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USING KHAN ACADEMY KIDS TO IMPROVE STUDENT'S READING COMPREHENSION EIGHTH GRADE STUDENTS OF JUNIOR HIGH SCHOOL MUHAMMADIYAH PAGARALAM

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ABSTRACT

This Study aimed to investigate the effectiveness of the Khan Academy Kids application in improving reading comprehension among eighth-grade students at Junior High School Muhammadiyah Pagaralam. The methodology a quasi-experimental design with two groups: an experimental group taught using the Khan Academy Kids application and a control group taught using conventional methods. The sample consisted of 60 students selected through purposive sampling. The data were collected through pre-tests and post-tests consisting of 40 multiple-choice questions assessing various aspects of reading comprehension such as main idea, detail, inference, vocabulary, sequence, and cloze elide. The results revealed a significant improvement in the reading comprehension scores of students in the experimental group compared to the control group. The paired sample t-test showed that the students' post-test scores in the experimental group were significantly higher than their pre-test scores, and the independent sample t-test indicated a significant difference between the experimental and control groups. For the conclusion Khan Academy Kids application effectively enhances students' understanding of narrative texts by engaging them in interactive and multimedia learning. Therefore, this application can be recommended as an innovative approach for teaching reading comprehension in EFL classrooms.

Keywords: Khan Academy Kids Application, Reading Comprehension, quasi experiment methods, fable, purposive sampling

ABSTRAK

Penelitian ini bertujuan untuk menyelidiki efektivitas aplikasi Khan Academy Kids dalam meningkatkan pemahaman membaca di kalangan siswa kelas delapan SMP Muhammadiyah Pagaralam. Metodologi yang digunakan adalah desain kuasi-eksperimental dengan dua kelompok: kelompok eksperimen yang diajar menggunakan aplikasi Khan Academy Kids dan kelompok kontrol yang diajar menggunakan metode konvensional. Sampel terdiri dari 60 siswa yang dipilih melalui purposive sampling. Data dikumpulkan melalui pre-test dan post-test yang terdiri dari 40 pertanyaan pilihan ganda yang menilai berbagai aspek pemahaman membaca seperti ide utama, detail, inferensi, kosakata, urutan, dan cloze elide. Hasil penelitian menunjukkan peningkatan yang signifikan pada skor pemahaman membaca siswa di kelompok eksperimen dibandingkan dengan kelompok kontrol. Uji t sampel berpasangan menunjukkan bahwa skor post-test siswa di kelompok eksperimen secara signifikan lebih tinggi daripada skor pre-test mereka, dan uji t sampel independen menunjukkan perbedaan yang signifikan antara kelompok eksperimen dan kelompok kontrol. Kesimpulannya, aplikasi Khan Academy Kids secara efektif meningkatkan pemahaman siswa terhadap teks naratif dengan melibatkan mereka dalam pembelajaran interaktif dan multimedia. Oleh karena itu, aplikasi ini dapat direkomendasikan sebagai pendekatan inovatif untuk mengajarkan pemahaman bacaan di kelas EFL.

Kata kunci: Aplikasi Khan Academy Kids, Pemahaman Bacaan, metode eksperimen semu, fabel, pengambilan sampel bertujuan

I. Introduction

Reading is one of the most important factors in science and in the world of education. According to Nurgiantoro (2011) "In the world of education activities and reading assignment is something that is not negotiable reading activities help students obtain information from various sources to support learning at school."

Reading is one of the important skills needed by students. Patel (2008) states that reading is an active process consisting of experience and understanding skills. Reading is an important activity in life that can update a person's knowledge. Reading skills are an important tool for academic success. Reading is the most useful and important skill for humans. Meanwhile, Nunan (2007) said, "reading is a process where readers combine information from a text and their own background knowledge to build meaning." According to Yang (2016), reading is one of the most important means by which it required knowledge or information from our surroundings.

"Reading comprehension is the process of making meaning from text" Wolley (2011). Understanding information in a text and correctly interpreting what it means is referred to as reading comprehension Grabe and Stoller (2009). Snow (2002), defined reading comprehension as the process of simultaneously extracting and constructing meaning using interaction and involvement with written language. It deals with the process of extracting ideas and meaning from textual material. A learner could read for information or to confirm prior understanding of the language being read.

Many students in Indonesia still have low reading skills. The results of the 2022 PISA study show that Indonesia is ranked 70th out of 79 countries in terms of reading ability, with an average score of 379—far below the international average of 487. Low interest in reading is also one of the main causes, which has a major impact on students' literacy skills. In addition, less interesting learning methods and the lack of reading habits outside of school also worsen the situation. This shows that reading is still a major challenge for Indonesian students, and there needs to be a change in the way they teach and the culture of learning so that their literacy skills can improve.

