# Development of Vocabulary Use <br> in ESL Composition 

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#### Abstract

Despite the fact that vocabulary knowledge is essential in all aspects of English as Second Language (ESL) learning, how that knowledge develops over time is still unknown. This study investigated how advanced learners' vocabulary usage changed via written compositions. Five graduate-level ESL learners wrote one essay per week over an eight week period responding to a given topic. The essays were analyzed in three aspects, following Laufer (1991): Language Density (LD), Language Sophistication (LS), and Language Variety (LV). The results suggest that mid-advanced learners' $L D$ tends to remain low and spike randomly, while the LD of high-advanced learners remain high and static. In terms of LV, both groups of learners showed little change over the eight weeks dependent on their proficiency level. The highadvanced learners showed more changes across the eight weeks in LS than the mid-advanced group. Collectively, these findings suggest that vocabulary knowledge usage patterns seem to relate to the learners' writing ability, motivation, and focus. Based on discussion and analyses, the current descriptive study offers the pedagogical implication that advanced ESL learners need more opportunity to practice already acquired vocabularies, especially with advanced vocabulary in use with familiar writing prompts for further lexical development.


Vocabulary acquisition in a second language is a continual process. Unlike the limited grammar points, English has a vast number of words. There is not a precise count of English vocabulary, but the Second Edition of the Oxford English Dictionary indicates that there are approximately 171,476 words in current use. To complicate matters further, roughly 8,500 new English words are created every year. On average, an English learner needs to recognize nearly 20,000 word families if he wants to appear native-like (Nation, 2001). Thus, even advanced learners of English as a second language (ESL) must continue to acquire new vocabulary.

Previous studies on the development of vocabulary usage are limited. Laufer (1991), for example, studied the development of vocabulary use in writing. Cohen (1987) studied the enrichment of vocabulary in a second language (L2) environment. Many researchers have investigated vocabulary use in various situations such as a first language (L1) versus an L2 environment or advanced learner acquisition versus beginning learner acquisition, but only a handful of studies comprehensively covered all variables in the acquisition process. In terms of pedagogical implications, only by studying the development of vocabulary use can teachers adjust their methods for different learner situations. This descriptive study provides further understanding of the development of L2 vocabulary use in an L2 environment.

## LITERATURE REVIEW

In an L2 environment, new vocabulary is everywhere. The most difficult aspect in acquiring new vocabulary is that each new word has several aspects that must be learned in order to use it correctly. Nation (2001) categorized word knowledge into three categories: form, meaning, and use. Each category is further divided into three aspects and contains both productive and receptive elements of word knowledge. The three aspects of form are spoken (the word's sound and pronunciation), written (the word's image and spelling), and word parts (recognizable affixes and affixes needed to express meaning). Nation's (2001) meaning category contains a form and meaning aspect (the combination of meaning and form), a concepts and referents aspect (basic and extended meanings), and an associations aspect (related words). The Use category contains grammatical functions, collocations, and constrains on use (appropriate contextual use). In this paper, the focus is on testing productive knowledge of vocabulary in free writing. All three categories of word knowledge (form, use, and meaning) were considered in analyzing vocabulary use.

Because writing is a productive skill as opposed to a receptive one, participants tend to avoid utilizing words that they perceive as difficult. This tendency was investigated by Blum-Kulka and Levenston (1978) and is referred to as lexical simplification. One more factor affecting writing is the lack of necessity in using newly acquired words. Advanced learners "can communicate their ideas orally and in writing (even though their expression is not flawless), both in class and homework assignments and in examinations" (Laufer, 1991, p. 441). This implies that advanced learners have a tendency not to use difficult or advanced words because they can meet their language needs within their current vocabulary domain.

