



Utilizing Wordwall as A Media Learning in Enhancing Students' Vocabulary: Students' Perception

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Abstract

This study aims to explore students' perceptions of the use of Wordwall as a digital media tool to enhance vocabulary learning in English classrooms. As vocabulary is a crucial component in language acquisition, interactive and engaging media such as Wordwall are expected to improve student learning outcomes and motivation. The participants of this study were five seventh-grade students from a junior high school, selected using purposive sampling based on their experience using Wordwall during English lessons. This research employed a qualitative approach with a phenomenological design to gain an in-depth understanding of students' subjective experiences. Data were collected through participant observation, questionnaires, and semi-structured interviews. The questionnaire was based on three constructs from the Unified Theory of Acceptance and Use of Technology 2 (UTAUT2): performance expectancy, effort expectancy, and hedonic motivation. Data were analyzed thematically by identifying patterns, formulating meaning, and describing the essence of the participants' experiences. The findings reveal that students generally perceive Wordwall positively. Most participants stated that Wordwall made vocabulary learning more enjoyable and helped them memorize new words faster (performance expectancy). They also found it relatively easy to use after guidance from the teacher (effort expectancy) and expressed that the learning process felt more like a game than a traditional classroom activity (hedonic motivation). However, some students experienced initial confusion with the interface and game rules. Overall, the use of Wordwall created a more engaging and motivating learning environment, supporting vocabulary development through interactive digital learning experiences.

Keywords: *digital media; interactive learning; students' perception; vocabulary learning; Wordwall*

Introduction

Language is a communication tool that has an organized system to express ideas, feelings, opinions, and ideas. Language can be in the form of sounds, symbols, or signs that have meaning and can be understood by others. Foreign languages, especially English, are increasingly needed along with globalization and technological advances. This phenomenon requires students to have good foreign language competence in order to compete in the digital era, both at the national and international levels.

In English language learning, there are four basic skills-listening, speaking, reading and writing-all of which require vocabulary mastery as a foundation. A good vocabulary helps students understand context, speak confidently, and write and read effectively. (Barcroft 2004) asserts that vocabulary acquisition is a key element in second language acquisition. Meanwhile, (Dalimunthe & Haryadi 2022) showed that students with extensive vocabulary showed better speaking ability. However, there are still many students who have difficulty in mastering vocabulary due to the limited teaching methods used in schools. Therefore, more interesting and interactive learning approaches and media are needed.

Nationally, the results of the 2018 Program for International Student Assessment (PISA) showed that Indonesian students' literacy skills are still relatively low, especially in reading and vocabulary comprehension. Indonesia ranked 74th out of 79 countries surveyed (OECD, 2019). This is evidence that basic language skills, including English vocabulary acquisition, still need to be improved significantly. At the international level, the EF English Proficiency Index (EF EPI, 2023) report states that Indonesia is ranked 79th out of 113 countries in terms of English proficiency, in the "low proficiency" category. This reflects the global challenge for students in developing countries to acquire competitive foreign language skills.

One of the innovative and interactive learning media is Wordwall, a game-based digital platform that allows students to learn through fun activities such as quizzes, word matching and group games. Sitohang et al. (2024) showed that Wordwall can increase students' learning motivation due to its varied and interesting features. Triaswari et al. (2023) added that Wordwall can effectively instill values and learning through a group game approach. Meanwhile, Gantari et al. (2024) found that Wordwall proved to be valid and effective in improving students' vocabulary acquisition and learning motivation in English language learning.

However, there is an important gap that has not been widely discussed in previous studies. Most previous studies, such as by Komang et al. (2024), used a media development approach with needs analysis and expert validation, and evaluated the effectiveness of Wordwall based on learning test results. The research emphasizes on the design and implementation aspects of the media, but has not explored students' subjective learning experiences in depth. Meanwhile, the study by Oña et al. (2025) used a quantitative approach through pre-test and post-test as well as questionnaires to teachers and students, focusing on vocabulary acquisition results and general perceptions of the Wordwall platform. These two studies did not explore students' personal perceptions in the process of using Wordwall, especially in the context of emotional, motivational, and interaction during learning. In addition, they did not use a phenomenological approach that allows an in-depth understanding of students' learning experiences from their own perspectives.

