#### **CHAPTER IV**

#### RESEARCH FINDINGS AND DISCUSSION

## A. Description of The Research

According to this research, the third grade of SDIT Nurhidayah Surakarta was used as the sample; they are three classes (III B, III C and III D). The experimental classes were III B and III C, and then the control class was III D. All students of this sample are 101 students, class III B and III C consist of 34 students on each class, then III D consist of 33 students.

Bilingual and monolingual card were used as the media in teaching vocabulary, while the control was taught without using those media. Before the treatment would give to the experiment classes and control classes, those classes were given pre-test to measure to know the students' basic competence. After conducting the pre-test, the experiment class which given treatment using bilingual card is III B and monolingual card is III C, while class III D was taught without any media. The materials of the study were vocabulary about pet and family tree based on the syllabus of the third grade. The treatments conducted in 6 meetings for two experiments classes. In the end of the meeting, the researcher conducts the post-test to all class; the experiment classes and control class to know how students' vocabulary increased after using bilingual card and monolingual card.

#### 1. Pre-test

The pre-test for the experimental classes and control class were administrated on January 25<sup>th</sup>, 29<sup>th</sup>, and 31<sup>th</sup>, 2019. The pre-test were 10 items of multiple choices and 10 items of fill the blank, then total of items are 20 items. The result of pre-test would be compared with the result of post-test.

#### 2. The Experimental Treatment

The class III B and III C were given treatment by using bilingual and monolingual card for 4 meetings, 2 meetings for material about pet and 2 meetings for material about family tree.

#### 3. Post-test

The post-test season was conducted by researcher to find out the difference between before and after treatment based on the result of the test. The post-test of experimental classes and control class were conducted on March, 15<sup>th</sup>, 18<sup>th</sup> and 28<sup>th</sup>, 2019.

## 4. Data Description

## a. Data of the Experimental Group 1

The result data of pre-test and post-test using bilingual card was found by the multiple choice and essay based on the two topics of material (pet and family tree). The pre-test consists of 20 items and post-test consists of 20 items. The test was conducted in the experimental class and control class. The data description of the pre-test can be seen as follows:

The result of pre-test and post-test for Experimental Group 1 (Bilingual Card)

Table 5.The result of pre-test and post-test for Experimental Group 1

	Pre-test	Post-test
Mean	51.76	88.24
Median	50	90
Maximum	70	100
Minimum	35	75
<b>Standard Deviation</b>	10.22	7.97
Variance	104.37	63.46

Based on the Table above, it can be seen that the mean scores of the pretest and post-test in the experimental group 1 were 51.76 and 88.24. The median score of pre-test was 50 and post-test was 90. The maximum score of pre-test was 70 and post-test was 100. The minimum score of pre-test was 35 and post-test was 75. Standard deviation of pre-test was 10.22 and post-test was 7.97.While, variance of pre-test was 104.37 and post-test was 63.46. From the table above, we can conclude that the mean score of post-test in students' who were taught by media bilingual card was higher than the mean score of pre-test.

# b. Data of Experiment Group 2

The result data of pre-test and post-test using monolingual card was found by the multiple choice and essay based on the two topics of material (pet and family tree). The pre-test consists of 20 items and post-test consists of 20 items. The test was conducted in the experimental class and control class. The data description of the pre-test can be seen as follows:

The table below is the result of pre-test and post-test for Experimental Group 2 (Monolingual Card).

Table 6. The result of pre-test and post-test for Experimental Group 2

	Pre-test	Post-test
Mean	53.24	86.03
Median	52.5	85
Maximum	70	100
Minimum	35	70
<b>Standard Deviation</b>	9.84	9.60
Variance	96.79	92.09

Based on the table above, it can be seen that the mean scores of the pretest and post-test in the experimental group 2 were 53.24 and 86.03. The median score of pre-test was 52.5 and post-test was 85. The maximum score of pre-test was 70 and post-test was 100. The minimum score of pre-test was 35 and post-test was 70. Standard deviation of pre-test was 9.84 and post-test was 9.60. While, variance of pre-test was 96.79 and post-test was 92.09. From the table above, we can conclude that the mean score of post-test in students' who were taught by media monolingual card was higher than the mean score of pre-test.

