

CHAPTER IV

RESEARCH FINDING AND DISCUSSION

This chapter discusses the result of the research, they are; the students' writing achievement in experimental group; the students' writing achievement in control group; interpreting the result of significant difference between the students' writing achievement in control and experimental group; and the effectiveness of using *WhatsApp Electronic Peer Technique* in teaching writing descriptive text.

A. The Students' Writing Achievement in Experimental Group

The students in experimental group were divided into 4 groups (each group consisted of 8 to 9 students). They used *WhatsApp Messenger* as the media for online discussion.

In the first meeting, after the students had divided into four groups, the students were given some rules on *WhatsApp Messenger* such as 1) using English, 2) posting opinions related to the topic, and 3) being active in group by responding the others' opinion and correcting the others' mistake such as grammar or punctuation. Then for the activity in *WhatsApp Messenger*, students were asked to discuss the descriptive of animal in the jungle. The students were shown some the picture of lion and tiger. Students replied their opinion based on the picture and correcting to each other.

In the second meeting, the students were shown the picture of "monkey" and "gorilla". After analyzing the picture with their group, the students had to write the descriptive of that animal and present in front of the class. Topic about

‘Monkey’ was presented by the first and the second group whereas topic about ‘Gorilla’ was presented by the third and the fourth group. After presenting in front of the class, others groups should give the comment and correction of the presenting group.

In the third meeting, the teacher returned the text written by them in previous meeting. Their texts were already corrected by the teacher. Students had been discussed about “tree” in the previous day by *WhatsApp Messenger*. Then, for activity in the class, students were asked to make descriptive text with mountain as theme in the group. Then, they changed their work with others groups to be corrected.

The fourth meeting was used as writing test. Although they did discussion group in the class, they had to do the writing test individually. Working in group was meant as collaborative writing in which they had to share ideas or arguments and made a conclusion together. The key sentences, which were drawn into cluster, were used as their writing material for test. Writing test was administered to get the students’ scores. The students’ writing can be seen in *Appendix 5*. Furthermore, the students’ writing achievements were analyzed by using SPSS and it can be seen in Table 4.1.1.

Table 4.1.1 Statistic Data for Experimental Group

Statistics

VAR00001

N	Valid	35
	Missing	0
Mean		83.46
Std. Error of Mean		1.227
Median		82.00
Mode		76
Std. Deviation		7.257
Variance		52.667
Range		23
Minimum		75
Maximum		98
Sum		2921
Percentiles	25	76.00
	50	82.00
	75	89.00

The highest score gotten by the students in experimental group is 98, whereas the lowest score is 75. The range of the highest and the lowest score is 23. The mean score is 83.46. The median score is 82 while its mode is 76. The standard deviation shown is 7.257.

Frequency is number of times the scores appear in computation. There are 18 kinds of scores shown from the lowest to the highest. It means that the students' writing achievement is various. To make it clear, the frequency of students' achievement in experimental group is presented in table 4.1.2.

Table 4.1.2 Frequency of the Students' Writing Achievement in Experimental Group

EXPERIMENTAL GROUP

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	75	3	8.6	8.6	8.6
	76	7	20.0	20.0	28.6
	77	1	2.9	2.9	31.4
	78	1	2.9	2.9	34.3
	79	2	5.7	5.7	40.0
	80	1	2.9	2.9	42.9
	81	1	2.9	2.9	45.7
	82	4	11.4	11.4	57.1
	84	1	2.9	2.9	60.0
	86	2	5.7	5.7	65.7
	88	3	8.6	8.6	74.3
	89	1	2.9	2.9	77.1
	91	1	2.9	2.9	80.0
	92	1	2.9	2.9	82.9
	93	1	2.9	2.9	85.7
	94	1	2.9	2.9	88.6
	95	3	8.6	8.6	97.1
	98	1	2.9	2.9	100.0
	Total	35	100.0	100.0	

