Chapter IV

Research Finding and Discussion

In this chapter, the writer reports the process of research and the results obtained during the study. The results of the study consisted of pre-test learning outcomes, the implementation of treatment, and the result of post test. The writer will discuss the descriptive results obtained earlier; however, the results of pre-test and post-test have been analyzed. Analysis data served to analyze the results of students' abilities.

Research Finding

Results of the study are the result measured at pretest and posttest. All procedures at the time of the pretest were analyzed by descriptive analysis and normality test. The results of the data analysis of pretest will be bases for the writer to know the prior knowledge of the students in using the dictionary. After the pretest, the writer provided a treatment then the result of treatment measured as a post-test. The posttest results were analyzed by using descriptive analysis and normality test, and subsequent writer compared the results of pre-test and posttest using hypothesis testing T. The results of this comparison will show whether treatment was given could improve students' vocabulary by reading a text recount or not.

Description Pre-Test Data

The data of pretest is a students' score that become the first data for the writer before treatment was conducting. After giving the pretest by instrument of multiple choices, the result of pretest obtained was ( see appendix 11 p.62 ). The
students’ score showed on appendix 11 is the data which was not process. So, it was should be conduct by the descriptive analysis as showed on appendix 12 p. 63. On appendix 12 item 1, the highest students’ score is 12 and the lowest students’ score is 4. So, it could be obtain the range class is 8.

And the next, the students’ score of pretest is divided into several of class interval and the formula to looking for class interval was showed on item 2. On item 2, the class interval obtained was 6 and on item 3 the length of each class interval obtained was 2. After the range of class, class interval and the length of class obtained then the score of students could be change into table form of frequency distribution of statistical data presentation as showed on table 2.

To look for the students’ average score when the pretest can be seen on item 5a, and the average score obtained was 6.83

Data pretest results are presented in the form of a description of the statistical frequency distribution table below.

<table>
<thead>
<tr>
<th>No</th>
<th>Interval class</th>
<th>Fi</th>
<th>F relative (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>4 – 5</td>
<td>6</td>
<td>25.0</td>
</tr>
<tr>
<td>2</td>
<td>6 – 7</td>
<td>10</td>
<td>41.7</td>
</tr>
<tr>
<td>3</td>
<td>8 – 9</td>
<td>5</td>
<td>20.8</td>
</tr>
<tr>
<td>4</td>
<td>10 – 11</td>
<td>2</td>
<td>8.33</td>
</tr>
<tr>
<td>5</td>
<td>12 – 13</td>
<td>1</td>
<td>4.17</td>
</tr>
<tr>
<td>6</td>
<td>14-15</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>24</td>
<td>100</td>
</tr>
</tbody>
</table>

Based on Table 2, it can be explained that the students' scores on the pretest distributed in 6 classes interval. The length of each class interval is 2. Data
frequency (percentage) for each class interval is 6 or 25% for the class interval 4-5, 10 or 41.7% for the interval 6-7, 5 or 20.8% for the interval 8-9, 2 or 8.33% for intervals 10-11, 1 or 4.17 for the class interval 12-13% and no cost (0%) for the interval 14-15. The percentage of the acquisition frequency was the highest in the class interval 6-7, while the lowest percentage gain frequency contained in the class interval 14-15.

From the description of the pretest, the writer obtained information that the majority of students (41.7%) of the total number, only able to be correctly answer questions 6-7 of 20 questions multiple choice pretest, whereas only a few students who can answer the questions on a number of from about 6-7. On average, the number of questions that can be answered totaling 6, therefore, a brief overview of the pretest results is still show a low ability of students' vocabulary.

Treatment

Treatment was conducted after the pretest data collection process. The numbers of meeting in treatment were divided into 5 times. In the treatment process, each student was required to bring a dictionary to be used personally. At the first meeting on November 14th 2013, the writer explains the purpose of the implementation of the treatment to students. The goal of treatment is to identify the student should be able to identify the meaning of words from the text that was read and was able to classify the words into 3 groups: adjective, noun and verb.

At the first meeting, not all the students are required to bring a dictionary, it illustrates that the interests of students to increase vocabulary skills are still low.
Therefore, the writer do a step by explaining that the dictionary is not a burden to be read, but it is the first step to find out the meaning of the English-language literature. It was explained that the dictionary plays an important role both for the beginner student who still lack the vocabulary and the students who have mastered a lot of vocabularies.

