



## The Relationship Between Extensive Reading Duration and Reading Volume

**Takaaki Goto**

Kyushu University of Nursing and Social Welfare

### ABSTRACT

*This study statistically examines students who conduct extensive reading in the first and second semesters by focusing on the reading volume of word counts to address the following research questions: 1) Is there a difference in word counts between students who conduct extensive reading in the first semester and those who continue it in the second semester? 2) Are there any differences in word counts between the three groups: students who conduct extensive reading for the first time only in the first semester, those who conduct it for the first time only in the second semester, and those who conduct it in both semesters? In 2017, extensive reading was implemented for 31 second-grade nursing students. No significant differences were detected for the first question. However, approximately 73% of students increased their word counts. Regarding the second question, a significant difference was found between the two groups such that certain students decreased their word count, which practitioners should be aware of. If a class includes experienced students who read extensively, they can serve as role models for novice students practicing it for the first time.*

### INTRODUCTION

Extensive reading, in which students develop their English skills by reading a large number of English books written for easy readers, has expanded from junior high school, high school, and junior college to university education. Even local public community libraries have recently begun to incorporate extensive reading, and the target audience has widened to include learners of all ages (Goto, 2019a; Nishizawa & Iinuma, 2017).

Day and Bamford (1998) define extensive reading thus: “it is an approach to the teaching and learning of second language reading in which learners read large quantities of books and other materials that are well within their linguistic competence.” This is a widely recognized definition.

As the implementation of extensive reading has become more widespread in Japan, a variety of research articles have examined its effects. It can improve students’ engagement in English (Rob & Susser, 1989), reading speed (Bell, 2001), and positive attitudes toward English reading (Day & Bamford, 2000). It also enhances the four language skills of reading, listening, speaking, and writing in English (Day, 2015; Takase, 2010).

Acquisition of these four skills has recently been emphasized in the context of Japanese English education. For the above purpose, extensive reading is conducted in university classes for various durations, such as one, two, or multiple semesters. Some universities have made extensive reading a requirement of their curricula.

Regarding this study, the students who took the extensive reading class in the first and second semesters were statistically examined, with an emphasis on the reading volume of word counts. Extensive reading requires learners to raise their reading volume and continue to read a large number of books in order to improve their English proficiency.

The research questions are as follows: 1) Is there a difference in word counts between students who conduct extensive reading in the first semester and those who continue it in the second semester? 2) Are there any differences in word counts between the three groups: students who conduct extensive reading for the first time only in the first semester, those who conduct it for the first time only in the second semester, and those who conduct it in both semesters?

Extensive reading has previously been studied in terms of word counts and semesters. Joichi (2013) established an extensive reading class in a university library housing English books for both native English speakers and English learners. The books meant for English learners are graded readers published in a sequence of levels from easy to difficult by several publishers. The students were able to select their own books; the entire 90-minute class was allotted for extensive reading almost every time. They also read books based on three principles, called *tadoku sangensoku* in Japanese.

Sakai presented three principles of *tadoku sangensoku* (2002, 2014): 1) Avoid using dictionaries; 2) when reading, skip words and expressions that you are unfamiliar with; 3) if the book is not interesting, change it. These principles require the reader to avoid interrupting the flow of reading, understand meanings by connecting known words one after another, and stop forced reading (Furukawa, 2013).

Seven students who continued extensive reading in the first and second semesters of 2011 achieved an average of 46,275 words; the minimum and maximum word counts were 17,621 and 77,795, respectively. All participants improved their reading speed and word counts in the second semester.

In another study, Joichi (2015) investigated 32 students who continued extensive reading into the next semester. Their average word count in the first semester was 23,328, with a minimum and maximum of 4,030 and 82,409, respectively. The average word count for the second semester was 32,810 words, with a minimum of 7,632 and a maximum of 100,000. Overall, students' word counts increased by approximately 10,000 words. A *t*-test revealed a significant difference between the two semesters ( $t(31) = -6.90, p < .001$ ). A substantial number of students also improved their reading speed and word counts. However, some students showed reduced word counts because of the absence of classes and limited reading time outside of the classroom.