Laufer (1991) conducted an influential study on vocabulary learning of advanced learners. In this longitudinal study 47 first-year Israeli college students majoring in English wrote an entrance exam, which was later compared with an essay on the same topic written after one semester had been completed. The results revealed that the majority of advanced learners made no significant
advancement in vocabulary use. Only six students under the threshold improved. Laufer (1991) defined the threshold as the average lexical richness at which the learners showed lexical knowledge. Laufer's Active Vocabulary Threshold Hypothesis suggests that the development of receptive vocabulary is a lifelong process that occurs only after L2 grammar rules have been acquired. In contrast, productive vocabulary knowledge develops only until it reaches a certain level of achievement. In short, if a learner has an average level of proficiency, his progress in vocabulary learning will be limited. The results of Laufer's (1991) study suggest that for most advanced English learners, even when receiving comprehensible input in an academic environment on a daily basis, any significant progress in vocabulary enrichment in writing is hardly typical.

Although Laufer's study well explained advanced ESL learners' limited vocabulary enrichment in writing, no prior knowledge of such vocabulary was actually checked in her study. Unlike Laufer, however, Schmitt (1998) focused on how individual words were acquired. He "tracked the acquisition of eleven words over the course of a year for three adult learners with advanced proficiency in English" (Schmitt, 1998, p. 281). The three participants in his study were postgraduate students studying in the U.K. Schmitt described the acquisition of individual words by measuring the development of four types of word knowledge: written forms, associations, grammatical information, and meaning by oral or written interview. His relative findings to the current study were: (1) participants had little problem with spelling; (2) the participants rarely knew a word's meaning senses and derivational forms completely; and (3) some of the word knowledge types were interrelated. From the findings of this research, we can see the inequality of learning word knowledge.

As seen in the previous studies, the relationships between vocabulary use in writing and learning individual words are complex and seem to be a stumbling block for ESL learners and teachers. Thus, we need to examine how to enrich L2 vocabulary in use. In this light, a recent study carried out by Joe (2010) attempted to clarify such question. In her study, Joe tracked an adult ESL learner's quality and quantity of encounters with twenty academic words over three months. Pretest and posttest interviews, course materials, and notes were used to analyze the acquisition of the words. The results showed that frequency of encounters has more influence on acquisition than contextual richness does. In other words, repeated encounters and practice with vocabulary in use is needed for ESL learners to produce meaningful and grammatically accurate sentences.

## THE STUDY

Collectively, Laufer (1991) investigated vocabulary usage of Israeli students majoring in English language where the L2 is only available in an English as a foreign language (EFL) environment. In line with Laufer, Schmitt (1998) focused on the acquisition of different aspects of word knowledge; however, contextual use of vocabulary clearly was not his research focus. In Joe's (2010) study, on Development of Vocabulary Use
the other hand, productive knowledge of words was tested in a contextualized format with target stimuli. Although the previous studies provided a longitudinal perspective on second language vocabulary acquisition, collective findings are still less conclusive. In order to shed more light on the previous longitudinal findings, the current study focuses on vocabulary change in writing amongst advanced ESL learners in an L2 environment. The purpose of the current study is to investigate productive knowledge of L2 vocabulary and with the above purpose in mind, we addressed the following research question: How does ESL learners' vocabulary use in composition change over an eight-week period? With the above objective and the addressed research question, the current study provides us with richer understanding of the developmental pattern of uncontrolled vocabulary usage in ESL learners' writing.

## Methods

## Participants

The participants for this project were five graduate students, as shown in Table 1, at a mid-size university in the U.S. The five participants consisted of three males and two females with four varied first language backgrounds. The majority of the participants were in their twenties, except Toshiko. Three of them, Abdullah, Ming and Roxana, were recent arrivals in the U.S. (less than 10 months), while Sayid and Toshiko had been in the U.S. much longer. The participants' majors were spread across many different departments: business (e.g., accounting), humanities (e.g., anthropology), and English (e.g., linguistics).