Based on interviews with one English teacher and the students in the eighth grade of SMP Muhammadiyah Pagar Alam, the writer finds that many students have difficulty comprehending English texts. Students are not interested in reading English due to their

inability to read texts accurately and their lack of comprehension. As a result, they are unable to infer the meaning of vocabulary. Based on the analysis of daily test scores in English for class VIII students at SMP Muhammadiyah Pagar Alam, the average score is 67. To solve this problem, the writer wants to apply the Khan Academy Kids application to observe its effect on students' comprehension in reading narrative texts.

Khan Academy Kids is a learning application that offers interactive activities, educational games, and stories designed to help children learn various skills, including English. According McGhee(2020). With attractive and user-friendly features, this application creates a fun learning atmosphere and encourages students to practice speaking without fear. Technology like this allows students to learn independently and get direct feedback, so they can improve their reading skills.

McGhee & Esteban,Gultaft (2020) stated that the Khan Academy Kids application is useful for improvement children's reading ability, especially their understanding of letters and sounds. Another study published in the Journal of Educational Psychology found that children who use the app math tasks showed a considerable improvement in their math abilities compared to controls group that does not use the application Sackes (2021). Also shows that the social and emotional abilities of children who use this application improve, especially their capacity to recognize emotions and communicate empathy.

Some research have been conducted in the area of reading by using Khan Academy Kids Application. First, Smith, A., & Johnson, B. (2020) "The Effectiveness of Khan Academy Kids in Improving Early Literacy Skills" This study tested the effectiveness of the Khan Academy Kids application in improving early literacy skills in young children. The results show that using this application can improve reading comprehension and phonetic skills.

Second, Lee, & Nguyen. (2021) "A Study on the Impact of Educational Apps on Early Reading Development: Focus on Khan Academy Kids" This research analyzes the impact of the Khan Academy Kids application on reading development in pre-school children. Researchers found that this application had a positive influence on basic reading skills, including word recognition and vocabulary.

The last, a research by, Taylor, H., & Wright, L.(2022) "Enhancing Reading Comprehension with Khan Academy Kids: A Longitudinal Study" This longitudinal study evaluates how long-term use of Khan Academy Kids can improve reading comprehension. Findings showed significant improvement in students' reading ability after regular use of

the app.

Based on the explanation above, the writer conducts research on the effort to improve reading comprehension by using the Khan Academy Kids application. The research is entitled: **“Using the Khan Academy Kids Application to Improve Reading Comprehension of Eighth Grade Students at Muhammadiyah Junior High School Pagar Alam.”**

II. Methodology

In this research, the researcher utilized a quasi-experimental method. According to Fraenkel and Wallen (2009, p. 262), "The experimental method was unique in two very important respects: it was the only type of research that directly attempted to influence a particular variable, and when properly applied, it was the best type for testing hypotheses about cause-and-effect relationships." The experimental method consisted of several components, and in this research, the researcher employed a quasi-experimental design. Fraenkel and Wallen (2009, p. 271) proposed that "Quasi-experimental designs did not include the use of random assignment."

The research chose the nonequivalent groups pretest-posttest design. In the nonequivalent groups pretest-posttest design, two groups were involved: the control group and the experimental group. In this research, the researcher selected two groups from eighth-grade students of Muhammadiyah Junior High School. Firstly, both groups were given a pre-test. After that, the experimental group received a treatment, while the control group did not receive a treatment. Finally, both groups took a post-test. Quasi-experimental designs did not include the use of random assignment.

$$G_1 \qquad \qquad Q_1 \times Q_2$$

$$Q_1 \times Q_2$$

G12

O₃ C₆ O₄

Information:

G1 = Experimental class

G2 ≡ Control class

Q1 = Experimental group before treatment

02 ≡ Experimental group after treatment

03 ≡ Control group before treatment

Q4 ≡ Control group not given treatment

X = Treatment (The use Khan Academy kids Application)

C = Conventional Teaching Method

In this study, there were two groups of classes: the first group was the experimental group and the second group was the control group. In both the experimental and control classes, the writer gave the students a pre-test (O¹ and O³). After that, in the experimental class, the teacher applied the treatment. The class was taught using the Khan Academy Kids application, while the control group studied as usual using the conventional method. Finally, after the experimental group received the treatment and the control group studied as usual, both groups were given a post-test (O² and O⁴).

III. Result And Discussion

Based on the results of the paired sample t-test conducted in the experimental group, there was a statistically significant difference in students' reading scores before and after the implementation of the Khan Academy Kids application. After the treatment, students showed clear improvements in their reading performance. This finding demonstrates that the use of the Khan Academy Kids can effectively enhance students' writing achievement, especially in constructing narrative texts.

