Enhancing Reading Comprehension Through the Know-Want-Learn (KWL) Strategy: An Insight to Private Junior High School

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Abstract

This study examined how the Know-Want-Learn (KWL) approach affected ninth-grade students' reading comprehension at SMP Swasta Cinta Rakyat 3 Pematangsiantar in the 2024–2025 academic year. A quantitative experimental design was utilized, involving two groups: an experimental group of 31 students who were instructed using the KWL strategy and a control group of 31 students who received traditional teaching methods. Data were collected through pre-tests and post-tests, which included multiple-choice questions centered on descriptive texts. The findings, processed with SPSS version 25, indicated notable enhancements in reading comprehension among students taught with the KWL strategy. The experimental class showed a mean score increase from 31.61 to 74.19, while the control class improved from 39.03 to 69.68. The alternative hypothesis was accepted after statistical analysis revealed that the significance value (Sig. 2-tailed) was 0.000, which is less than 0.05. These results show that by utilizing prior knowledge, establishing learning objectives, and promoting reflection, the KWL strategy successfully improves students' reading comprehension. Therefore, integrating the KWL strategy into classroom practice can provide a more engaging and structured learning experience, supporting the development of students' comprehension skills and overall language proficiency.

Keywords: Reading comprehension, KWL strategy, descriptive text, English learning, experimental study

1. Introduction

Language is a human ability that enables communication with others through signs, such as words and gestures. It serves as an arbitrary symbol that people use to collaborate, interact, and express their identity. Language is also a means of human communication. As social beings, humans need to engage with others to meet various life needs (Herman et al., 2023). Consequently, it is not feasible for humans to exist in isolation without interacting with others. With language, we can convey knowledge and ideas. The ability to read, write, and speak helps in obtaining information and participating in the learning process (Chairi et al., 2023; Agustini et al., 2024). Language is the primary communication tool and has always occurred in a social context (Trino et al., 2024). Therefore, language is a communication tool used by humans to interact with others, and language can also be expressed through gestures.

Communication is one of the ways humans interact to establish a mutual relationship. Herman et al. (2020) defined that communication involves the exchange of information, ideas, thoughts, opinions, and messages among individuals, groups, or organizations using a system of symbols, signs, or general behaviors (Juanda et al., 2025). As stated by Kurniadi & Mahaputra (2021), communication is an activity in which one person sends a message through specific media to another person, who then responds to the sender after receiving the message (Batubara et al., 2023). Hence, Butarbutar & Indrawan (2024) explained that communication is the process of transferring information, understanding, and objects to a place or another person. Therefore, based on the above understanding, communication is one way for humans to interact with each other through various means.

Good communication also requires people to understand the language well. In addition, people need to learn one foreign language, especially English, because English is currently an international language. For students, Learning English language is necessary because, by understanding English, students can communicate using foreign languages, expand their horizons, and develop English skills (Girsang et al., 2025). Before learning English, students need to know in advance what they will learn or master in English. According to Hafizah and

Hendriani (2022), mastering four key skills—listening, reading, writing, and speaking—is essential for achieving success in learning English (Resmi et al., 2023; Widodo et al., 2024). Among these, reading is a crucial skill for students. It serves as a vital tool for gathering information. Through reading, students can acquire a wealth of information and, more importantly, knowledge that aids their educational journey. In essence, reading skills are necessary for students to complete their academic pursuits. Dewi (2021) describes reading as a process that readers engage in to grasp the message the author intends to communicate through written language. Thus, it can be concluded that reading significantly aids students in language acquisition, understanding fundamental language skills, particularly in English, and enhances their knowledge overall (Judijanto et al., 2024).

Fitri et al. (2022) highlighted that reading is intrinsically linked to comprehension, as understanding the text's meaning is essential. Without comprehension, reading loses its purpose. Similarly, Herman et al. (2025a) emphasized that to grasp the content, meaning, ideas, and messages within a text, comprehension is necessary. Reading comprehension involves a thorough examination of the material to evaluate its context, purpose, and impact. According to Tarchi (2016), reading comprehension is the process of reading to develop understanding. Thus, it can be inferred that reading comprehension involves connecting the ideas in texts with students' cognitive processes.

