

The Effectiveness of *gamestolearnenglish.com* on Vocabulary Mastery of The Fourth Grade SDN 4 Tamansari in The Academic Year 2023/2024

Lailatul Maftuha¹, Novelin Putri Yanuar^{2✉}, Biaggi Banidhar Jodhi³, Iva Nuria Indah⁴, Nur Hasibin⁵

^{1,2,3,4,5} Program Studi Pendidikan Bahasa Inggris Fakultas Bahasa dan Seni
Universitas PGRI Bnayuwangi

¹ maftuha99@gmail.com, ² novelinyanuar@gmail.com, ³ biaggi99@gmail.com, ⁴ nuria99@gmail.com,
⁵ hasibinnur@gmail.com

✉ *Corresponding Author:* novelinyanuar@gmail.com

ABSTRACT

*Teaching vocabulary through games has gained recognition as an engaging and effective approach to improve and enhance students' word knowledge and retention. Based on preliminary study in SDN 4 Tamansari, the students have problem with their vocabulary. This research aims to measure whether there is a significant effect of *gamestolearnEnglish* website on the vocabulary mastery of the fourth grade at SDN 4 Tamansari in the academic year 2023/2024. This research is quantitative research with pre-experimental research design. There are 12 respondents of the fourth grade students at SDN 4 Tamansari. Purposive sampling technique is used to choose the sample in the school. Multiple choice test is chosen for the data collecting method that consist of 30 questions of common noun, adverb of time and verb for the test. For the data analysis, the researcher used t-test formula. The mean score was 46,83 in the pre-test and 78,41 in the post-test. The result of t-test is higher than t-table ($8,494 > 2.201$). Thus it can be concluded that There is a significant effect of *gamestolearnEnglish.com* website on the vocabulary mastery of the Fourth grade SDN 4 Tamansari in the academic year 2023/2024.*

Keywords: *Vocabulary Mastery, Game Based Learning, Gamestolearn English Website*

Artikel Info

| Masuk | Revisi | Diterima | Terbit |
|--------------------|------------------|-------------------|-------------------|
| September 03, 2025 | Oktober 06, 2025 | November 10, 2025 | Desember 24, 2025 |

INTRODUCTION

Industry 4.0 age, the development of communication and information technologies will have a significant effect on the education especially in the learning process. One of the technology products that can be used as innovation in teaching and learning English is the computer. Teaching and learning English using the help of computer programs/devices commonly known as CALL (Computer Assisted Language Learning). Computer-Assisted Language Learning (CALL) encompasses a wide range of digital tools and resources aimed at enhancing language learning experiences.

Among the various CALL products, online games have emerged as an effective and enjoyable tool to facilitate English language acquisition, particularly among elementary school children. The positive impact of online games in teaching English is developing English vocabulary, grammar, and speaking skills. Teaching vocabulary through games has gained recognition as an engaging and effective approach to improve and enhance students' word knowledge and retention.

hang and Lin (2021) state the benefits of incorporating games into vocabulary instruction. Games create a dynamic and interactive learning environment that motivates students and encourages active participation. They provide opportunities for students to engage with target words in meaningful contexts, reinforcing comprehension and facilitating long-term retention. Interactive games, such as vocabulary board games, word association games, or digital word quizzes, stimulate students' curiosity, promote word exploration, and foster word connections. Additionally, games offer a supportive and enjoyable atmosphere, reducing anxiety and facilitating a positive learning experience.

Based on preliminary study in SDN 4 Tamansari, the students have problem with their vocabulary. The student had limited vocabulary. When the teacher asked them to say something in English, they did not know how to respond because of limited vocabulary. Thus, they find it difficult to reply what teacher said. Therefore, vocabulary emerged as the cause of the difficulty faced by students. Although they have experienced such for problem long time, the teacher failed to overcome the problem and stimulate the students to be interested and to use English in simple practice. Such condition was mostly found in the classroom.

