

Using AI Platforms toward English Language Learning: A Case Study of English Program Students

Thanadun Krasaesom¹ / Weerawoot Jeanmano² /
U-krit Sompen³ / Purisa Watcharenwong^{*4}

^{1, 2, 3}Students of English Program, Faculty of Humanities and Social Sciences,
Buriram Rajabhat University, Thailand

⁴Lecturer of English Program, Faculty of Humanities and Social Sciences,
Buriram Rajabhat University, Thailand

*Corresponding Author

E-mail: purisa.wa@bru.ac.th

Received: December 7, 2023
Revised: December 19, 2023
Accepted: December 26, 2023

Abstract

The purposes of the research were to study the perceptions and the effect of using AI platforms towards English as a foreign language of English program students, and to investigate which AI platforms is mostly used among English program students. The participants in this quantitative research were 90 third-year English program students from Buriram Rajabhat University. The researchers collected data by using a questionnaire. The results revealed a positive perception of the students towards using Artificial Intelligence in learning English and the students agreed that AI can improve their English abilities. The results also indicated that the most used AI platforms was Google Translate. These show that AI platforms have impact and advantages in education. The learners can use AI to improve their knowledge if they use it appropriately.

Keywords: artificial intelligence, AI platform, English language learning

Introduction

Artificial intelligence (AI), commonly referred to as machine intelligence, is a subfield of computer science that focuses on creating and overseeing machinery that can learn to make judgments and do actions independently on behalf of a person. In terms of technologies, AI is not one. Rather, it is an all-encompassing word that refers to any kind of software or hardware part that enables robotics, computer vision, natural language processing, natural language creation, and machine learning. (Rouse, 2023). Students who are still developing their skills in using English to study or communicate successfully are known as English language learning. They frequently come from families and backgrounds where English is not their native language; therefore, they need specialized or altered training in both their academic courses and the English language. The strategic use of AI for education is a topic of an increase of discussion (Seldon and Abidoye, 2018). Loeckx (2016) suggested that AI may be a useful educational tool that decreases the daily tasks of instructors and students while providing them with engaging learning opportunities. Coupled with current education reforms such as the digitalization of educational resources, gamification, and

personalized learning experiences, there are many opportunities for the development of AI applications in education. Students may utilize AI to enhance learning results in some cases since they are digital citizens. However, they might not employ the proper AI strategies in a given learning situation, which might lead to unfavorable attitudes about learning (Ijaz & Bogdanovych, 2017). AI technology is being utilized in Thailand's education system to enhance the learning experience for both teachers and students. English program students at Buriram Rajabhat University are utilizing AI to enhance their proficiency in English as a second language, focusing on four core English skills that can lead to success in their personal and professional lives. This study aims to explore the perceptions and effects of using AI platforms in English language learning among English major students. It will use popular AI to poll students who are most likely to use it, focusing on listening, speaking, reading, and writing. The research will also investigate which AI platforms are most and least used in English language learning, considering students' previous knowledge of the subject matter.

Literature Review

The Definition of Artificial Intelligence (AI)

Artificial Intelligence (AI) was developed since the late 19th century and still developing for a better version that help human in 21st century or in the future. The term of Artificial Intelligence (AI) was first known in 1956, during a summer conference at Dartmouth College. John McCharthy, the AI pioneers, was coined the term "Artificial Intelligence (AI)" in the conference and the term was being used until nowadays. Artificial Intelligence (AI) really came into existence with the birth of computers in around the 1940s and 1950s for the earlier period of its development, attention was clearly focused on getting computers to do things that, if a human did them, would be regarded as intelligent (Warwick, 2012). The first study of Artificial Intelligence (AI) begun in the 1950s, by Alan Turing during World War II. He considered the question of the study "Can machines think?" (Turing, 1950). In the study, he used computer's ability to deceive interrogators into believing its response to their questions were made by a human being, also known as the Turing test to determine if machines could think. This is an importance part of the history of Artificial Intelligence (AI). According to Russell and Norvig (1995), they described the artificial intelligence from their study into four definitions categories:

1. Systems that think like humans
2. Systems that act like humans
3. Systems that think rationally
4. Systems that act rationally