## METHODOLOGY

*S University* introduced extensive reading among 31 second-grade nursing students in 2017. The students borrowed English books from university libraries and brought them into the classroom.

*S University* has two libraries on each of its campuses, the *K Library* and the *O Library*. Both have English books, such as Penguin Readers, Macmillan Readers, Oxford Bookworms, Cambridge English Readers, and Ladder series, which are graded readers. The graded readers were used in this study. The *O Library* has 912 copies of graded readers, whereas the *K Library* has 627 copies (Goto, 2019b). They acquired these books independently, so they do not have the same

books basically. Nursing students, unlike other students, have classes on both campuses and have easy access to both libraries. All classes were held on the *K Campus*, which is the main campus.

Students were assigned extensive reading for the first 20 minutes of every 90-minute class, and they were also required to read outside the class. The rest of the time, the students also utilized an English textbook to study nursing.

Students were required to participate in activities related to reading aloud and listening in groups in the first class in order to become familiar with English reading. The teacher in charge explained the three principles of *tadoku sangensoku* in great detail. All the students were asked to follow the principles.

Although some students changed in the second semester, 11 students continued and participated in the extensive reading class through the second semester. Students were given a reading record sheet (Goto, 2013) to keep track of how many books they had read throughout the semester, providing such information as dates, word counts, titles, series names, reading levels, comments, and evaluation ratings from 1 to 10 based on students' interest and enjoyment. The teacher collected student reading record sheets halfway through to ensure that the students had problems. If the teacher offered any suggestions, it was for the spacing of the sheets. All sheets were collected at the end of the last class.

For analysis, 11 students who continued extensive reading in the second semester, 20 students in the first semester excluding those 11 students, and 20 students in the second semester excluding those 11 students were the focus groups. These are referred to as Group A, Group B, and Group C, respectively. Each student's word count was utilized as the data in this study. As Goto (2021) pointed out, a high TOEIC score does not always imply that the student will be able to achieve a high word count. Therefore, the three groups did not consist of students with the same average English competence.

## RESULTS

In the case of Group A, the table below illustrates the word count for the 11 students who continued extensive reading in both the first and second semesters. This information also indicates the rate of increase between semesters. The total word count for the first semester was 206,516 words, with an average word count of 18,774 words. In the second semester, on the other hand, the total word count was 260,722 words, with an average word count of 23,702 words. The difference in the average word count was approximately 4,900 words between the two semesters.