Reading comprehension problems that students face include distinguishing between the main idea and supporting details, getting the main idea between paragraphs, understanding vocabulary, concluding the text, and connecting the topic with background knowledge. Based on the researcher's experience in teaching practice at SMP Swasta Cinta Rakyat 3 Pematangsiantar, when the researcher implemented an internship program (teaching practice) for class IX students, the researcher discovered several problems among the students. The problem is that students have difficulty finding the main idea in the text, understanding the meaning behind words and text, understanding vocabulary, and have poor reading skills that make it difficult to understand the content of the text. Additionally, students have difficulty concluding the text.

From the problems obtained by the researchers who implemented an internship program (teaching practice) at SMP Swasta Cinta Rakyat 3 Pematangsiantar, it was stated that the students' scores were low in reading comprehension. According to the 2013 curriculum, the minimum standard criteria (KKM) for ninth-grade English at SMP Swasta Cinta Rakyat 3 Pematangsiantar is 75.

Through observation conducted by the researchers, it was found that only nine Grade IX students scored between 75 and 100 in the 2024/2025 academic year. The majority of students scored 60. This shows that the level of reading proficiency among grade IX students is still relatively low. Low student scores indicate the need for effective teaching strategies to improve their reading comprehension skills. Researchers can use strategies to help students improve their reading comprehension. One effective approach to enhance students' reading comprehension is the Know-Want-Learned (KWL) strategy. This method is designed to assist learners in thoroughly understanding texts. Typically, educational activities emphasize particular strategies or skills, and the KWL strategy is a prominent example. It can be implemented in classroom settings, small groups, or with individual students through the creation of a 'KWL chart'. Primarily used for informational texts, the KWL strategy aims to achieve several objectives: it aids readers in accessing prior knowledge about the subject, establishes a reading purpose, allows them to track their comprehension, evaluate their understanding of the material, and extend their thoughts beyond the text. The KWL strategy, which involves identifying what is known, determining what one wants to learn, and recalling what has been learned, integrates multiple components of the approach. Theoretically, it can enhance students' reading comprehension by modeling active thinking during reading. Teachers play a role in helping students activate their prior knowledge using the KWL strategy. Although it is designed for group or class exercises, it can be adapted for individual use. According to Khaira (2015), KWL strategies enable students to monitor their comprehension. While students can tailor it for personal use, engaging in discussions is undoubtedly beneficial. KWL strategies offer students the chance to broaden their ideas beyond the text.

In contrast to the traditional approach often employed by teachers, which tends to be monotonous and involves students merely reading and reviewing the entire text, the KWL strategy offers improvements. This strategy breaks down the main points of the text into three sections: K, W, and L, allowing students to better understand the information and connect it with their own knowledge. Traditional methods also tend to demotivate students from actively asking questions, whereas the KWL strategy can boost their motivation. It helps students access their prior knowledge, determine what they want to learn, and if it feasible in that section, and decide on their next steps after reading. With this approach, students are more likely to develop an interest in learning English, particularly in enhancing their reading comprehension of descriptive texts.

Researchers are interested in using the Know-Want-Learned (KWL) strategy to improve student grades because it helps students better understand and remember information, thereby improving their understanding of new knowledge. There has been previous research related to strategies. The journal came from Harsono, et al. Universitas Sebelas Maret (2012) entitled "The Influence of Curiosity Learning Strategy (KWL) and Reading Interest on the Intensive Reading Ability of State Junior High School Students in Temanggung." The purpose of this study is to examine (1) the effect of the Know Want to Learn (KWL) reading strategy on students' intensive reading skills, (2) the impact of varying levels of reading interest on students' intensive reading skills, and (3) the interaction between reading strategies and reading interest on students' intensive reading skills. This study employed an experimental approach with a 2 x 2 factorial design. The population for this research consisted of all seventh-grade students from junior high schools in the Temanggung district during the 2011/2012 academic year. Data analysis was conducted using two-way analysis of variance. The findings of the study are as follows: (1) there are differences in the intensive reading skills of students taught using the KWL strategy compared to those taught with traditional methods, with students using the KWL strategy demonstrating superior skills; (2) students with a high interest in reading exhibit better intensive reading skills than those with low interest, as evidenced by an average score of 77.80 for high-interest students compared to 69.91 for low-interest students; and (3)

there is no interaction between reading strategies and reading interest in affecting students' intensive reading skills.