Also, Alan Turing's definition would have fallen under the category of "systems that act like humans" which is one of the artificial intelligence's definitions. To act like human and to be able to deceive human in Turing test with rationally, computer systems required natural language processing which mean it needs to be able to communicate in a natural language, knowledge representation, automated reasoning, and machine learning which mean it needs to be able to learn from its environment (Kok, Boers, Kosters, Putten & Poel, 2009). It can conclude that the computer systems need more intelligence to process by itself and after that, the computer systems were developed continuously until the computer systems have intelligence that capable to process by itself and it was called artificial intelligence nowadays. The definition of

Artificial Intelligence (AI) in this time is a computer processing combines with science and strong datasets, to enable problem-solving. It is a deep learning machine that can make predictions or classifications based on input data.

English Language Learning

Akbari (2016) stated that in the current era of science and technology expansion, increasing demands for international communication, exchanging, and progress have made English language learning an essential tool required by many people around the world. Many countries in 21st century accepted English language as the importance factor in communication and it became international language used to communicate around the world. Learning English language can be done in many ways including self-study through social or environment and studying in an educational institution where the English language course is offered.

Listening skill

Listening skill is the first skills that the learners need to practice. Egamnazarova and Mukhamedova (2021) indicated that listening comprehension is the basis for your speaking, writing, and reading skills. To practice listening skills, it is important to listen actively, which means to pay attention to what you are listening to. They can practice other skills from listening. Also, practice comprehension skill too. If the learners have a good listening and have a comprehension skill. The learners can learn other skills more easily. According to the study conducted by Obari and Lambacher (2019). The study utilized AI smart speakers to enhance students' English language skills, including listening and speaking. The results showed a positive impact on students, who were satisfied with the improvement. The study suggests that improving listening skills is a foundation for other language skills.

Speaking Skill

Speaking skill is the most important skill to acquire foreign or second language. Among the four key language skills, speaking is deemed to be the most important skill in learning a foreign or second language (Rao, 2019). The speaking skill is also, the hardest skills of all. According to Abugohar, et al. (2019)'s study, the researchers aimed to explore the most trouble-provoking skill for EMP students through a questionnaire report and interviewees. To improve your English speaking skills, immerse yourself in the language and practice regularly. Even if it's just a few minutes, focus on something related to English daily. Regardless of the method, dedicate time each day to improving your skills, as with enough practice and dedication, your abilities will significantly improve.

Reading Skill

Reading comprehension skill is a skill of a person that capable to read, comprehend, interpret, and decode written language and texts. Takaloo and Ahmadi (2017) stated that reading comprehension is the organization of meaning of a written or spoken communication by a reciprocal, holistic exchange of ideas between the interpreters and the message in a specific communicative context. This skill requires the learners' prior knowledge and experience such as the main idea, topic of a text. If the learners have prior knowledge and experience, the learners will be able to understand

the meaning of the written text. Reading comprehension skill can strengthen English language skills but it's hard to improve. According to the study conducted by Naeini and Duvall (2012), the researchers studied the improvements in English Language Training (ELT) university students' reading comprehension performance. The researcher utilized Lev Vygotsky's (1978) dynamic assessment approach to teach English language skills. Results showed students struggled with reading comprehension due to limited vocabulary. This suggests that knowledge and experience are necessary for effective reading practice. Good reading skills can help strengthen English language skills.

Writing Skill

Writing skill is the second important skill that the learners need to practice. Writing skill is the ability to express opinion, and the writer delivers message and opinions through it (Chicho, 2022). Writing skill is hard skill among others because it must be a concern more about it, and we need to follow some rules that related to every single step, they are word choice, coherent, correlation, and grammar (Sa'adah, 2020). To practice writing skill, the learners must have knowledge of writing rule and grammar to practice writing skill. Writing skill is a hard thing for the teachers to teach their students too, but if the teachers capable to make students understand writing skill. It will give a good benefit for the students. Moses and Mohamad (2019) stated that writing skill will benefit the rest of the students' lives. Introducing and practice writing with attractive activities in schools could increase students' confidence and they will fall in love with writing in a long run.

