# **CHAPTER III**

# **RESEARCH METHOD**

This chapter discusses the description of the method employed in this study. The description covers:

### A. Research Type

According to Arikunto that the research type was a planned or processed that was made by the researcher, as the preparation activity will be done.

Basically, there were two kinds of research, namely: qualitative research and quantitative research. This research is the quantitative approach means evaluating numerical, measurable information. In quantitative measurement, research or analysis contain hard data, such as numbers, values, statistic, fact, figures. The quantitative approach was used to analyze the scores of the data.<sup>1</sup>

# B. Research Design

The research design of this study is descriptive as definition comes from Arikunto about descriptive, where he said that:

Penelitian deskriptif merupakan penelitian yang dimaksud untuk mengumpulkan informasi suatu gejala yang ada, yaitu keadaan gejala menurut apa adanya pada saat penelitian yang dilakukan. Penelitian deskriptif tidak memerlukan administrasi atau pengontrolan terhadap suatu perlakuan.<sup>2</sup>

<sup>&</sup>lt;sup>1</sup> Arikunto, Suharmini. *Prosedur Penelitian Sebagai Pendekatan Praktek*, 1998, p. 440. Jakarta: Rineka cipta.

<sup>&</sup>lt;sup>2</sup> Arikunto, Suharsimi. Prosedur Penelitian. Jakarta : Rineka Cipta. 2002, p. 309

The study uses the descriptive method because the problems of the study will answer by using descriptive method to describe the students' difficulties in using verbal sentence on simple past tense and the solutions to solve the students' difficulties in using verbal sentence on simple past tense.

# C. Variable of the Study

Arikunto stated that "A variable is defined as something that varies from one case to another. The dependent variable is variable which one observes and measure to determine the effect of the independent variable. Independent variable (the major variable) is the variable which selected manipulated and measured by the researcher.<sup>3</sup>

In this research there is one variable, it is the students' difficulties.

# **D.** Population and Sample

1. Population

Population is all members of well defined class people, events or objects.<sup>4</sup> The population in this research took at eight grades. A research population is generally a large collection of individuals or objects that is the main focus of a scientific query. It is for the benefit of the population that researches are done. However, due to the large sizes of populations, researchers often cannot test every individual in the population because it is

<sup>&</sup>lt;sup>3</sup> *Ibid*, p. 98

<sup>&</sup>lt;sup>4</sup> Sukardi. *Metodology Penelitian Pendidikan Kompeensi dan Praktiknya*. Penerbit: Bumi Aksara. 2003. p.53

too expensive and time-consuming. This is the reason why researchers rely on <u>sampling techniques</u>.

A research population is also known as a well-defined collection of individuals or objects known to have similar characteristics. All individuals or objects within a certain population usually have a common, binding characteristic or trait.<sup>5</sup> The population of this research was the eight grade students of Mts Annur Palangka Raya in academic year 2014/2015. The total population is 47 students, grouped into two classes VIII-A and VIII-B.

2. Sample

Sample is part of number and characteristic which have by population itself.<sup>6</sup> Then Arikunto stated "if the population is too large, the sample can be taken out between 10% - 15% or it depends on the research's ability based on the time available, energy, expense or finance he can afford the scope of the research area.<sup>7</sup>

The sample of this research was the second grade students of MTS An-Nur Palangka Raya, which has 27 students for one class A. It means that the researcher had to take two classess because cluster sampling technique was used. The study has started on September  $28^{\text{th}}$  – October  $28^{\text{th}}$  2014.

<sup>&</sup>lt;sup>5</sup> *Ibid*, p.115

<sup>&</sup>lt;sup>6</sup> Prof. Dr. Sugiyono. *Metodologi Penelitian Pendidikan*, Bandung: Alfabeta, 2010, p.118

<sup>&</sup>lt;sup>7</sup> Suharsimi Arikunto, *Prosedur Penelitian suatu Pendekatan Praktik*, Jakarta: Rineka Cipta, 2006, p. 134

# **E.** Research Instruments

#### 1. Research Instruments

Research instrument is tool or facilities are used by researcher to collect data. It is easier his work and the result of research are better, more accurate, complete and systematic. So it is easier to be worked.<sup>8</sup>

To collect data the researcher was determined the method and the instrument first. Arikunto stated the method was the way that was used by researcher in collecting data for his research. And the instrument was the means or the facility that was used by researcher in collecting data in order his work will be easy and result be better, accurate, complete, and systematic, so it would be easy to be processed.<sup>9</sup>

The researcher used the test as a method and question test as the instrument, which the test was put the past form of verbal sentences in brackets that consists of twenty questions. It had to be answered by the students so the result can be got as the research data.