2. Literature Review

Reading comprehension is a fundamental skill in language learning that enables students to understand, interpret, and evaluate written texts. According to Tarchi (2016), reading comprehension involves complex cognitive processes in which readers integrate prior knowledge with textual information to construct meaning. In English as a Foreign Language (EFL) contexts, students often face challenges such as limited vocabulary, difficulty identifying main ideas, and a lack of reading strategies. In recent years, researchers have emphasized the importance of explicit reading strategies to enhance students' comprehension abilities. For example, Agustini et al. (2024) reported that interactive learning media can increase students' engagement and improve their comprehension performance. Similarly, Herman et al. (2025b) highlighted that instructional strategies that actively involve students in the learning process can significantly improve reading comprehension skills.

One strategy that has gained considerable attention is the Know–Want–Learn (KWL) strategy. The KWL strategy encourages students to activate prior knowledge, formulate questions, and reflect on newly acquired information. According to Khaira (2015), the KWL strategy helps students organize their thinking during the reading process and promotes active engagement with texts. Recent studies have also confirmed the effectiveness of strategy-based instruction in reading. Fitri et al. (2022) found that structured reading strategies help students better identify main ideas and improve comprehension outcomes. Furthermore, Apriliyanti and Pangaribuan (2018) demonstrated that the use of contextual reading strategies significantly improved students' understanding of descriptive texts.

Despite the growing body of research on reading strategies, few studies have specifically examined the effectiveness of the KWL strategy in private junior high school contexts in Indonesia, particularly among ninth-grade students. Therefore, this study aimed to investigate how the implementation of the KWL strategy influenced students' reading comprehension at SMP Swasta Cinta Rakyat 3 Pematangsiantar.

3. Research Method

1. Design of the Research

Research methods are important in research. Each researcher chooses a method that is in accordance with the goals to be achieved in the research. Sugiyono (2015) describes the educational research method as a scientific approach aimed at acquiring valid data to discover, develop, and verify specific knowledge (Panjaitan et al., 2026). This process ultimately aids in understanding, addressing, and predicting issues. From the statement, the method must be based on scientific methods and use valid data for the results to be reliable. In addition, research methods are also one of a series of other research activities, such that research methods cannot be eliminated in research activities. There are several methods in this study, one of which is the quantitative research method and the method used in this study.

Hulu et al (2023) describe the quantitative research method as one grounded in the philosophy of positivism, which is employed to study a specific population with data collection conducted randomly (Panjaitan et al., 2025). They also note that data collection in quantitative research involves the use of research instruments, and the data analysis is statistical, aimed at testing pre-established hypotheses. This suggests that the quantitative research method focuses on gathering data that is numerically oriented and selected at random.

This study employed a quasi-experimental design featuring an unequal control group. As described by Cahyani et al. (2025), a quasi-experimental research design includes a control group but lacks the full capability to manage external variables that may influence the experiment. In line with this description, the research utilized a non-equivalent control group design to compare two groups: the control class and the experimental class. The experimental class received specific treatments tailored to the research requirements, whereas the control class did not receive any treatment and followed conventional methods. This was done to assess the effectiveness of the treatment being researched.

So, in this research, two classes are use, namely class B students and class C class IX of SMP Private Cinta Rakyat 3 Pematangsiantar. Class B is a control class or class that is not given special treatment. while class C is an experimental class that is given treatment. Both classes were given the same pretest and posttest to determine the effectiveness of the know-want-learn strategy as a form of treatment that would be given in the experimental class.

The participants were divided into two distinct groups: a control group and an experimental group.

