

## CHAPTER IV

### RESEARCH FINDINGS AND DISCUSSION

This chapter describes about research findings and discussion that include data of research findings, data analysis, hypothesis testing and discussion.

#### A. Research Findings

In research finding, the research found the result of pre-test, post-test, hypothesis testing, normality and homogeneity testing.

##### 1. Pre-Test of Control Group and experiment Group

]Here is the table description of pre-test and post-test scores according to Control Group and Experiment Group:

**Table 4.1**

#### The Students' Score of Pre-Test

Students	Control Group	Experiment Group
1	70	75
2	67	60
3	72	80
4	70	72
5	65	68
6	71	70
7	80	81
8	74	75
9	70	74
10	60	60
11	74	75
12	75	78
13	80	82

14	70	72
15	75	78
16	65	65
17	70	75
Mean	71.05882	72.94118

According to the table 4.1, the students' score of Control Group on pre-test was 71.05882. On the other hand, the students' score of Experiment Group on pre-test was 72.94118. The scores got from the students when there were no treatment yet to the Experiment Group. The pre-test was used to know how far the students' stages on knowledge to get the following material or treatment.

**Table 4.2 The Scores' Criteria**

Grade	Interval Class	Criteria
A <sup>+</sup>	90 – 100	Excellent
A	80 – 89	Very Good
B	70 – 79	Good
C	50 – 69	Fair
D	0 – 49	Poor

**Table 4.3 Frequency of Students' Score Pre-Test**

No	Score	F <sub>x</sub> / Control Group	F <sub>y</sub> / Experiment Group
1	90 – 100	0	0
2	80 – 89	2	3
3	70 – 79	11	10
4	50 – 69	4	4
5	0 – 49	0	0
		N=17	N= 17

From the table 4.3 above, the students' frequency of ability was almost the same. The number of students who get the in the middle score was almost the same. The students' ability was in a good stage based on the criteria in the table 4.2. The students were ready to continue or getting treatment the following material.

**Table 4.4 Descriptive Statistics of Control Group**

<b>Descriptive Statistics</b>					
	N	Mean	Std. Deviation	Minimum	Maximum
Pretest	17	71.06	5.166	60	80
Posttest	17	73.65	4.582	65	83

The following steps was conducting normality test. Normality test is one of some requirements that should be fulfilled before conducting t-test. The aims of normality test is to know whether the data from two classes have been normally distributed or not. To know the normality, the researcher used *Saphiro-Wilk test* with SPSS.25. *Saphiro-Wilk test* is a test of normality for little samples. A normal distribution is rejected. Simply put a value less than 5% or 0.05 indicates that the data are non-normal. The result can be seen in the table below:

**Table 4.5 Normality Test**

The result of table 4.5 shows that the data of two classes  
**Test of Normality**

Class	Kolmogorov-Smirnov <sup>a</sup>			Shapiro-Wilk			Statistic	df	Sig.
	Statistic	df	Sig.	Statistic	df	Sig.			
Students Study Result	Pre-Test Experiment		.152	17	.200*	.923	17	.169	
	Post-Test Experiment		.178	17	.154	.952	17	.491	
	Pre-Test Controlled		.184	17	.131	.957	17	.569	
	Post-Test Controlled		.127	17	.200*	.967	17	.771	

\*. This is a lower bound of the true significance.

a. Lilliefors Significance Correction

were normally distributed. Both of experimental class and controlled class have almost the same ability in reading skill. According to table above, the data were normally distributed since the sig (2 tailed) 0.491 is higher than 0.05 or  $0.491 > 0.05$ . After the data had been distributed normally, hypothesis testing was conducted. It was used to prove whether the hypothesis proposed by the researcher was accepted or not. Thus, the Null Hypothesis (H<sub>0</sub>) was rejected since the sig (2 tailed) 0.491 is higher than 0.05. To examine the hypothesis, the researcher used statistical computation Paired Sample T-Test SPSS 25 version for Windows.

After getting the normality and paired sample test, the next step is homogeneity test. It purposed to test the similarity of the sample in both classes. The result can be seen as follows;

**Table 4.6 Homogeneity Test**  
**Test of Homogeneity of Variance**

		Levene Statistic	df1	df2	Sig.
Students Result Study	Based on Mean	.032	1	32	.859
	Based on Median	.030	1	32	.863
	Based on Median and with adjusted df	.030	1	31.736	.863
	Based on trimmed mean	.031	1	32	.862

Based on table 4.7, it shows Based on Mean Sig.  $0.859 > 0.05$ , it can be concluded that data variant of post-test Experiment Class and data variant of post-test Controlled Class is the same or homogeny.