Artificial Intelligence in English Language Learning

In the 21st century, advancements in technology and science have made English language proficiency crucial for global communication, while artificial intelligence (AI) has emerged to aid in education. AI has been integrated into teaching and assessment practices to enhance learning outcomes and instructional experiences (Mushthoza, et al., 2023). Artificial intelligence is a tool that easy to access and easy to use for everyone and enable to solve problem in a short duration of time which suit very well with the 21st century English language learning. The integration of AI in language learning environments offers numerous possibilities for fostering the four fundamental language skills: speaking, listening, reading, and writing (Rusmiyanto, et al., 2023). Artificial intelligence (AI) platforms like ChatGPT, Google Translate, and Grammarly are widely used in English language learning to assist learners in improving their skills, as highlighted by Dewi's (2021) study. The researcher utilized an artificial intelligence platform to enhance students' English language performance in education. The study demonstrated that AI can aid students in learning and completing various English assignments, highlighting its significant role in the 21st-century education field.

Methodology

1. Research Design

This research applied a quantitative method. According to the research objectives, this research aims to study the effect of using AI platforms in English language learning skills and which AI platforms is the most and the least used among English program students of the Faculty of Humanities and Social Sciences, Buriram Rajabhat University.

2. Population and Samples

The population of this research were 120 third-year students from English Program, Faculty of Humanities and Social Sciences, Buriram Rajabhat University. The samples were selected by purposive sampling method which was referenced from table of Krejcie and Morgan in amount of 90 students.

3. Instrument and Procedures

The research instrument used to collect data was questionnaire behavior of using AI platforms. The researcher used a five-point rating scale questionnaire. The three-part questionnaire comprises of part 1: General perception of the used of AI platforms, part 2: The use of AI platforms in English language learning in any situation which contained four language skills, and part 3: AI platforms used in English language learning.

4. Data collection

The researchers have collected the information related to the research. There were steps to precedes as follows:

1. The researcher made an online questionnaire from literature review with cite scale level in two types: Agreement opinion and how often do they use AI platforms.
2. The researcher sent an online questionnaire's link made by google form to 90 third-year English Program students.
3. The researcher collected the online questionnaire's link that has been sent to English Program students and already answered.
4. The researcher examined the information that provide on questionnaire and analyze to find the result.

5. Data Analysis

A five-point rating scale questionnaire was analyzed by using mean (\bar{x}) and standard deviation (S.D.). The data from part 1 and part 2 was computed for mean (\bar{x}), and standard deviation (S.D.), and the data from part 3 was analyzed using frequency and percentage.

Results

The aims of this research were to study the perceptions and the effects of using AI platforms towards English language learning of English Program students and to investigate which AI platforms were the most and the least used in English language learning of English Program students. In this section the results collected from 90 third-year students from English Program, Faculty of Humanities and Social Sciences, Buriram Rajabhat University were presented and discussed.

Perception of Using AI Platforms**Table 1***Result Found from Student's Questionnaire Survey*

| No | Question | \bar{x} | S.D. | Meaning |
|--------------|--|-----------|------|---------|
| 1 | I use AI platforms to help me understand information when I learn English. | 4.24 | 0.65 | Much |
| 2 | AI platforms give me more advantages than disadvantages. | 4.12 | 0.74 | Much |
| 3 | AI platforms save time in English learning. | 4.23 | 0.76 | Much |
| 4 | I can learn English language better when I use AI platforms. | 3.81 | 0.86 | Much |
| 5 | AI platforms is easy to use and quickly. | 4.39 | 0.76 | Much |
| 6 | AI platforms can be used in daily life. | 4.29 | 0.76 | Much |
| 7 | When I have to talk with foreigners, AI platforms help me to understand what they said. | 4.08 | 0.81 | Much |
| 8 | I think AI platforms have good benefits in Education. | 4.37 | 0.71 | Much |
| 9 | AI platforms encourage me to improve listening, speaking, reading, and writing in English. | 4.24 | 0.69 | Much |
| 10 | I often use AI platforms when I learn English. | 4.13 | 0.78 | Much |
| TOTAL | | 4.19 | 0.49 | Much |

As presented from Table 1, the overall of the finding indicated the perception of using AI platforms, the result was much. When considering in each category, the participant was much agreed in AI platforms is easy to use and quickly ($\bar{x} = 4.39$), followed by the participant was much agreed in AI platforms have good benefits in Education ($\bar{x} = 4.37$), and the participant was much agreed in AI platforms can be used in daily life ($\bar{x} = 4.29$), respectively.