Table 1. Design of the Research

Group	Pre-test	Treatment	Post-test
Experimental	X1	Y	X2
Control	X1	-	X2

Where:

X1 : Pre-test for experimental and control classes

Y : Maintenance by using a KWL strategy

X2 : Post-test for experimental control class

2. Location of the Research

This research was conducted on grade IX students of Cinta Rakyat 3 Pematangsiantar Private Junior High School, located on Jln. Kain Batik Pematangsiantar. This research was conducted in the 2024/2025 academic year.

3. Population and Sample

*3.1 Population*The subject of research, often also referred to as the population, is a source of data that includes the nature or characteristics of a group of individuals, problems, or objects. Population refers to the subjects that can be in the form of humans, animals, plants, or other natural objects that have certain organoleptic, physical and chemical characteristics (Ary et al., 2014). Based on this statement, the subject in this study is a grade IX student of Cinta Rakyat 3 Pematangsiantar Private Junior High School. The researchers chose the population of the four ninth grades because based on the researchers' experience when conducting teaching practice in this school, the researcher found that students had difficulty understanding the text when they read it. The research population is all ninth-grade students of Private Junior High School Rakyat Cinta 3 Pematangsiantar for the 2024/2025 school year, consisting of four classes. The number of students in each class was the same. The total number of students in grade IX was 124.

Table 2. Population of the Research

No	Class	Student
1.	IX A	31
2.	IX B	31
3.	IX C	31
4.	IX D	31
	Total	**124**

3.2 Sample

The object of research, commonly known as a sample, is the one used by the author in writing. The object of research is the nature, state of an object or person, and the things that are the object of research. According to Sinaga et al. (2025), samples are part of the number and characteristics that a population has. From this statement, the sample is part of the population that has special characteristics and is the target of research. This research used purposive sampling to obtain samples because the two classes comprised the same students. The researchers chose classes IX B and IX C as the samples for this study. As for the sample of 62 students, there were 31 students in class IX C as an experimental class using the Know-Want-Learned (KWL) strategy, and 31 students in class IX B as a control group class that did not use the Know-Want-Learned (KWL) strategy.

Table 3. Sample of the Research

Group	Class	Student
Experimental	IX C	31
Control	IX B	31
	Total	62

4. Technique of Data Collection

Data were gathered using a test with multiple-choice questions. This test checked how well the students understood what they had read. It included a pre-test and a post-test. The researchers used the reading test to collect data. The reading comprehension test consisted of 20 multiple-choice questions based on descriptive texts, which are part of the ninth-grade English curriculum. Each question provided four answer options (A, B, C, and D), with only one correct answer. The test aimed to measure several aspects of reading comprehension, including:

1) Identifying the main idea of the text
2) Understanding supporting details
3) Interpreting vocabulary in context
4) Identifying specific information
5) Drawing conclusions from the text

Each correct answer was awarded five points, resulting in a maximum score of 100. The same test format was administered for both the pre-test and post-test to measure students' improvement after the implementation of the KWL strategy.

5. Technique of Data Analysis

Once all necessary data has been collected, data analysis is the next step. Data analysis is the process of managing data affairs until the results of data acquisition are found. In data analysis, research must use techniques so that the data obtained can be managed and analyzed properly and have validity. After being collected, the data is grouped, data estimation is carried out, and calculations are performed to

answer the formulation of the problem and test the hypothesis.

In this case, the researcher uses descriptive statistics, which are statistics used to analyze data by describing the data that has been collected without any intention to make conclusions that apply to the public. If the data has been collected in the form of tables, graphs, or histograms, then the data can be processed descriptively. This study used an application to conduct statistical analysis, namely, the Social Science Statistics Package (SPSS) version 25.0, for data processing.. The use of the application is described as follows:

1. Descriptive Statistics

Descriptive statistics were used to summarize students' reading comprehension scores in both the experimental and control groups. The analysis included the calculation of the mean, minimum score, maximum score, and standard deviation to describe students' performance in the pre-test and post-test. These statistics helped to provide an overview of the improvement in reading comprehension after the implementation of the KWL strategy.

