

CHAPTER III

RESEARCH METHOD

In this chapter, the researcher presents the research method. It consists of research design, population and sample, research variable, research instrument, data collection method and data analysis.

A. Research Design

Based on the research problems that have been stated before, the researcher used the quantitative research methodology with the correlational design. According to Ary et al (2010, p.421), quantitative research is inquiry employing operational definition to generate numeric data to answer predetermined hypotheses or question. These variables can then be monitored normally utilizing instruments, allowing for the statistical analysis of numerical data. The final written report follows a predetermined format that includes an introduction, background information, methods, findings, and discussion.

According to Creswell (2008, p.358), correlational research indicates an association between two or more variables. In addition, according to Ary et al (2010, p.351), correlational research is useful in a wide variety of studies. Mostly, the correlational design is applied to: (1) assess the the relationship; the correlational design is used to assess the relationship between two or more variables in a single group of subjects); (2) assess the prediction; for instance, if you discovered that two variables were correlated, you can use one variable to predict the other; and (3) assess the consistency; correlational research can be used to measure the consistency in a wide range of situations. In order to determine the relationship between students' reading habits, reading

comprehension, and vocabulary mastery, the researcher utilized a correlational design.

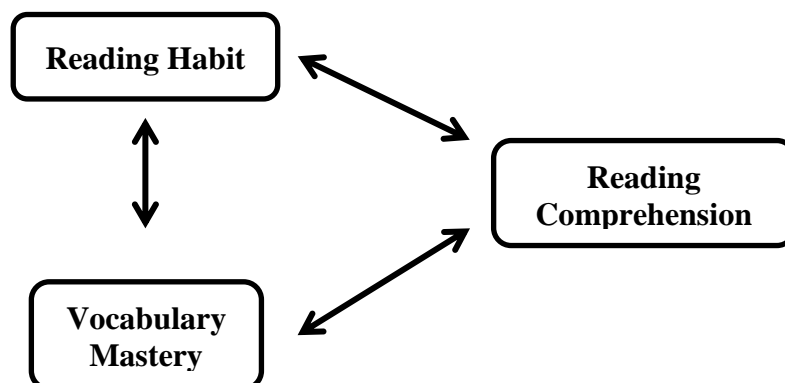
B. Population and Sample

According to Creswell (2005, p.145) population is a group of individuals who have the same characteristic. The population may consist of all people of a certain type or only a smaller subset of that group. The participants in this study were second-semester English department students at IAIN Kediri. There were 145 students in all.

Due to time, resource, and financial constraints, the researcher can only collect a sample of the population or a subset of the population. Arikunto (2006) asserts that all should be used if the subject is less than 100. On the other hand, if the subject is over 100, 10-25 percent of it can be taken. 51 of these were chosen as samples by the researcher. Using simple random sampling, the researcher selected the sample for this study..

C. Research Variable

In this study there are 3 variables, they are students' reading habit (X1), reading comprehension (Y), and vocabulary mastery (X2).



D. Research Instrument

Research instruments are tools that researchers use to measure participants. This is done to obtain both supporting and primary data. In this research, the researcher used to collect data through:

1. Research Instruments Development

a. Questionare

According Ary et al (2006, p.648), questionnaire is an instrument in which respondents provide written responses to questions or mark items that indicate their response. According to Cohen (2005, p,245) Questionnaire is a list of questions that given to the subjects of a research that usually forms in. The second semester IAIN Kediri students who participated in this study were given a questionnaire to fill out in order to assess their reading habits.

The reading habit questionnaire utilized in this study was created by Khalisa's research (2018) and comprised of 20 statements with phrasing changes to make it simpler for the students to understand the content. This questionnaire is closed-ended (checklist). The Likert scale approach was used to create the questionnaire for this study. Likert scale, according to Arikunto (2010), is a statement that is followed by a table that displays the scale. as in starting from strongly agreeing to strongly disagreeing. Following are the indicators on a Likert scale questionnaire item's scores.

Table. 3.1

Indicator score of reading habits

No.	Alternative Answer	Score
1.	Strongly agree	5
2.	Agree	4
3.	Neutral	3
4.	Disagree	2
5.	Strongly disagree	1

There are numerous indicators in the questionnaire that was presented to the students. The indicators were derived from Shen's (2006) idea of the indicators of reading habit. They are: reading motivation, reading frequency, reading materials, and average time spent reading. The indicator that the author used in the questionnaire is shown in the following table. The complete questionnaire can be seen in appendix 1.