**Table 1.** Word Counts and Rates of Increase of Group A

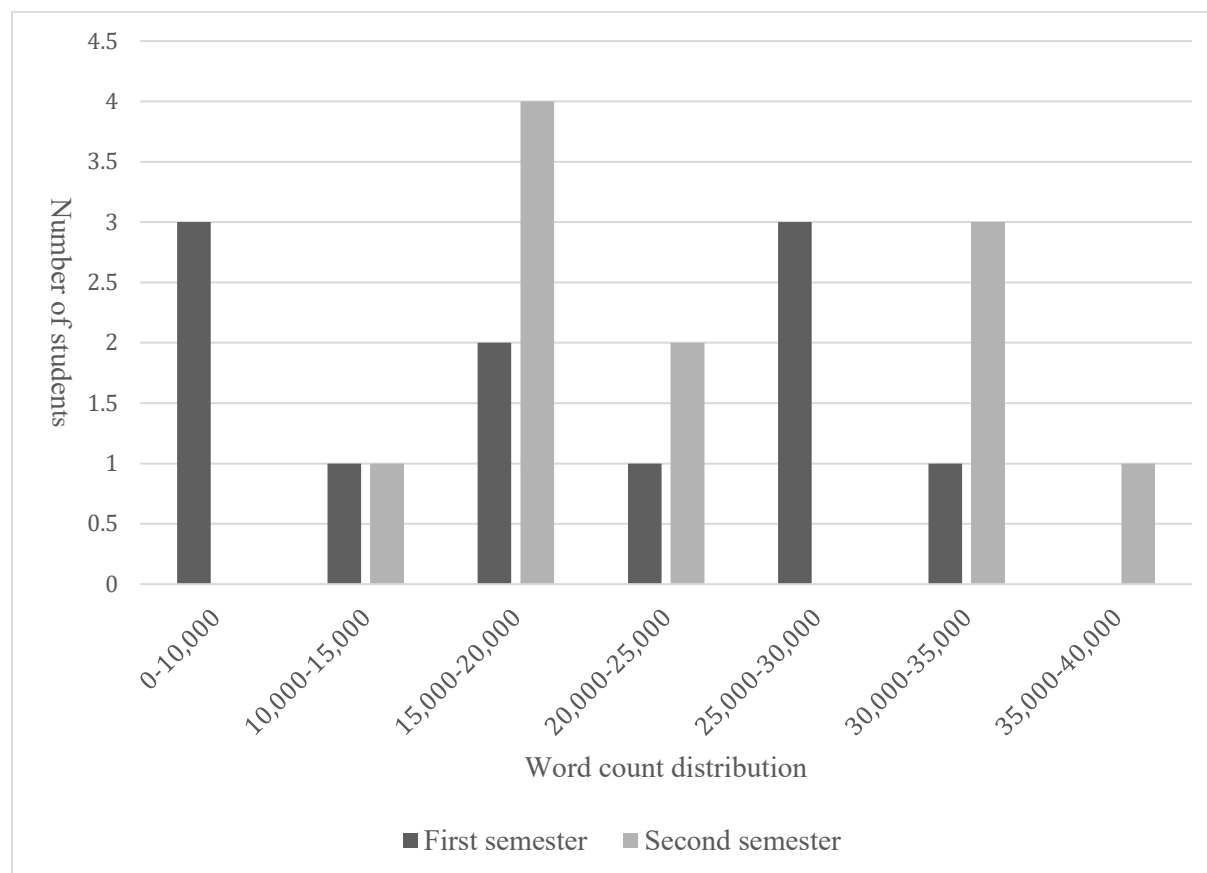
<b>Name</b>	<b>First semester (Word counts)</b>	<b>Second semester (Word counts)</b>	<b>Rates of increase (Second semester / First semester)</b>
Student 1(A)	18879	24248	1.28
Student 2(A)	27867	32961	1.18
Student 3(A)	14128	35297	2.50
Student 4(A)	7051	21028	2.98
Student 5(A)	22283	16946	0.76
Student 6(A)	27093	13207	0.49
Student 7(A)	9595	19936	2.08
Student 8(A)	32290	17041	0.53
Student 9(A)	5380	31451	5.85
Student 10(A)	26191	31725	1.21
Student 11(A)	15759	16882	1.07
Total word counts	206516	260722	
Average word counts	18774.18	23702	1.26 (Average rates of increase)

\* *Note:*  $n = 11$ ; figures rounded to two decimal places

The second semester's word counts were 1.26 times those during the first semester on average. Eight students increased their word counts, with the minimum being 1.07 times and the maximum being 5.85 times. On the other hand, three students reduced their word counts, with the minimum being 0.49 times and the maximum being 0.76 times (Table 1).

Figure 1 depicts the distribution of word counts for Group A. The distribution was highest in the first semester, with 0–10,000 words and 25,000–30,000 words. In the second semester,

however, the distribution was highest at 15,000–20,000 words. The next highest was 30,000–35,000 words, followed by 20,000–25,000 words. Overall, the word count distribution shifted toward the right. Notably, in the second semester, there were no students whose word counts fell in the range of 0 to 10,000 words.



**Figure 1.** Word Count Distribution in Group A

The Wilcoxon test was conducted to determine the significance of the difference in word counts between the first and second semesters of Group A students, finding no significant difference ( $T = 19, p > .05$ ). The Wilcoxon test was adopted because of the small sample size of 11 students (Hiromori, 2004).