This study was motivated by the author's observations during a Field Experience Practice (PPL)—a teaching internship in a junior high school classroom. For international readers, PPL (Praktik Pengalaman Lapangan) refers to a mandatory pre-service teacher training program in Indonesia, where university students conduct teaching practicum in real school settings. It was found that students were less enthusiastic when learning using only textbooks, but were more active and interested when the learning method involved elements of digital games. This encourages the author to conduct a more in-depth research on students' perceptions of the use of Wordwall in English vocabulary learning.

The title "Utilizing Wordwall as A Media Learning in Enhancing Students' Vocabulary: Students' Perception" was chosen because of the importance of understanding how students respond to digital media in the context of vocabulary learning. This research is relevant because it focuses on students' subjective learning experiences with a phenomenological qualitative approach, which has not been widely explored. This research is expected to contribute to the development of technology-based vocabulary learning that is more effective, enjoyable, and in line with the needs of today's learners. Therefore, the research questions that form the basis of this study are: How do students perceive the use of Wordwall to improve their vocabulary?

Method

This study uses a qualitative approach with a phenomenological type that aims to explore students' perceptions of the use of Wordwall media in learning English vocabulary. The phenomenological approach was chosen because it allows researchers to explore students' subjective experiences in depth in the context of digital learning. In line with Neubauer, Witkop, and Varpio (2019), this method is considered appropriate to understand how students directly experience the use of Wordwall as a learning medium. The participants in this study consisted of five

seventh grade students who were selected through purposive sampling technique. This selection refers to the guidelines from Palinkas et al. (2019) which emphasizes the importance of selecting informants who have relevant experiences of the phenomenon under study.

Data collection was conducted through three main techniques, namely participant observation, questionnaires, and semi-structured interviews. Observations were conducted to record student behavior during Wordwall use, while the questionnaire was designed based on the Unified Theory of Acceptance and Use of Technology 2 (UTAUT2) by Venkatesh et al. (2012), specifically focusing on three constructs: performance expectancy, effort expectancy, and hedonic motivation. It consisted of 3 items, each measured using a 5-point Likert scale: 1 (Strongly Disagree), 2 (Disagree), 3 (Neutral), 4 (Agree), and 5 (Strongly Agree). The Likert scale was used to assess the extent of agreement with statements regarding students' experience with Wordwall, providing supporting quantitative insights within the qualitative framework through data triangulation.

Questionnaire results were used to strengthen interview and observation data. Interviews were conducted to dig deeper into students' perceptions of the ease, engagement, and benefits of using Wordwall Castillo-Montoya, (2020). Data analysis was conducted through theme identification, meaning formulation, and essential description preparation. Validity was maintained through data triangulation and member checking Nowell et al., (2019), while maintaining research ethics through school permission and confidentiality of participant data.

Results

In this study, the data of 5 seventh grade students were analyzed to determine students' perceptions of the use of wordwall to improve English vocabulary through participant observation, questionnaires and semi-structured interviews.

Students' Observation

The results of participant observation of five seventh grade students during the vocabulary learning process with Wordwall media show variations in students' engagement and response. These variations can be analyzed using the perspective of learning motivation theory and interaction theory in digital learning. Self-Determination Theory by Deci and Ryan (2000) which emphasizes the importance of intrinsic motivation in learning. Social Interaction Theory in Constructivist Learning by Vygotsky (1978) is also relevant, especially in the context of how interactions with peers and teachers influence student engagement during technology-based learning. The following is the data from the participant observation conducted by the researcher:

Table 1. Students' Observation Data

Students' code	Gender	Activity Observed	Notes
S1	Female	Following the Wordwall game with high focus.	Smiles often and looks enthusiastic, tries a few times when answering incorrectly.
S2	Male	Difficulty understanding the initial interface.	Needed teacher help, but after that seemed more active.
S3	Female	Answer quickly and precisely.	Mastering the material, encouraging other friends.
S4	Male	Less active participation.	More silent, seemed confused by the rules of the game.
S5	Female	Consistent in answering	Actively engage, make positive comments at the end of play.