The first step, the writer explained briefly about recount text that has been studied at various times prior learning, suggests the importance of a bilingual dictionary, explaining the difference class of words consists adjective, noun and verb. After explaining some of the materials, the writer provided the opportunity for students to ask if there is a material that is not understood yet. The writer divided the students into 5 groups, each group shared reading text. Each reading was read by each student in the group, then, students categorized the words in the word classes. Finally, the students presented the results of the grouping as a group report. Recount text was given for the first meeting, the test is about My life was My Adventure.

At the second meeting of wonderful adventures in My life. The author sees almost all the students have to bring their personal dictionary. It indicates that the interest of bringing the dictionary already started to develop from the students themselves. When the author asked the owner of the dictionary which were taken by students, students generally have to bring a personal dictionary, while the rest is still borrowing from other graders.

The third meeting was The Wonderful Beach Parangtritis Beach, the fourth meeting was My Best Friend’s Haruka and fifth meetings was A Trip To
Description Post-test

The data of posttest is the students’ score obtained after the treatment was conducted. The students’ score of posttest was recapitulated as showed on appendix 13 p.66. Based on appendix 13, the data which was processing to descriptive analysis was appropriate with the step on appendix 14 p.67. On appendix 14 item 1, the students’ score was sorted from the lowest score until the highest score. The highest score of students is 12 and the lowest score of students is 4 then the range class obtained is 8. On item 2, the data of posttest divided into 6 class interval. On item 3 the length of each class interval obtained is 2. After item 1 until 3 was finished, then the data of posttest can be seen on item 4, and the average score obtained is 12.75

Data pretest results are presented in the form of a description of the statistical frequency distribution table below.

<table>
<thead>
<tr>
<th>No</th>
<th>Interval class</th>
<th>Fi</th>
<th>F_{relative} (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>9 – 10</td>
<td>5</td>
<td>20.83</td>
</tr>
<tr>
<td>2</td>
<td>11 – 12</td>
<td>7</td>
<td>29.17</td>
</tr>
<tr>
<td>3</td>
<td>13 – 14</td>
<td>4</td>
<td>16.67</td>
</tr>
<tr>
<td>4</td>
<td>15 – 16</td>
<td>8</td>
<td>33.33</td>
</tr>
<tr>
<td>5</td>
<td>17 – 18</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>24</td>
<td>100</td>
</tr>
</tbody>
</table>
Based on Table 3, it can be explained that the students' scores on the pretest distributed in 6 interval classes. The length of each class interval is 2. Data acquisition frequency (percentage) for each class interval is 5 or 20.83% for the class interval 9-10, 7 or 29.17% for the interval 11-12, 4 or 16.67% for the interval 13-14, 8 or 33.33% for the interval 15-16, and no cost (0%) for the interval 17-18. The percentage of the acquisition frequency was highest in the class interval 15-16, while the lowest percentage gained frequency contained in the class interval 13-14.

From the description of the pretest, the writers obtained information that the majority of students (33.33%) of the total amount, have been able to correctly answer questions 15-16 of 20 questions multiple choices pretest, while few students who could answer questions in the amount of less than 15-16 questions. On average students have been being able to answer 12 questions. A brief description of this posttest results revealed that there is still an increase in students' vocabulary skills when compared with the previous pretest.

Data Analysis

Normality Test (chi-square)

Normality test is intended to determine whether the data pre-test and post-test normal distribution obtained or derived from the same population (see Appendix 12 item 6 p.64 for pretest and Appendix 14 item 6 p.68 for posttest). Normality test is a requirement for hypothesis testing (t-test). If both the data are normally distributed, then it can be followed by hypothesis testing research, but if the data are not normally distributed, the data obtained to be invalid or does not come from the same population statistically. Normality test is performed based on
the results of the pretest frequency distribution table and of the frequency
distribution table posttest. Formulation of the test for normality is

\[ \chi^2 = \sum \frac{(O_i - E_i)^2}{E_i} \]

Where:
\( \chi^2 \) = chi-square
\( O_i \) = frequency of observation
\( E_i \) = frequency of theory

Criterion of testing normal distribution is:
If \( \chi^2_{\text{count}} \leq \chi^2_{(1-\alpha)(n-3)} \) at level \( \alpha = 0.05 \) and degrees of freedom \( (df) = 24-3 \), pretest and posttest data are assumed to be normally distributed, but if \( \chi^2_{\text{count}} \geq \chi^2_{(1-\alpha)(n-3)} \) so its mean pretest and posttest data are considered not normally distributed. The result of analysis of the data normality was performed for the pretest and posttest can be briefly presented in the following matrix:

<table>
<thead>
<tr>
<th>Data</th>
<th>( \chi^2_{(1-\alpha)(n-3)} )</th>
<th>( \chi^2_{\text{count}} )</th>
<th>validation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pretest</td>
<td>32.7</td>
<td>5.69</td>
<td>Normally distributed</td>
</tr>
<tr>
<td>Posttest</td>
<td>32.7</td>
<td>15.05</td>
<td>Normally distributed</td>
</tr>
</tbody>
</table>

Based on the criteria above then the data is data both pretest and posttest meet the criteria for the analysis of the data so that the data is assumed to have both normally distributed so that it can proceed with hypothesis testing.
**Hypothesis test (t-test)**

Hypothesis testing is intended to compare the results of the posttest and pretest results. In a hypothesis test (t), there are criteria required that the writer will get information on whether the treatment has been given effect on the ability of the students' vocabulary. In testing the hypothesis, the writers use the t-test formula is

\[
t_{\text{count}} = \frac{\bar{d}}{SDd / \sqrt{n}}
\]

Description:

- **SDD** = Standard deviation of deviation
- **N** = Number of samples

Criteria for hypothesis testing is

- Ho: \( \mu_0 = \mu_1 \): there is no difference between pretest and posttest (Ho will be accepted if \( t < t_{\text{list}} \) for \( \alpha = 5\% \))
- H1: \( \mu_0 \neq \mu_1 \): there is difference between pretest and posttest (H1 will be accepted if \( t_{\text{count}}\) \( > t_{\text{list}} \) for \( \alpha = 5\% \))

After testing the hypothesis (see appendix 16 p.70) the results of hypothesis testing can be seen in the following matrix T test results.

<table>
<thead>
<tr>
<th>df</th>
<th>t\text{count}</th>
<th>t\text{list}</th>
</tr>
</thead>
<tbody>
<tr>
<td>46</td>
<td>20.53</td>
<td>2.021</td>
</tr>
</tbody>
</table>
where
\[ \text{df} = \text{degrees of freedom (} n_1 + n_2 ) - 2 = ( 24 + 24 ) - 2 = 46 \approx 60 \]
\[ t_{\text{list}} = t \left( 1 - \frac{1}{2} \alpha \right) = t \left( 0.975 \right) \left( 60 \right) = 2.00 \text{ (see appendix 18)} \]

Based on the hypothesis test table it can be seen that \( t_{\text{count}} \) is 20.53 and \( t_{\text{list}} \) at 2.00 confidence level (\( \alpha \)) of 5% = 0.05 and seen that \( t_{\text{count}} \) greater than \( t_{\text{list}} \). Based on the criteria for testing the hypothesis posited that if \( t_{\text{count}} \) is greater than \( t_{\text{list}} \) The information received is the acceptance of the hypothesis \( H_1 \) dan rejection of the hypothesis \( H_0 \). Fulfillment of the testing criteria, illustrates that there are significant differences between pretest posttest data so that the data directly show also significantly increased students' ability in mastering vocabulary.

**Discussion**

Reading ability of students in English must be supported by the ability of vocabulary because vocabulary will improve the understanding of the material. Using the dictionary for vocabulary that will improve reading comprehension must be proven by empirical research.

**Discussion of Pretest**

On the pretest, students were given a multiple choice test. Pretest results (in Appendix 12 item 5-6 p.64) shows that the average student can answer correctly only 6 of the 20 items was about the test and the number of students who are able to answer the range 41.7% or 10 of 24, the number of students. Highest number of questions that can be answered correctly was 12 points, but, the number of students that can answer 12 grains is only 41.7% or 1 out of 24 the number of students, while the lowest number of questions that can be answered.
correctly is 4 grains and the number of students who can answer 4 the items were 25% or 6 out of 24, the number of students.

