**CHAPTER III**

**RESEARCH METHODOLOGY**

1. **The Research Method**

 The research method in this study, the writer used experimental research. The writer tries using Preview, Ask Question, Read and Summarize for teaching reading. Experiments are carried out in out order to explore the strength of relationship between variables[[1]](#footnote-1). Variable in this research consist of two variables. There are Preview, Ask Question, Read and Summarize as (X) variable and reading comprehension on report text as (Y) variable. The writer used experiment research because this research using treatment by the purpose to explore the effectiveness of certain treatment on others, so it can be seen significantly whether the method is effective or not.

 There are three kinds of experiment research, such as: the first, true experiments consist of control and experiment groups to which subject have randomly assigned, and in which all subject are tested before and after the invention or treatment under investigation has been administrated to the experiment group. The second, a pre-experiment may have pre and post treatment test, but lack of control group. The third, a quasi experiment has both pre and post test, and control and experiment groups, but no random assignment subject.[[2]](#footnote-2)

 From types of experiments above in this research, the writer takes the quasi experiment design that has class control as compare class experiment. The writer using quasi experiment because sample used to this research wasn’t selected randomly. In this research the writer takes two classes consist of the experimental class and control class. Experiment class who are given content based instruction method and the control class without it.

1. **The Objective of Research**

 The object of the research is using test to improve students reading skill. The writer has taken in the third grade of Junior High School of MTs Al-khairiyah Pipitan academic period 2018-2019.

1. **Place and Time of Research**

 To collect the data of the research, the writer conducted a field research of Junior High School at the third grade of MTs AL-Khairiyah Pipitan Serang. It is located at Jl. Ciruas Km.2 Pipitan-Serang. The research time start on July 2018 to August 2018. The writer chose this school because this method has never been used in this school, so the writer tries to use this method to explore if the method is effective or not. In other hand, the writer has known well about the condition of this school.

1. **Population and Sample**
2. Population

 Population is the entire subject of the research “a population is a set of all elements processing one or more attributes of interest”[[3]](#footnote-3). Population of this research is the students of MTs Alkhairiyah Pipitan especially the third grade of junior high school, there are four classes consist of 120 students.

1. Sample

 Sample is part of representative of population being research[[4]](#footnote-4)**.** On taking sample, the writer takes 60 students from population purposely. Class IX B as control class consist of 30 students and class IX C as experiment class consist of 30 students.

1. **The Research Instrument**

 In this research, the writer gives the student two tests. These are pre-test and post-test. Pre-test was given before the writer observed the class, and post-test was given after the writer finished taking the observation in the class. So the writer know whether there are differences before and after observation or not.

 To get data of students’ reading comprehension, the writer giving pre-test and post-test. The pre-test and post-test consist of 20 multiple choice questions and 5 essay.

**Table 3.1**

**Table of Specification of Reading Comprehension Test**

**(Multiple Choice)**

|  |  |  |
| --- | --- | --- |
| **No** | **Reading Skill** | **Item Number** |
| **Pre-test** | **Post-test** |
| 1. | Identifying main idea | 1,6,11,16,21 | 1,6,11,16,21 |
| 2. | Finding specific information | 2,7,12,17,22 | 2,7,12,17,22 |
| 3. | Inference | 3,8,13,18,23 | 3,8,13,18 ,23 |
| 4. | Reference | 4,9,14,19,24 | 4,9,14,19,24 |
| 5. | Vocabulary | 5,10,15,20,25 | 4,10,15,20,25 |
| **Total Item** | **25 number**  | **25 number** |

1. **The Technique of Data Collecting**

 To collect the data for this research, the writer takes the data by using test as an instrument. The writer uses test for knowing result study of reading skill before and after using Content based instruction method.

1. Pre-Test

 The writer uses pre-test before use Content based instruction method to knows students’ reading skill in MTs Al-khairiyah Pipitan. In this test, the instrument used in this study is multiple choices. It can be objective to measure learning outcome. The multiple choices consist of 20 items. The correct answer is given score 1 (one) and incorrect answer is given score 0 (zero).

1. Post-Test

 The writer uses post test after use Content based instruction method. The writer can knows of the result using content based instruction to increase students’ reading skill in MTs Al-khairiyah Pipitan.

1. Documentation

 Documentation method which collect data to noted a report that available. This is done as a proof that the research process is considered correct has been done.

1. **The Technique of Data Analyzing**

 The data which analyzed was gotten from the test and observation. The writer analyzed the data based on the collecting data of score pre test and post test of experimental class and control class. In other hand, the writer also analyzed the score of students learning activity which written on the sheet of students’ observation, the writer take step as follows:

1. The result of the post-test in experiment class is named variable (X1)
2. The result of the post-test in control class is named variable (X2).
3. Qualification of data are multiple choices and essay.

 For the reading comprehension test in pre test and post test, there are steps to must to collect and scoring the reading comprehension test with criteria. Collected and scoring the students reading comprehension test with criteria:

* + - * 1. Multiple Choices : 20 Question, score 20

If correct the answer is given score 1 and incorrect answer given is 0 (zero)

1. Essay : 5 Question, score 20

Derived from Pierce College

* 1. Answer is appropriate to the question, content is

factual collect, score 4.

