

## **CHAPTER III**

### **RESEARCH METHODOLOGY**

#### **A. RESEARCH METHODOLOGY**

##### **1. Research Design**

This research uses a qualitative approach. Qualitative research plays an important role in investigation by considering the social, cultural, and historical context surrounding a phenomenon. Creswell (2018) suggests that researchers who use qualitative methodology must describe and explore phenomena comprehensively. Qualitative research is "a research that intends to understand the phenomenon of what is experienced by the research subject, for example, behavior, perception, motivation, action, and so on." The qualitative model used in this research is a case study model. According to Yin (2012, p. 18), a case study is an empirical research model designed to find, understand, and analyze a particular case. This research explores phenomena in real-life situations, where the boundaries between the phenomenon and its context are invisible, and multiple sources of evidence are utilized.

Creswell (2015) notes that case study research is one of the qualitative approaches that explores real-life cases or multiple cases through in-depth data collection. Therefore, this study emphasizes the application of qualitative research to thoroughly explore the technological tools used by students in learning English, their perceptions of the benefits and drawbacks of using these technological tools, and the ways students interact with technology in the context of learning English. The case study research was

chosen because the objective of this research implement entrepreneurship education, and the activities are also ongoing. This research aims to describe and analyze technology-assisted learning media in teaching English to students of SMP Islam Al Azhar 53 Baturaja. This research provides a comprehensive description of what is experienced without any intervention from the researcher. This method is suitable for use because it can reveal data in depth about the analysis of technology-assisted learning media in teaching English to students of SMP Islam Al Azhar 53 Baturaja in the 2024/2025 academic year.

## 2. Research Setting

### a. Place of Research

This research will take place at SMP Islam Al Azhar 53 Baturaja which is located on Jl. Garuda Lintas Sumatera, Tj. Baru, Kec. East Baturaja, East Ogan Komering Ulu Regency, South Sumatra. Researchers chose Al-Azhar 53 Baturaja because this school is a school that has a level of education ranging from elementary to junior high school, which can allow researchers to get broader data about technology-assisted learning media in English language teachers used in the school and what problems are faced in implementing English language learning. This school also teaches students about English terms that are often used in public places so that it can help students when in its.

c. Research Subject

The subjects of this study are English teachers and students from SMP Islami Al-Azhar 53 Baturaja. The English teacher's name is Risti Nuratiah, S.Pd.

**B. Data and Source of the Data**

a. Data

Data refers to information obtained through specific data collection methods, which will be processed and analyzed using specific techniques to produce insights or indicators about a subject (Baba, 2017). Furthermore, qualitative data was collected through classroom observations and document analysis, which included lesson plans and teaching materials used in the learning process. This study draws on relevant previous research, including Tafonao's (2018) investigation into how learning media influences student interest and Widiyanto's (2021) report on the role of technology in education. The focus of this research is to analyze the application of technology-assisted learning media in English language instruction at SMP Al-Azhar Islami 53 Baturaja during the teaching and learning process. This data includes the application of tech-assisted learning media used by teachers and students during the learning process. The researcher received assistance in gathering data through both spoken and written language, which included audio recordings, instructional videos, and notebooks. Spoken data, consisting of words, phrases, clauses, and sentences, needed to be transcribed into written form for easier analysis. In contrast, written data can be analyzed directly without the need for transcription.

#### b. Source of Data

Data sources are a crucial component of research for researchers. The accuracy of selecting and determining the type of data sources significantly influences the precision, depth, and validity of the information obtained. Data cannot be acquired without the appropriate data sources. In qualitative research, various data sources can be utilized for information gathering, including documents or artifacts, informants, events or activities, locations, objects, images, and recordings. This study aims to apply technology-assisted learning media in the English language teaching process. Data were collected through observation, questionnaires, and documentation of the use of technology-based learning media by teachers and students in the classroom. Therefore, the data source for this study is qualitative data, because the nature of the information is not in the form of numbers but rather relates to the strategies used by educators in teaching English.

#### C. Research Instrument

Creswell (2014) states that research instruments function as tools that can be realized in various forms, such as interview, checklists, observation sheets, test questions, inventories, scales, and others. The instruments used in this study include: (1) problem formulation, research focus, research procedures, proposed hypotheses, and even expected results, all of which cannot be defined precisely and clearly in advance. Each aspect requires further development during the research. In these uncertain and unclear circumstances, there is no other choice, and the researcher himself is the only tool that can achieve it. To answer the

analysis of questions about appropriate technology-assisted learning media in teaching English to children of SMP Islam Al-Azhar 53 Baturaja with observation, interviews, and documentation. Researchers are the main source of information or data in this study. This study also used several additional instruments, namely recording devices and field notebooks, during the data collection process.

#### **D. Techniques of Collecting the Data**

The data collection technique is one of the most important steps in research because the main purpose of research is to get data. According to Arikunto (2019), the research method is the main method used by researchers to achieve goals and determine answers to the problems posed. In collecting data, researchers use observation, and documentation methods.

##### **1. Observation**

According to Amalia (2020), observation comes from Latin which means "to see" and "to pay attention". The term observation refers to the activity of paying attention accurately, noting the phenomena that appear, and considering the relationship between aspects of the phenomenon. Poerwandari (2017) emphasizes that observation is an important data collection method in qualitative research. For the data obtained to be accurate and useful, observation must be carried out by researchers who have gone through adequate training and have made careful and complete preparations. The purpose of observation is to describe the environment observed, the activities that take place, the individuals involved in the environment and the activities and behaviors that arise, and the

meaning of events based on the perspective of the individuals involved. This research adopts from Alvianaides (2021) and Aulia (2021). Researchers will observe how teachers apply technology-assisted learning media in English lessons at SMP Al-Azhar Islami 53 Baturaja.