Table 4.1.2 shows that; 8.6% or 3 students get 75; 20% or 7 students get 76; 2.9% or 1 student gets 77; 2.9% or 1 student gets 78; 5.7% or 2 students get 79; 2.9% or 1 student gets 80; 2.9% or 1 student gets 81; 11.4% or 4 students get 82; 2.9% or 1 student gets 84; 5.7% or 2 students get 86; 8.6% or 3 students get 88; 2.9% or 1 student gets 89; 2.9% or 1 student gets 91; 2.9% or 1 student gets 92; 2.9% or 1 student gets 93; 2.9% or 1 student gets 94; 8.6% or 3 students get 95 and; 2.9% or 1 student gets 98. The histogram chart is presented on the following page;

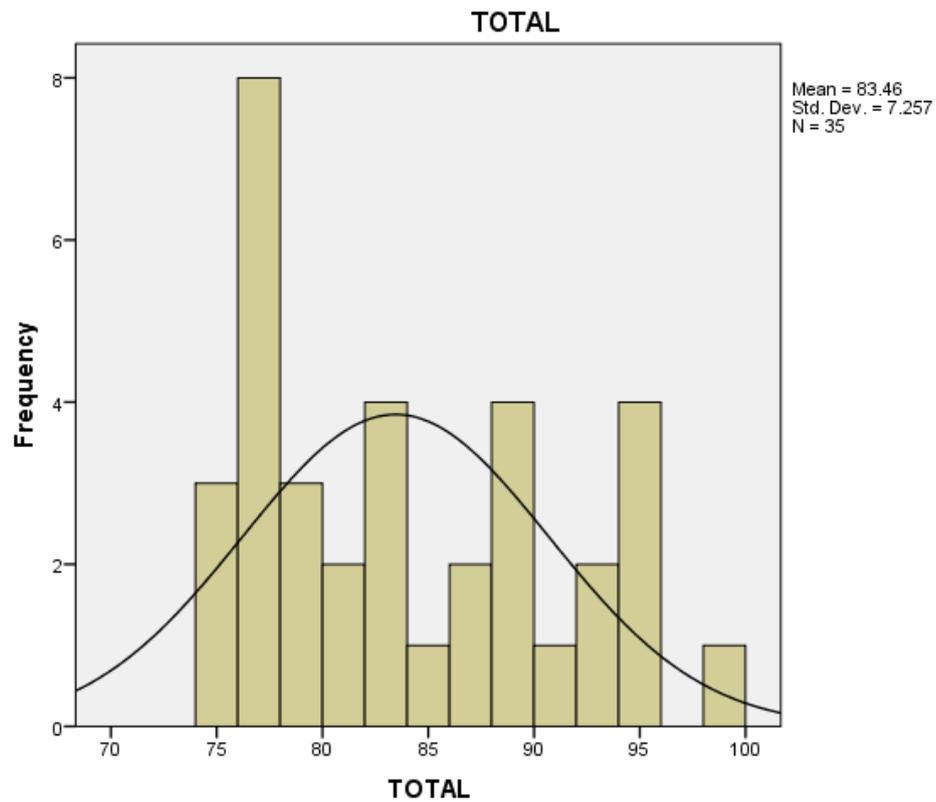


Figure 4.1.1 Frequency of the Students' Writing Achievement in Experimental Group

The students' scores are classified into some categories. Table of categorization is adapted from

BadanPenelitiandanPengembanganPendidikanNasionalPusatKurikulum, Depdiknas.

Table 4.1.3 Category for the Students' Achievement in Experimental Group

No.	Score	Frequency	Percentage	Category
1	85 – 100	14	40%	Very Good
2	69 – 84	21	60%	Good
3	53 – 68	0	0%	Fair
4	37 – 52	0	0%	Bad
5	20 – 36	0	0%	Very Bad
	Total	35	100%	

The students who get score in interval 69 – 84 (good) are 21 students.