The word counts for Group B and Group C are presented in Tables 2 and 3 below. In the first semester, 20 students in Group B performed extensive reading, while 20 students in Group C did so in the second semester. Group C students, on the other hand, could have been influenced by Group A students, who continued extensive reading in the second semester. The total and average word counts for Group C were higher than those for Group B. The total word count for Group B was 479,585 words, with an average of 23,979 words. The minimum was 9,578 words and the maximum was 72,580 words (Table 2). The total word count for Group C was 761,761 words, with an average of 38,088 words. The minimum was 10,128 words and the maximum was 64,303 (Table 3).

**Table 2.** Word Counts for Group B

Name	Word counts	Name	Word counts
Student 1(B)	9578	Student 12(B)	20356
Student 2(B)	11145	Student 13(B)	20810
Student 3(B)	11731	Student 14(B)	23915
Student 4(B)	14194	Student 15(B)	25820
Student 5(B)	14863	Student 16(B)	31445
Student 6(B)	15006	Student 17(B)	36794
Student 7(B)	16734	Student 18(B)	37647
Student 8(B)	18835	Student 19(B)	40510
Student 9(B)	18940	Student 20(B)	72580
Student 10(B)	18978	Total word counts	479585
Student 11(B)	19694	Average word counts	23979.25

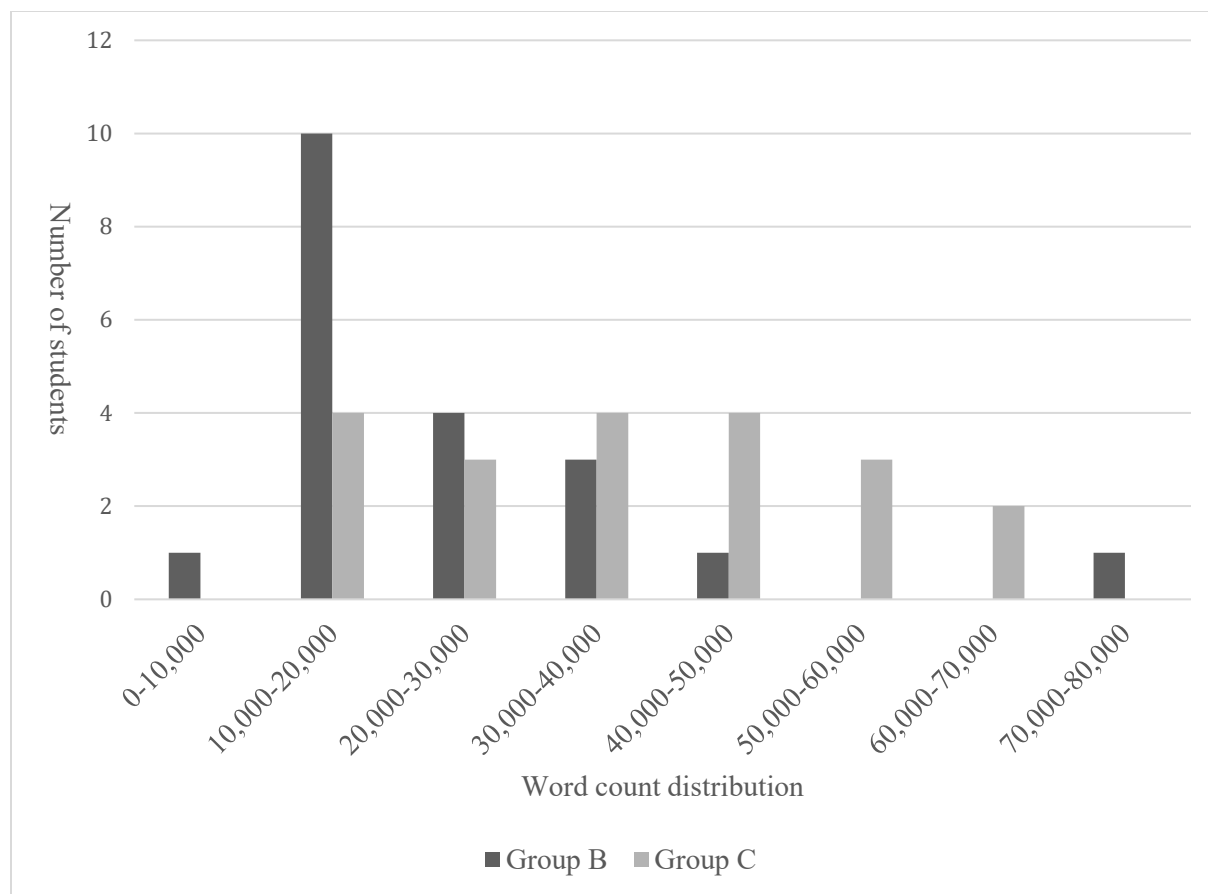
\* *Note:*  $n = 20$ ; figures rounded to two decimal places

