The Influence of Using Crossword Puzzle to Improve Students' Vocabulary Mastery of Class VII SMP Negeri 4 Pujananting of Barru

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Abstrak
The objective of this study is to find out the influence of crossword puzzle method to improve the students' vocabulary mastery. This research is quasi-experimental as the design that used two group pretest and posttest. It means that there were an experimental class and a controlled class which were given pretest and posttest. There were 40 students of class VII of SMPN 4 Pujananting of Barru as the sample in this study. The instrument of this research was a written test, to score the students' vocabulary mastery on pretest and posttest. The result of this research showed that there was a positive effect of the result of students' vocabulary mastery after using crossword puzzle method. Based on the result of the calculation process the researcher gained that in pretest had a mean of 59,05 and the posttest had a mean of 82,20 of experimental class. Based on the finding of this study, it can be concluded that using of crossword puzzle method in improving students' vocabulary mastery is quite success. And after conducting the research and calculating the data, it could be stated that it was effective of using crossword puzzle method on students' of improving vocabulary mastery. Students' vocabulary mastery got a higher score.

***Kata Kunci**: Crossword Puzzle Method, Students' vocabulary mastery, Vocabulary*

INTRODUCTION

The influenece of crossword puzzle is one of method to improve students' Vocabulary mastery, because vocabulary is fundamental need for supporting learners to master English. Based on observations done on 20th Juli 2021 at SMP Negeri 4 Pujananting of Barru. The students' vocabulary mastery had low vocabulary and low motivation in learning English, The teacher still uses the conventional method in delivering the materials and this is considered make them feel bored and had not interested to learn English. And recommend the students' to do exercises in the written form or ask them to do exercise provided a text book (Finandiati, et al., 2022). The teacher had not variation or other teaching media used to teach English.

Vocabulary is fundamental need for supporting learners to master English.The students must continuously learn words as they learn structure and as they practice the sound system. The students are demanded to have good vocabulary knowledge because the vocabulary is the core of communication, learning, and thinking. if language structure makes up the skeleton of language, than vocabulary that provides the vital organs and the flesh and divides vocabulary into two types, namely: (1) Active Vocabulary refers to vocabulary that has been learned by the students. They are expected to be able to use it. (2) Passive Vocabulary refers to words which students will recognized when they meet them, but the probably are not able to produce it.

Vocabulary is a fundamental requirement that influence students' achievement in studying English. Without vocabulary there is no communicate, read, and write can be conveyed. So that, it is important to know what the vocabulary is. According to Hornby (1994) defines vocabulary as follows: (1) Total members or words, which make up a language. (2) Range of words known, or used by, a person in a trade, profession, etc. (3) Book containing a list of words, list of words used in a book, used with definition and translation. And Good (1959) defines vocabulary as the words having meaning when heard or seen even though not produced by the individual himself to communicate with other. The words are considered essential for minimal use of a language (Nurjannah, et al., 2022).

Vocabulary is a collection of words that were part of a particular language and were used to construct sentence.Vocabulary is very important part for us in learning English. It is because English learning ability can be seen from vocabulary mastery. Vocabulary mastery is a situation where people have a great skill and knowledge of words especially foreign words. Spelling, grammar and meaning. (Sari, 2016)

Though we believe they have difficulty to master vocabulary. From the initial observations and the results of our interviews before the execution of this action research there are coveral common reasons such us: The students' accept the materials but then easy to forget its. Moreover, the students' low interest in learning English. And had lack of attention to the teacher explanation. From the constraints faced by the students above, then through experimental research, researcher will try to use the crossword puzzle method to know whether there is a significant influence of using Crossword Puzzle to improve Students' Vocabulary mastery for

Class VII at SMP Negeri 4 Pujananting of Barru. Erlinda (2020) had been used quasi-experimental as the method of collecting data. The result of her research indicated that there is a significant difference between the students' achievement who were taught by using crossword puzzle game and those who were taught by using conventional learning method in improving vocabulary of descriptive text. Crossword puzzle is a popular puzzle games which in every case, the puzzle-solvers goal is to solve a particular mentally challenging problem or accomplish a particular mentally challenging task (Moursund,2007).

This method will make it easier for students' to learn vocabulary. Although it is not perfect , it is expected that above method can improve students' vocabulary mastery. So that students' have motivation to learn vocabulary. the students' are trained to involve in the problem solving. It is interesting and challenging for the students'. It can avoid students' bored and can make the students' trained to be more critical thinking.

According to Encyclopedia (2013) stated that, crossword puzzle is a word game in which words corresponding to numbered clues are put into a grid of horizontal and vertical squares to form intersecting words. The puzzle is solved when a player supplies the entire words correctly. And Oxford Learner's dictionary (2008) stated that, crossword is puzzle in which words have to be guessed from clues and written in spaces in a grid. A crossword is a word puzzle that normally takes the form of a square or rectangular grid of white and shaded   squares (http://www.wikipedia.org). Puzzle is game that you have to think about carefully in order to answer it or do it (Oxford Learner dictionary; 2008). Puzzle is game or toy to exercise the mind (Longman Handy Learners' Dictionary of American English: 2000). Crossword puzzle has been proposed as one of alternatives game in teaching-learning. According to Dhand (2008) defines a crossword puzzle as a puzzle with sets of squares to be filled in with words/numbers, one letter/ number to each square. Synonyms or definitions of words are given with number corresponding to numbers in the squares. Letters/words are fitted into a pattern of numbered squares in answer to clues. According to Binta (2010) defines There are two types of crossword puzzle they are: Crossword Puzzle using picture as the clues. (2) Crossword Puzzle without picture as the clues.