Meanwhile, the students who get score in interval 85 – 100 (very good) are

14students. To make it clear, the pie chart of its category is presented on the following page;

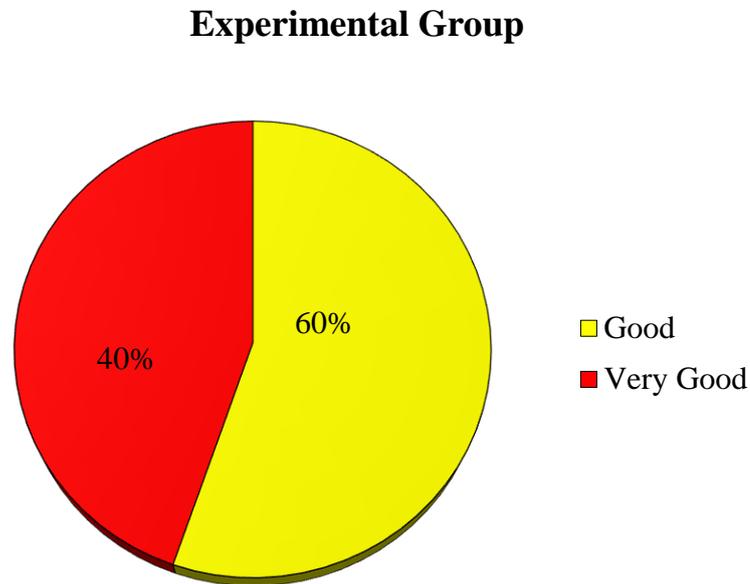


Figure 4.1.2 Category for the Students' Achievement in Experimental Group

The percentage of the students who get 'good' scores is 60%, whereas 40% students get 'very good' scores. To sum up, the students' writing achievement in experimental group is in 'good' category with the mean score 83.46.

B. The Students' Writing Achievement in Control Group

Writing test was given to the students to get the students' scores. The students in control group were taught by conventional discussion method. Although they were divided into some groups, they had to do the writing test individually. Working in group was meant as collaborative writing in which they had to share ideas and made a conclusion. The result of the discussion was used as their material in writing test. The students' writing achievements were analyzed

by using SPSS version 21. The statistic data for control group is presented in table 4.2.1.

Table 4.2.1 Statistic Data for Control Group

Statistics		
VAR00001		
N	Valid	35
	Missing	0
Mean		80.29
Std. Error of Mean		.812
Median		82.00
Mode		84
Std. Deviation		4.805
Variance		23.092
Range		18
Minimum		72
Maximum		90
Sum		2810
Percentiles	25	76.00
	50	82.00
	75	84.00

From table 4.2.1, it can be seen that the highest score is 90 and the lowest score is 72 while its range is 18. The mean shown in the group is 80.29. The median is 82 while its mode is 84. The standard deviation is 4.805.

Frequency is number of times the scores appear in computation. There are 13 kinds of scores shown from the lowest to the highest. It means that the students' writing achievement is various. To make it clear, the frequency of students' achievement is presented in table 4.2.2 on the following page.

Table 4.2.2 Frequency of the Students' Writing Achievement in Control Group

VAR00001

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	72	1	2.9	2.9	2.9
	73	3	8.6	8.6	11.4
	74	2	5.7	5.7	17.1
	75	2	5.7	5.7	22.9
	76	2	5.7	5.7	28.6
	78	3	8.6	8.6	37.1
	79	1	2.9	2.9	40.0
	80	3	8.6	8.6	48.6
	82	2	5.7	5.7	54.3
	83	6	17.1	17.1	71.4
	84	7	20.0	20.0	91.4
	86	1	2.9	2.9	94.3
	90	2	5.7	5.7	100.0
	Total	35	100.0	100.0	

The frequencies of score achieved by the students are; 2.9% or 1 student gets 72; 8.6% or 3 students get 73; 5.7% or 2 students get 74; 5.7% or 2 students get 75; 5.7% or 2 students get 76; 8.6% or 3 students get 78; 2.9% or 1 student gets 79; 8.6% or 3 students get 80; 5.7% or 2 students get 82; 17.1% or 6 students get 83; 20.0% or 7 students get 84; 2.9% or 1 student gets 86; and 5.7% or 2 students get 90.

