### **CHAPTER I**

# **INTRODUCTION**

This chapter provided an introduction to this research. It consisted of the Research Background, which explained the problem and the reasons why the researcher chose the topic, Identification of the Problem, Delimitation of the Research, Research Questions, Aim of the Research, Significance of the Research, Theoretical Foundation, Previous Research, Framework of Thinking, and Research Method.

#### 1.1. Research Background

The rapid spread of the Coronavirus (COVID-19) turned it into a global health crisis, affecting people worldwide, including in Indonesia. To address this situation, the government implemented a lockdown policy, requiring citizens to stay at home and temporarily restricting various activities to reduce the virus's transmission. One of the significant effects of the COVID-19 pandemic on education globally was the closure of numerous educational institutions, including schools, universities, madrasas, and Islamic boarding schools (Setiawan, 2020).

The education sector was profoundly impacted by the pandemic, with teaching and learning activities transitioning to a home-based format. This shift was outlined in the Ministry of Education and Culture's Circular Letter No. 4 of 2020, which addressed educational policy adjustments during the COVID-19 crisis. It was further supported by Circular Letter No. 15 of 2020, providing guidelines for implementing home-based learning during the emergency period (Ministry of Education and Culture, 2020).

The sudden onset of the COVID-19 pandemic compelled teachers to rapidly adapt and modify the learning system. They had to transition from traditional face-to-face instruction in schools to online learning, requiring changes in teaching strategies and the development of learning materials suitable for remote education (König et al., 2020). The core idea of home-based learning was to enable students to access educational materials and resources without being bound by time or location. This approach aimed to support distance learning and ensure the smooth delivery of educational content. However, the abrupt and unplanned shift to the study-from-home policy significantly affected the learning process.

The adoption of effective teaching methods, along with positive teacher behavior and attitudes, was crucial for the success of online learning. Traditional learning approaches needed to be swiftly enhanced and transformed into technology-based formats. This shift posed a significant challenge for English teachers, who had to create engaging and innovative materials and strategies to make learning English enjoyable for students, especially as the subject is often regarded as one of the most challenging in schools. Technology played a key role in meeting the demands of the learning process. According to Selwyn (2011), digital technology in educational institutions serves as a vital tool for both accessing information and facilitating learning activities.

In the new normal era, both teachers and students were required to utilize ICT for online education during the pandemic. Dwiyanto (2020) described the new normal as a way of living that continued as usual but incorporated new habits and practices. Within this context, teachers needed to adopt various educational tools and platforms, such as WhatsApp, Google Classroom, Zoom, and other innovative learning technologies, to sustain the teaching process. Teachers remained central to ensuring the effectiveness of the teaching and learning experience.

The integration of ICT into education offered numerous advantages in enhancing the learning process. According to Salsabila et al. (2020), educational technology played several key roles: (1) serving as tools to aid in knowledge creation and design, (2) acting as a resource to help students access information, (3) providing a platform for students to articulate and present arguments, (4) increasing the efficiency and effectiveness of the learning process, and (5) supporting the achievement of educational objectives.

It is important to recognize that home-based online learning was an unfamiliar concept in education, which naturally led to a range of perceptions. This approach appeared to have been implemented with little to no preparation, resulting in challenges and inconsistencies in its execution. Teachers played a crucial role in managing the shift from traditional in-class learning to online platforms, as they were responsible for overseeing the learning process. According to Bao (2020), online learning could be effectively organized by integrating various types of resources, including documents, images, videos, and audio, which students could access and engage with. These resources were essential in shaping and advancing online education.

Following the pandemic, many schools continued to integrate ICT into their educational practices. The post-pandemic learning process remained closely tied to the use of technology, which supported various aspects of education. Raibowo (2021) emphasized that advancements in information and communication technology (ICT) necessitated teachers' proficiency in using these tools. Educators were expected to create ICT-based learning materials and leverage technology as a teaching medium, enhancing both accessibility and opportunities for deeper, more effective learning experiences.

This study aimed to explore the perceptions of English teachers on the utilization of ICT in the post-COVID-19 era. The findings were expected to offer insights into how ICT was employed in teaching English at junior high schools following the pandemic. This knowledge could serve as valuable guidance for teachers and educators in selecting suitable learning media, strategies, and methods for effective instruction.

#### **1.2. Identification of the Problem**

In the post-COVID-19 era and in light of the rapid technological development at the time, the education system faced various challenges. One of the biggest challenges was the need to improve the quality of learning to match the demands of the times. Although various efforts had been made to improve the quality of education, many schools still faced problems related to access to quality learning resources, less innovative teaching methods, and limited facilities and infrastructure that supported effective learning.

To overcome these problems, one of the solutions that could be applied was the use of Information and Communication Technology (ICT)-based learning. ICT learning allowed students to access various digital learning resources, enriched the learning experience through interactive media, and facilitated more engaging and effective learning. Thus, the application of ICT-based learning became an effective solution to overcome various issues in conventional learning. Technology helped create more engaging, effective, and relevant learning experiences, while also preparing students with the skills needed to face global challenges.

#### **1.3.** Delimitation of the Research

From the problems above, the researcher focused on the issues regarding learning English using ICT. In this study, the researcher focused on investigating how ICT tools were used by the teachers in the post-pandemic era and their perceptions of the use of ICT in the post-pandemic era.

### 1.4. Research Questions

In accordance with the focus of the study above, the questions that become the problem in this research are:

- 1. How do teachers use ICT Tools in the post-pandemic era?
- 2. What is the teachers' perception on the use of ICT in the postpandemic era?