**Table 3.** Word Counts for Group C

Name	Word counts	Name	Word counts
Student 1(C)	10128	Student 12(C)	41330
Student 2(C)	12637	Student 13(C)	44931
Student 3(C)	12877	Student 14(C)	46115
Student 4(C)	16342	Student 15(C)	49380
Student 5(C)	26145	Student 16(C)	54144
Student 6(C)	27767	Student 17(C)	55640
Student 7(C)	28638	Student 18(C)	58802
Student 8(C)	34141	Student 19(C)	63194
Student 9(C)	38199	Student 20(C)	64303
Student 10(C)	38336	Total word counts	761761
Student 11(C)	38712	Average word counts	38088.05

\* *Note:*  $n = 20$ ; figures rounded to two decimal places

Figure 2 illustrates the distribution of word counts for the 20 Group B students in the first semester and the 20 Group C students in the second semester. The distribution was highest in the first semester, at 10,000–20,000 words, followed by a gradual decrease. However, the distribution was highest at three levels in the second semester: 10,000–20,000 words, 30,000–40,000 words, and 40,000–50,000 words. Although the first semester had the highest score, the second semester's distribution tended to be more balanced.



**Figure 2.** Word Count Distribution in Group B and Group C

Finally, a non-parametric test, the Kruskal-Wallis test, was employed to compare the three groups because of the small sample size and sample independence (Hiromori, 2004). To recapitulate, Group A comprised 11 students who continued extensive reading during the second semester; Group B included 20 students who only did extensive reading during the first semester; and Group C comprised 20 students who completed it only in the second semester. Both B and C students excluded Group A students. The results revealed that the three groups differed significantly ( $H(2) = 8.86, p = .01$ ; rounding off to two decimal places). A multiple comparison test, the Bonferroni test, was adopted (Hiromori, 2004), showing that only Groups B and C had a significant difference ( $p < .01$ ).

## DISCUSSION

The word counts of the 11 students who continued extensive reading in the second semester increased considerably, although there was no significant difference in their word counts between the first and second semesters. In the second semester, 8 of the 11 students (approximately 73%) read more words than in the first semester, indicating that those students tended to increase their word counts. As a result, Figure 1 indicates that word count distribution shifted positively to the



right in the second semester. The students were assumed to have consistently increased their word counts because they had already experienced extensive reading in the first semester.

This result corroborates previous studies that found that students who continued extensive reading into the next semester increased their word counts (Joichi, 2015). Similarly, that study also reported that several students decreased their word counts in the next semester. The difference between Joichi's case and this study, however, is that the word counts of the students in this study were not significantly different. This reflects the fact that the learning environments in the two cases differed.

In previous research, extensive reading was conducted in almost all classes. The teacher in charge gave the students specific instructions, such as how to choose books, how to undertake extensive reading, and why the students were doing this activity. All the classes were held at the university library, where they could easily access English books, use a variety of book levels totaling 30,000 copies, and check their YL and total word counts.