Based on participant observation data, S1 and S3 showed active engagement and positive emotional expressions, such as smiling, answering quickly, and encouraging other friends. . S5's positive response that showed consistency in answering and giving positive comments after playing also reflected the performance expectancy aspect - the expectation that the use of media can improve learning performance. Meanwhile, S2 and S4 experienced barriers at the beginning of learning. S2 had difficulty understanding the interface but adapted after teacher assistance, while S4 still showed confusion about the rules of the game. This suggests that the success of digital media such as Wordwall is strongly influenced by effort expectancy-the extent to which students find the media easy to use.

Overall, the results indicate that while Wordwall media has the potential to create an active and enjoyable learning environment, its success is strongly influenced by students' digital readiness, the teacher's role in providing assistance, and clear and adaptive activity design. The differences in students' responses reflect the importance of a learning approach that takes into account the diversity

of students' backgrounds and experiences with technology.

Students' Questionnaires

In this study, questionnaires were used as one of the data collections instruments to support the phenomenological qualitative approach. Although the main focus of the research was to explore students' subjective experiences through interviews and observations, the use of questionnaires made an important contribution in strengthening data validity through triangulation techniques. Data triangulation allows researchers to compare and confirm findings from different sources and methods, thereby increasing confidence in the research results.

In addition, the questionnaire was developed based on the Unified Theory of Acceptance and Use of Technology 2 (UTAUT2) theoretical framework which includes three main constructs. Performance expectancy was created to see the extent to which students feel Wordwall helps them learn vocabulary well. Effort expectancy is made to find out the extent to which students find it easy to use Wordwall learning media. Hedonic motivation was created to find out the extent to which students enjoy using Wordwall.

Table 2. Participant questionnaire Data

No	Theme	questionnaire	Student Code	Scale
1	Performance Expectancy	I feel that learning with Wordwall makes me memorize new words faster.	S1	5
			S2	3
			S3	5
			S4	2
			S5	4
2	Effort Expectancy	I have no difficulties while learning to use Wordwall	S1	4
			S2	2
			S3	5
			S4	3
			S5	4
3	Hedonic Motivation	Wordwall makes learning feel like play	S1	5
			S2	4
			S3	5
			S4	3
			S5	4

Description of Likert scale 1-5 (1 = Strongly disagree, 5 = Strongly Agree)

Most students state that Wordwall makes them memorize vocabulary in English faster. Like S1 and S3 who gave a scale of 5 to the statements made in the Performance Expectancy section which means strongly agree and student S5 who gave an agree statement. Then there are also students who give disagreeing statements such as S4 who give a scale of 2, and S2 who give a scale of 3 which means neutral.

Then the effort expectancy questionnaire section three of the five students studied said that Wordwall was easy to use and they had no difficulty. As S1, S3 and S5 provide a scale of 4-5 which means agree - strongly agree. This indicates a high perception of effort expectancy, namely the ease of using technology. Furthermore, there are also students who disagree with this statement such as student S4 who gave a scale of 2 which means disagree. The observation results did show that S2 students experienced difficulties at the beginning of using Wordwall even though they later understood with the help of the teacher. S3 students gave a scale of 3 which means normal with the use of Wordwall learning media to learn vocabulary in English. This is reinforced by the results of observations that have been made previously by researchers, namely there are students who can use Wordwall learning media easily, some are confused and some have difficulties.

In the Hedonic Motivation section, almost all students agreed to this statement, such as S1, S2, S3 and S5 gave a scale of 4-5 which means agree - strongly agree. This shows the positive side of hedonic motivation, namely the expectation of Wordwall which helps students understand the material and makes the learning atmosphere more fun. Then S4 gave a scale of 3 which means neutral in the statement in the hedonic motivation section. S4 shows that he feels normal about the learning carried out using Wordwall media.

