencies that suggest they are unlikely to be encountered again.

Similar existing tools are the “View” function of AntWordProfiler (Anthony, 2012), and the “Edit to a Profile” option on the VocabProfile section of the Lextutor website (Cobb, n.d.). The reason for adding another program to this list is that each has useful features the other is missing, and a few flaws in common.

Firstly, VocabProfile allows users to paste in text or simply start typing, whereas AntWordProfiler requires users to load a text file. Secondly, VocabProfile displays results alongside the editing window, requiring users to look back and forth, whereas AntWordProfiler the highlighted text can be edited directly (“inline”). VocabProfile is a website -an offline solution is still necessary for teachers working on trains, in Wi-Fi dead zones, or editing exam texts that should not be sent unencrypted over the internet. There are also two small issues that both programs share: switching between alternative word lists is slow (the text or the lists must be reloaded) and neither cleans website addresses when calculating summary information (e.g. “http://google.com” is split and counted as three off-list tokens). These issues are all minor, but together they led to the decision to create a new tool.

Aims
Addressing the issues identified above, the aim was to create an offline tool capable of inline editing which can switch word lists rapidly, accept pasted or typed input, clean website addresses, and work on all platforms (Mac, Windows, and Linux). An overall aim was to release the tool as free, open-source software: free to download and use, with the source code available to be adapted to the personal requirements of each user, and free of licensing restrictions on then sharing any adapted versions with others.

Methods
The programming language used was Python. The project has been released under a GNU GPL v3 license.

To get the latest packaged version, please visit http://alba-english.org and find the link “Download TextGrader”. This version can simply be downloaded and run by double-clicking, and comes with three sets of lists built in, described below in Sample. For help using the program, please watch...
the regularly updated demonstration screen-cast available at http://www.youtube.com/user/malcprentice.

Those interested in making changes to the program or using their own lists should instead download and run the unpackaged script - available at https://github.com/malcprentice/Text-Tools (click "Zip"). However, using this adaptable version requires Python 2.7 (http://python.org/) and basic familiarity with the command line.

Sample

The lists used in the current version are adapted from those distributed with the RANGE program (Heatley, Nation, & Coxhead, 2002). The three options are: the British National Corpus list (Nation, 2006); the paired General Service List / Academic Word List (West, 1953; Coxhead, 2000); and a new list combining data from British National Corpus/Corpus of Contemporary American English (BNC/COCA) which adjusts for the bias towards formal, written English in the source corpora (Nation, 2012).

Preliminary Results

Initial tests (comparison with short texts analysed by hand, comparison with the output of similar tools) suggest the tool is functioning as intended, including all features described under Aims. The user interface is shown in Figure 1.

Figure 1. Main screen of the program. This figure shows a text colour coded using the BNC/COCA lists.

In common with the other tools, users can also get basic summary information on word tokens, types and families by selecting "Word Lists" for each level. The pre-installed lists are very broad - most contain around 1000 word families. Making the program specific to a certain entrance exam or graded reader level currently means copy-pasting new lists into the source code version (see Methods). Lists can be converted from RANGE format (line/tab) to TextGrader format (line/space) using a script available from https://github.com/malcprentice/Text-Tools. If users only have a list of headwords, the LexTutor Familizer (http://www.lextutor.ca/familizer/) is one option to convert that to a word family list in a compatible format.

Preliminary Conclusions

The main advantage to this tool currently lies not in its feature set, still under development, but in its license. Open-source software is transparent and adaptable. Transparent in that the exact definition of concepts used (e.g. "token") is clear from the code and adaptable in that changes do not require the cooperation of the developer. For example, should any user have an issue with the way hyphenated words are handled, they could open the program with a text editor, make a change, and share their version with others - with no need to ask for permission. Any useful improvements can also be merged back into the main project, with users becoming collaborators.

Future Directions

Development is ongoing, with both large and small issues remaining. While the tool is stable (no crashes), it is slow with long texts. The current system for adding new lists is not user-friendly. A recent repair of website address cleaning temporarily broke the handling of punctuated numbers, and there are almost certainly other bugs. Readers are invited to help with the ongoing process of improvement by testing, collaborating or suggesting features.

References

The Vocabulary SIG will hold two events at JALT National in Kobe this year: our SIG Forum and the Annual General Meeting (AGM). At the SIG Forum you can see the poster presentations from our members on many different aspects of vocabulary learning and teaching, as well as talk with people interested in all things vocabulary. At the AGM we will discuss what has been happening with the SIG over the last year and confirm our officers for the upcoming year. Also, you can find out more about the annual SIG symposium and other events, and various ways for you to participate in the SIG. If you have any questions please email jaltvocab@gmail.com.