The histogram chart is presented on the following page;

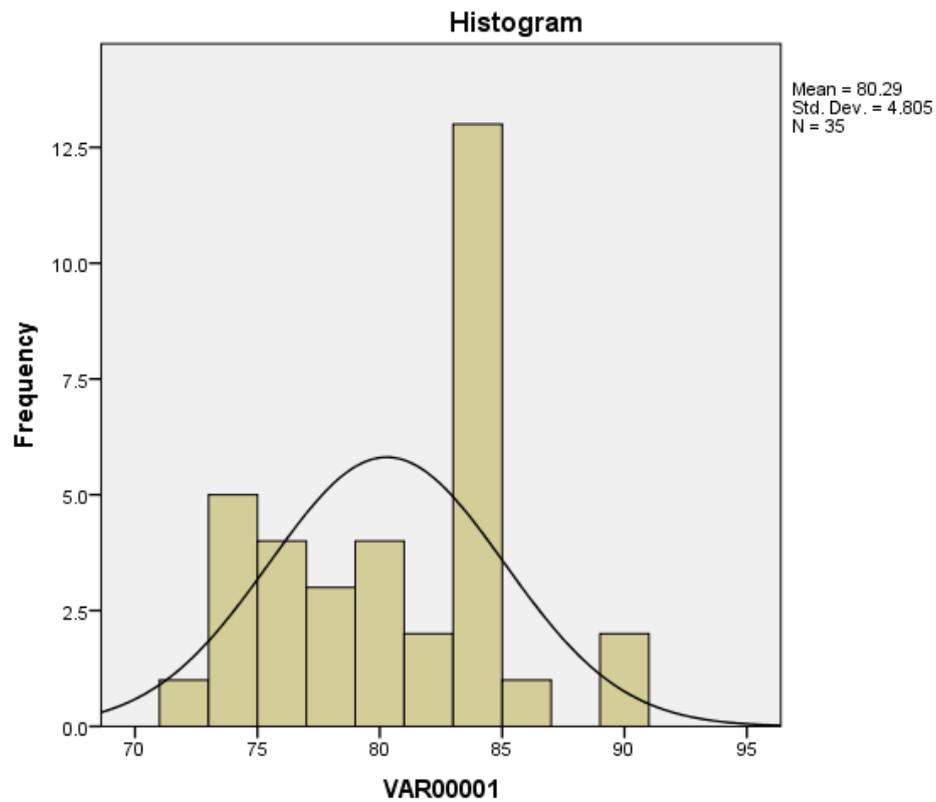


Figure 4.2.1 Frequency of the Students' Writing Achievement in Control Group

The students' scores are classified into some categories. Table of categorization is adapted from

BadanPenelitiandanPengembanganPendidikanNasionalPusatKurikulum, Depdiknas.

Table 4.2.3 Category for the Students' Achievement in Control Group

No.	Score	Frequency	Percentage	Category
1	85 – 100	3	8.57%	Very Good
2	69 – 84	32	91.43%	Good
3	53 – 68	0	0%	Fair
4	37 – 52	0	0%	Bad
5	20 – 36	0	0%	Very Bad
	Total	35	100%	

The students who get score in interval 69 – 84 (good) are 31 students. Meanwhile, the students who get score in interval 85 – 100 (very good) are 3 students. The pie chart is presented on the following page;