Table 1.
Participant Information

|  | Gender | Age | L1 | Major | LOR* |
| :--- | :--- | :--- | :--- | :--- | :--- |
| Abdullah | M | 26 | Arabic | Computer Science | 24 |
| Ming | M | 23 | Chinese | Accounting | 8 |
| Roxana | F | 28 | Romanian | Anthropology | 9 |
| Sayid | M | 27 | Arabic | Linguistics | 36 |
| Toshiko | F | 43 | Japanese | English | 73 |

Notes. * Length of residency; The full description should be "length of residency in an English speaking community."

All participants wrote and typed on a computer one essay per week as assigned by the researchers across eight weeks. They were required to write each essay within 20 minutes without any reference or aid (e.g., dictionaries) so that their vocabulary usage in a natural environment could be investigated. The participants were asked to write two paragraphs for each assignment with each paragraph containing five to seven sentences and responding to the designated question. The criterion for the selection on the writing questions was that the topics should be related to the experiences of the participants as international students. This was so that the participants would be able to finish their writing as required and the topics would be sufficiently interesting and relevant to motivate the participants' responses (see Appendix A).

## Analysis procedures

To explore the development of the participants' vocabulary use, the lexical items in the writings of the participants were listed and calculated each week in five aspects: the total number of words, the number of tokens (No. of tokens), the number of types (No. of types), the number of content words (No. of content words), and the number of advanced tokens (No. of advanced tokens). A token in this project refers to words in the same word family without considering their derivations. For example, the words "he," "him," and "his" were three words in the total of words but were considered one token. Types refer to lexical categories (e.g., noun, preposition). Thus, when taking "he," "him," and "his" into consideration, pronouns like these words were calculated as one type. Out of total number of token nouns, verbs, adjectives, and adverbs were listed and calculated as content words. Advanced tokens refer to the sophisticated words chosen from the tokens listed in each essay. The researchers set the standard of advanced tokens as the tokens that were not frequently used in a conversation and informal setting. For example, when "he," "him," and "intact" appeared in one essay, the first two words were one token and "intact" was calculated as another token. Moreover, "intact" was an advanced token since according to the researchers' standard, this word was not frequently used in a conversation. The researchers went through all the tokens in all writings and determined the advanced tokens together.

The data were coded following Laufer's (1991) formulas of Lexical Variation (LV), Lexical Density (LD), and Lexical Sophistication (LS). LV shows the tendency of the learner to repeat the same word multiple times (Laufer, 1991). Therefore, a high LV score indicates a participant had little change in his or her vocabulary choices. Laufer (1991) defined LD as the percentage of lexical words (e.g., nouns, verbs, adjectives and adverbs) in the writing. A higher LD score is indicative of a large vocabulary. LS was defined as the percentage of sophisticated words in the text (Laufer, 1991). A higher score in LS shows Development of Vocabulary Use
that the participant has mastered and is able to use a large amount of academic words. The formulas of LV, LD, and LS are listed below:

$$
\begin{aligned}
& \text { 1. } \mathrm{LV}=\frac{\text { No. of types }}{\text { No. of tokens }} \times 100 \% \\
& \text { 2. } \mathrm{LD}=\frac{\text { No. of content words }}{\text { No. of tokens }} \times 100 \% \\
& \text { 3. } \mathrm{LS}=\frac{\begin{array}{l}
\text { No. of advanced tokens } \\
\text { Total No. of content words }
\end{array} \times 100 \%}{}
\end{aligned}
$$

Two independent raters coded the LV, LD, and LS for each writing. The interrater reliability was $95.23 \%$ and any disagreement was consulted to reach consensus among the raters.

## RESULTS AND DISCUSSION

## Overall Description of Vocabulary in Use

In the current study we investigated if advanced ESL learners' lexical vocabularies would change over eight weeks. The specific focus was to see whether any change could occur in a longitudinal period in the aspects of LDs, LVs, and LSs. As a result, the descriptive data portrayed some interesting patterns among the participants, which seemed to relate to the participants' language proficiency and reflected their overall vocabulary knowledge. In the following section, we offer interpretations of the patterns found amongst two contrasting groups of participants.