2. Data Centralization Actions

After presenting the data in the form of descriptive statistics, a data centering measure is determined. There are three types of data centralization measures: mean, median, and mode. The following provides an explanation of these three types:

a. This average is calculated by adding the data from all individuals in the group and then dividing the total by the number of individuals. This average is calculated by adding together the data from all individuals in the group and then dividing the total by the number of individuals.

b. The median (Me) is the value located in the center of the data that has been sorted from the smallest value to the largest one. If data is odd, then the median (Me) is the data value located in the middle after being sorted. If the data is even, then the median (Me) is the average of the values located in the middle after being sorted.

c. Mode (Mo) is the data that appears most often or has the most frequency.

3. Prerequisite Tests

Before hypothesis testing, a prerequisite test is conducted as a form of hypothesis proof, and it includes the following steps:

a. Normality Test

The normality test was used to determine if the sample was drawn from a normally distributed population. In this study, to test the level of normality, the sample was tested with one Kolmogorov Smirnov sample using a significance level greater than 0.05. The testing steps are as follows:

1) Enter the data into the SPSS data editor worksheet.

2) Then click the Analyze-Nonparametric Test 1-sample KS menu.

3) After that, then enter all the variables into the Test Variables List.

4) In the Test variables list, click normal.

5) Then click Ok to display the analysis output.

b. Homogeneity Test

The purpose of the homogeneity test was to determine whether the two groups shared the same variant. When both groups possessed the same variant, they were considered homogeneous. The procedure for conducting the homogeneity test is as follows:

1) Create a hypothesis

2) Calculate F*calculate* with formula:

$$Fmax = \frac{\text{highest variation}}{\text{lowest variation}}$$

4. Hypothesis Testing

In analyzing quantitative data, statistical analysis is used from the results of the average score of the test which has a linear form: in this case, the researcher uses a single linear regression analysis formula. A single linear regression analysis aims to analyze the magnitude of the influence of independent variables on bound variables. There are two ways to test a hypothesis using the SPSS 25.0 application for Windows, namely using the Paired Sample Test formula for parametric (normal) data and the Wilcoxon Test for non-parametric (abnormal) data.

4. Data Analysis and Results

A. Data Analysis

In this quantitative study, data from both the experimental and control groups were gathered before and after the tests, necessitating a thorough analysis. To assess the impact of the KWL strategy on students' reading comprehension, the data were analyzed using SPSS version 26, a widely used statistical software for research data processing.

1. Descriptive Analysis

Descriptive statistics are essential for summarizing and interpreting research data. This study examined the reading comprehension skills of ninth-grade students at SMP Swasta Cinta Rakyat 3 Pematangsiantar, with a focus on the impact of the Know-Want-Learn (KWL) strategy as a teaching approach. Data were gathered from two groups: the experimental class, comprising 31 students who were taught using the KWL strategy to boost their reading comprehension, and the control class, also consisting of 31 students, who were instructed through traditional methods. By comparing the pre-test and post-test scores, we assessed the effectiveness of the KWL strategy against conventional teaching methods in enhancing students' reading comprehension abilities.

Table 5. Descriptive Statistics of Students' Narrative Text Reading Ability

Descriptive Statistics					
	N	Minimum	Maximum	Mean	Std. Deviation
PreTest_Experimental	31	20	50	31.61	7.788
PostTest_Experimental	31	50	95	74.19	12.322
PreTest_Control	31	20	65	39.03	12.611
PostTest_Control	31	50	90	69.68	11.757
Valid N (listwise)	31				

a) Each class comprised 31 students denoted as N.

b) Experimental Class: The scores from the pre-test had a lowest value of 20 and a highest value of 50. The average score was 31.61, with a standard deviation of 7.788. For the post-test, scores varied from a minimum of 50 to a maximum of 95, with an average score of 74.19 and a standard deviation of 12.322.

c) Control Class: The pre-test scores ranged from a low of 20 to a high of 65, with an average score of 39.03 and a standard deviation of 12.611. In the post-test, scores varied between 50 and 90, with a mean score of 69.68 and a standard deviation of 11.757.