Description of the pretest results showed that the vocabulary skills of students still low because only a few students were able to answer half of all multiple choice questions was given. The low yield is caused by the lack of mastery of vocabulary number of students. The students are still very dependent on the motivation of teachers to learn vocabulary. Mastery of vocabulary is very important when learning English. Pretest results are empirical facts of the results of the first observations on the reading ability of students class 8 in SMP 9 Gorontalo by getting information with the English teacher that has been done before. Reading ability of English was still low caused the lack of students’ interest in reading English

Discussion of Treatment

After giving the pretest, the writer provide treatment to students. The first meeting was held on November 14th 2013. The title given text recount is My life was My Adventure. The writer found that the majority of students are still difficult to understand the meaning of vocabulary in reading. The writer gives an explanation of how to find the vocabulary word in a dictionary is based on the word classes. The writer found several problems faced by students during the learning process taken. First, they do not understand and still difficulty in classifying the words into word class consist to verb, adjective or noun. Although the writer was given an explanation, but students still confused with the word-class material, and only a few students could understood. Students who already
know about the word classes, help their others friends which do not understand to how to classifying the word classes.

In the second meeting of treatment was held on (November 15th 2013) were better than previous meeting . The writer start learning activity by divided the students into 5 groups consist to 4-5 students in a group. The writer describes more of the adjective, noun and verb. This explanation was important because the writer wanted to know whether the students have understood correctly about the word classes from the recount text was they read. At this meeting, some students can show that they have understood and be able to classify words into each word class. The writer assesses student learning outcomes have been correct in the classified of words.

The third meeting was held on November 16th 2013 . Title recount text at this meeting was wonderful beach, Parangritis beach. The writer did the same steps as the previous meeting, but that is different is the writer do not explain again the word class.

The fourth meeting on November 18th 2013 and the title recount text given was My Best Friend , Haruka . The writer completed the fifth meeting on November 19th 2013 and given the title of recount text is A Trip To Borobudur Temple . At the last meetings , the writer considered that the treatment has been running smoothly because during the treatment process there was no students were followed extracurricular activities so that students can conducting well . In addition, there were several students who did not follow the treatment, it caused ill, permit or absent but that situation could not affect to the treatment process conducted.
Discussion of Posttest.

Posttest results obtained was showing that there was a significant increase in students' scores when compared with the results of previous pretest. In the posttest results (see Appendix 14 item 5-6 p.68), the average score of the students was 12.5. This can be seen in the average student was able to answer correctly 12 items from 20 items. Amounting to 33.33% of the total students have been able to answer 15 to 16 questions correctly, while for 20.83% of the total students have been able to answer half of all questions correctly.

The increase in the value of the students analyzed by using statistical hypothesis tested, in order to compare the results of pretest and posttest. Prior to test the hypothesis, the data must be validated by the analysis of posttest normality test. Results of normality test to prove that the data pretest and posttest have normal distribution \((\chi^2_{\text{count}} \geq \chi^2_{(1-\alpha)(n-3)})\) so it can proceed with hypothesis testing (t-test). Based on the t-test (see Appendix 16 p.70), the results showed that greater than tlist tcount the confidence level \((\alpha = 0.05)\), so the hypothesis \((H_1)\) which states that applications use bilingual dictionaries can improve the reading skills of students can be accepted while \((H_0)\) is rejected.

The use of dictionaries is considered to have the ability to improve students' vocabulary. This is consistent with the statement Gutlohn (2005) in the previous chapter that the use of a dictionary to teach students about some sense of the word, as well as the importance of choosing the right definition to fit the particular context. Contextual analysis involved infer the meaning of an unfamiliar word by examining the surrounding text.
Bilingual dictionary is very important in learning English, especially in reading competence. In search of the meaning of a passage, the students would spend a long time, so the writers concluded reading comprehension suspect that students will find the meaning of certain words so that the words that need to be considered not negligible as proposed by Hunt (2009, p.23) learners reading for general understanding can often ignore unknown words and use dictionaries them more strategically. Based on the theory of Fox and Potter (2006), the writers agree that the use of a dictionary for understanding frequently discussed in both studies / foreign language reading to help students to gain an understanding of reading, they have to use a bilingual dictionary because it can motivate students to learn reading.

The limitation of research

The limitation of this research goes to several points. The first point is about reading comprehension domain. Besides reading comprehension, this research aim to find out students’ vocabulary in reading comprehension. On the other hand, the main point in this research is to examine. Whether Bilingual dictionary can increase students’ vocabulary or not. After that, to support the instrument of this research, the writer used recount text. In the recount text, students found out the word classes consist of noun, verb and adjective. Continues, this research was conducted in SMP 9 Kota Gorontalo with a total sample 24 students in class VIIIc.

The writer expects to the English teacher and another researcher that finding of this research refers to English of junior high school, they can use bilingual to enhance students’ vocabulary in English reading. On the other hand,
the finding of this research can be a guideline or the consideration in similar research.