In Japanese, Y stands for "*Yomiyasusa*" (difficulty level in English), and L stands for "*Level*" (level in English), which can assist students in selecting appropriate books in accordance with their English proficiency. Although some English books provide reading levels, there are no universal reading difficulty levels that can be applied to books by different publishers. The "*Yomiyasusa Level*" was created specifically for Japanese English learners.

Students in this study, on the other hand, were only allowed a 20-minute reading period in each 90-minute class. Although the teacher gave instructions on how to perform extensive reading, its consequences, and how to find English books in the libraries, each class was held in the classroom rather than in one of the libraries. The libraries only have about 1,500 copies, and no book information such as YL or word counts is available. Thus, extensive reading time and the learning environment differed substantially, which could have led to the varied outcomes.

Another result demonstrated a significant difference between the three groups of students: those who continued extensive reading in the second semester, those who only participated in the first semester, and those who only participated in the second semester. In particular, there was a considerable difference between the second and the third groups. The only difference was whether the students in the group had previous classroom experience. Figure 2 also indicates that Group B had the highest word counts at the lower reaches of the distribution, whereas Group C remained comparatively steady, without such a sharp increase.

These findings indicate that students in the second semester experienced a positive impact if they had previously encountered students who continued extensive reading. If a class has had extensive reading in the classroom, novice students can learn about extensive reading from experienced students through communication, which has a positive influence on their own extensive reading. Day and Bamford (1998) emphasize the role of the teacher as a model for students by stating, "Teachers take the role of active participant and model reader, lending prestige, example, and support to the activity" (p. 26). Experienced students can also serve as role models for newcomers.

This study had some limitations. First, it is probable that target students did not all have the same English proficiency. However, Goto (2021) demonstrated that a student who scored higher on the TOEIC-IP test did not always read correspondingly many words in extensive reading. Another student who read more words did not gain a higher score on the TOEIC-IP test. All things considered, then, requiring students to have the same level of English competence might not be required for this study. Second, only statistical analyses were applied to determine how the three groups of students differed in extensive reading word counts. It would have been better if the study

had provided additional evidence such as interviews or questionnaire surveys. Third, the word counts on reading record sheets were employed to quantify reading volume. However, if a student stopped reading a book mid-way, he or she was not required to record the word counts. It is thus possible that some students had higher word counts than they reported on the sheets.

## CONCLUSION

The research questions may be answered as follows: 1) Is there a difference in word counts between students who conduct extensive reading in the first semester and those who continue it in the second semester? The results indicate that there were no notable distinctions between the two. However, approximately 73% of the students increased their word counts. 2) Are there any differences in word counts between the three groups: students who conduct extensive reading for the first time only in the first semester, those who conduct it for the first time only in the second semester, and those who conduct it in both semesters? The answer is yes: There was a significant difference between them, particularly between the first and the second groups.

These findings offer pedagogical suggestions for practitioners of extensive reading. Although students who continued extensive reading in the next semester tended to increase their word counts, this was not always the case. In fact, the word counts of some students were reduced, which practitioners should address in class. If a class includes students who have experienced extensive reading before, they can act as role models for students practicing it for the first time, assisting and motivating them to increase their word counts. Thus, a reading community will be easily established if the class includes both types of students.

In future research, it will be necessary to determine whether the same results hold if the condition is modified to, for instance, first-grade students. This study also utilized students' word counts on their reading record sheets to determine any disparities statistically. Other sources of information, such as interviews or questionnaires, will help to clarify the relationship between experienced and novice extensive reading students.

## NOTES

This study was based on the 45<sup>th</sup> JASELE 2019 presentation, "Extensive Reading: Growing Around the Second Semester," presented at *Hirosaki University* on August 19, 2019.