Table 2.
Summary of Each Participant's Average Word Count, Tokens, Content Lexemes, and Advanced Vocabulary Used

|  | Word count | Tokens | Lexemes | Advanced |
| :--- | :--- | :--- | :--- | :--- |
| Abdullah | 244.4 | 105.8 | 71.8 | 1.6 |
| Ming | 318.1 | 150.4 | 112.4 | 5.4 |
| Roxana | 316.5 | 131.6 | 98.5 | 3.3 |
| Sayid | 311.6 | 139.3 | 100.3 | 6.9 |
| Toshiko | 157.9 | 76.3 | 48.9 | 1.8 |

Note. Word count (running word count), the number of lexemes (tokens), the number of content lexemes, the number of advanced vocabulary items.

In Table 2, we summarize participants' averages for word count, tokens, content lexemes, and advanced vocabulary items used in compositions. The data suggest relatively large amounts of vocabulary knowledge. In fact, all participants were enrolled in graduate programs in an English-speaking environment, and they were using English as a communicative tool in their own fields on a daily basis. Thus, we assumed that the participants had achieved sufficient grammatical knowledge, and they were fully capable of expressing complex ideas in writing (Laufer, 1991; Schmitt, 1998).

Despite their advanced language proficiency, however, a notable gap in the data divides the participants into two groups. Specifically, the overall description of vocabulary knowledge of Roxana, Ming, and Sayid (hereafter, the high-advanced learners) were relatively similar in terms of word counts, tokens, content lexemes, and advanced vocabulary. In contrast, Toshiko and Abdullah (hereafter, the mid-advanced learners) had significantly lower averages for word counts, tokens, content lexemes, and advanced vocabulary.

One potential reason for the gap is that the participants in the two groups might have possessed different productive knowledge sizes of vocabulary. In general, higher achievement in productive vocabulary knowledge requires learners' deliberate efforts in a lengthy period (Nation, 2001). Such delays might have resulted from the fact that the learners tend to receive more input relative to the output (writing in this case) they produce, and the nature of writing simply requires additional knowledge: a written form of vocabulary or spelling.

Another reason for the above salient contrast, especially the midadvanced learners' low averages, is that individual writing techniques might differ from one another, which mirrored overall proficiency differences. Generally speaking, writing requires a number of skills. Since the given time for the task was strictly limited to 20 minutes, it might have resulted in the participants focusing on the whole writing process, such as generating ideas, constructing grammatical structures, organization, revising, and so forth, instead of concentrating on vocabulary use only. Therefore, the mid-advanced learners might not have been able to focus on vocabulary use as meticulously as they could have in a less time-sensitive situation. As a consequence, allocation of the participants' focus to the global writing process led to less variety in vocabulary use under the current task design. Such influences from the task design will be discussed in more detail in a later section.

## Use of a Number of Vocabularies in Writing

Figure 1 shows the LDs of all participants and the two different patterns that were observed. Firstly, the mid-advanced learners showed similarities. Their LDs presented lower and more random changes within the eight weeks. Abdullah's highest was in Week 1 ( $78.23 \%$ ), whereas his lowest was in Week 2 ( 56.36 \%). The mean percentage over the eight weeks was 67.37 \%. Toshiko's LD also Development of Vocabulary Use
showed the same change ( $M=63.83 \%$ ). Her highest was in Week 1 ( $75.58 \%$ ), and her lowest was in Week 7 (60.00 \%).

Figure 1.
Summary of Lexical Density Percentage


The high-advanced learners showed somewhat different patterns; their LDs remained relatively high but static during the experiment. Ming's LD was highest in Week 1 ( 77.27 \%), whereas his lowest was in Week 6 ( 71.97 \%) ( $M$ $=74.75 \%$ ). Correspondingly, Roxana's LD statically remained higher ( $M=$ 74.69 \%). Her highest was in Week 7 ( 78.18 \%), and her lowest was in Week 4 ( $71.2 \%$ ). Sayid's LD also showed a static line after Week 1 ( $M=71.85 \%$ ). His highest was in Week 5 ( 75.16 \%), whereas his lowest was in Week 3 ( $68.55 \%$ ).

