

Chapter Three

Research Methodology

This chapter discusses the methodology used in this research. The first discussion was about the research design of this research. Then, the second information is about the setting of conducting this research. The third discussion is explaining the population, sample, and sampling technique that will participate in this research. Then, the next sub chapter explains about the data collection instrument and data collection procedure used in this research. Next, the validity and reliability are explained. After that, this chapter discusses about the data analysis used in this research.

Research Design

The purpose of this research was to find out the strongest category of autonomous learners' behaviors and the autonomous learning level of the students in English Language Education Department of a private university in Yogyakarta. The researcher explored what was the autonomous learners' behaviors category which is frequently done by the students and the researcher also found the autonomous learners' level based on the respondents' opinion. This purpose was in line with the purpose of conducting the quantitative research design which describes the problem based on the description of trends (Deslandes & Bertrand, 2005). Quantitative research design is used to study the autonomous learning behaviors which become the trend in educational field now on.

Then, this research used cross-sectional survey design. Creswell (2012), stated that a cross-sectional survey can investigate the current attitudes, beliefs, opinions or practices. Autonomous learning becomes the current issue in educational field now on and it becomes the practice of successful language teaching and learning, so that the researcher investigated about the strongest category of behaviors of autonomous learners in English Language Education Department of a private university in Yogyakarta using the cross-sectional survey design. Cross-sectional survey design is appropriate for studying about the autonomous learning behaviors which become current practice in educational field.

Research Setting

This research was conducted at English Language Education Department of a private university in Yogyakarta. English Language Education Department was suitable for this research because the teachers taught large classes. Autonomous language learning programs can be tested properly in large classes (Murray, 2008). Large classes are suitable for exploring the autonomous learning behaviors because it contained of many students who have different characteristics and different learning behaviors.

Population and Sampling Technique

According to Creswell (2012), population is a group of individuals who has one character which is different from others. The sample is the part of the population. Both explanations were explained below.

Population. The population of this research was English Language Education Department students batch 2016 consisted of 95 active students that were grouped into 3 classes. It consisted of group A, group B, and group C. The researcher chose that population because English Language Education Department students batch 2016 still has theoretical class in English Language Education Department and they have already learnt English in this university at least for two years, so that they understand about their learning behaviors.

Sampling technique. This research used total sampling which used the total respondents from the entire population as the respondents. Total population sampling is a sampling technique where the whole population have met the criteria are belonged in the conducted research and it usually used where the number of cases being researched is relatively small (Etikan, Musa, & Alkassim, 2016). The population of English Language Education Department students batch 2016 is 95, so that the researcher decided to use the total number of population. The researcher chose the whole English Language Education Department students batch 2016 who attend the same course in the classroom to avoid getting the double data from the same respondent. The researcher got seventy-five data from the three classrooms because there were twenty students who did not attend the lesson. And then, the researcher created the questionnaire using Google form and sent it through WhatsApp application. There were five students did not fill out the questionnaire, so that the total data was ninety data from ninety respondents.

Data Collection Instrument

This research gained the data using closed and structured questionnaires which described about some categories related to autonomous learning behaviors. Highly structured, closed questionnaire are beneficial for arousing the accepted response frequencies to statistical treatment and analysis (Cohen et al., 2011). Closed and structured questionnaire was used for focusing the respondents to the questionnaire items and scales.

The researcher adopted the questionnaire from Murray (2008) entitled autonomous learning behaviors which is made based on the six categories of autonomous learning behaviors (Fenner & Newbie, 2000). Then, Murray added one autonomous learning category, so that there were seven categories used as the autonomous learning behaviors categories of the questionnaire. This questionnaire consisted of 34 items. The original questionnaire items made by Murray had frequency scale from one to five, and this research used five frequency scales to keep the originality of the questionnaire, and that it could measure the frequency of doing autonomous learning behaviors. The five scales were never (1), sometimes (2), seldom (3), often (4), and always (5). The original questionnaire items consisted of seven parts of autonomous learning behaviors. They are reflection, setting goals, planning, evaluating learning, learning styles and strategies, materials and classroom activities, and external resources. Then, Murray developed these behaviors into several statements which became the questionnaire items.

Then, the researcher translated the items into *Bahasa Indonesia* to ease the respondents in understanding the items and avoiding confusion. Two expert judgements were invited to give suggestion of the translation of each questionnaire items. The researcher revised translated items based on the suggestion of expert judgements. And then, the researcher put the question items randomly in order to make the respondent answer the items based on their thought, so that they do not lean to a specific category.