## 2. Post-test Scores of Control Group and experiment Group

Treatment was given only to students who were in experimental group. The students who were not join to experimental group; they were included in control group. Students in control group taught by a conventional reading learning. They read the passage or text, and answer questions then. Without any directions or steps how to read

the text, how to predict the content of text, how to analog the information, how to interpret the new or difficult information.

The following tables are about the Post-Test score and its frequencies:

**Table 4.5 The Students' Score of Post-Test**

<b>Students</b>	<b>Control Group</b>	<b>Experiment Group</b>
1	73	80
2	70	74
3	75	83
4	71	75
5	68	71
6	73	78
7	83	85
8	76	79
9	73	79
10	65	72
11	76	78
12	77	80
13	82	86
14	74	78
15	75	80
16	69	73
17	72	80
Mean	73.64706	78.29412

According to the table 4.5, the students' score of Control Group on post-test was 73.64706. On the other hand, the students' score of Experiment Group on post-test was 78.29412. The scores got from the students after treatment to the Experiment Group and after conducted conventional learning.

**Table 4.6 The Scores' Criteria**

Grade	Interval Class	Criteria
A <sup>+</sup>	90 – 100	Excellent
A	80 – 89	Very Good
B	70 – 79	Good
C	50 – 69	Fair
D	0 – 49	Poor

**Table 4.7 Frequency of Students' Score Post-Test**

No	Score	F <sub>x</sub> / Control Group	F <sub>y</sub> / Experiment Group
1	90 – 100	0	0
2	80 – 89	2	7
3	70 – 79	12	10
4	50 – 69	3	0
5	0 – 49	0	0
		N=17	N= 17

According to the table 4.7 above, there were 4 (four) number of students in experiment group who got the score better than before, the reach very good criteria (80-89). At the pre-test, students who got very good criteria were only 3 (three) persons only. In addition, after getting the treatment, their score increased significantly.

**Table 4.8 Descriptive Statistics of Experiment Group****Descriptive Statistics**

	N	Mean	Std. Deviation	Minimum	Maximum
Pretest	17	72.94	6.609	60	82
Posttest	17	78.29	4.254	71	86

**Table 4.5 Normality Test\***

**Test of Normality**

Class	Statistic	Kolmogorov-Smirnov <sup>a</sup>			Shapiro-Wilk			
		df	Sig.	Statistic	df	Sig.		
Students Study Result	Pre-Test Experiment		.152	17	.200*	.923	17	.169
	Post-Test Experiment		.178	17	.154	.952	17	.491
	Pre-Test Controlled		.184	17	.131	.957	17	.569
	Post-Test Controlled		.127	17	.200*	.967	17	.771

\*. This is a lower bound of the true significance.

a. Lilliefors Significance Correction

The result of table 4.5 shows that the data of two classes were normally distributed. Both of experimental class and controlled class have almost the same ability in reading skill. According to table above, the data were normally distributed since the sig (2 tailed) 0.491 is higher than 0.05 or  $0.491 > 0.05$ . After the data had been distributed normally, hypothesis testing was conducted. It was used to prove whether the hypothesis proposed by the researcher was accepted or not. Thus, the Null Hypothesis (H<sub>0</sub>) was rejected since the sig (2 tailed) 0.491 is higher than 0.05. To examine the hypothesis, the researcher used statistical computation Paired Sample T-Test SPSS 25 version for Windows.

After getting the normality and paired sample test, the next step is homogeneity test. It purposed to test the similarity of the sample in both classes. The result can be seen as follows;



**Table 4.6 Homogeneity Test****Test of Homogeneity of Variance**

		Levene Statistic	df1	df2	Sig.
Students Result Study	Based on Mean	.032	1	32	.859
	Based on Median	.030	1	32	.863
	Based on Median and with adjusted df	.030	1	31.736	.863
	Based on trimmed mean	.031	1	32	.862

Based on table 4.7, it shows Based on Mean Sig.  $0.859 > 0.05$ , it can be concluded that data variant of post-test Experiment Class and data variant of post-test Controlled Class is the same or homogeneity.

The following step was independent sample test. Independent Sample Test is a test that conduct when the data is normally. It aims is to know whether there is a mean different between two samples unpaired. Independent sample test is to know the result, when the sampling was consist of a class divided into two groups; experimental and control group. Independent sample test is used to answer research problem “Is there any significant difference mean score in reading ability of the students’ taught by using think-aloud strategy and those taught by using a conventional method?” This test is focused on the post-test result of the both Experiment and Controlled Class. The result can be seen as follows;

### Independent Sample 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 Result Study	Equal variances assumed	.032	.859	3.065	32	.004	4.647	1.516	1.558	7.736
	Equal variances not assumed			3.065	31.825	.004	4.647	1.516	1.558	7.736

Based on the table above, on Equal variances assumed Sig. (2-tailed) is  $0.004 < 0.05$ , it can be concluded that there is difference mean score in reading ability of the students' taught by using think-aloud was more significance than those taught by using a conventional method.