In recent years, game-based learning (GBL) has gained significant attention as an innovative educational approach that integrates interactive games into the learning process. By leveraging the engaging and immersive nature of games, GBL has the potential to revolutionize education and promote effective learning outcomes. Game-based learning (GBL) offers numerous benefits in education and its impact on student engagement, motivation, and academic achievement. *Games to learn English* is a web-based games that provide a resource for students to practice English in an engaging and fun way. Not only students, this site also provides teachers with resources to give to their students. However, students can learn independently through this site.

The games on the site are aimed at novice students who have a relatively low level of English. They are very suitable as an introduction because the vocabulary content they use is very simple and accompanied by visual representations so that it will be very suitable for junior high school students. The game is aimed at a basic level of English, with most of the content at or near a basic level. Much of the vocabulary in Learn English will be at an introductory or pre-basic level. By just looking at the graph, students can infer the meaning. The video is then mixed with text and audio. Viewing photos allows students to visualize what they have learned. This game can also be used as an assignment or homework because it contains a teacher's section to record student activity.

The role of online games in English Language Teaching (ELT) cannot be overstated, as they have revolutionized the way language learning takes place. According to a study conducted by Chen and Chen (2020), online games offer a unique and engaging platform for language acquisition, enhancing motivation and participation among learners. These games provide interactive and immersive environments where students can practice their language skills in realistic and contextualized contexts. By engaging with the language in a fun and interactive manner, learners become more motivated and invested in their language learning journey. Additionally, online games promote collaboration and communication skills

as they often incorporate multiplayer features or cooperative gameplay, encouraging learners to interact and negotiate meaning with their peers (González-Rivero & Guerrero-González, 2019). This collaborative aspect of online gaming not only facilitates language practice but also fosters a sense of community and social interaction within the language learning context.

Vocabulary mastery plays an important role when learning English. A wide vocabulary will assist students in learning the four basic skills of English, which are reading, speaking, writing and listening. Students will find it difficult to learn if they do not have a wide vocabulary. And it is impossible for them to communicate and express themselves without a wide vocabulary. Therefore, the teaching of vocabulary is an important aspect in elementary school. The teaching of vocabulary in elementary school is an important aspect of language development, as it forms the foundation for reading comprehension, writing skills, and overall academic success. Vocabulary development plays a crucial role in a student's language acquisition and overall academic success. As students' progress through their educational journey, a strong vocabulary becomes increasingly essential for effective communication, reading comprehension, and written expression. In conclusion, teaching vocabulary in elementary school is of utmost importance for students' language development and academic success. By focusing on vocabulary instruction, educators equip young learners with the tools needed to enhance reading comprehension, improve written expression, facilitate oral communication, and foster a love for lifelong learning. It is through intentional vocabulary instruction that elementary students are empowered to become confident, skilled communicators, and enthusiastic learners.

RESEARCH METHOD

The research was employed a pre-experimental design with one group pre-test and post-test. Pre-experimental design observations were made twice before and after the experiment, according to Arikunto (2013: 124). After Pre test, the treatment was given four meetings to the students and then students are given a post-test to determine their progress. The gametolearnenglish Website is used as a learning medium for students in treatment. The student vocabulary mastery was measured by using vocabulary test. The test must be done in 60 minutes by the students. The test is in the form of multiple choice and consists of 30 questions. The correct answer was scored 3,3, and the incorrect was answer scored 0. The test is used for getting the objective data of student vocabulary mastery by using gamestolearn English website and to measure aspect of vocabulary such as common noun, abstract noun and adverb of time. The Pre-test and Post-test have some differences and similarity. The questions on the pretest are different from the posttest. For the data analysis method, this research used T-test because it aims to measure whether there is any effect of the treatment towards students' vocabulary mastery.