Using AI Platforms in English Language Learning

Table 2

Results Found from Student's Questionnaire Survey

| No | Question | \bar{x} | S.D. | Meaning |
|-----|---|-----------|------|---------|
| 1. | AI platforms help me familiar with native English speaker's accent. | 3.97 | 0.86 | Much |
| 2. | I use AI platforms to listen voice when I don't know how to pronounce of words. | 4.22 | 0.70 | Much |
| 3. | I am better with AI when I need to listen something in English. For example, I don't need to read the subtitle just listening from generated text-to-voice. | 3.98 | 0.77 | Much |
| 4. | I can watch movie and understand what is going on with AI platforms. | 3.97 | 0.86 | Much |
| 5. | AI platforms made me want to improve my listening skill. | 4.14 | 0.82 | Much |
| 6. | I use AI platforms to help me practice pronunciation when I learn English language. | 4.02 | 0.79 | Much |
| 7. | I can pronounce better when I practice speaking by AI platforms. | 4.02 | 0.83 | Much |
| 8. | I am better with AI when I need to say something in English. For example, I can start a conversation naturally. | 3.94 | 0.81 | Much |
| 9. | AI platforms guild me the manner of how to speak and what it should be. | 3.88 | 0.80 | Much |
| 10. | AI platforms made me want to improve my speaking skill. | 3.96 | 0.86 | Much |
| 11. | AI platforms help me read a book easier when I don't understand some English vocabulary. | 4.23 | 0.72 | Much |
| 12. | I use AI platforms to help me practice reading when I learn English. | 4.04 | 0.77 | Much |
| 13. | I am better with AI when I need to read something in English. For example, I can understand the story faster. | 4.03 | 0.72 | Much |

Table 2 (Continued)

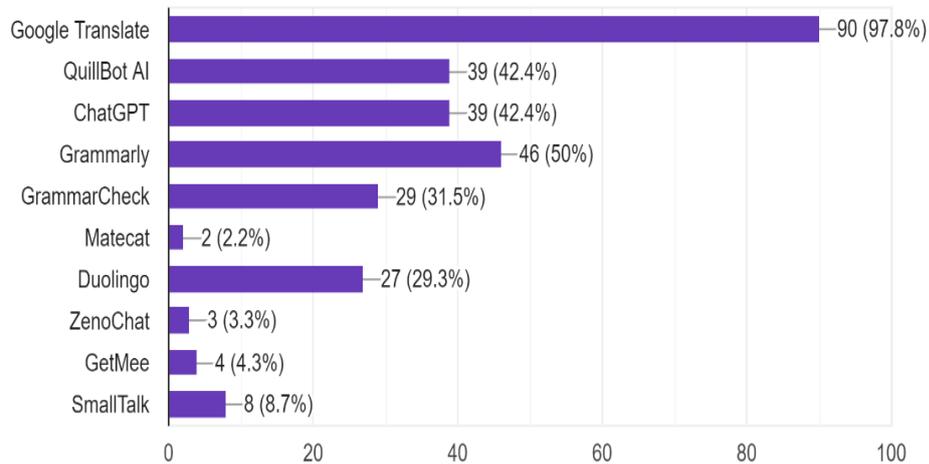
| No | Question | \bar{x} | S.D. | Meaning |
|--------------|--|-----------|------|---------|
| 14. | I have known some English vocabulary that has more than 1 meaning from AI platforms. | 4.07 | 0.80 | Much |
| 15. | AI platforms made me want to improve my reading skill. | 3.92 | 0.85 | Much |
| 16. | I use AI platforms to help me practice writing when I learn English. | 4.09 | 0.81 | Much |
| 17. | I use AI platforms to check grammar when I write the sentence. | 4.21 | 0.80 | Much |
| 18. | I am better with AI when I need to write something in English. | 4.07 | 0.85 | Much |
| 19. | AI platforms can help me to write something easier. | 4.12 | 0.77 | Much |
| 20. | AI platforms made me want to improve my writing skill. | 3.97 | 0.80 | Much |
| TOTAL | | 4.04 | 0.56 | Much |