#### 2. Research Instruments Try Out

The quality of the data, whether it is good or bad, is based on the instrument to collect the data. A good instrument must fulfill two important qualifications. Those are valid and reliable. So, before the test was used as an

<sup>&</sup>lt;sup>8</sup> Suharsimi Arikunto, *Manajemen Penelitian*, Jakarta: PT. Rieneka Cipta, 2009, p. 150

<sup>&</sup>lt;sup>9</sup> Arikunto, Suharsimi. *Prosedur Penelitian*. Jakarta : Rineka Cipta. 2002, p. 309

instrument to collect the data, it had been tried out first to the students in other class. Students were given 40 minutes in doing each test. The researcher gave them 50 items to find out which one the valid items. The writer made an analysis to find out the validity and reliability of the item of the try out. All of them to decide which items should be used in making instrument.

3. Research Instruments Validity

Validity is a standard or criterion that shows whether the instrument is valid or not. A test is valid to the extent that it measure what it claims to measure.<sup>10</sup> It is the level validity from the instrument and by using it the researcher will know exactly about the truth level of each items question.<sup>11</sup> According to Brown, test validity is the complex criterion of good validity, the degree to which the test actually measures what is intended to measure.<sup>12</sup> To calculate the validity of each item the writer used the Product Moment by Pearson formula:

$$\begin{array}{c} r_{xy} = \sum_{xy} \\ \sqrt{\sum x^2 \cdot \sum y^2} \end{array}$$

 $\mathbf{r}_{xy} = Validity$ 

x = the number of respondent

<sup>&</sup>lt;sup>10</sup> Donald Ary, *Introduction to research in Education*, New york: CBS College Publishing, 1985, p. 143

<sup>&</sup>lt;sup>11</sup> *Ibid*, p. 70

<sup>&</sup>lt;sup>12</sup> H Douglas Brown, *Teaching By Principles*, San Francisco: San Francisco State University, 2000, p. 387.

# y = items number

After getting the result, the researcher categories it into standard of validity as follows:

Interval	Criteria
0.80 - 1.00	Very valid
0.60 - 0.79	Valid
0.40 - 0.59	Valid enough
0.40 - 0.39	Less valid
0.20 - 0.39	Invalid
< 0.20	

 Table 3.1 Criteria of Validity Analysis

a. Construct Validity

According to Sudijono, "Validitas konstruksi dapat di artikan sebagai validitas yang ditilik dari segi susunan, kerangka, atau rekaannya."<sup>13</sup> (Construct validity is validity viewed from the construction aspect).

In this study, the researcher assigned the subject of the study to write concerning the aspects of thinking in the items (the cognitive and psychomotor aspects of free writing items) and the aspects of thinking in standard of competence, basic competence and indicator in the syllabus of Junior High School for the second grade students.

<sup>&</sup>lt;sup>13</sup> Anas Sudijono, *Pengantar Evaluasi Pendidikan*, Jakarta: PT. Raja Grafindo Persada, 2007, p. 166

b. Content Validity

According to Djiwandono, "Validitas isi menuntut adanya kesesuaian isi antara kemampuan yang ingin di ukur dengan tes yang digunakan untuk mengukurnya."<sup>14</sup> (Content Validity demands the existence of the content appropriateness between ability that want to be measure with the test use to measure it).

The researcher used objective test for students. The researcher wants to know students` score in using verbal sentence in simple past, so the test must measure the students` ability in using verbal sentence in simple past.

The distribution of the content can be seen in the following table:

# TABLE OF CONTENT SPECIFICATION

Subject	: English	Grade	: VII, Semester 1
Time Allocation	: 60 minutes	Items Types	: Essay and Multiple

Choice

# Table 3.2

# **Content of Specification**

No.	Item Types	Content	Item
		1. Positive Sentences	13
	1 Multiple Choice	a. Irregular b. Regular	6
	2.Negative Sentences	4	

<sup>&</sup>lt;sup>14</sup> M. Soenardi Djiwandono, *Tes Bahasa dalam Pengajaran*, p. 92.