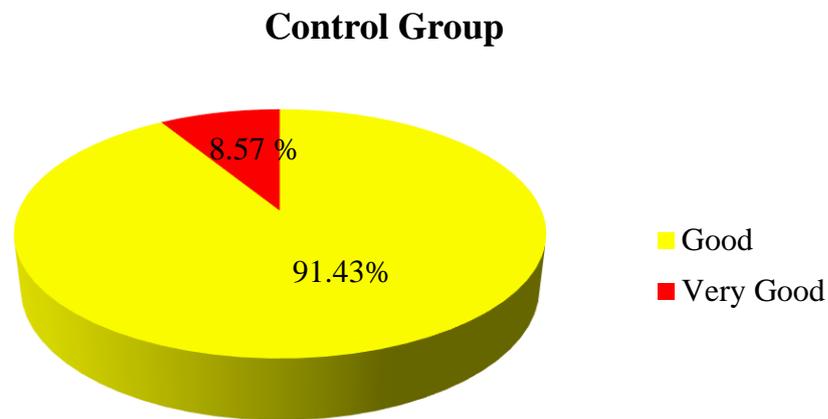


Figure 4.2.2 Category for the Students' Achievement in Control Group

The percentage of the students who get 'good' scores is 91.43%, whereas 8.57% students get 'very good' scores. To sum up, the students' writing achievement in control group is in 'good' category with the mean score 80.29.

C. Interpreting the Result of Significant Difference between the Students' Writing Achievement in Control and Experimental Group

After finding the results of both groups, the significant difference between students' writing achievement in control and experimental group is calculated. SPSS version 21 is used to analyze the data. The result is shown in table 4.3.1.

Table 4.3.1 Statistic Difference between Control and Experimental Group

Group Statistics					
KELAS		N	Mean	Std. Deviation	Std. Error Mean
NILAI	EXPERIMENTAL	35	83.46	7.257	1.227
	CONTROL	35	80.29	4.805	.812

Table 4.3.1 reveals a difference in mean value between the experimental group ($M = 83.42$, $SD = 7.257$) and the control group ($M = 80.44$, $SD = 4.805$). In order to examine whether the experimental group and the control group differed significantly in the test achievement, an independent-samples t-test was conducted using an alpha level of 0.05. The result is indicated in Table 4.3.2.

Table 4.3.2 Independent Samples T-test Result

		Independent Samples Test								
		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
								Lower	Upper	
NILAI	Equal variances assumed	9.742	.003	2.156	68	.035	3.171	1.471	.236	6.107
	Equal variances not assumed			2.156	59.008	.035	3.171	1.471	.227	6.115

The interpretation of the table above is; there is significant difference between two groups if sig. (2-tailed) value is the same as or is lower than 5% or 0.05. From table 4.3.2, it can be seen that the experimental group outperformed the control group in writing achievement with $P(t(68) = 2.156, df = 68) = .035$ and 95% confidence interval ranging from 0.236 to 6.107. Thus, the significance different between the mean values of both groups is found.

D. The Effectiveness of Using *WhatsApp* Electronic Peer Group in Teaching

Writing of Descriptive Text

Alternative Hypothesis (H_a) states: *Peer Technique Technique in WhatsApp Messenger* is effective to be used in teaching writing descriptive text at the eleventh grade of MAN KOTA BLITAR. Before testing this hypothesis, t-test is calculated to compare the means between the experimental and control groups.

Peer correction technique in WhatsApp Media, is 'effective' because the research findings show some indicators, those are; 1) the mean score of experimental group (M = 83.46) is higher than control group (M = 80.29); 2) the result reveals that experimental group outperforms the control group with significance value 0.3% or 0.003 as indicated in Table 4.3.2.; and 3) t-observed ($t_{obs} = 2.156$) is higher than t-table ($t_{table} = 2$).

Therefore, the Null Hypothesis is rejected in favor of the Alternative Hypothesis. Thus, *Peer Technique in WhatsApp Messenger* is effective to be used in teaching writing descriptive text at the eleventh grade of MAN Kota Blitar.