2. Normality Test

In parametric statistical analysis, normal data were essential for conducting paired-sample and independent-sample t-tests. The normality test uses the significance value as a measure. Both the Kolmogorov-Smirnov and Shapiro-Wilk tests confirm data normality at a significance level of 0.05. The choice between these tests depends on the sample size. For samples fewer than 50, the Shapiro-Wilk test is more suitable, whereas for samples exceeding 50, the Kolmogorov-Smirnov test is preferred for more accurate results.

Table 6. Tests of Normality for Students' Learning Outcomes

Tests of Normality								
			Kolmogorov-Smirnov[a]			**Shapiro-Wilk**		
		Class	**Statistic**	**df**	**Sig.**	**Statistic**	**df**	**Sig.**
Students Learning Outcomes		Pre-test Experimental	.130	31	.192	.943	31	.097
		Post-test Experimental	.139	31	.132	.952	31	.174
		Pre-test Control	.142	31	.116	.955	31	.209
		Post-test Control	.138	31	.135	.941	31	.088

a. Lilliefors Significance Correction

The Shapiro-Wilk test results shown in the table reveal that all significance (Sig.) values exceed 0.05. Specifically, the pre-test for the experimental group has a significance value of 0.097, the post-test for the experimental group is 0.174, the pre-test for the control group is 0.209, and the post-test for the control group is 0.088. As each of these values is above 0.05, it suggests that the data for both the experimental and control groups, in both pre-test and post-test scenarios, follow a normal distribution. Consequently, the normality assumption in this study is satisfied.

3. Homogeneity Test

The homogeneity test assesses whether data from multiple groups are uniform (homogeneous) or varied (heterogeneous). For the Paired Sample t-test, homogeneity is a crucial assumption. If the significance value (Sig.) based on the mean exceeds 0.05, the data are deemed homogeneous; if it falls below 0.05, they are considered heterogeneous. In contrast, the Mann-Whitney test, being a nonparametric test, does not require assumptions of normal distribution or homogeneity of variance.

Table 7. Test of Homogeneity of Variance for Students' Learning Outcomes

Test of Homogeneity of Variance						
			Levene Statistic	df1	df2	Sig.
Students Learning Outcomes		Based on Mean	2.557	3	120	.058
		Based on Median	2.206	3	120	.091
		Based on Median and with adjusted df	2.206	3	108.294	.092
		Based on trimmed mean	2.537	3	120	.060

Since the significance value (Sig.) based on the mean is 0.058, which is greater than 0.05, we can conclude from the homogeneity test output in the table that the variances of the data are homogeneous. This indicates that the changes in the post-test data of the experimental class and the post-test data of the control class are identical or homogeneous.

4. Paired Samples Test

The independent samples t-test is a statistical technique utilized to assess if there is a notable difference between the averages of two separate groups. In this study, the independent samples t-test was applied to evaluate the post-test scores of the experimental group, which was instructed using the KWL strategy, against those of the control group, which received traditional teaching methods.

Table 8. Independent Samples Test for Students' Learning Outcomes

Independent Samples Test										
		Levene's Test for Equality of Variances		t-test for Equality of Means						
									95% Confidence Interval of the Difference	
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	Lower	Upper
Students Learning Outcomes	Equal variances assumed	6.372	.014	-16.265	60	.000	-42.581	2.618	-47.817	-37.344
	Equal variances not assumed			-16.265	50.668	.000	-42.581	2.618	-47.837	-37.324

With a Sig. (2-tailed) value of 0.000, the null hypothesis (Ho) is rejected, and the alternative hypothesis (Ha) is accepted, demonstrating that the KWL strategy effectively improves reading comprehension skills among ninth-grade students at SMP Swasta Cinta Rakyat 3 Pematangsiantar.

These findings highlight the potential of innovative teaching strategies, such as the KWL strategy, in improving educational outcomes in reading instruction. The results suggest that engaging students actively in the reading process through the KWL strategy can significantly improve their comprehension skills compared to traditional teaching methods.

B. Results

According to the data analysis, the KWL strategy significantly improved the reading comprehension skills of ninth-grade students at SMP Swasta Cinta Rakyat 3 Pematangsiantar. The independent samples t-test results showed a Sig. (2-tailed) value of 0.000, which is less than the significance level of 0.05. This result shows that the KWL strategy intervention effectively improved students' reading comprehension, supporting the alternative hypothesis (Ha).

