#### **CHAPTER III**

## RESEARCH METHOD

This chapter will discuss about research design, participants, research instrument, data collectoin technique, and data analysis technique.

## A. Research design

The design of this research is survey research design. According to Creswell (2012), survey research design is a procedure in quantitative research in which the researcher conducts a survey for a sample or to the entire population of people to describe attitudes, opinions, behavior, or characteristics of a population. In this procedure, survey researchers collect quantitative data using questionnaires or interviews and statistically analyse the data to describe trends about responses to the questions and to test research questions or hypotheses. The researcher used survey design to identify the students' perceptions on the use of online learning in learning English.

In this research, the researcher used questionnaire and interview to collect the data. Questionnaire used to collect quantitative data which is to identify students perception on the use of online learning in Learning English. While, the interview used to identify the problems faced by the students and how to solve students' problem in the use of online learning in learning English.

# B. Participant

Participant is a person who participates in research. The participant of this research is the students of State Islamic Senior High Schools of Nganjuk, which are consist of students of MAN 1 Nganjuk, MAN 2 Nganjuk, and MAN 3

Nganjuk. The students who participate in this study had taken the online learning in learning English.

#### C. Research Instrument

## 1. Questionnaire

In this research, the researcher used questionnaire as the research instrument to obtain the data about students' perception. According to Juliansyah (2013), questionnaire is data collection techniques by sending or distributing a questionnaire to respondents with the hopes that they will respond the questionnaire. There are two types of questionnaire, closeform questionnaire and open-form questionnaire. Close-form questionnaire will help the respondent to answer quickly, because the researcher provides an alternatives answer to them. On the other hand, open-form questionnaire is a question that expect the respondent to write their answer about something descriptively (Sugiono, 2009).

The researcher used close form questionnaire to find out students perceptions on the use of online learning in learning English. The contents of the questionnaire adapted from similar previous study conducted by Vinayak & Kalpana (2019), Mustika (2017), and Nuryansyah & Pudji (2018). There are 30 statements in the questionnaire and used Likert Scale to measure students perception. Likert scale is used to measure the attitude, opinion, and perception of a person or group about social phenomena (Sugiyono, 2009). Therefore, the answer can be scored in likert scale as follows:

a. Strongly agree = 5

b. Agree = 4

c. Neutral = 3

d. Disagree = 2

e. Strongly disagree = 1

#### 2. Interview

In addition to using questionnaires, the researcher also use interview as research instruments to identify the problems faced by the students and how to solve students' problem in the use of online learning in learning English. Rosaliza (2015) states that interview is one of the methods of collecting data that is most commonly used in social research. Interviews are used to obtain information related to facts, beliefs, feelings, desires and so needed to meet the research objectives. According to Cresswel (2012), an interview survey is a form in which researchers record thez answers given by participants in the study. The researcher asks questions from the interview guideline, listens for the answers, and records the responses of the survey. In quantitative survey interviews, researchers use structured or semi-structured interviews that consist mainly of closed questions, provide answers to the interviewee, and record their responses.

In this study, the researcher conducted structured interviews to gain insight into students' perceptions, students' problems and the way they solve their problems on the use of online learning in learning English. The contents of the interview used in this study were adapted and simplified

from previous similar studies conducted by Windhiyana (2020), Fatima (2019), and Putra (2015) which investigated students' perception on the use of online learning.

## D. Validity and Reliability of the Instrument

## 1. Validity

Validity is a measure that shows the levels of validity or validity of an instrument (Suharsimi Arikunto, 2010). A measuring device is valid if it does what it should do and measures what it should measure. If the measurement scale is invalid, then it is not useful for the researcher because it does not measure or do what is supposed to be done.

In this study the researcher tried to determine the validity of the instrument using the validity of the construction test and tested it to the respondents. According to Sugiyono (2014) to test the validity of construction, the judgment of experts can be used. After the instrument is arranged in accordance with the aspects that will be measured based on certain theories, it is then consulted with experts. The expert is someone who is in control of the material to be tested. The experts were asked for their opinions regarding the instruments that had been prepared. The results of the construct validity by the experts are then used as a reference to perfect the instrument that has been made. The validator in this study was Mrs. Ria Fachrurriana, M.Pd. She stated that everything was good, just add information from the Likert scale used in the questionnaire.

After consultation with the validator, the questionnaire was tested on students with a sample of 15 respondents. Validity measurements using the SPSS 24.0 for the Windows computer program. Criteria for decision making in determining whether the items are valid or not, according to Sugiyono (2016) states that if the coefficient between items and total items is equal to or above 0.3 then the item is declared valid, but if the correlation value is below 0.3 then the item is declared invalid.

The validity test of this study was calculated using SPSS 24.0 for Windows. The results of the validity test were then compared with the value of the r-table at the significant level of 5% with n=15, which is 0.514, the items are said to be valid if the r-obtained is greater than 0.514.

Based on the indicators of students' perception regarding online learning, 36 statement items were developed. After testing the validity, there are 30 statements that are classified as valid and 6 statements that are classified as fall/invalid. Invalid statements are number 1, 3, 18, 31, 34, and 36. Statements that are null/invalid are not used in the study.

## 2. Reliability

Suharsimi Arikunto (2010) states that reliability refers to the understanding that an instrument can be trusted enough to be used as a data collection tool because the instrument is already good.

A questionnaire is said to be reliable if a person's answers to questions are consistent from time to time. While a variable is said to be good if it meets the value of Cronbach's Alpha > 0.60. The reliability status of each

variable can be said to be reliable if the value of Cronbach's Alpha > r  $_{table}$  (Sutrisno Hadi, 2000). The table below shows the statistical calculations of Cronbach's Alpha with SPSS 24.0.

**Table 3.1 Reliability Statistics** 

Cronbach's Alpha	N of Items
0,758	36

Based on the table 3.1, the Cronbach's Alpha is 0,758. It can be conclude that the instrument is reliable because 0,758 is higher than r  $_{\text{table}}$  (0,514). Thus, the instrument have fulfilled the requirements as a means of retrieving research data because they have been tested for their validity and reliability.

## E. Data Collection Technique

Data collection is a process of gathering information from various sources. In this study, the researcher used questionnaire and interview as an instruments to collect data. There are several procedures to collect the data. The procedures are:

- 1. Preparing intruments that will be used for research.
- 2. Make a questionnaire about students' perception on the use of online learning in learning English.
- 3. Then, the questionnaire needs to get validity from the expert of this research.
- 4. Conducting try out to test the validity and reliability of the questionnaire.
- 5. Collecting the data by distributing the questionnaire through Google form.
- 6. Interviewing the students after making an agreement first with research informants about the time to conduct interviews. The researcher conducted

interview through the WhatsApp application using Voice Note feature due to the pandemic.

7. After gathering the data, the researcher analyzes the data quantitatively and explain descriptively by making conclusion as a result of research.

# F. Data Analysis Technique

The data obtained from questionnaire were analyzed statistically by calculating the percentage of students' answers in each questionnaire item. It used to determine students' perception on the use of online learning in learning English. Based on Sudjana (2008), the formula used is:

$$P = \frac{F}{N} \times 100\%$$

**Notes:** 

P = Percentage

 $\mathbf{F} = \mathbf{Frequency}$ 

N = Number of sample

**100%** = Constant of value

The data obtained from interview were transcribed and analyzed to repeat matters related to the use of online learning. This interview intended to clarify students' perception on the use of online learning, problems faced by students, and how to solve students' problem on the use of online learning in learning English.