Students' Interview

Semi-structured interviews in this study served as the main method to explore students' perceptions and subjective experiences in using Wordwall as an English vocabulary learning media. This type of interview was chosen because it provides a balance between a framework of directed questions and the flexibility for participants to explain their experiences freely and in depth. In the context of phenomenological approach, semi-structured interviews are very effective to explore the meaning students perceive in the learning process, including emotional, motivational, and perceived ease and benefits of using Wordwall. The researcher used interview guidelines based on the constructs of the UTAUT2 theory, but still opened space for spontaneous responses from students so that the data obtained was rich and reflective.

As such, semi-structured interviews allow for more in-depth data collection than structured interview formats, and are more focused than free-form interviews, making them well suited to the purpose of this research which is to understand students' experiences in a comprehensive and in-depth manner. At the interview

stage, the researcher asked open-ended questions with a semi-structured interview type. The researcher asked one question, namely: When you learned to use Wordwall, how did it feel, can you tell me if it went well or if there were any confusions. The following are the students' answers for the interview.

a) Positive Views on Vocabulary Learning with Wordwall

EFL students generally expressed positive perceptions of Wordwall, particularly appreciating its interactive and game-based design which helped them understand and remember vocabulary more effectively. This digital platform stood out as a more engaging alternative to traditional learning tools, especially textbooks.

As S5 explained,

"I feel that English vocabulary becomes easier to remember when learning using Wordwall. There are challenges like having to answer quickly to win, so I'm more focused. Because I learn while playing, new words stick in my head faster." (S5)

This illustrates the performance expectancy of Wordwall, as students perceived clear improvements in vocabulary retention due to its competitive and dynamic format.

Similarly, S1 emphasized the engaging aspect of learning:

"Learning using Wordwall is really fun, because it's not just sitting still while reading a book. You can play while learning... I even remember the English vocabulary faster. I like this way of learning, it's not boring." (S1)

This statement reflects the dual benefit of hedonic motivation and performance expectancy, where fun activities lead to deeper vocabulary learning.

S3 added a similar sentiment:

"I really like the games on Wordwall, it's fun! You can learn while playing, so it doesn't feel like you're really learning... If there's a game, I get excited and want to keep going." (S3)

This supports the idea that digital game-based learning promotes sustained engagement and motivation, elements emphasized in the UTAUT2 model under hedonic motivation.

b) Wordwall's Advantage over Traditional Learning Tools

When comparing Wordwall to conventional learning methods such as textbooks or vocabulary lists, students consistently perceived Wordwall as a more engaging, efficient, and enjoyable platform. The game-based format offered by Wordwall was considered superior in terms of learning atmosphere, motivation, and retention.

As S3 shared,

"The atmosphere is also lively and it's not boring like it usually is with books. When I study with books, I sometimes get sleepy and bored quickly, but if there's a game, I get excited and want to keep going." (S3)

This clearly reflects the hedonic motivation aspect—students found Wordwall more stimulating than traditional materials, which often failed to maintain their interest.

Similarly, S1 expressed:

"Learning is more fun because it feels like playing, not learning that makes me sleepy. I like this way of learning, it's not boring." (S1)

This statement reinforces Wordwall's ability to make vocabulary learning more emotionally engaging, which in turn contributes to more effective knowledge retention.

S5 emphasized the platform's practical value when compared to textbook learning:

"Compared to learning from a book, I understand and remember the meaning of the words faster when using Wordwall." (S5)

Here, the performance expectancy is evident—students viewed Wordwall as not just more enjoyable but also more effective in helping them grasp and retain vocabulary.

These comparisons highlight a recurring theme: Wordwall's interactive design gives it an edge over static, traditional learning tools. The platform turns vocabulary learning into an active experience, allowing students to practice and receive immediate feedback in a playful format. This aligns with the broader benefits of educational technology as described in studies such as Sitohang et al. (2024) and Gantari et al. (2024), which report increased motivation and learning outcomes through game-based media.

c) Ease of Use: Students' Effort Expectancy in Using Wordwall

Students' responses revealed varying experiences regarding how easy it was to use Wordwall. While some students adapted quickly and found the platform user-friendly, others required initial guidance before feeling confident navigating the games. This variation highlights the role of digital readiness and instructional support in shaping effort expectancy.