The experimental class initially obtained pre-test scores ranging from 20 to 50, with an average score of 31.61 (SD = 7.788). After the intervention, the post-test scores increased markedly, ranging from 50 to 95, with an average score of 74.19 (SD = 12.322). In contrast, the control class began with pre-test scores between 20 and 65, averaging 39.03 (SD = 12.611). After being taught using conventional methods, their post-test scores ranged from 50 to 90, averaging 69.68 (SD = 11.757). Although both groups showed improvement, the experimental group's gain was notably higher than that of the control group, confirming the effectiveness of the KWL strategy in enhancing reading comprehension.

Figure 1. A comparison of the experimental classes' pre-test and post-test mean scores

The experimental class demonstrated significant improvement in reading comprehension after the implementation of the KWL strategy. The mean score increased from 31.61 in the pre-test to 74.19 in the post-test, representing an average gain of 42.58 points. This substantial improvement indicates that the KWL strategy effectively facilitated students' engagement with the reading material, helping them activate prior knowledge, set learning goals, and reflect on what they had learned. The results suggest that this strategy provided a meaningful learning experience that enhanced both comprehension and retention of the text.

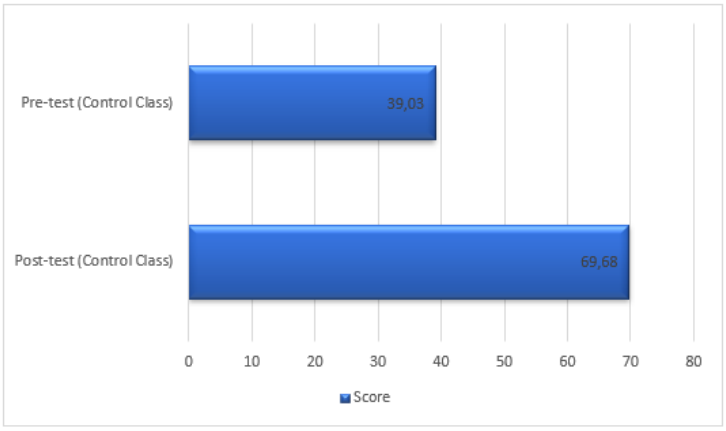

Figure 2. A comparison of the control classes' pre-test and post-test mean scores

The control class, which was taught using conventional methods, also showed improvement in reading comprehension; however, to a lesser extent. Their mean score increased from 39.03 in the pre-test to 69.68 in the post-test, reflecting an average gain of 30.65 points. Although conventional teaching methods contributed to students' learning progress, the increase was smaller than that of the experimental class. This outcome suggests that traditional instruction alone may be less effective in promoting rapid and deep understanding of reading materials compared to the KWL strategy.

Although the experimental class began with a lower average score on the pre-test, it surpassed the control class in the post-test results. This shift underscores the effectiveness of the KWL strategy not only in enhancing but also in accelerating students' reading comprehension abilities. Overall, the results clearly demonstrate that the KWL strategy had a significant and beneficial effect on students' reading comprehension compared to traditional teaching methods.

5. Discussion

This study examined the effect of the Know–Want–Learn (KWL) strategy on students' reading comprehension at SMP Swasta Cinta Rakyat 3 Pematangsiantar. The statistical analysis revealed a significant improvement in students' reading comprehension, indicated by the Sig. (2-tailed) value of 0.000, which is lower than the significance level of 0.05. This result confirms that the implementation of the KWL strategy had a statistically significant effect on students' reading comprehension performance. The substantial improvement observed in the experimental group indicates that the KWL strategy effectively supports students in organizing their thoughts during reading activities. By encouraging students to identify what they already know (K), determine what they want to learn (W), and reflect on what they have learned (L), the strategy promotes active engagement with the text and enhances comprehension processes.