As perspective teachers, the researcher conducted quasi-experimental research to improving students' vocabulary mastery using crossword puzzle method. Therefore the researcher made experiment research with entitled The Influence of using Crossword Puzzle to Improve Students' Vocabulary Mastery for Class VII at SMP Negeri 4 Pujananting of Barru. The research question of this study is there significant Influence of using Crossword Puzzle to Improve students' Vocabulary Mastery for Class VII at SMP Negeri 4 Pujananting of Barru?

METHOD
Types of Research
This types of research was quasi- experimental research. It aimed to know the influence of students' vocabulary mastery to achieve students' learning outcomes. It was conducted in the classroom in which the author was taught the effect of

using crossword puzzle method in teaching vocabulary at class VII of SMPN 4 Pujananting of Barru.

The Procedure of Collecting Data
The procedure of collecting data would be presented in chronological steps as follow:
1. Pre-test. The pre-test was used to know how far the students' vocabulary mastery before using crossword puzzle method. The test referred to in this study is a test to find out or measure the learning outcomes of class VII of SMPN 4 Pujananting using crossword puzzle method. The test used was in the form of written test.
2. Treatment. In this research, the treatment applied using the crossword puzzle method in teaching vocabulary. The treatment was given to students.

Table 3.2 Criteria of students' ability

NO	Level of Mastery	Criterion
1	86%-100%	Excellent
2	76%-85%	Good
3	60%-75%	Fair
4	55%-59%	Poor
5	0%-54%	Very Poor

eight times, using methods or crossword puzzle methods.
3. Post-test. Post-test was used to know how far the students' vocabulary mastery before using crossword puzzle method. The test was given in the post-test was the same as the test at the pre-test, ie. The test used was in the form of written test.

Data Analysis Procedure
Some formulas in this research used data analysis as follow:
NP = 0 0 100x Sm R
Where:
NP = The percentage of scoring
R = The students' vocabulary mastery
Sm = The maximum/ total score for the writing test.
Then, after getting the score of the test, the writer could be concluded the students' ability by categorizing them into some groups to expressed various criteria of the students' achievement. Each level is represented A,B,C,D, and E, each of the ranges about a certain class. The criteria of students' ability are based on the following percentage table:
1. Calculating the mean score of students' by using the following formula :

$$X = \frac{\mathrm{E}x}{n} x100$$

Where

  X : Mean score Ex: Total Score

  n = The number of students

Finding out t-test to know the significant difference between pre-test and post-test from the experimental class and control class by using SPSS.

RESULTS AND DISCUSSION

The findings of this research is to know the result of effective crossword puzzle method on students' vocabulary mastery, which was gained from the test conducted in pre-test and post-test. To make the result of the test clearer the researcher provided the comparison to show the differences between students' scores in the pre test table and post-test.

The students' achievement before using crossword puzzle to improving students' vocabulary mastery at the class VII of SMPN 4 Pujananting of Barru.

The students' achievement before using Crossword Puzzle method in table 4.1

Table 4.1: The frequency of Pre-test in experimental class and controlled class.

Classifica tions	Interval score	Experiment al class		Control class	
		F	%	F	%
Excellent	86-100	4	10,8	0	0
Good	76-85	9	24,3	4	10,8
Fair	60-75	10	27	7	18,9
Poor	55-59	0	0	8	21,6
Very Poor	0-54	17	45.9	21	56,8
Total		40	100	40	100

Table 4.1 showed that no student had an excellent category in the pre-test control class. There 4 students (10, 8%) who got excellent category 86- 100 in pre-test experimental class. In addition, there were 9 students (24, 3%) in the experimental class and there were 4 students (10, 8%) in the control class. who got good category and score interval from 76-85. Then, there were 10 students (27, 0%) in the experimental class and there were 7 students (18,9%) in the control class who got fair category and score interval from 60-75. Then, no student had a poor category in the experimental class but there were 8 students (21,6%) in the control class. who got poor category and score interval from 55-59. And the last, there were 17 students (45,9%) in the experimental class and there were 21 students (56,8%) in the control class who got very poor category and score interval from 0-54.

Table 4.2 Statistics of Pre-test in experimental Class and Controlled class

Statistics	Experimental class	Controlled class
N	40	40
Mean	59,05	56,58
Std. deviation	22,676	9,443

Table 4.2 showed that the data of the experimental class consisted of 40 students. The total of all data was divided with the number of data determined as the mean score from the experimental class was 59,05. Std. deviation score was 22,676. Table 4.2 also showed that the data of the controlled class was 40 students. The total of all data was divided with the number of data determined as the mean score from the controlled class was 56,58. Std. deviation score was 9,443.