S2 shared their experience of initial confusion followed by growing independence:

"When I first tried Wordwall, I was confused about how to play... But after being explained slowly by Miss Nurul, I understood. It wasn't as difficult as I thought. Now it's even easier and I can play by myself without having to ask again." (S2)

This narrative demonstrates a positive shift in effort expectancy, where early teacher support enabled students to feel competent and autonomous in using the tool.

In contrast, S4 admitted to ongoing difficulties:

"I'm actually still a bit confused when playing Wordwall... I still like to forget how to answer. So sometimes I just see my friends first and then join in." (S4)

This response illustrates a low effort expectancy—despite repeated instructions, the student continued to struggle with understanding the gameplay mechanics. The observation data confirmed that S4 appeared silent and hesitant during the activities.

Meanwhile, S3 offered a more neutral stance:

"At first, I didn't really get it, but once I tried it, it became easier. I like how it's just clicking and choosing. It's simple compared to writing a lot." (S3)

This reflects a gradual improvement in perceived ease of use, showing how intuitive design can help students feel more comfortable over time.

The responses suggest that Wordwall is generally perceived as easy to use, particularly after basic teacher guidance. However, some students may still need additional scaffolding, especially those with less exposure to digital tools. These findings align with the effort expectancy construct of the UTAUT2 model, emphasizing that perceived ease of technology use directly affects students' engagement and willingness to continue using it.

In contrast to static learning from books or passive digital tools, Wordwall's active learning environment made students feel emotionally involved, motivated, and more successful in vocabulary acquisition. Their testimonies align with recent literature highlighting the effectiveness of interactive, game-based learning platforms in fostering vocabulary mastery through enjoyable, contextual, and performance-driven experiences.

In this question, most students stated that learning using Wordwall was more fun and less boring. As said by S1 "learning is more fun" which makes him remember vocabulary faster. S3 also said "I like the game" because it makes him feel learning while playing. S5 said, "It's easier to remember". These students' statements are included in the hedonic motivation theme, namely the extent to which students enjoy learning by using Wordwall media and the performance expectancy theme, namely the extent to which students feel that Wordwall helps them improve their English vocabulary for the better. Then student S2 said "initially confused how to play" with a little help by the teacher then the student became aware of how to learn while playing using Wordwall media. And student S4 said "I don't understand the game" making it difficult for this student to understand the

material and games using Wordwall. In the previous observation, student S4 was more silent and looked confused.

Discussion

Vocabulary plays a very important role in learning and communication. In English language learning, mastering a lot of vocabulary is very helpful in understanding the material, discussing with confidence, conveying ideas appropriately according to context and also doing assignments. According to Daulay S.H, (2021) vocabulary is a set of words known and used by humans to interact with other people. Without mastery of vocabulary, a person will have difficulty communicating orally and it will be difficult to understand each other. This understanding shows that vocabulary has a very important role in language learning, especially for students.

The findings of this study indicate that the use of Wordwall as a learning medium was perceived positively by most students, particularly in relation to their vocabulary acquisition. The majority of participants reported that Wordwall helped them remember new words more quickly and easily. This aligns with the performance expectancy construct of UTAUT2, which refers to the belief that using a particular technology will improve task performance (Venkatesh et al., 2012). For instance, students S1, S3, and S5 reported increased focus and retention of vocabulary through Wordwall's interactive activities. This is consistent with observations where these students were visibly engaged, smiled frequently, and responded quickly to the game-based tasks. Such findings demonstrate that Wordwall has the potential to enhance learning outcomes by combining cognitive engagement with emotional satisfaction.

In addition to perceived learning effectiveness, the role of hedonic motivation emerged as a significant factor influencing student engagement. Students generally described their learning experiences with Wordwall as enjoyable, fun, and motivating. The statements by S1 and S3, which emphasized that learning felt like playing rather than a traditional academic activity, illustrate that emotional engagement is integral to their motivation. Hedonic motivation, as explained in UTAUT2, refers to the fun or pleasure derived from using technology, and this study found that such enjoyment translated into deeper focus and willingness to participate. The positive emotional climate created by Wordwall not only sustained student attention but also fostered intrinsic motivation. This is particularly valuable in junior high school contexts where students are more responsive to interactive and game-based learning tools than passive learning strategies.