From Table 2, the finding provided the effect of using AI platforms in English language learning. The overall of the finding indicated the use of AI platforms which contained four English skills, the result was much. When considering each category, the participant was much agreed in AI platforms to help them reading a book easier when they don't understand some English vocabulary ($\bar{x} = 4.23$), followed by the participant was much agreed in AI platforms to listen voice when they don't know how to pronounce of words ($\bar{x} = 4.22$), and the participant was much agreed in AI platforms to check grammatical when I write the sentence ($\bar{x} = 4.21$), respectively. According to the study, there are advantages of using AI platforms separated into four English language skills. In listening skill, AI help them to listen voice when they don't know how to pronounce of words. In speaking skill, AI platforms to help them practice pronunciation when they learn English language and they can pronounce better when they practice speaking by AI platforms. In reading skill, AI platforms help them read a book easier when they don't understand some English vocabulary. In writing skill, they use AI platforms to check grammar when they write the sentence.

The Most and the Least Used AI Platforms

Figure 1

Results Found from Student's Questionnaire Survey



From Figure 1, the finding provided the most and the least used AI platforms. When considering each category, it can list from the most and the least used as follows: Google Translate (97.8%), Grammarly (50%), QuillBot AI (42.4%), ChatGPT (42.4%), GrammarCheck (31.5%), Duolingo (29.3%), SmallTalk (8.7%), GetMee (4.3%), ZenoChat (3.3%), and Matecat (2.2%), respectively.

According to the study, AI platform that was used the most was Google Translate and the least used was Matecat. The findings indicated that AI platforms can actually help the participants to practice and develop their English language skills. For listening, they can hear a word or conversations more comprehended and from variety of English accents. For speaking, they can now speak more naturally. For reading, they can understand the story by the unknown vocabulary. For writing, they can write with more ease and grammatical correct.

Discussion

1. The study explores the perceptions and effects of AI platforms on English language learning among English program students. Results show that students use AI platforms in their daily lives and see their benefits in various situations and educational settings, enhancing their understanding and proficiency in English. These findings are in line with Rusmiyanto, et al. (2023) who found that Artificial Intelligence is a tool that easy to access and easy to use for everyone and enable to solve problem in a short duration of time.

2. The study analyzed the most and least used AI platforms in English language learning among English program students. The results showed that AI platforms significantly improved students' understanding and learning of English. The study revealed the most and least used AI platforms by presenting 10 popular platforms and asking students to check which ones they used. The results were arranged from the most to the least used as follows: Google Translate (97.8%), Grammarly (50%), QuillBot AI (42.2%), ChatGPT (42.4%), GrammarCheck (31.5%), Duolingu (29.3%), SmallTalk (8.7%), GetMee (4.3%), ZenoChat (3.3%), and Matecat (2.2%), respectively. Those were the AI platforms which they were familiar with and used with

their English skills to help or practice when necessary. These findings are in line with Dewi, et al. (2021) who studied Artificial Intelligence (AI) which provides a useful tool to aid the learners in improving their skills.

Recommendations

1. Implications

1.1 The results might be helpful for students who are interested in using artificial intelligence (AI) platforms to improve their English language abilities via their learning of each skill, such as listening, speaking, reading, and writing.

1.2 The results of the study can be used as a guideline for teachers or educators in integrating AI in language classrooms.

2. Further Studies

2.1 Additional research ought to focus more on the subject and might use a bigger sample size in order to obtain more trustworthy findings.

2.2 It could be possible to interview the participant to gather further information that's relevant and has more information about student's attitude toward adopting AI platforms.