RESULT AND DISCUSSION

Based on the data analysis, it was found the range score of the pre-test result was 30-72, The mean score that the researcher got was 46,83. There were no students obtained score 80. The highest score in this pre-test was 72. In the post-test, After the treatment that was given for 4 meetings, the researcher also analyzed the post-test result. The mean score that the researcher found was 78,41. The lowest score was 63

and the highest score in this post-test was 92. There were 6 students who got score in the range 30-72 and there were 6 students who got score in the range 63-92. From the explanation above about the result of pre-test and post-test, it can be concluded that the post-test score was higher than the pre-test score.

T-test formula was used in this research by the researcher to find out the differences in the results. To calculate T-test, the researcher used the score of pre-test and post-test. In the pre-test, the mean score was 46,83. In the post-test, the mean score was 78,42. The result of standard deviation in the pre-test was 14,990 and the standard deviation of post-test is 9,000. After getting all the data, the researcher calculated the T-test. The T-test was analysed and interpreted with significance level at 5%, then the degree of freedom was $= N - 1 = 12 - 1 = 11$. It was found that the T-table was 2,201. Then the result of T-test analysis in this research was 8,494. Based on the results of statistic calculation, it was shown that the score of T-test was 8,494, while the T-test value was higher than the T-table ($8,494 > 2,201$). It means that H_a (alternative hypothesis) was accepted and the H_o hypothesis was rejected. In brief, there is a significant effect of *gamestolearnEnglish.com* website on the vocabulary mastery of the Fourth grade SDN 4 Tamansari in the academic year 2023/2024.

Based on analyzing the students' vocabulary test, in pre-test most of students in experimental class got wrong answer in items to choose the correct answer. while in post-test they had progress and their score was better than pre-test. After analyzing the result of the students' vocabulary test the researcher knew that the class with game based-learning strategy more effective to increase their vocabulary mastery. They were suit and easily adapt the method in teaching because it didn't make them depressed so they felt enjoy when being taught. Donmus (2010) supported with these findings, saying that "when games and education are combined, it can be educative and educational environments can be entertaining." Learners who use games to learn develop good attitudes and are more motivated to learn. The students were studying how to concentrate on a word that included clues. This technique is appropriate for students, particularly when it comes to learning vocabulary. The technique encourages students to actively explore word relationships, which leads to a greater comprehension of word meanings by expanding their conceptual knowledge of words.

Considering the explanation above, it claimed that using *gamestolearnEnglish.com* website on students' vocabulary mastery has significant effect on students' motivation and also activeness in joining the English class. Moreover, it was also supported by the expert statement Gustinna, (2015:10) that the game strategy is one of the most powerful approaches to teach vocabulary because it engages students in thinking about word relationships. The students were study how to concentrate with a book which is having the clues. This strategy is appropriate for students, especially in learning vocabulary because it provides such a cooperative with the other students in a group to find out the correct answer. Moreover, students enjoyed having the experiment of teaching English using *gamestolearnEnglish.com* website strategy. In short, it was really proved that " There is a significant effect of *gamestolearnEnglish.com* website on the vocabulary mastery of the Fourth grade SDN 4 Tamansari in the academic year 2023/2024".

CONCLUSSION

Based on the research results of the data analysis that have been discussed it was supported by data analysis with 5% significant level. The t-test result was 8,494 and t-table was 2,201. It means that the result of t-test analysis was higher than t-table (8,494 > 2,201), it can be concluded that " There is a significant effect of *gamestolearnEnglish.com* website on the vocabulary mastery of the Fourth grade SDN 4 Tamansari in the academic year 2023/2024