Here are the details of the two events:

**Title:** Vocabulary SIG Forum Poster Session (ID #: 860)
**Day:** Sunday, October 27th
**Time:** 11:35 AM – 1:35 PM (120 minutes)
**Room:** Exhibition Hall #3
**Presenters:** Vocabulary SIG members

**Title:** Vocabulary SIG Annual General Meeting (ID #: 861)
**Day:** Sunday, October 27th
**Time:** 1:20 PM – 2:20 PM
**Room:** Exhibition Hall #3
**Presenters:** Vocabulary SIG officers

**Call for Participation**
If you are a SIG member and have a poster presentation that you would like to display (on the topic of vocabulary) at the Vocabulary SIG Forum at JALT National please contact us. Email your name, poster title and a short description of your poster to jaltvocab@gmail.com.

See you there!
CALL FOR PAPERS FOR 
Vocabulary Learning & Instruction

The Vocabulary SIG’s Vocabulary Learning and Instruction (VLI) journal is calling for submissions for its third issue. Submissions will be published online upon acceptance, and printed early 2014.

VLI accepts long-form research papers (2000-7000 words) and brief reports, summaries and commentaries (2000-3000 words) related to vocabulary acquisition, pedagogy, assessment and lexical networks.

As an open journal, content is indexed on Google Scholar and made freely available on the internet without paywalls. Authors are free to also make their work available on sites such as academia.edu and researchgate.

The deadline for submissions for the third print issue is Tuesday, October 01, 2013 (at 23:59:59 JST).

All submissions are subject to a 2-step peer-review process:

A) Editors review manuscripts to ensure basic requirements are met, and that the work is of sufficient quality to merit external review. This process typically takes 1-2 weeks, at which point authors are informed of the outcome.

B) Submissions which meet these requirements are sent out for blind peer review by 2-3 experts in the field. This process takes approximately 1-2 months. Following external review, authors are sent copies of external reviewers’ comments and notified of decisions (accept, accept pending changes, revise and resubmit, or reject).

Please see http://vli-journal.org/submissions.html for details.
2014 JALT Vocabulary SIG Symposium

Proposed date: Saturday June 21, 2014

Place: Kyushu Sangyo University

Format: Two symposium sessions of four speakers and one discussant on the topics of vocabulary learning and assessment. Poster presentations by SIG members will be displayed during the lunch break.

Call for Posters:
In order to ensure a strong audience, no sessions will run concurrent to poster presentations. Proposals for poster presentations will be accepted under two general categories:

1. Ongoing vocabulary related research
2. Vocabulary teaching and learning in practice

Submission:
Please e-mail 1) your name, 2) presentation title, and 3) a brief outline of your proposed topic not exceeding 300 words, to <jaltvocab[at]gmail.com>

Structured formats for poster presentation proposals:

<table>
<thead>
<tr>
<th>Ongoing research format:</th>
<th>Teaching and learning in practice:</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Background</td>
<td>• Theoretical framework</td>
</tr>
<tr>
<td>• Aims</td>
<td>• Sample population</td>
</tr>
<tr>
<td>• Methods</td>
<td>• Procedure</td>
</tr>
<tr>
<td>• Sample</td>
<td>• Preliminary results</td>
</tr>
<tr>
<td>• Preliminary results</td>
<td>• Preliminary conclusions</td>
</tr>
<tr>
<td>• Preliminary conclusions</td>
<td>• Future directions</td>
</tr>
</tbody>
</table>

Deadline: March 30th, 2014

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Accepted poster presenters will be invited to submit written synopses of their presentation for publication in VERB 3(2), which is scheduled to be published in Fall 2014. A call for papers will be sent upon poster acceptance notification.
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Current Trends in Vocabulary Studies
www.vocab.org.nz

December 18-20, 2013
Rutherford House, Victoria University of Wellington, New Zealand

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Frank Boers  Irina Elgort
Peter Gu  Anna Sliyanova
Stuart Webb

...and many more you shouldn’t miss!

VERB Submission Information

Short Papers
• Contributions to Short papers and Word of Mouth sections must not exceed 1000 words, excluding references and titles. They are expected to adhere to APA 6th edition formatting guidelines. All submissions will undergo peer review, and may require rewriting and resubmission for acceptance.
• The call for papers deadline is: January 10th

Member Publication & Event Info
• If you would like to get the word out about your recent publications, please inform us and we will list it in a future issue so that more people will be exposed to it.
• If you know of a vocabulary-related event, or if you are planning to organize an event, let us know so we can get the word out for you!

Please send submissions to: jaltvocabsig.verb[at]gmail.com
For more information: http://jaltvocab.weebly.com