Table 1

Number of Questionnaire Items per Category

Categories	Items
Reflection	1, 8, 15, 22, 25
Setting Goals and Level	2, 9, 10
Planning	16, 3, 17
Evaluating Learning	4, 11, 18, 23, 26
Learning Styles and Strategies	5, 12, 19
Materials and Classroom Activities	6, 13, 20, 24, 27, 29, 31, 33, 34, 32, 30, 28
External Resources	7, 14, 21

Data Collection Procedure

The researcher entered the three classrooms and distributed the questionnaire independently or using self-administered questionnaire. Learners

were given the questionnaire on the frequency of their use of autonomous language learning behaviors. The researcher made sure the whole students get the questionnaire. Then, the researcher explained the way of filling the questionnaire correctly. The presence of the researcher helps to answer the uncertainties of the questionnaire items (Cohen et al., 2011). The researcher suggested to the respondents to ask if they have question regarding to the questionnaire items.

The researcher distributed the questionnaire to the respondents in the same course to avoid getting double data from the same respondents. The researcher took the data in the course of Instructional Development in 3 classes. There was approximately 15 minutes for the respondents to fill the questionnaire. The researcher took data from students class C on December 26th 2018 and the researcher obtained data from 31 students. Then, the researcher gathered the data on December 29th for class B and she got data from 23 students. And then, the researcher entered class A on January 4th 2019 and she got data from 21 students. There were 15 students who did not attend the course and the researcher sent the questionnaire through WhatsApp to 20 students. Then, 5 students did not respond to the WhatsApp, so that the total data gathered in this research was from 90 students.

Validity and Reliability

In quantitative research, validity and reliability are also important. Validity is used for making the appropriate translation of the adopted questionnaire and make sure that the translation is clear enough. Validity refers to whether or not the questionnaire items are actually measuring what it is supposed to. Then, reliability

is used to prove that the questionnaire can be used in the same way and the result is still reliable. Reliability is when the result of the questionnaire items produces consistent result when used to measure the same thing over and over.

Validity. The items of the questionnaire were tested by the expert judges. The researcher invited two expert judges who are expert in terms of the field. They were lecturers of English Language Education Department. The expert judges were invited to review the translation and to check that the items are understood easily. They were also invited to give suggestion and recommendation. The researcher gave the translated questionnaire items to the expert judges and asked them to give suggestion and recommendation.

Both expert judges gave suggestion about the translation of several numbers. The expert judge 1 revised and gave the researcher suggestion about the translation of questionnaire items number 4, 5, 15, 16, 20, 25, 28, 29. Then, the expert judge 2 suggested to revised questionnaire items number 4, 5, 6, 15, 16, 26, 27, 29, 30, and 34. The questionnaire was revised and the researcher gave it back to the expert judges and there were no revision. Then, the researcher distributed the questionnaire based on the suggestion and recommendation of both expert judges.

Reliability. Cohen, Manion, Morrison (2011) stated that “Reliability is essentially a synonym for dependability, consistency, and replicability over time, over instruments, and over group of respondents.” The researcher used the questionnaire adopted by Murray and the questionnaire was already used in 2008

by Murray. Murray had already tested the questionnaire items before Murray used the questionnaire, so that the questionnaire items were considered to have been reliable.

Data Analysis

The researcher analyzed the data using descriptive statistic. Descriptive statistics describe and present data such as in terms of frequency (Cohen et al., 2011). The highest frequency of autonomous learning behaviors became the main point of this research. To know the trend of autonomous learning behaviors category in English Language Education Department, the researcher used the ordinal scales or frequency scales. Then, five scales were presented, namely never (1), sometimes (2), seldom (3), often (4), and always (5).

The maximum scale minus by the minimum scale, and then the result is divided by the n category. The maximum scale is 5 and the minimum scale is 1, and then the n category is 3. The formula will be $(5-1): 3 = 1.3$. So, the class interval for each category is 1.3. The table below is the table of category.

Table 2

Level of the Autonomous Learning

Scale	Category
3.71 – 5.00	Very autonomous
2.31 – 3.70	Autonomous
1.00 – 2.30	Less autonomous

The researcher counted the mean score of the questionnaire items based on the respondents' answers. Next, there would be the result about what is the mean score of the category of autonomous learning behaviors. Then, based on the table above, the result about the category of autonomous learners of English Language Education Department was revealed.