## 2. Interview

The use of interviews in data collection enables researchers to delve deeper into answers related to the research issue (Flick, 2022). Conducting interviews enables respondents to freely share their ideas and provide a more detailed account of a wider range of information (Cresswell & Creswell, 2018). This study used interviews as a data collection technique in the study, collecting various information from one respondent, namely English teacher Risti Nuratiah, S.Pd, after obtaining consent from the respondent to conduct an interview session. The interview questions were adapted from Zulfa (2023). There are 10 questions for the interview session to get comprehensive and supportive data.

**Table 3.1**

### **The Specification Interview**

<b>No</b>	<b>Aspect</b>	<b>Indikator</b>	<b>No item</b>
<b>1</b>	Explore technological media tools used by teachers to teach English.	Teacher	1,2,3
<b>2</b>	Discovering students' perceptions of the use of Technology-Assisted learning media in English language learning		4,5,6
<b>3</b>	Identify in which part of the process Technology-Assisted learning media can help students in English learning		7,8,9,10

Source: Zulfa, S (2023). Tech-Assisted Learning Media Used In Students' English Academic Writing

### 3. Documentation

According to Sugiyono (2019), observation involves studying behavior." Through observation, researchers gain insight into the behaviors and meanings associated with these behaviors. The documentation method is a data collection technique that is carried out by collecting information that is not directly provided by the research subject. Documentation refers to written or recorded materials that serve as official information, evidence, or records of information. In this study, researchers will look at the teaching module for English lessons in two semester in classes 7,8,9 at SMP Islam Al Azhar 53 Baturaja.

### **E. Technique of Data Analysis**

Data analysis involves the process of systematically searching and organizing data obtained from questionnaires, field notes, and documentation. This process includes categorizing data, breaking it down into units, synthesizing, arranging it into patterns, selecting what is important and what will be studied, and finally making conclusions that can be understood by oneself and others (Sugiyono, 2019).

According to Sugiyono as cited in Nasution, (2019) In this context, it emphasizes that "Analysis begins with formulating and clarifying problems, before research in the field, and continues continuously during the writing of research results. Data analysis serves as a foundation for further research, potentially resulting in a 'grounded' theory."

Based on this statement, data analysis in qualitative research is carried out before researchers go to the field through preliminary or pre-research studies

to determine the focus of the problem. During the research stage in the field, data analysis occurs interactively when data is collected.

a. Data Reduction

According to Sugiyon (2019), data reduction is a thinking process that requires sensitivity, intelligence, and broad and deep insight. This thinking process is very important, especially for novice researchers, who can discuss the steps of data reduction with colleagues or individuals who have expertise in the field. After data has been collected through observation, questionnaires, and documentation methods, the next step is to streamline the information that has been obtained to facilitate the identification of data relevant to the research. After collecting all the data regarding the application of tech-assisted learning media in teaching English at SMP Islami Al-Azhar 53 Baturaja, the data reduction process was conducted to categorize the information into categories that are relevant and irrelevant to the research focus. In the data reduction process, each researcher is guided by the objectives to be achieved. The main objective of qualitative research centers on findings. Therefore, when researchers conduct research, any elements that seem unfamiliar, unfamiliar, or have no clear pattern should be the focus of attention during data reduction.

b. Data Display

Once the data has been collected, it is presented in a narrative format. A structured description of the data is created utilizing data visualization. The purpose of the narrative text is to convey significant statistics in a narrative

style and to depict previously classified media related to Tech-Assisted Learning Media for students of SMP Islam Al Azhar 53 Baturaja.

The final step in qualitative data analysis is conclusion drawing and verification. According to Sugiyono (2019), "conclusions in qualitative research are new findings that have never existed before." Verification is the process of assessing accuracy and determining the validity of the subject. In this study, verification emphasizes the procedures used to sequentially engage in the research process, ensuring the validity, reliability, and accuracy of the research. After obtaining accurate data on the application of technology-assisted learning media in English language learning for students in grades 7, 8, and 9, the results were analyzed by utilizing the collected data and field observations. Furthermore, the data was compiled together with the documentation and observation guidelines to validate the final findings regarding the application of technology-assisted learning media used by teachers in English language learning at SMP Islam Al Azhar 53 Baturaja.

#### **F. Trustworthiness of The Data**

This research requires data validity checking techniques. Data validity can be achieved by using a data collection process with data triangulation techniques. To test the validity of this research, researchers used triangulation. According to Sugiyono (2015), data triangulation is a data collection technique that combines various existing data sources. data triangulation is a method of checking data from various sources with various approaches and at different times. Data

triangulation includes source triangulation, triangulation of data collection techniques, and time triangulation. 66

According to Merriam (2009), Triangulation is of four types: the use of multiple methods or techniques, multiple data sources, different investigators, or multiple theories to validate emerging findings. Furthermore, this study used triangulation of methods or techniques. Triangulation of methods or techniques refers to the use of various data collection techniques, which allows for a comparison between what individuals stated during and what was observed in the field or what was documented in relevant materials regarding the phenomenon of interest.

The use of three different data collection methods interview observation, and documentation - demonstrates the application of triangulation in research. In this study, the researcher used these techniques to compare observational data collected in the classroom with questionnaire answers from students of SMP Islam Al Azhar 53 Baturaja, as well as information obtained from relevant documents. These documents included teaching modules and English learning materials. In this study, the data collected were reviewed in accordance with the theories underlying the research. This implies that theories regarding technology-based learning media will be used in the study to analyze the data collected. As a result, the data extracted from this research is based on the findings of data validity.