Table 3.2

Reading Habit Indicators

No.	Reading habit indicators	Item number
1.	Reading Motivation	2, 3, 12, 13, 15, 16, 19, 20
2.	Reading Frequency	4, 11, 18, 7
3.	The Material Readers Read	6, 9, 10, 1
4.	The Average Readers Spent To Read	5, 14, 17

b. Test

According to Ary et al (2010, p.201) the test itself consists of a series of stimuli that are shown to a subject in order to elicit reactions from them, from which a score may be calculated. According to Djiwandono (2008), there are two different types of exams based on how they are scored: objective tests and subjective tests. An objective test is a type of questioning with only one right response. It includes multiple choice, yes or false, fill in the blank, and matching tests. In such case, a subjective test is a type of inquiry where there may be more

than one right response (or more than one way to communicate the right response). The author administered a multiple-choice test to gauge the comprehension of each student's reading..

1) Reading Comprehension Test

The test was conducted within 60 minutes. The test of reading comprehension was an objective test in the form of multiple choice tests. The item of the test consisted of 30 items of a multiple choice question. The following table presents the blueprint of the reading comprehension test. The complete reading test can be seen in appendix 2.

Table 3.3

Reading Comprehension Blueprint

No.	Reading comprehension indicators	Item number
1.	Finding Main Idea	1, 5, 13, 21, 25, 29
2.	Finding Specific Information	2, 6, 9, 12, 14, 19, 20, 24, 26, 27
3.	Finding Reference	3, 8, 10, 15, 18, 22, 30
4.	Finding Inference	4, 7, 11, 16, 17, 23, 28
	TOTAL	30

2) Vocabulary Mastery Test

The test was used to measure students' vocabulary mastery. The item of the test consisted of 30 items of a multiple choice question. The test was conducted within 60 minutes. The following table presents the blueprint of the vocabulary mastery test. The complete vocabulary test can be seen in appendix 3.

Table 3.4

Vocabulary Mastery Blueprint

No.	Vocabulary Mastery Indicators	Item number
1.	Finding Meaning	1, 2, 3, 4, 5, 6, 7, 8
2.	Finding Synonym	9, 10, 11, 12, 13, 14, 15, 16
3.	Finding Antonym	17, 18, 19, 20, 21, 22, 23, 24
4.	Finding Appropriate Word for The Context	25, 26, 27, 28, 29, 30
TOTAL		30

2. Validity Test

It is a valid instrument if it can measure what the researchers want to measure. (Arikunto, Prosedur Penelitian, 2010, p. 168). Validity is a measure of how well, accurately, meaningfully, and usefully of the specific conclusions made by the researcher are referred to as validity (Fraenkel et al, 2012:147). That justification leads the researcher to conclude that a validity test is necessary for the study since it is crucial to evaluating the accuracy of the instrument that will be used to gather data. For the reading comprehension test, vocabulary proficiency test, and questionnaire on reading habits, the researcher utilizes IBM SPSS 29.0 to calculate the Pearson Product Moment. The test is deemed valid if the r-result is higher than the r-table. The test is invalid if the r-result is less than the r-table.

Table 3.5

Validity Result of Reading Habit

No.	Item	Value	R _{table}	Result
1	Item 1	0.714	0.361	VALID
2	Item 2	0.689	0.361	VALID
3	Item 3	0.663	0.361	VALID
4	Item 4	0.541	0.361	VALID
5	Item 5	0.723	0.361	VALID
6	Item 6	-0.107	0.361	INVALID

7	Item 7	0.466	0.361	VALID
8	Item 8	0.854	0.361	VALID
9	Item 9	0.705	0.361	VALID
10	Item 10	0.422	0.361	VALID
11	Item 11	0.589	0.361	VALID
12	Item 12	0.451	0.361	VALID
13	Item 13	0.435	0.361	VALID
14	Item 14	0.704	0.361	VALID
15	Item 15	0.689	0.361	VALID
16	Item 16	0.787	0.361	VALID
17	Item 17	0.537	0.361	VALID
18	Item 18	0.507	0.361	VALID
19	Item 19	-0.170	0.361	INVALID
20	Item 20	-0.316	0.361	INVALID

Based on the table above, the researcher concluded that there are 17 valid items because $r_{\text{value}} > r_{\text{table}}$. There are 3 items are invalid because $r_{\text{value}} < r_{\text{table}}$.