As shown in Figure 1, the individual changes of the LD lines show patterns that suggest certain interpretations. As mentioned previously, LD is calculated by a formula where the number of content lexemes is divided by the number of tokens indicating that the higher the LD is, the larger the content lexeme proportion is. Among the high-advanced learners, the LDs over the eight weeks changed less widely, while the mid counterpart showed relatively lower and wider changes, albeit inconsistently. For instance, Ming's LD ranged from 71.97 \% (Week 6) to 77.27 \% (Week 1), whereas Abdullah's LD ranged more widely from 56.36 \% (Week 2) to 78.23 \% (Week 1). Therefore, it is safe to conclude that the two groups' LDs demonstrated different patterns in a longitudinal span.

A plausible interpretation to what caused such inconsistent LDs among the mid-advanced learners could be the fact that the writing prompts elicited the participants' vocabulary sizes differently depending on how familiar they were with the given topics. This is clearly evidenced in Week 4's data in which almost all participants' LDs dropped similarly, suggesting that the prompt affected the learners' performance equally. Specifically, the given topic was about the quality of a friend, which is abstract and drawing more on personal values than
the daily life and experiences of an international student. Consequently, they might have needed more time to reflect and evaluate their own personal values before writing, resulting in less overall time spent writing.

In contrast, the high-advanced learners showed static and higher lines, which might be attributed to their higher language proficiency. That is, their advanced ability in writing might have enabled them to express more abstract ideas in a limited time. Their writing skills compensated for a lack of topic familiarity so that they simply focused on what to write instead of how to write. Note that other topics (see Appendix A) were strongly associated with the learners' daily lives, such as experiences of different cultures, difficulties in living abroad, and narratives of a memorable journey. These topics resulted in fewer hindrances in expressing their ideas because they were more concrete for the ESL learners, in general. In short, perhaps the mid-advanced learners would have shown higher LDs if they were more familiar with the topics. This familiarity with the topic could have potentially disguised their smaller quantity of productive vocabulary knowledge. This conclusion still needs more empirical data to investigate the causality in detail.

Figure 2.
Summary of Lexical Variation Percentage.


## Use of Variety of Vocabularies in Writing

The LVs also portray interesting patterns, and an overall summary of the LVs of participants is presented in Figure 2. Abdullah's highest LV was in Week $4(12.05 \%)$ and his lowest was in Week $1(8.06 \%)(M=9.59 \%)$. Likewise, Toshiko's LV also showed a higher flat line in parallel to Abdullah ( $M=13.24$ \%). Toshiko's highest LV was in Week 4 ( 16.39 \%), and her lowest was in Week 1 ( $11.63 \%$ ). In short, the mid-advanced group showed higher flat lines than the high-advanced counterpart.
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The high-advanced learners' LVs were slightly different. That is, their LVs were flat, but relatively low. Ming's highest was in Week 4 (7.7 \%), and his lowest was in Week 5 ( $6.29 \%$ ), and the change remained consistent in the other weeks ( $M=6.76 \%$ ). In accordance with Ming, Roxana's static line peaked in Week $6(10.87 \%)$ and was lowest in Week $7(6.06 \%)(M=7.9 \%)$. Sayid's LV is not an exception ( $M=7.24 \%$ ). His highest was in Week $6(8.13 \%)$, and his lowest was in Week 4 ( $6.33 \%$ ).

The mid-advanced learners showed higher LVs throughout the experiment in contrast to the high-advanced learners who showed relatively low and flat lines. As previously mentioned, the LV is calculated by the number types (of parts of speech) divided by the number of tokens. Given that the numerator is strictly limited ( $N=11$ and $M=10.03$ ), the level of the line conversely represents the token size, which indicates the variation of vocabulary in use in respect to the each part of speech. Almost all types of the parts of speech were utilized in each composition, except for interjections, suggesting that, as discussed earlier, all participants have reached the threshold level where grammatical knowledge of vocabulary has sufficiently developed according to Schmitt (1998). According to this logic, the mid-advanced learners' higher lines represent smaller token sizes, while the high-advanced learners' lower LVs were attributed to larger token sizes. Collectively, it is safe to say that the individual productive knowledge of vocabulary seems to be different depending on proficiency, although all the participants are equally proficient in terms of grammatical knowledge.