REFERENCES

- Alizadeh, I. (2016). Vocabulary teaching techniques: A Review of common practices. *International journal of research in English education*. Vol. 1, No.1.
- Alqahtani, M. (2015). The importance of vocabulary in language learning and how to be taught. *International journal of teaching and education*. Volume III, No. 3
- All, A., Castellar, E.P.N. and Van Looy, J. (2016) 'Assessing the effectiveness of digital gamebased learning: best practices', *Computers & Education*, Vol. 92, pp.90-103
- Arnab, S., Lim, T., Carvalho, M. B., Bellotti, F., Freitas, S., Louchart, S., ... & de Gloria, A. (2012). Mapping learning and game mechanics for serious games analysis. *British Journal of Educational Technology*, 43(3), 361-380
- Andreani, W., & Ying, Y. (2019). "PowPow" interactive game in supporting English vocabulary learning for elementary students. *Procedia Computer Science*, 157, 473-478.
- Arikunto. *Prosedur Penelitian Suatu Pendekatan Praktik*. Jakarta: Rineka Cipta. 2013
- Barzilai, S. and Blau, I. (2014) 'Scaffolding game-based learning: impact on learning achievements, perceived learning, and game experiences', *Computers & Education*, Vol. 70, pp.65-79
- Biemiller, A. (2001). Teaching vocabulary: Early, direct, and sequential. *American Educator*, 25(1), 24-29.
- Brown, H. Douglas. *Language Assessment: Principles and Classroom Practice*. Hoboken: Pearson Education, 2019
- Brown, A. (2012). Noun classification in language. *Journal of Linguistics*, 40(3), 453-468.
- Burn, Anne. *Doing Action Research in English Language Teaching: A Guide for Practitioners ESL and Applied Linguistics Professional Series*. England: Routledge. 2010.
- Chapelle, A. C. (2001). *Computer Applications in Second Language Acquisition: Foundations for Teaching, Testing, and Research*. New York: Cambridge University Press
- Chen, Y.-H., & Chen, Y.-M. (2020). The Effectiveness of an Online Game-Based Learning Platform on English Vocabulary Acquisition. *Sustainability*, 12(3), 1280. doi:10.3390/su12031280
- Connolly, T. M., Boyle, E. A., MacArthur, E., Hainey, T., & Boyle, J. M. (2012). A systematic literature review of empirical evidence on computer games and serious games. *Computers & Education*, 59(2), 661-686.

- Creswell, J. W. (2012). *Educational Research: Planning, Conducting, Evaluating Quantitative and Qualitative Research 4th Edition*. Boston: Pearson.
- Delgado, P., Vargas, C., & Ackermann, S. (2018). Evaluating the Effectiveness of a Mobile Game for Vocabulary Learning: A Quasi-Experimental Study. *Computers & Education*, 122, 170-182
- Donmus, V. (2010). The use of social networks in educational computer-game based foreign language learning. *Social and Behavioral Sciences*, 9, 1497-1503.
- Erkaya, O.R & Drower, I.S. (2012). Perception of an EL learner on vocabulary development. *International journal of special education*. Vo. 27, No 1
- Fahrizal Muhammad (2019). "The Effect of Scramble Game on the Vocabulary Mastery of Seventh Grade Pupils." At SMP PAB 19 Manunggal", thesis of University of Muhammadiyah Sumatera Utara Medan 2019
- Garcia, M.G., Luis, C.I.S. and Samonte, M.J.C. (2016) 'E-tutor for Filipino sign language', *Computer Science & Education (ICCSE)*, 2016 11th International Conference on, IEEE.
- Gee, J. P. (2007). *Good video games + good learning: Collected essays on video games, learning and literacy*. Peter Lang.
- Gikas, J. and Grant, M.G. (2013) 'Mobile computing devices in higher education: student perspectives on learning with cellphones, smartphones & social media', *The Internet and Higher Education*, Vol. 19, pp.18-26.
- González-Rivero, M., & Guerrero-González, P. (2019). Online Gaming in the ESL Classroom: A Literature Review. *European Journal of Contemporary Education*, 8(2), 380-390.
- Graves, M. F. (2006). *The vocabulary book: Learning and instruction*. New York, NY: Teachers College Press
- Gustinna, 2015. *Improving the Vocabulary Mastery by Using Word Mapping Game*. PGRI University of Banyuwangi
- Hailey, T., Connolly, T. M., Stansfield, M., & Boyle, E. A. (2011). The impact of digital games-based learning on student engagement and academic performance. *Computers & Education*, 56(1), 378-390.
- Hailey, T., Connolly, T. M., Stansfield, M., & Boyle, E. A. (2011). The impact of digital games-based learning on student engagement and academic performance. *Computers & Education*, 56(1), 378-390.
- Hamari, J. et al. (2016) 'Challenging games help students learn: an empirical study on engagement, flow and immersion in game-based learning', *Computers in Human Behavior*, Vol. 54, pp.170-179.
- Hiebert, E. H., & Kamil, M. L. (2005). *Teaching and Learning Vocabulary: Bringing Research to Practice*. Mahwah, NJ: Lawrence Erlbaum Associates.
- Henry and Pongrantz. 2006. Some Effects of the Nature and Frequency of Vocabulary Instruction on the Knowledge and Use of Words. *Reading Research Quarterly*, 20, 522-535
- Johnson, M. (2015). The role of nouns in sentence structure. *Language Studies*, 25(2), 87-102.