## REFERENCES

- Bell, T. (2001). Extensive reading: Speed and composition. *The Reading Matrix*, 1(1), 1-13.
- Day, R. R., & Bamford, J. (1998). *Extensive reading in the second language classroom*. Cambridge: Cambridge University Press.
- Day, R. R., & Bamford, J. (2000). Reaching Reluctant Readers. *English Teaching Forum*, 38(3), 12-17. Retrieved March 14, 2012, from <http://eca.state.gov/forum/vols/vol38/no3/p12.htm>.
- Day, R. (2015). Extensive Reading: the background. In R. Day, J. Bassett, B. Bowler, S. Parminter, N. Bullard, M. Furr, N. Prentice, M. Mahmood, D. Stewart, & T. Robb, *Extensive Reading* (pp. 10-21). Oxford: Oxford University Press.

- Furukawa, A. (2013). Dai isscho SSS no dankaiteki tadokuhou [Chapter one: Stepped approach of extensive reading of SSS]. In A. Furukawa, & M. Kanda (Eds.), *Eigo tadoku kanzen book guide kaitei dai yon han* [Perfect book guide of English extensive reading: revised fourth edition] (pp.9-16). Tokyo: CosmoPier Publishing Company.
- Goto, T. (2013). Generating synergetic effects on extensive reading through supportive activities. In M. Toyota, & S. Kikuchi (Eds.), *New Horizons in English Language Teaching: Language, Literature and Education Selected Papers from the Kansai Gaidai IRI Forum* (pp. 101-119). Osaka: Kansai Gaidai University.
- Goto, T. (2019a). Extensive Reading for University Students and the General Public: How Do They Differ in Their Attitudes? *Journal of International Relations and Comparative Culture*, 17(2), 43-52.
- Goto, T. (2019b). *Kosen daigaku toshokan kara* [From technical college and university libraries]. In Nishizawa, H., Yonezawa, K., & Awano, M (Eds.), *Toshokan tadoku no susumekata* [Introduction to tadoku at libraries] (pp. 138-140). Tokyo: Japan Library Association.
- Goto, T. (2021). The Effect of 20-minute Extensive Reading Activities on TOEIC IP Scores. *The Reading Matrix*, 21(2), 145-152.
- Hiromori, T. (2004). Shoninzu gatsukyu de no sa no kentou [A study on the difference in a small class size]. In Maeda, H., & Yamamori, K (Eds.), *Kyoiku deta bunseki niyumon* [An introduction to educational data analysis for English teachers] (pp.53-62). Tokyo: Taishukan Shoten.
- Joichi, M. (2013). Extensive reading in remedial English class: Variables influencing the development of students' favorite attitudes. *Language Education*, 14, 27-40.
- Joichi, M. (2015). In-class SSR for reluctant learners: Four years of extensive reading research. *Language Education*, 13, 33-48.
- Nishizawa, H. & Iinuma, K. (2017). Community ga hirogeru toshokan tadoku no kanousei [A possibility of the expansion of extensive reading at libraries by local communities]. *Gendai no toshokan*, 55(3), 116-122.
- Robb, T. & Susser, B. (1989). Extensive reading vs skills building in an EFL context. *Reading in a Foreign Language*, 5(2), 239-251.
- Sakai, K. (2002). *Kaidoku hyakumango paperback e no michi* [Pleasurable reading to one million words: The way to paperback books]. Tokyo: Chikuma shobo.
- Sakai, K. (2014). Issho: Tadoku to wa: daredemo hajimerareru [Chapter one: What is extensive reading? Everyone can start it]. In H. Nishizawa, & K. Sakai (Eds.), *Toshokan tadoku no hajime kata* [How to start extensive reading at libraries] (pp. 1-14). Tokyo: Japan Library Association.
- Takase, A. (2010). *Eigo tadoku tachiyou manual* [A manual of extensive reading and extensive listening in English]. Tokyo: Taishukan.

**Takaaaki Goto** is an Associate Professor, working at Kyushu University of Nursing and Social Welfare. His research interests include genre analysis, genre approach, extensive reading, community-based writing, shadowing, corpus and media.

Email: [t-goto@kyushu-nu.ac.jp](mailto:t-goto@kyushu-nu.ac.jp)