## c. Data of Control Group

The result data of pre-test and post-test using monolingual card based on the two topics of material (pet and family tree). The pre-test consists of 20 items and post-test consists of 20 items. The test was conducted in the experimental class and control class. The data description of the pre-test can be seen as follow:

The result of pre-test and post-test for Experimental Group 2 (Monolingual Card)

Table 7.The result of pre-test and post-test for Control Group

	Pre-test	Post-test
Mean	53.03	79.85
Median	55	80
Maximum	70	95
Minimum	35	60
Standard Deviation	8.56	10.42
Variance	73.34	108.57

Based on the Table above, it can be seen that the mean scores of the pretest and post-test in the control group were 53.03 and 79.85. The median score of pre-test was 55 and post-test was 80. The maximum score of pre-test was 70 and post-test was 95. The minimum score of pre-test was 35 and post-test was 60. Standard deviation of pre-test was 8.56 and post-test was 10.42. While, variance of pre-test was 73.34 and post-test was 108.57. From the table above, we can conclude that the mean score of post-test in students' who were taught without any media was higher than the mean score of pre-test.

# d. Comparison between Experimental and Control Group

The table belowis the result data of the pre-test and the post-test from experimental and control group.

Table 8.The Result of Pre-test and Post-test for the Experimental and Control

Group

	Experimental Group 1		Experimental Group 2			Control Group			
	Pre- test	Post-test	Gain	Pre- test	Post- test	Gain	Pre- test	Post-test	Gain
Mean	51.76	88.24	0.76	53.24	86.03	0.70	53.03	79.85	0.56
Median	50	90	0.75	52.5	85	0.71	55	80	0.58
Maximum	70	`100	1.00	70	100	1.00	70	95	0.92
Minimum	35	75	0.29	35	70	0.25	35	60	0.11
Standard Deviation	10.22	7.97	7.97	9.84	9.60	0.21	8.56	10.42	0.05

According to the table above, it can be seen that the result of test before

and after conducting the treatment. The result of pre-test in experimental group 1 presents that the mean score was 51.76, the median score was 50, the maximum score was 70, the minimum score was 35, the standard deviation score was 10.22. Then, the post-test result presents that the mean score was 88.24, the median score was 90, the maximum score was 100, the minimum score was 75, and the standard deviation was 7.97.

On the other hand, the result of pre-test in experimental group 2 show that the mean score was 53.24, the median score was 52.5, the maximum score was 70, the minimum score was 35 and the standard deviation was 9.84. Meanwhile, the post-test result presents that the mean score was 86.03, the median score was 85, the maximum score was 100, the minimum score was 70, and the maximum score was 9.60.

The last discussion is about the result of vocabulary test in control group. The pre-test score of control group presents that the mean score was 53.03, the median score was 55, the maximum score was 70, the minimum score that 35 and the standard deviation was 8.56. Meanwhile, the post-test score of control group presents that the mean score was 79.85, the median score was 80, the maximum score was 95, the minimum score was 60, and the standard deviation was 10.42.

Then the result shows that there was a significant difference between the result score pre-test and post-test. It means there is significant difference result among the entire group from samples, while the experimental group 1 (bilingual group) reached the highest enhancement to increase student vocabulary activity.

## **B.** Data Analysis

In this part, the researcher conducted three test, they are the test of normality, test of homogeneity and test of hypothesis. Test of normality was used to find out whether the data from the population is distributed normally or not. Test of homogeneity was used to know the data sample is homogeneous of not. The last, test of hypothesis was conducted to know the hypothesis of research is acceptable or not.