* 1. Answer is appropriate to the question, content may

have one or two factual error, score 3

* 1. Content relates peripherally to the question,

contains significant factual error, score 2

* 1. Content unrelated to question, score 1. [[5]](#footnote-5)

Maximum Score = 40

For scoring the test the writer will use standard of absolute[[6]](#footnote-6):

The step for statistical analyze are:[[7]](#footnote-7)

Students’ final score = students’ raw score x 100

 Ideal maximum score (40)

To analysis data the writer uses *t*-Test. The *t*-Test is the most frequently used measure in second language research when comparing mean scores for two groups.[[8]](#footnote-8) It supposed to know whether experimental versus control class when taking the same test has the same score or not. The size of the sampling error can be known by looking at the size of a standard number called the standard Error of the mean, which can be achieved or obtained by using the following formula:

1. To search Mean Variable $X\_{1}$ with formula :

 $M\_{1}= \frac{\sum\_{}^{}X\_{1}}{N\_{1}}$=

1. To search Mean Variable $X\_{2}$with formula :

$M\_{2}= \frac{\sum\_{}^{}X\_{2}}{N\_{2}}$

1. To search deviation score variable $X\_{1 }$with formula :

$X\_{1 }$ = $X\_{1}$ - $M\_{1}$

Note : quantity $X\_{1 }$ or $\sum\_{}^{}X\_{1}$must same with zero

1. To search deviation score $X\_{2}$ with formula:

$X\_{2}$= $X\_{2}$ - $M\_{2}$

Note :quantity$X\_{2}$ or $\sum\_{}^{}X\_{2}$ must same with zero

1. To quadrate $X\_{1 }$so summed up, and result
2. To quadrate$X\_{2}$so summed up, and result
3. After collecting the data from pre-test and post-test, the researcher analyze it by using statistic calculation of t-test by using fisher formula with significance degree 5% and 1%. The formula is as follow :

To calculate $t\_{0}$ with formula

$$t= \frac{M\_{1}-M\_{2}}{\sqrt{\left(\frac{\sum\_{}^{}x\_{1}^{2}+\sum\_{}^{}x\_{2}^{2}}{N\_{1}+N\_{2}-2}\right)\left(\frac{N\_{1}+N\_{2}}{N\_{1}.N\_{2}}\right)}}$$

$M\_{1}$ = Mean score of the experiment class

$M\_{2}$ = Mean score of the control class

$\sum\_{}^{}x\_{1}^{2}$= Sum of square deviation score in experiment class

$\sum\_{}^{}x\_{2}^{2}$= Sum of square deviation score in control class

$N\_{1}$ = Number of students of experiment class

$N\_{2}$ = Number of students of control class

$2$ = Constant number

df = Degree of Freedom (df = $N\_{1}+N\_{2}-2$)

1. **Research Procedure**

The procedure of this research can be described as follows:

1. Observation the English teaching activity
2. Provide pre-test of the experimental class and control class
3. Provide treatment to the experimental class using Preview, Ask Question, Read and Summarize, and control class without content based instruction as follow:
	* + 1. **Experimental Class**
	1. Preparation
4. Preparing the lesson plan
5. Preparing the material
6. Preparing reading report for students’ reading comprehension
	1. Implementation
7. Teacher guide students to make a group
8. Teacher give texts to each group
9. Teacher explain the material
10. Teacher ask to the students to make a question
11. Teacher guide student to reading text and write the result of reading comprehension on reading report
12. Teacher guide students to make a summary of the text.
	* + 1. **Control Class**
	1. Preparation
13. Preparing the lesson plan
14. Preparing the material
	1. Implementation
15. Teacher guide students to make a group
16. Teacher explain the material
17. Teacher give the example
18. Teacher give texts to each group
19. Teacher guide students to make a summary
20. Provide post test of experimental class and control class
21. Analyzing the data from pre-test and post-test
22. Drawing the interpretation based on the result of test and making conclusion.
1. David Nunan, *Research Method in Language Learning*, (Camridge: Univercity Press,1992).p.24-25 [↑](#footnote-ref-1)
2. Nunan, Research Method in Language Learning, p.40 [↑](#footnote-ref-2)
3. Suharsini Arikunto, procedure penelitian suatu pendekatan praktek, (Jakarta: Rineka Cipta,2006),p..173 [↑](#footnote-ref-3)
4. Suharsini Arikunto, procedure penelitian suatu pendekatan praktek, (Jakarta: Rineka Cipta,2006),p..104 [↑](#footnote-ref-4)
5. Pierce College, *Sample Rubric-Short Essay,* 20 March 2009, http://IbccEdu//pdf/SampleRubrics.pdf [↑](#footnote-ref-5)
6. Anas Sudjiono, *Pengantar Statistik Pendidikan,* (Jakarta: PT Raja Grafindo Persada, 2003), 318. [↑](#footnote-ref-6)
7. H. Douglas Brown, *Language Assessment: principle and classroom practices,(*USA:Pearson education, 2004),59. [↑](#footnote-ref-7)
8. Anas Sudijono, *pengantar statistik pendidikan,* (Jakarta:Raja Grafindo,2012),278 [↑](#footnote-ref-8)