Reference

- Abugohar, M. A., Al-Hnifat, M. A., Al-Smadi, O. A., & Rashid, R. A. (2019). English language speaking skill issues in an EMP context: Cause and solutions. *International Journal of English Linguistics*, 9(3), 211-225.
- Akbari, Z. (2016). The study of EFL students' perceptions of their problems, needs, and concerns over learning English: *The case of MA paramedical students. Procedia - Social and Behavioral Sciences*, 232, 24-34.
- Chicho, K. Z. H. (2022). An analysis of factors influencing EFL learners' writing skills. *Canadian Journal of Language and Literature Studies*, 2(2), 28-38.
- Dewi, H. K., Wardani, T. I., Rahim, N. A., Putri, R. E., & Pandin, M. G. (2021). *The use of AI (Artificial Intelligence) in English learning among university student: Case study in English Department, Universitas Airlangga*. Universitas Airlangga, Surabaya, Indonesia.
- Egamnazarova, F. A., & Mukhamedova, M. S. (2021). *Improving English language listening skill. Academic Research in Educational Sciences*, 2(Special Issue), 28-32.
- Ijaz, K., Bogdanovych, A., & Trescak, T. (2017). Virtual worlds vs books and videos in history education. *Interactive Learning Environments*, 25(7), 904-929. <https://doi.org/10.1080/10494820.2016.1225099>
- Kok, J. N., Boers, E. J. W., Kosters, W. A., van der Putten, P. W. H., & Poel, M. (2009). Artificial intelligence: Definition, trends, techniques, and cases. In J. N. Kok, E. J. W. Boers, W. A. Kosters, P. W. H. van der Putten, & M. Poel (Eds.), *Encyclopedia of life support systems (EOLSS)* (Vol. 1, pp. 270-299). UNESCO.
- Loeckx, J. (2016). Blurring boundaries in education: Context and impact of MOOCs. *International Review of Research in Open and Distributed Learning*, 17(3), 92-121.

- Moses, R., & Mohamad, M. (2019). Challenges faced by students and teachers on writing skills in ESL contexts: A literature review. *Creative Education*, 10, 3385-3391.
- Mushthoza, D. A., Syariantin, N., Tahalele, O., Telussa, S. I., Rasmita, R., & Mokodenseho, S. (2023). Analyzing the impact of artificial intelligence (AI) on the future of English language teaching and learning. *Journal on Education*, 6(1). 1549-1557. <https://doi.org/10.31004/joe.v6i1.3115>
- Naeini, J., & Duvall, E. (2012). Dynamic assessment, and the impact on English language learners' reading comprehension performance. *Language Testing in Asia*, 2(22), 22-41.
- Obari, H., & Lambacher, S. (2019). Improving the English skills of native Japanese using artificial intelligence in a blended learning program. *CALL and complexity—short papers from EUROCALL 2019*, 327-333.
- Rao, P. S. (2019). The importance of speaking skills in English classrooms. *Alford Council of International English & Literature Journal (ACIELJ)*, 2(2), 6-18.
- Rouse, M. (2023, February). *Generative AI*. https://www.linkedin.com/pulse/what-generative-ai-margaret-rouse?trk=portfolio_article-card_title
- Rusmiyanto, R., Huriati, N., Fitriani, N., Tyas, N., Rofi'i, A., & Sari, M. (2023). The role of artificial intelligence (AI) in developing English language learner's communication skills. *Journal on Education*, 6(1), 750- 757.
- Russell, S. J., Norvig, P., & Davis, E. (2010). *Artificial intelligence: A modern approach*. (3rd ed.). Prentice Hall.
- Sa'adah, A. R. (2020). Writing skill in teaching English: An overview. *EDUCASIA: Jurnal Pendidikan, Pengajaran, Dan Pembelajaran*, 5(1), 21-35. <https://doi.org/10.21462/educasia.v5i1.41>
- Seldon, A., & Abidoeye, O. (2018). *The fourth education revolution: Will artificial intelligence liberate or infantilise humanity?* University of Buckingham Press.
- Takaloo, N. M., & Ahmadi, M. R. (2017). The effect of learners' motivation on their reading comprehension skill: A literature review. *International Journal of Reacher in English Education*, 2(3), 10-21.
- Turing, A.M. (1950). Computing machinery and intelligence. *Mind*, 59(236), 443-460.
- Warwick, K. (2012). *Artificial intelligence: The basics* (1st ed.). Routledge.

Author

Miss Purisa Watcharenwong is currently a lecturer at English Language Program, Faculty of Humanities and Social Sciences, Buriram Rajabhat University. She graduated in Master of Arts in Applied Linguistics (Teaching English for Specific Purposes) from Mahidol University. Her areas of interests include teaching English as a foreign language, translation, and English for specific purposes.