## 1. Test of Normality

The researcher used the Kolmogorov-Smirnov in this test. The data can be normal if the significance of probability value is greater than 0.05. However if it

lower than 0.05, the data can be said as not normal data distribution. The result data of normality test can be seen as follows;

**Table 9.The Result of Normality Test** 

Group		Kolmogorov-Sminov				
		Statistic	Df	sig.		
Experimental 1	Pre-test	.140	34	0.89		
	Post-test	.146	34	0.62		
Experimental 2	Pre-test	.129	34	.166		
	Post-test	.131	34	.148		
<b>Control</b> Pre-test		.136	33	.124		
	Post-test	.144	33	.080		

From the table above, it can be seen all the significant values were greater than 0.05. From the experimental 1 the value of pre-test was 0.89 and post-test was 0.62. For the experimental 2 the value of pre-test was .166 and post-test was .148. Then from the control group the significant value of pre-test was .124 and the post-test was .080. From all significant values had greater significant value than 0.05, it means that the data of all groups are normal.

## 2. Test of Homogeneity

To know whether the sample variance was homogenous or not, the researcher conducted the test by using Levene test. The data can be said homogenous if the significance of probability score is greater than 0.05. The result of homogeneity as the follows:

**Table 10.The Result of Homogeneity Test** 

Group	Levene Statistic	df1	df2	Sig.
Experimental	2.882	1	66	.094
1				
Experimental	.005	1	66	.944
2				
Control	1.059	1	64	.307

According to the table above, it can be seen that the all significance values were .094, .944, .307 greater than 0.05. Then, it can be concluded the data of all the sample was homogenous or have similar variances.

## 3. Hypothesis Testing

The hypothesis testing is conducted to find out the significant difference in increasing students' vocabulary ability using, bilingual card, monolingual card and conventional media, the researcher used ANCOVA. The researcher used ANCOVA and continued by Least Significant Differences (LSD) in this test. LSD was used to know the rank of the treatment. This is the result test of ANCOVA as follows;

Table 11. The Result test of ANCOVA

	Sum of Squares	df	Mean Square	F	Sig.
<b>Between Groups</b>	.657	2	.328	8.060	.001
Within Groups	3.993	98	.041		
Total	4.650	100			

The criteria of test ANCOVA is the null hypothesis ( $H_0$ ) is rejected if the significant value is lower than 0.005 or sig<a. According to the table result of

ANCOVA above, it can be seen that significant value was .001 which is lower than 0.05. It means that the null hypothesis  $(H_0)$  is rejected and the alternative hypothesis is accepted. Then, it can be concluded that there was a significant differences among students' accomplishment in learning vocabulary using bilingual card, monolingual card and conventional media.

After knowing the significant differences among students' accomplishment from using ANCOVA test. Then, the next test was Least Significant Differences (LSD) that was conducted to know which the most effective media. The result of LSD is as following:

Table 12. The Result of LSD

Dependent	(I)Group	(J) Group	Mean	Std.	Sig.	95%	Confidence
Variable			Differenc	Error		Interval	
			e ( <b>I-J</b> )			Lower	Upper
						Bound	Bound
	Experimental	Experimental	.061	.049	.213	036	.158
	Group 1	Group 2					
		Control	.194	.049	.000	.096	.291
		Group					
	Experimental	Experimental	061	.049	.213	158	.035
	Group 2	Group 1					
		Control	.132	.049	.008	.035	.230
		Group					
	Control	Experimental	194	.049	.000	292	096
	Group	Group 1					
		Experimental	132	.049	.008	230	035
		Group 2					

The criteria of Post Hoc test using model LSD test was the null hypothesis  $(H_0)$  is rejected if the significant value is lower than 0.05 or sig<a. From the table above we can conclude that;

Table 13. LSD result

	Model of comparison	Sig	Conclusion	Discussion
LSD	Billingual –		H <sub>0</sub> accepted	there is no
	Monolingal	.213		significantdifference
	Billingual –		H <sub>0</sub> rejected	there is
	Conventional	.000		significantdifference
	Monolingual –	.008	H <sub>0</sub> rejected	there issignificant
	Conventional			difference

From the table above, the hypothesis testing of this research are specified as follows.