The findings of the research give some implications, those are as follows;

1. The students are more interested in learning English because they learn by using new media (*WhatsApp Messenger*) which is familiar to them. It is caused because they are given challenge by the teacher. Besides, *WhatsApp messenger* is effective to be used as media in teaching because this application is downloaded in smartphone and it can be learnt every time and everywhere.
2. *Peer correction* helps the students to correct their friends' work. They should compete with their friends to share ideas, correct some mistakes, debate, and so on within *WhatsApp Messenger* group. This makes the students more spirit to learn English.
3. The communication or learning opportunity between teacher and students is sustainable. It means although the teaching process or this research is done, the students sometimes use *WhatsApp Messenger* to ask further

explanation about English since *WhatsApp Messenger* can be optimized as learning media outside classroom.

E. Discussion

The students in experimental group are divided into 4 groups (each group consists of 8 to 9 students). They do online discussion by using *WhatsApp Messenger*. However, they have to present their result of discussion in the classroom by showing some screenshots of chats. Others groups giving comments and correcting for the work of presenting group. Although the students are divided into some groups, they have to do writing test individually. Working in a group is meant as collaborative writing in which they have to share ideas with others and make a conclusion at the end of discussion. The conclusion is about determining some key sentences as writing test materials.

Based on the students' writing achievement result in experimental, it is found that 40% students get scores in interval 85 – 100, whereas 60% students get scores in interval 69 – 84. The value of *Kriteria Ketuntasan Minimal*(KKM) for the eleventh grade is 75. A total of 35 students get higher scores than 75 while 3 students get the same scores as the KKM value. It means that all students or 100% pass the KKM with mean is 83.46. Meanwhile in the control group, 8.57% students get scores in interval 85 – 100 and 91.43% students get score in interval 69 – 84. A total of 27 students get higher scores than 75 while 2 students get the same scores as the KKM value and 6 students get lower scores than 75. It means that only 82.8% students pass the KKM with mean is 80.29. Furthermore, the mean score of experimental group is higher than the control group.

The use of *WhatsApp Messenger* as the media for online discussion in experimental group is based on the consideration that ‘we need the modern technologies for a better blended method of delivery to create apt teaching techniques to enhance the process of learning English language’ (Jayanthi& Kumar, 2016). *WhatsApp Messenger* is also considered as collaborative technology which can be used to guide writing, provide prompt feedback, and provide students to make revisions and ask further questions in a timely manner (Xia & Sun, 2010).

A study related to the use *WhatsApp Messenger* in language teaching done by Alsaleem (2014) revealed that the mean between pre and post test results of the vocabulary choice section reached 2.59 in the journalers’ group whereas the voice section improved significantly ($p = .030$)

Based on a research done by Sam (2016), there are some pedagogical implications of students using *WhatsApp Messenger* as an informal channel of learning English, those are; 1) in the course of learning outside the classroom, students participate in a self organized learning environment, where they learn in their own pace, and they collaborate with the peers online via *WhatsApp Messenger*, 2) in the course of communication with people outside the classroom, students tend to produce language in an authentic context and tend to learn language in a socio-cognitive perspective, and 3) students design learning strategies on their own in course of exploring materials/contents outside the classroom context.

Furthermore, Awada (2016) states one of the addressed Technology (ISTE) Standards for Students is for Communication and Collaboration in which

the students use digital media and environments to communicate and work collaboratively, including at a distance, to support individual learning and contribute to the learning of others.

From the explanation above, it can be concluded that *WhatsApp Messenger* can be used as learning media for language teaching since it gives pedagogical implications and the use of ICT in language learning can enhance positive effects for the students.

Meanwhile, peer correction used as role. *Peer Correction Technique* is categorized as *Collaborative Teaching Writing Technique*. Meanwhile, *WhatsApp Messenger* is used as a media in which the students have their *chatroom* for discussion and Peer Correction is used as a rule to *chatroom* connection to others. Students will be correcting their friends' description about the related topic, so they can learn and fix the mistake together.