2.   The student's achievement after using crossword puzzle method to improve students' vocabulary mastery at the class VII of SMPN 4 Pujananting of Barru.

Students' achievement can be known after the post-test in the experimental class and control class.

Table 4.3 : The frequency of Post-test in experimental class and controlled class.

Classifications	Interval score	Experimental Class		Control Class	
		F	%	F	%
Excellent	86-100	15	40,5	0	0
Good	76-85	15	40,5	8	21,6
Fair	60-75	10	27,0	26	70,2
Poor	55-59	0	0	4	10,8
Very Poor	0-54	0	0	2	5,4
Total		40	100	40	100

Table 4.3 showed that there were 15 students (40,5%) who got excellent category and score interval 86-100 in the post-test experimental class. Then no students had a excellent category in the control class. In addition, there were 15 students (40,5%) in the experimental class and there were 8 students (21,6%) in the control class. who got good category and score interval from 76-85. Then, there were 10 students (27,0%) in the experimental class and there were 26 students (70,2%) in the control class who got fair category and score interval from 60-75. Then, no student had a poor category in the experimental class but there were 4 students (10,8%) in the control class who got poor category and score interval from 55-59. And the last, no student had a very poor category in the experimental class and there were 2 students (5,4%) in the control class who got very poor category and score interval from 0-54.

Table 4.4 : Statistics of Post-test in experimental Class and Controlled class

Statistics	Experimental class	Controlled class
N	40	40
Mean	82,20	64,90
Std. deviation	9.971	9.761

Table 4.4 showed that the class VII of SMPN 4 Pujananting as the experimental class consisted of 40 students. The total of all data was divided with the number of data determined as the mean score from the experimental class was 82.20

Std. deviation score was 9.971. Table 4.4 also showed that the class of SMP Negeri 4 Pujananting as the controlled class consisted of 40 students. The total of all data was divided with the number of data determined as the mean score from the controlled class was 64,90. Std. deviation score was 9.761.

3.   The effectiveness of using crossword puzzle method to improve students' vocabulary mastery at the class VII of SMPN 4 Pujananting of Barru.

After doing the post-test, there was an improvement result to know the effectiveness of crossword puzzle. The students' improvement results can be seen in table 4.5.

Table 4.5: Students' improvement result of post-test

	Respondent		Meanscore		Std, deviation		Improvement
Eksperiment	Pre test	Posttest	59,05	82,20	22,676	9.791	23,15
Control	Pre test	Posttest	56,58	64,90	9.443	9.761	8.32

Table 4.5 showed that the pre-test mean of the experimental class is 59.05 and the mean post- test is 82,20 than the standard deviation from the pretest is 22,676 and the standard deviation post- test is 9,791 with the sample there are 40 students and the improvement from pre-test to post-test is 23,15.

Table 4.6:Paired Samples Test

		Paired Differences			t	df	Sig. (2-tailed)
	Std. Error Mean	95% Confidence Interval of the Difference					
		Lower	Upper				
Pre test post test	2.217	-27.634	-18.666		-10.444	39	.000

From the process of data analysis used SPSS 21 for windows above can be seen that the result showed the significant score is 0.000 if compared with a = 0.05, it means that there is a significant change in students' vocabulary mastery after receiving the treatment using "crossword puzzle method" therefore the researcher interpreted that the use of "crossword puzzle" effective for improving students' vocabulary mastery

CONCLUSION AND RECOMMENDATION

The result of this study shows that there was a positive effect of the result of students' vocabulary mastery after using the crossword puzzle method. Based on the result of the calculation process the researcher gained that the pretest has a mean of 59,05 and in the posttest has a mean of 82.20 of experimental class. Based on the finding of this study it can be concluded that using crossword puzzle method to improve students' vocabulary mastery is quite a success. And after conducting the research and calculating the data, the conclusion could be stated that it was effective of using crossword puzzle method on students' vocabulary mastery.

Based on the research above, the researcher concludes that the research findings at the class VII of SMPN 4 Pujananting of Barru, shows that 40,5% of the students are categorized " excellent ", 40,5% of the students are categorized " good ", 27,0% of the students are categorized "fair", 0% of the students are categorized "poor", and 0% of the students are categorized "very poor". So, It means that the influence of using crossword puzzle method to improve students' vocabulary mastery for class VII at SMPN 4 Pujananting of Barru is effective.

Crossword puzzle method showed a positive significant difference to improve students' vocabulary mastery. Based on the result of the calculation process the researcher gained that the pretest has a mean of 59,05 and in the posttest has a mean of 82,20 of experimental class. Based on the finding of this study it can be concluded that using crossword puzzle method to improve students' vocabulary mastery is quite a success.

And after conducting the research and calculating the data, the conclusion could be stated that it was effective of using crossword puzzle method on students' vocabulary mastery. Students' vocabulary mastery got higher scores if students' used crossword puzzle to help them in improving vocabulary mastery as it can help to improving students' vocabulary mastery. Students who did not receive treatment got a lower score than students who received treatment.

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