## a. Hypothesis Testing 1

This hypothesis states that bilingual card is more effective than conventional media in teaching English vocabulary. From the result of LSD, it told that there is a significant difference between student who were taught by bilingual card and student who were taught by conventional media. It can be seen from the value if sig. 0.000 which is lower than 0.05. So it can be concluded that the use of bilingual card is more effective than conventional media was accepted.

## b. Hypothesis Testing 2

This hypothesis reveals that the use of monolingual is more effective than conventional media in teaching English vocabulary. From the result of LSD, it states that there is differencesignificant between student who taught by

monolingual card and students who taught by conventional media from the value of sig. 0.000 which is lower than 0.05. Additionally, the mean difference indicates positive result (.132). Based on the result, the use of monolingual card is more effective than conventional as media in teaching English vocabulary. So the hypothesis of this research was accepted.

# c. Hypothesis Testing 3

This hypothesis shows that there is no significant difference between using bilingual and monolingual card. The result of LSD test was present that there is no significant difference between students who were taught using bilingual card and the students who were taught using monolingual card. It happen because the value of Sig. 0.213 which is higher than 0.05. Thus, it can be seen that teaching vocabulary using bilingual cards and monolingual cards have same achievement and the hypothesis was rejected.

#### d. Hypothesis Testing 4

From the result of LSD, the result of this last hypothesis was accepted. Although, there is no significant difference between teaching English vocabulary using bilingual and monolingual card but the result of the value of mean difference of the experimental group 1 (bilingual card) to the experimental group 2 (monolingual card) is .061. Meanwhile, from the experimental group 1 to control group is .194. Additionally, the most effective media can be seen from the gain of the mean result which are bilingual card is 0.76; monolingual card is 0.70

and 0.56. From these values, it can be conclude that the bilingual card is the most effective media. Thus the hypothesis was accepted.

#### C. Discussion

In this part, the researcher aim to explain the result of the research finding. Meanwhile, the objectives of the study were 1) to find whether the use of bilingual card is more effective than the use of conventional media in increasing young learners' English vocabulary 2) to find whether the use of monolingual card is more effective than the use of conventional media in increasing young learners' English vocabulary 3) to find whether the use of bilingual card is more effective than the use of monolingual card in increasing young learners' English vocabulary 4) to find whether the most effective media between bilingual card, monolingual cards, and conventional media as the media in increasing young learners' English vocabulary.

From the data analysis, it shows that there is one hypothesis of this research was rejected and three hypothesis of this research were accepted. The first, the use of bilingual card is more effective than the use of conventional media. While, the use of monolingual card is more effective than the use of conventional media. Another hypothesis stated it shows that the use of bilingual card is more effective than the use of conventional card. The most effective media is bilingual card. It revealed because it shows the highest result of mean difference of the experimental group 1.

There some researcher who did similar research with this research. Fisrt, NenengSuhaimi who stated that flash card considered as the media that solve problemsin learning English vocabulary. In her research, the problem such as students' low achievement in vocabulary and high imbalance in achievement between upper and lower level can be fixed by flashcard. The use of flashcard gives students opportunity to work in group with other students and helps each other in teaching learning process in other to improve their vocabulary. The aimed of this study is to find out the effectiveness of using visual media, flashcards to improving students' vocabulary at MTs N 13 Petukangan, South Jakarta. The result of this study shows that the use of flashcards is effective in improving students' vocabulary.

Second, Abbasian and Ghorbanpor (2016) who investigated the effect of flashcard based instruction on vocabulary learning among intermediate EFL learners with a consideration of the role gender. This is a quantitative research which is involving 60 Iranian male and female EFL learners. Then they were received treatment using flashcard-based and conventional instruction of vocabulary respectively, and also a post test. Based on T-test analysis of data, there is significant difference between the two methods of teaching in favor of the flashcard based instruction vocabulary. However, the difference between male and female participants in vocabulary learning was not found to be significant. The implication of this study is that flashcard-based instruction as and important method of vocabulary learning should receive further attention in language teaching programs.