		3.Interrogative Sentences	
	a. Yes-No question	1	
		b. WH question	6
		1. Positive Sentences	
		a. Irregular	5
	b. Regular	2	
2.	2 Completion	2. Negative Sentences	3
2. Completion	3. Interrogative Sentences		
	a. Yes-No question	2	
		b. WH question	3
		Total	40 items

4. Index of difficulty

The index of difficulty (or the facility value) of an item simply shows how easy or difficult the particular item proved on the test.<sup>15</sup> To know the level of the difficulty of test, using F.V as follows:

$$F.V = R$$

Notes: F.V = index of the difficulties

R = the number of the correct answer

N = the total of the students

Then, the application result of the formula commented with the following qualifications:

<sup>&</sup>lt;sup>15</sup> Arikunto, Suharsimi. Prosedur Penelitian. Jakarta : Rineka Cipta. 2002, p. 108

F.V = 0.00 - 0.30 = difficult= 0.31 - 0.70 = medium $= 0.71 - 1.00 = easy^{16}$ 

# F. Data Collection Procedures

Collecting data method is the ways that can be used by researcher to collect data.<sup>17</sup> They are interview, observation, questionnaire, test and documentation. Documentation and test were applying in this study. They are:

1. Test

Arikunto said that the test is a number of questions, exercises or equipments that it is used to measure individual's component, knowledge, intelligence, ability and talent. A test is used to find out the students difficulties in using verbal sentences in Simple Past Tense. As has been stated previously, there was a problem that has investigated. By this test, the researcher identified the students' difficulties in using verbal sentences in Simple Past Tense and gave the students a test by answering some questions.<sup>18</sup>

In this research, the researcher used test as the instrument in collecting the data. The researcher will use multiple choice tests, reconstruction, and completion. The test was given to the students and then they collected their works. The following were the steps in collecting data:

<sup>&</sup>lt;sup>16</sup> J.B. Heaton, Writing English Language Test. England: Longman, 1974, p. 173

<sup>&</sup>lt;sup>17</sup>Suharsimi Arikunto, *Manajemen Penelitian*. Jakarta: PT. Rieneka Cipta, 2009, p. 100 <sup>18</sup> Arikunto, Suharsimi. *Prosedur Penelitian*. Jakarta : Rineka Cipta. 2002, p. 127

- Determined the research subject those are the students of Mts Annur Palangka Raya, and problems and then asked the permission of the head of this institution.
- 2) The researcher gave a try out.
- 3) And then the researcher gave a test. In this case, the researcher has given the students writing test by answering multiple choice and completion. The test is used to know the students' difficulties in using verbal sentences in simple past tense.
- 4) The researcher collected the result of the test.
- 5) Finally, the researcher scored the result of the test in order to know the students' difficulties in using verbal sentences in simple past tense.
- 2. Documentation

Documentation is searching the data. It is about note, book, newspaper, magazine, etc. The researcher uses this method to obtain data which is related to this research. The purpose in using documentation in this research is to support the data that is gotten in the field so the data is admitted the data validity. Arikunto also gives statement that: "Documentation is to find out some data related to note, transcript, book, newspaper, magazine and the other. The documentation is a technique in collecting data by using documents of writing that is gotten and related to the data needed." <sup>19</sup> Those documents such as:

- 1. The students' name as subject.
- 2. The students' worksheet of multiple choice and completion test.
- 3. The result of the students' answer (the students' score)

# G. Data Analysis Procedures

After collecting the data, the researcher analyzed the data. It used percentage descriptive quantitative analysis in giving the score to find out the students' difficulties in using verbal sentence in simple past tense. It can be defined as the process of analyzing data required from the result of the research. The researcher gave multiple choice and completion tests to the students. It contain of 25 multiple choices, and 15 completions. The score of correct answer is 1 and 0 to each wrong answer. The result of the test has been analyzed by using percentage scoring as following formula:

$$Score = \frac{\sum Right \ answer}{\sum items} 100\%$$

After giving percentage of score, then the researcher gave five letters: A, B, C, D and E to classify the grade of students' scores level as follows:

<sup>&</sup>lt;sup>19</sup> *Ibid*, p.101

The percentages of correct answer grade:

81 - 100 %	A: Excellent
61 - 80 %	B: Good
41 - 60 %	C: Fair
21-40 %	D: Less
0-20 %	E: Poor