Figure 3.
Summary of Lexical Sophistication Percentage


## Use of Advanced Vocabularies in Writing

The LS is demonstrated by a formula in which the number of advanced vocabulary items is divided by the number of content lexemes, indicating how
often the participants produced advanced vocabulary in relation to how often they use more basic content words. In Figure 3, a summary of the LSs of all the participants is shown. Abdullah's highest was in Week 6 ( $2.56 \%$ ) and his lowest was in Week $4(0.00 \%)(M=1.5 \%)$. Toshiko's LS paralleled with Abdullah's ( $M=2.26 \%$ ). Her highest was in Week 1 ( $3.49 \%$ ), and her lowest was in Week $5(1.27 \%)$. The data indicated that, although only a few advanced words were produced, they were produced steadily over the eight weeks.

Not surprisingly, the higher proficiency counterpart showed wider changes. Roxana's showed several spikes in Week 1 ( 4.08 \%), Week 3 ( 3.06 \%), and Week $6(4.35 \%)$. Several drops also occurred in Week $2(.74 \%)$, Week 4 (. $8 \%$ ), and Week 8 ( $1.91 \%$ ). Likewise, Sayid's writing showed random spikes and dips across the experiment $(M=4.91 \%)$. His spikes were in Week $7(10.61$ $\%)$, Week $5(7.01 \%)$, Week $4(5.06 \%)$, and Week $1(5.0 \%)$. His line dropped in Week 8 ( $2.08 \%$ ), Week $6(3.25 \%)$, and Week 2 ( $2.21 \%$ ). Ming, however, showed somewhat different patterns. In fact, a slight development was observed. His highest was in Week 8 ( $5.92 \%$ ), and his lowest was in Week 3 (1.28 \%). His steady increase began from Week $5(3.14 \%)$ and continued to Week $8(M=$ $3.58 \%$ ). In summary, the LSs patterned contrastively among the two proficiency groups: the mid-advanced learners showed consistently lower lines, while the high-advanced showed moderately inconsistent lines.

Simply put, the formula indicates that the low LS is ascribed to a smaller quantity of advanced vocabulary. Limited quantity of advanced vocabulary, however, is not the same as an absence of such knowledge. Rather, the advanced learners might have avoided using advanced vocabulary, which can account for the low static LSs of all the participants. According to Laufer (1991), the advanced learners tend to avoid advanced vocabulary to express their ideas despite their rich knowledge of vocabulary in general, and the current study is not an exception. Roxana, for example, used "public transport[ion]" and "public bus" interchangeably, which can be attributed to a various factors.

One probable factor for the less frequent use of advanced vocabularies might be due to a psychological factor such as the participants' desire to use a number of advanced items in order to express complicated ideas (Corson, 1985; Laufer, 1991). This is in line with the previous studies (Joe, 2010; Schmitt, 1998). Although the learners would avoid using advanced vocabulary in general, the high-advanced learners might produce more advanced vocabulary only when they were required, which was also evidenced in our data. When Sayid described his own country's political issues in comparison to the United States, for example, he used more advanced vocabulary $(M=10.61 \%$, where the overall average is $4.91 \%$ ) to provide needed information. Sayid's performance adequately illustrated that the high-advanced ESL learners could have used more advanced vocabulary with an adequate prompt or requirement. Unlike Schmitt and Joe, however, the current study did not explicitly ask participants to produce specific target stimuli. In this sense, the current study created little motivation for the participants to use particular advanced vocabulary, which Development of Vocabulary Use
resulted in demonstrating little and inconsistent productive knowledge of the advanced vocabulary. An issue of how much knowledge each participant had concerning each advanced vocabulary word (whether newly learned or already known) is also an essential consideration, which was unable to be determined.