Third, YulianieKasari (2013), this qualitative study which is used descriptive method and study case. The technique methods of collecting data are interview,

observation, and documentation. Based on observation in bilingual class program in Smart Eureka a National plus School Depok shows that this program successfully increasing students' English ability. It can be seen that students can easily mention some word classes such as; noun, adjective etc. They also can make easy sentences such as; giving opinion, instruction etc.

The other research was conducted by Jessica Michelle Pfister (2009) who investigates the culmination of recent research in this newly developed field, as well as provides feedback from bilingual individuals on their experiences of being bilingual. Through analyzing current studies, the conclusion is made that bilingual children will follow a series of stages in their semantic and syntactic acquisition in which there is a bilingual disadvantage, followed by a bilingual advantage, and lastly a continuous stage of neutrality between bilingual children and their monolingual peers. This theory combined with the positive social effects of bilingualism seen through results of the survey, encourage education systems to take responsibility in teaching children to be proficient in two languages.

Abdolmajid Hayati and Khaled Deheimi Nejad (2010) also did the quite same research like pfister. They compared between monolingual and bilingual EFL learners on language use in Iranian High School Students. Their research was conducted to compare the language learning strategies used by bilingual (Arab-Persian) and monolingual (Persian) EFL learner in Iran. Among a pool of 650 students studying in grade one in two high school located in Ahvaz city, 200

learners (100 monolingual and 100 bilingual) were randomly selected as the research participants. The prime data collection instrument utilized in this study was SILL questionnaire. An oral interview was also designed after SILL questionnaire administration to check the written and oral responses. The results of this study revealed the superiority of bilingual learners on four strategy categories. Bilingual learners tended to use social and compensation strategies most frequently while monolinguals preferred social and effective strategies. This results mean that monolingual also help students to learn English and give good influence to students but bilingual tends to be more effective than monolingual.

Another study was conducted by Yahya, Amirali and Noorullah. Their research was exploring the effect of bilingualism on the learning of vocabulary learning. They divided two groups of Iranian male students (Baluchi bilingual and Persian monolingual. The present study is based on the data from 80 monolingual Persian-speaking learners of English and 80 bilingual Baluchi-Persian-speaking learners of English. All participants were male studying English as a foreign language at preuniversity of Sistan and Baluchestan in Iran. The results indicated that Baluchi-Persian bilingual speakers outperformed in general vocabulary learning and inL3 recognition vocabulary learning. The findings of this paper also showed that no significant difference was seen between Persian-speaking learners and Baluchi-Persian-speaking in L3 production vocabulary learning (p>.05).

From the research above there no researches which discuss about comparison between teach use one language (target language) and two languages (target and native language with card or without card. Threfore in this research has proved that bilingualism and monolingualism can be applied in card (picture card) and give good impact for student in learning English especially in mastering vocabulary.

The researcher used these two media (bilingual and monolingual card) in increasing student's vocabulary ability because both media proved effective in teaching English vocabulary. In other side that bilingual card as the most effective media consists of picture and two languages; first language and second language (Indonesia and English). This type of card make students more interest and easy to understand the new vocabulary. The card also help student to understand teacher's explanation by used two languages in explaining the materials.

The study told that bilingualism has positive impact in learning vocabulary and can increase students' vocabulary ability. Monolingual can also have positive impact in learning vocabulary but in case teaching in long-term or teaching English for the infant (L1).

As the result, it can be concluded that bilingual card and monolingual card also become the effective media in many aspects of teaching especially in increasing students' English vocabulary. Meanwhile, in this study the research stated that the most effective media is bilingual card on the result of least significant and monolingual card is more effective than conventional media.

# **D.** Limitation of The Research

The maximum result was always being researcher attention. However, there are several limitations. First, students need more time to fill the answer sheet. Second, the learning material on this research is only about vocabulary in pet and family tree. Third, the research only has six meetings to do the treatment including the pre-test and the post-test.