### B. The Discussion

According the research method in chapter III in this research, teaching and learning process is divided into three steps. First step is the researcher administrated pre- test by giving reading comprehension test. It is used to know the students' earlier reading comprehension before they get treatment.

The second is given treatment to the students. The treatment here is teaching reading comprehension by using reading think aloud strategy. The material is about descriptive text, recount text and report text. After the student got treatment, they were more enjoy and enthusiastic to learn reading comprehension. The last step was giving post-test to the students after they got treatment.

From the research finding in chapter IV, the output data Experiment group of paired sample statistics shows mean of pre-test is 73.65 and post-test is 78.29 has increased. If compared the differences both of value is 4.64. Therefore, from both mean it can concluded that there is significant differences in the students' achievement of reading comprehension means that teaching reading comprehension through think aloud strategy is effective. There were 8 (four) number of students in experiment group who got the score better than before, the reach very good criteria (80-89). At the pre-test, students who got very good criteria were only 3 (three) persons only. In addition, after getting the treatment, their score increased significantly.

The statistical computations on the pre -test scores of the experimental and controlled group using SPSS 25 for windows showed that it was found that test count (3.390) and t-table (3.065).

The *output paired samples correlations* shows the large correlation between both samples, where can be seen numeral both correlation is (0.894) and numeral significance (0.000). The large of numeral significant or Sig.(2-tiled) is 0.000 lower than 0.050 or  $0.000 < 0.050$ . It means that the hypothesis

clarify, there is a significant different score using *think aloud strategy* toward students reading comprehension at the ninth grade of Junior High School 1 Campurdarat.

The data were normally distributed since the sig (2 tailed) 0.491 is higher than 0.05 or  $0.491 > 0.05$ . After the data had been distributed normally, hypothesis testing was conducted. It was used to prove whether the hypothesis proposed by the researcher was accepted or not. Thus, the Null Hypothesis ( $H_0$ ) was rejected since the sig (2 tailed) 0.491 is higher than 0.05. To examine the hypothesis, the researcher used statistical computation Paired Sample T-Test SPSS 25 version for Windows.

Based on Mean Sig.  $0.859 > 0.05$ , it can be concluded that data variant of post-test Experiment Class and data variant of post-test Controlled Class is the same or homogeny. Thus, it can be one of follow requirements in independent sample t-test.

When the value of  $T_{count}$  and  $T_{table}$  where  $df = 16$  got from  $T_{table} = 1.746$ . So,  $T_{count} (6.510) > T_{table} (1.746)$  means that  $H_0$  is rejected and  $H_a$  is accepted. The alternative hypothesis ( $H_a$ ) is accepted and the null hypothesis ( $H_0$ ) is rejected. It means that there is significant different score of reading achievement to the ninth grade students of Junior High School 1 Campurdarat before and after being taught by using Reading Think Aloud Strategy.

Based on the data above, we can concluded that there was significant different of post test result between both control class and experimental class.

We could see the improvement made by the students after using Think Aloud strategy in increasing students' reading comprehension. Then, we also found that was significant effect of Think Aloud strategy in increasing students reading skills. It can be seen at the highest score of experimental class achievement than the control class which were not using the think aloud strategy.

Keene & Zimmerman, (1997) declare that “think aloud is a technique in which students verbalize their thoughts as they read” (p. 1). Thus, this strategy is useful because students are verbalizing all their thought in order to create understanding of the reading texts. Another illustration about think aloud is provided by Tinzmann in Teacher Vision website (2009), he says that:

*When students use think out loud with teachers and with one another, they gradually internalize this dialogue. It becomes their inner speech the means by which they direct their own behaviours and problem-solving processes. Therefore, as students think aloud, they learn how to learn, and they develop into reflective, metacognitive, independent learners, an invaluable step in helping students understand that learning requires effort and often is difficult. This argument encloses all the issues that imply think-aloud in a reading process.*

Here is the comparison preview study from Paridah, Paridah (2016) “The Effect of Think Aloud Strategy toward Students' Reading Skill at the Eighth Grade of MTsN-2 Palangka Raya”. Based on the result, this strategy recommended to the students should use this strategy to

increase their English skill especially in reading and for teacher should apply the think aloud strategy in teaching reading English generally, and increasing students' motivation especially.

According to this research, the improvement made by the students after using Think Aloud strategy in increasing students' reading comprehension. Then, we also found that was significant effect of Think Aloud strategy in increasing students reading skills. The teacher technique to give directions to students were clear understood, they are steps how to read the text, how to predict the content of text, how to analog the information, how to interpret the new or difficult information. Moreover, the students motivated by teacher to share what students got from the text or passage in reading comprehension confidently.