Table 3.6

Validity Result of Reading Comprehension

No.	Item	Value	R_{table}	Result
1	Soal 1	0.758	0.361	VALID
2	Soal 2	0.650	0.361	VALID
3	Soal 3	0,779	0.361	VALID
4	Soal 4	0.626	0.361	VALID
5	Soal 5	0.504	0.361	VALID
6	Soal 6	0.046	0.361	INVALID
7	Soal 7	0.604	0.361	VALID
8	Soal 8	0.733	0.361	VALID
9	Soal 9	0.453	0.361	VALID
10	Soal 10	0.613	0.361	VALID
11	Soal 11	0.414	0.361	INVALID
12	Soal 12	0.392	0.361	VALID
13	Soal 13	0.492	0.361	VALID
14	Soal 14	0.525	0.361	VALID
15	Soal 15	0.604	0.361	VALID

16	Soal 16	0.785	0.361	VALID
17	Soal 17	0.623	0.361	VALID
18	Soal 18	0.578	0.361	VALID
19	Soal 19	0.088	0.361	INVALID
20	Soal 20	0.119	0.361	INVALID
21	Soal 21	0.613	0.361	VALID
22	Soal 22	0.181	0.361	INVALID
23	Soal 23	0.704	0.361	VALID
24	Soal 24	0.432	0.361	VALID
25	Soal 25	0.724	0.361	VALID
26	Soal 26	0.335	0.361	INVALID
27	Soal 27	0.133	0.361	INVALID
28	Soal 28	0.632	0.361	VALID
29	Soal 29	0.088	0.361	INVALID
30	Soal 30	-0.020	0.361	INVALID

Based on the table above, the researcher concluded that there are 21 valid items because $r_{\text{value}} > r_{\text{table}}$. There are 9 items are invalid because $r_{\text{value}} < r_{\text{table}}$.

Table 3.7

Validity Result of Vocabulary Mastery

No.	Item	Value	R_{table}	Result
1	Soal 1	0.557	0.361	VALID
2	Soal 2	0.007	0.361	INVALID
3	Soal 3	0.738	0.361	VALID
4	Soal 4	-0.043	0.361	INVALID
5	Soal 5	0.901	0.361	VALID
6	Soal 6	0.079	0.361	INVALID
7	Soal 7	-0.056	0.361	INVALID
8	Soal 8	0.115	0.361	INVALID
9	Soal 9	0.435	0.361	VALID
10	Soal 10	-0.191	0.361	INVALID
11	Soal 11	0.901	0.361	VALID
12	Soal 12	0.901	0.361	VALID
13	Soal 13	0.901	0.361	VALID
14	Soal 14	0.901	0.361	VALID
15	Soal 15	0.901	0.361	VALID
16	Soal 16	0.601	0.361	VALID

17	Soal 17	0.901	0.361	VALID
18	Soal 18	0.738	0.361	VALID
19	Soal 19	0.901	0.361	VALID
20	Soal 20	0.571	0.361	VALID
21	Soal 21	0.404	0.361	VALID
22	Soal 22	0.619	0.361	VALID
23	Soal 23	0.601	0.361	VALID
24	Soal 24	0.901	0.361	VALID
25	Soal 25	-0.063	0.361	INVALID
26	Soal 26	0.601	0.361	VALID
27	Soal 27	-0.102	0.361	INVALID
28	Soal 28	0.901	0.361	VALID
29	Soal 29	-0.601	0.361	INVALID
30	Soal 30	0.901	0.361	VALID

Based on the table above, the researcher concluded that there are 21 valid items because $r_{\text{value}} > r_{\text{table}}$. There are 9 items are invalid because $r_{\text{value}} < r_{\text{table}}$.

3. Reliability Test

According to (Fraenkel et al., 2012:154), dependability is about how consistent the scores are from one use of an instrument to the next and from one set of items to the next for each person. It means that when the researcher conducts the test several times and at various times, the score should be essentially the same. A reliable tool will handle reliable data and may be trusted to be used for data collection. Although some of the text and questions were taken from the English book written by the Educational and Cultural Ministry, which was reviewed and edited by the Educational and Cultural Ministry before being published, the researcher will use SPSS version 29.0 to conduct a reliability test to determine whether the test is reliable or not. If r_{obtained} is greater than r_{table} , the test is said to be reliable. (Arikunto 2019, p.276), says that the reliability coefficient is based on:

Table 3.8

The Coefficient of Reliability

Coefficient Interval	Levels of Reliability
0.80 < 1.00	Very high reliability
0.60 < 0.80	High reliability
0.40 < 0.60	Fair reliability
0.20 < 0.40	Low reliability
0.00 < 0.20	Very low reliability

The researcher used the Alpha Cronbach Formula and SPSS 29.0 to figure out how reliable Reading Habit was. In the table below, you can see the results of the reliability test:

Table 3.9

Reliability Table of Reading Habit

Reliability Statistics	
Cronbach's Alpha	N of Items
0.857	20

Based on the data above, the result of the reliability of students' reading habits is acquired the reliability coefficient= 0.857 in $r_{table} = 0.361$ at the level of significance 0.05 for the number of students is 30 students. It means that this questionnaire is highly reliable and can be used for the next test.

Table 3.10

Reliability Table of Reading Comprehension

Reliability Statistics	
Cronbach's Alpha	N of Items
0.885	30

Based on the data above, the result of the reliability of students' reading habits is acquired the reliability coefficient= 0.885 in $r_{table} = 0.361$ at the level of significance 0.05 for the number of students is 30 students. It means that this reading comprehension test is highly reliable and can be used for the next test.

Table 3.11

Reliability Table of Vocabulary Mastery

Reliability Statistics	
Cronbach's Alpha	N of Items
0.885	30

Based on the data above, the result of the reliability of students' reading habits is acquired the reliability coefficient= 0.885 in $r_{table} = 0.361$ at the level of significance 0.05 for the number of students is 30 students. It means that this vocabulary mastery test is highly reliable and can be used for the next test.

E. Data Collection Method

To gather all of the data required for this research, data gathering is employed. The researcher gave the second-semester English Department students at the Islamic State Institute of Kediri a research instrument that was used to collect quantitative data for this study.

On the first day, the researcher give the reading habit questionnaire and also the reading test to the participants of this research, wich is the second semester english department students of IAIN Kediri. The researcher give 20 minutes for students to do the questionnaire, and 60 minutes to answer the reading text. So it will take 80 minutes to do the both. The researcher classified the classification of the students' reading habits and offered the reading habit questionnaire to see the ranking of their answers in order to measure the students' reading habits. The following table will be used to classify the students' results from the reading habit questionnaire, reading comprehension test, and vocabulary mastery test. (see table 3.12).

Table 3.12

Classification of Students' Score

No.	Category	Score
1.	Very high	80-100
2.	High	60-79
3.	Middle	40-59
4.	Low	20-39
5.	Very low	0-19

Source : Rasyid, D (2012)

On the second day, the researcher do the reading and vocabulary test. This test also need to be done for only 60 minutes. After gathering the data, the researcher will evaluate the students' responses and check their accuracy. In the final step, the researcher will compute the data after obtaining the results of the tests for vocabulary mastery, reading comprehension, and reading habit.

F. Data Analysis

The researcher used a quantitative analysis to figure out how to look at the data. According to Cresswell (2012), quantitative research can be used to define a research topic by looking for patterns or a desire to explain the relationship between variables. To collect numerical data from a large number of people, devices with prepared questions and replies are utilized. Now that the data has been computed, it will be examined, and the analysis will use scoring techniques with SPSS 29.0.

The researcher used correlational technique to analyze the correlation between students' reading habit, reading comprehension, and vocabulary mastery. To find out the correlation between those variables, the researcher used *Spearman Rank Correlation Coefficient (rs)*.

The range of values for the Spearman correlation coefficient is from -1 to 1. When two variables have values that are close to 1, it suggests that they are very positively connected to one another. When the correlation value is close to -1,00, it indicates a negative relationship between the variables. In contrast, if the value is close to 0, it indicates that the variables have only a weak relationship (Ary et al., 2006). According to Spearman's Rank Scale. The other interpretation of correlation scale also determined by Spearman's Rank Scale as follow:

Table 3.13

The Interpretation Table of Spearman's Rank Formula Correlation Coefficient

Coefficient Correlation (CC)	Category
0.00 – 0.25	Very Low Correlation
0.26 - 050	Low Correlation
0.51 – 0.75	Average Moderate Correlation
0.76 – 0.99	High Correlation
1.00	Very High Correlation

To determine the significant hypothesis based on the value of coefficient

correlation were formulated as follows:

- $\text{Sig} < 0.05$ H_0 is rejected, H_a is accepted. It means there is the correlation.
- $\text{Sig} > 0.05$ H_0 cannot be rejected, H_a is accepted. It means there is no correlation.