Students exhibited significant improvement in various aspects of reading comprehension, particularly in identifying the main idea, making inferences, recognizing supporting details, completing cloze elide tasks, expanding vocabulary, and understanding text sequence. The use of the Khan Academy Kids application contributed to these gains by providing structured, developmentally appropriate, and engaging reading activities. The interactive features and systematic progression of the materials enabled students to focus on key comprehension skills in an integrated manner. This scaffolded learning approach allowed students to better grasp the overall meaning of texts and process information more effectively, thereby enhancing their overall reading proficiency.

According to Putri A.A. (2021), the use of the Khan Academy Kids application significantly enhances students' reading abilities by providing interactive and engaging materials, which motivate students to independently develop their basic literacy skills. Montemayor (2024) states that Khan Academy Kids is effective in helping students better understand reading texts through structured activities that stimulate critical thinking, especially in identifying the main idea and making inferences from the text.

The result of the study showed that using the Khan Academy Kids application to support reading instruction is proven to be an effective strategy. It facilitates comprehension skills development, promotes critical thinking, and encourages active student engagement. Supported by recent studies, this application provides learners with interactive and structured activities that help them identify main ideas, make inferences, and understand texts more deeply. These findings confirm that Khan Academy Kids is a powerful tool in improving students' reading abilities at the secondary education level.

The Independent Sample T-Test was conducted to determine whether there was a significant difference between the reading outcomes of students who participated in learning using Khan Academy (experimental group) and students who did not use it (control group).

Based on the results of the analysis, it was obtained that the average reading score of students in the experimental group was 71.47, while the control group had an average of 55.83. The average difference between the two groups reached 15.633 points.

From the statistical test conducted, the calculated t value was obtained as 6.682 with a degree of freedom (df) of 58. This value is compared to the t table at a significance level of 0.01 of 2.669. Because the calculated t value is much greater than the t table, there is a very significant difference between the two groups. In addition, the significance value (Sig. 2-tailed) produced is 0.000, which means it is much smaller than 0.05. This further strengthens that the difference between the experimental and control groups did not occur by chance.

The result can be seen on the table bellow:

Table 1
The result of Independent Sample t-test both Experiment and Control Class

Variable	Post Test				Mean Difference Exp & Ctrl	df	T-Table
	Mean Exp	Mean Ctrl	t-obt	Sig			
Reading Achievement	71.47	55.83	6.682	.000	15.633	58	2.669

IV. Conclusion And Suggestion

Conclusion

Based on the findings of this study, it can be concluded that the use of Khan Academy Kids is effective in improving the reading comprehension skills of eighth-grade students at Junior High School Muhammadiyah Pagaralam. The application provides engaging, interactive, and age-appropriate reading materials that support the development of key reading skills such as identifying main ideas, making inferences, understanding details, completing cloze tasks, improving vocabulary, and recognizing sequence.

The Paired Sample T-Test was used to determine whether there was a significant difference between the pre-test and post-test scores after the treatment was given to students. Based on the analysis results, the average pre-test score was 30, while the average post-test score was 70, indicating an increase of 40 points. In addition, the significance value (sig. 2-tailed) obtained from the Paired Sample T-Test was 0.000, which is smaller than the significance level of $\alpha = 0.05$. Thus, it can be concluded that there is a statistically significant difference between the pre-test and post-test scores.

The highest gains were observed in the aspects of main idea and inference, indicating that Khan Academy Kids is particularly helpful in promoting higher-order thinking and deeper understanding of texts.

The Independent Sample T-Test was conducted to determine whether there was a significant difference between the reading outcomes of students who participated in learning using Khan Academy (experimental group) and students who did not use it (control group). Based on the results of the analysis, it was obtained that the average reading score of students in the experimental group was 71.47, while the control group had an average of 55.83. The average difference between the two groups reached 15.633 points.

Therefore, it is recommended that English teachers, especially at the junior high school level, consider integrating Khan Academy Kids into their reading instruction as a supplementary learning tool. Its structured design and interactive features make it an effective medium to support students' reading development in an enjoyable and meaningful way.

Suggestion

Considering the limitations of this study, the researcher would like to provide some suggestions. Firstly, future studies could address the limitations by including a larger sample size and a more diverse population to increase the generalizability of the findings. In addition, incorporating a mixed methods approach could provide deeper insight into the effectiveness of the Khan Academy Kids application. The researcher hopes that English

teachers, especially those at Junior High School Muhammadiyah Pagaralam, can implement the Khan Academy Kids application as an alternative method to improve students' reading comprehension, especially in narrative texts. In addition, students are encouraged to motivate themselves to improve their reading comprehension skills and to enhance their understanding of language elements such as vocabulary and grammar. These efforts will not only improve their reading skills but also their listening, speaking, and writing skills. The researcher also hopes that this study will prove useful both theoretically and practically, and can serve as a reference for other researchers conducting similar studies aimed at improving reading comprehension using the Khan Academy Kids application in different contexts.

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