In this same vein, since participants did not know the main goal of the task, the requirement of completing a composition in a limited time became the participants' primary concern. Therefore, individual differences of writing ability largely impacted the quality of the composition in terms of vocabulary use. In short, the higher proficiency freed up more attention sources to vocabulary usages as pointed out in Schmitt (2010), which enabled the learners to allocate more attention to word choices because writing process appeared so automatic to the high-advanced learners. On the other hand, the mid-advanced learners focused on constructing precise sentences with sparse attention to word choices due to more difficulty of writing as a whole.

Collectively, the lower static LS lines by no means indicated the absence of knowledge of advanced vocabulary among the current participants. Rather, the current finding suggests that the advanced ESL learners could produce more advanced vocabulary if they are required, but they otherwise avoid it. Thus, from a pedagogical standpoint, it is necessary for the advanced ESL learners to make deliberate effort to practice the advanced vocabulary explicitly. Such implication is well supported in the relevant literature (Nation, 2001). Otherwise, as found in our data, the advanced ESL learners would avoid such items in use unless it is required (Blum-Kulka \& Levenston, 1978), which in turn facilitates development of productive knowledge of vocabulary usages among the advance level of learners.

## CONCLUSION

In this study we investigated whether advanced ESL learners' vocabulary use in written compositions changed over eight weeks. The analyses in relation to proficiency as seen in the LDs, LVs, and LSs suggest that productive vocabulary use depends on topic familiarity. Tailored writing prompts are required to motivate the learners to use advanced vocabulary because learners may avoid such items otherwise. Additionally, productive vocabulary development in L2 is a longer process according to the learners' LDs, LVs. and LSs' patterns.

The findings lead to several pedagogical implications. One such implication is that ESL writers may require more time to feel comfortable using more advanced vocabulary so that advanced vocabulary is most likely to be used when required or motivated. Another is that there is a threshold point where learners must explicitly learn new academic vocabulary. In this view, if an educator wants to know the true writing ability of an ESL learner, especially in terms of any aspect of vocabulary knowledge, familiar writing prompts are necessary.

In spite of the above useful findings, however, several limitations should be taken into consideration in the current research design. Most notably, increasing the length of research may provide a different conclusion. The writing prompts also need more attention so that the participants would not decline using academic vocabulary when answering. Lastly, the amount of academic vocabulary already known by the participants was not quantified prior to the experiment in which a formal pre-test would have granted clearer delineations concerning each participant's level at the beginning of the study. For future projects, requiring the participants to use as many advanced vocabulary words as possible and tracking the usage of such vocabulary of undergraduates or individuals in the process of learning English could give more insight into the process of acquiring and using vocabulary in writing.

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## APPENDIX A

Instructions: Write two paragraphs, each paragraph containing 5-7 sentences, responding to the following question. You have a maximum of 20 minutes to complete this writing. You are not allowed to use a dictionary or any other aid.
(Week1) What are your favorite places in your country that you will recommend your foreign friends to visit?
(Week 2) Some university students want to live in a room alone. Others prefer living with roommates. Which do you like better, living alone or living with roommates? Give specific reasons for your answer.
(Week 3) Think of a problem you encounter at BSU that you think needs to be solved (transportation, time for class, food in the cafeteria ...). State the problem and explain why you think it is a problem. Then offer some advice that may solve the problem.
(Week 4) In your opinion, what are the qualities of a good friend? Use specific details and examples in your answer.
(Week 5) Some people think that people moving to a new country should accept the culture in the foreign country rather than living as a separate minority group with a different lifestyle. What do you think?
(Week 6) Is it a good idea to have a part time job as a college student? Give reasons and specific examples to support your opinion.
(Week 7) What are some ways that Muncie/Ball State is different from your hometown?
(Week 8) Write about a journey that you took to a certain place. Talk about what you liked and/or did not like about it.