However, not all students experienced Wordwall as straightforward or beneficial at the outset. The findings also revealed discrepancies in effort expectancy—or the ease associated with using the technology. While some students adapted quickly, others required support to understand how to navigate the interface or interpret the rules of the game. For example, S2 initially struggled

with the interface, while S4 consistently expressed confusion even after instruction. The observation data confirmed this, as S4 remained passive and hesitant during most activities. These variations suggest that while Wordwall is generally intuitive, certain learners—especially those with lower digital literacy or less exposure to game-based environments—may need additional scaffolding.

The role of teacher facilitation is thus critical, as seen in how S2 was able to gain confidence following clear guidance from the teacher. This aligns with findings from Gantari et al. (2024), who emphasized the importance of guided learning in optimizing the use of digital platforms.

The triangulation of data from observations, questionnaires, and interviews enriches the interpretation of these findings. The questionnaire results showed that most students agreed or strongly agreed with statements related to Wordwall's ease of use, usefulness, and fun aspects. However, the qualitative data highlighted nuances not visible in the questionnaire responses. For instance, while S4's questionnaire score indicated a neutral or low perception, the interview and observational data revealed a deeper struggle with comprehension and engagement. This underscores the value of a phenomenological approach, which allows researchers to access students' lived experiences and subjective meanings beyond surface-level responses. It also confirms that technology adoption in educational contexts cannot be assumed to be uniform; individual differences must be accommodated.

The comparison with traditional learning tools also surfaced frequently in students' testimonies. Textbooks were often described as boring or sleep-inducing, while Wordwall was characterized as dynamic and stimulating. Students associated digital games with excitement and immediacy, which contrasts with the slower, passive experience of reading and memorizing from printed materials. This aligns with the broader shift in educational practice toward more interactive, student-centered pedagogies, particularly in the digital age. Although Sitohang et al. (2024) support the claim that Wordwall enhances motivation, this study extends the discussion by showing how such motivation emerges—through play, competition, immediate feedback, and a sense of autonomy. The feeling of being emotionally connected to the activity appears to be a major contributor to the perceived learning effectiveness.

In sum, this study affirms that Wordwall is not merely a supplementary tool but a transformative medium that reshapes students' learning experiences. The constructs of UTAUT2—performance expectancy, effort expectancy, and hedonic motivation—are clearly manifested in students' accounts and behaviors. Nonetheless, the presence of individual variation indicates that the implementation of digital learning tools must be carefully managed, with attention to learners' prior experience, digital skills, and the instructional design. While the platform promotes a more enjoyable and effective vocabulary learning process for

most students, it is not without challenges. Educators must be prepared to support students who encounter obstacles and to adapt the technology's use to suit diverse learner profiles

Conclusion

This study concludes that the use of Wordwall as a vocabulary learning medium is perceived positively by students. Based on observations, questionnaires, and semi-structured interviews, students expressed that Wordwall made learning more enjoyable, increased their motivation, and helped them remember new vocabulary more effectively. The constructs of performance expectancy, effort expectancy, and hedonic motivation from the UTAUT2 model are clearly reflected in the findings. Most students enjoyed the game-based activities (hedonic motivation), found the media relatively easy to use after teacher guidance (effort expectancy), and felt it improved their vocabulary acquisition (performance expectancy). These findings highlight the role of Wordwall not just as a digital tool, but as a pedagogical approach that promotes active and engaging learning.

Despite its contributions, this study has certain limitations. The sample size was small, consisting of only five seventh-grade students from a single school, which limits the generalizability of the findings. In addition, the study focused on short-term perceptions without exploring long-term effects on vocabulary retention. Future research is suggested to involve larger and more diverse student populations across various educational levels and institutions. Researchers may also consider conducting longitudinal studies to examine the sustained impact of Wordwall on students' vocabulary development. Moreover, further investigation into the role of teacher support and digital readiness in maximizing the effectiveness of game-based learning platforms is recommended.

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