In addition to the quantitative findings, classroom observations during the implementation of the KWL strategy revealed that students became more actively involved in reading activities. Students showed greater enthusiasm when discussing their prior knowledge and formulating questions related to reading texts. Informal feedback from the students also indicated that the KWL chart helped them understand the reading material more clearly and organize their ideas before and after reading. Similarly, feedback from the English teacher suggested that the KWL strategy helped structure classroom discussions and encouraged students to participate more actively in reading lessons. The teacher observed that students were more motivated to ask questions and share their understanding of the text when the KWL strategy was implemented. These qualitative insights support the quantitative results of this study and provide additional evidence for the effectiveness of the KWL strategy in improving reading comprehension.

These findings highlight the importance of integrating interactive and student-centered learning strategies into English language instruction. The KWL strategy not only improves students' comprehension performance but also encourages them to become active readers who engage critically with texts. By activating prior knowledge and encouraging reflection, the strategy supports deeper cognitive processing during reading activities. From an educational perspective, the results suggest that teachers should consider incorporating structured reading strategies, such as, KWL into their classroom practices. Such strategies can help students develop metacognitive awareness, thereby enabling them to monitor their understanding while reading. This is particularly important in EFL contexts, where students often struggle with vocabulary, text structure, and comprehension skills. Furthermore, the findings imply that reading instruction should move beyond traditional teacher-centered approaches and adopt more interactive and reflective learning models that encourage student participation and critical thinking.

The results of this study are consistent with previous research on the effectiveness of the KWL strategy in reading instruction. For example, Harsono et al. (2012) found that students taught using the KWL strategy demonstrated significantly better reading performance than those taught using conventional methods. Similarly, recent studies on strategy-based reading instruction have emphasized that structured learning strategies can significantly enhance students' comprehension abilities by promoting active engagement with texts. However, this study contributes additional evidence by examining the implementation of the KWL strategy in the context of private junior high school students in Indonesia, particularly among ninth-grade learners who initially demonstrated relatively low reading comprehension scores.

The findings of this study have several pedagogical implications for English language teaching. First, teachers can use the KWL strategy as a practical instructional tool to systematically guide students through the reading process. Second, this strategy can help students develop critical reading skills by encouraging them to ask questions, predict information, and reflect on their understanding. Finally, the KWL strategy can foster a more collaborative learning environment, as students often share their ideas and insights during the discussion phase of the strategy.

Although this study demonstrated the effectiveness of the KWL strategy in improving students' reading comprehension, several limitations should be acknowledged. First, it involved a relatively small sample of students from a single school, which may limit the generalizability of the findings. Second, the qualitative insights were based on classroom observations and informal feedback rather than structured interviews. Future studies should incorporate more comprehensive qualitative methods, such as interviews or focus group discussions, to obtain deeper insights into students' learning experiences.

6. Conclusion

This study aimed to assess the effect of the Know-Want-Learn (KWL) approach on reading comprehension among students at SMP Swasta Cinta Rakyat 3 Pematangsiantar. A Sig. (2-tailed) value of 0.000, which is below the 0.05 significance level, demonstrated that the KWL strategy significantly improved reading comprehension. This result shows that the intervention improved students' reading comprehension, supporting the alternative hypothesis (Ha). Students in the experimental class demonstrated significant improvement following the implementation of the KWL strategy, with their mean score rising from 31.61 in the pre-test to 74.19 in the post-test. In contrast, although the mean score of the control group increased from 39.03 to 69.68, its improvement was not as significant as that of the experimental group. These findings show that students taught using the KWL strategy made greater progress than those taught using traditional methods.

Overall, this study concludes that the KWL strategy is an effective instructional approach for enhancing students' reading comprehension. It fosters active learning by encouraging students to connect with prior knowledge, set learning goals, and reflect on what they have learned. Therefore, integrating the KWL strategy into classroom practice can provide a more structured, reflective, and engaging learning experience that supports the development of students' comprehension skills.

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Authors' contributions

H.H., I.S., B.P.S.D., and R.P. were responsible for study design and revising. J.S. and E.S. were responsible for data collection. H.H., R.P., and M.N. drafted the manuscript. H.H., J.S., R.P. and E.F. revised the manuscript and H.H., I.S., and M.N. proofread it. All authors read and approved the final manuscript.

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