- Jones, R. (2018). The syntactic functions of nouns. *Journal of Language and Grammar*, 15(4), 521-536.
- Kiili, K. (2005). Digital game-based learning: Towards an experiential gaming model. *The Internet and Higher Education*, 8(1), 13-24.
- Kiili, K. (2019). Effects of Digital Game-Based Learning: A Meta-Analysis. *Journal of Computer Assisted Learning*, 35(5), 533-549. doi:10.1111/jcal.12357
- Khorasgani, A.T. & Khaneshgir, M. (2017). Teaching new vocabulary to Iranian young FL learners: using two methods total physical response and key word method. *International journal of language education and teaching*. Vol. 5, Issue
- Marzano, R. J., & Pickering, D. J. (2005). *Building Academic Vocabulary: Teacher's Manual*. Alexandria, VA: ASCD.
- Nagy, W., & Scott, J. A. (2000). Vocabulary Processes. In M. L. Kamil, P. B. Mosenthal, P. D. Pearson, & R. Barr (Eds.), *Handbook of Reading Research* (Vol. 3, pp. 269-284). Mahwah, NJ: Lawrence Erlbaum Associates.
- Nation, I. S. P. (2001). *Learning vocabulary in another language*. Cambridge: Cambridge University Press.
- Nurdini, h. & marliana, l. 2017. Vocabulary journal as a learning tool for students in learning vocabulary through reading at junior highschool. *Journal of English language teaching*, 6(1) p. 221
- Prensky, M. (2001). Digital natives, digital immigrants Part 1. *On the Horizon*, 9(5), 1-6.
- Squire, K. (2006). From content to context: Videogames as designed experience. *Educational Researcher*, 35(8), 19-29.
- Schwartz, D. L., Blair, K. P., Tsang, J. M., & Moreno, R. (2016). Making the Case for Video Games in the Classroom: Teachers' Experiences. *Journal of Educational Psychology*, 108(4), 510-524
- Sari (2022) "Using gamestolearnEnglish to increase English vocabulary mastery at 7th grade junior high school 27Bulukumba.
- Smith, L. (2010). The significance of nouns in language development. *Language Acquisition Quarterly*, 7(1), 37-52 examples of nouns
- Thornbury, Scott. *How to Teach Vocabulary*. Harlow: Pearson Education Limited, 2002.
- Walters, J.M. (2004) 'Teaching the use of context to infer meaning: A longitudinal survey of L1 and L2 vocabulary research'. *Language Teaching*, 37(4), pp. 243-252
- Zhang, Y., & Lin, C.-H. (2021). Enhancing Vocabulary Instruction Through Games. In L. C. Smith & C. Tang (Eds.), *Handbook of Research on Digital Content, Mobile Learning, and Technology Integration Models in Teacher Education* (pp. 147-165). IGI Global.
- Zheng, D., & Warschauer, M. (2016). Participation, interaction, and social presence in online language learning. In S. Thorne & S. May (Eds.), *Language, Education, and Technology* (pp. 27-46). Springer International Publishing.