### 1.5. Aim of the Research

In accordance with the research questions above, the objectives of this study

are:

- 1. To find out how teachers use ICT Tools in the post-pandemic era
- 2. To find out teachers' perceptions on the use of ICT in the postpandemic era EKH NURJAT

# 1.6. Significance of the Research

Research benefits are expectations related to research results, both theoretically and practically.

### **1.6.1** Theoretically

 Academics can contribute ideas to teachers and other educational institutions regarding the process of implementing the use of ICT in the postpandemic era.  For future researchers who are researching similar research, it can be used as a source of reference, comparison in research that is being carried out or that will be carried out.

### **1.6.2 Practically**

- Students can provide and increase motivation in learning activities in the postpandemic era.
- For teachers, it is hoped that this research can be used as a reference for consideration in determining appropriate learning strategies.

# 1.7. Theoretical Foundation

This part discussed the theoretical foundation of the study. The researcher explained some of the keywords in the title explicitly to be investigated, which consisted of: English learning in junior high school, Information and Communication Technology (ICT), and learning in the post-pandemic era.

# 1.7.1. English language learning in Junior High School.

English is considered the most widely spoken language in the world. According to Brown (2000), language is a system of symbols whether written, spoken, or signed that is both conventional and arbitrary, allowing members of a specific group to communicate in a mutually understandable way. This definition highlights that language is a structured and arbitrary set of symbols, which can be visual or verbal, and carries meaning. English, in particular, is a system of signs, sounds, or symbols whether spoken or written that enables people to communicate effectively with one another.

Brown (2000) identifies reading, writing, speaking, and listening as the four key components of English language learning. Listening is one of the most common ways people use language in everyday life. Furthermore, providing students with ample listening practice is an effective strategy for improving their vocabulary, as well as their listening comprehension. For instance, one significant difference between learning a mother tongue and a foreign language is the environment in which the learning takes place. While learning a foreign language, interactions typically occur in formal settings, such as classrooms. Developing skills in oral reading takes time and consistent practice, and listening comprehension improves similarly through continuous practice. Speaking and listening often are interconnected, and in traditional learning methods. two-way communication helps detect and improve communicative skills. The interaction between teachers and students in the classroom is an example of such two-way communication.

1.7.1.1. Characteristics of English Subjects for Junior High School

Damayanti et al. (2022) describe the characteristics of junior high school English courses as follows: (1) The text types taught in general English include process, argumentation, discussion, description, exposition, narrative, special texts (such as short messages and advertisements), and original texts. These texts can be presented in various forms, including spoken (monologues or dialogues), visual, audio, and multimodal formats (which combine verbal, visual, and audio elements). They may be authentic or educationally produced, and can appear as single or multiple texts, either on paper or on a screen. This approach aims to help students become technologically literate and enhance their ability to navigate digital information. (2) The teacher can choose the type of text to be taught based on the classroom context. To help students understand the text's content and enable them to create texts of the same type, both orally and in writing, textbased learning can start with familiar text types. Teachers may also introduce new types of texts, helping students grasp and produce them. The choice of text type may also be influenced by students' experiences at home or school, allowing them to connect the text to real-world experiences. (3) Students play a central role in the learning process, which aims to transform their abilities (from incapable to capable) in using the six language skills across various text types. In this Class VII Middle School book, the focus is on descriptive texts and procedures. (4) The main objective of general English instruction is to develop students' language proficiency in line with their language skill development. This involves both productive skills (speaking, writing, and presenting) and receptive skills (listening, reading,

and viewing). (5) The goal of junior high school English instruction is to improve students' proficiency in both written and spoken English.

1.7.1.2. English Subject Objectives for Junior High School

Damayanti et al. (2022) state that the aim of learning English is to develop students' skills in the following areas: (1) identifying context, main ideas, and specific information from procedural and descriptive texts in oral, written, and multimodal forms; (2) expressing ideas from procedures, short messages, and descriptive texts in oral, written, and multimodal formats; and (3) analyzing the structure and linguistic elements of descriptive texts, procedures, and short messages in oral, written, and multimodal forms.

The learning activities and materials for junior high school are designed to meet the students' needs, including those who have not yet received English instruction at the previous level. As a result, the teacher can adjust and modify these resources and exercises to align with the students' progress and achievements, as noted by Damayanti et al. (2022).

### 1.7.2. Information and Communication Technology ICT.

Information and Communication Technology (ICT) is a tool for conveying information related to the processing, management, and transfer of data, as explained by Rusman (2018). With the rise of modern ICT, the use of technology has become essential for improving educational standards and expanding access to knowledge. Fitriyadi (2013) emphasizes that ICT is a rapidly advancing and vital component in the global landscape, especially in education. According to Ahamdi (2017), ICT refers to all technological devices used for processing and transmitting information. Supianti (2018) further adds that ICT involves the storage and analysis of data in the form of text, numbers, or images using electronic devices.

From the above explanation, it can be concluded that ICT serves as a medium or tool for data transfer, enabling both the acquisition and delivery of information, while also functioning as a means of communication.

In the 21st century and the era of globalization, teachers are expected to be proficient in technology. Technology plays a significant role in education, fostering student engagement, creativity, and independence. As Aka (2017) notes, it is crucial for teachers to master ICT to meet the demands of modern learning and teaching tasks. ICT serves multiple roles in education, including as a tool for instruction, a medium for student learning, and a channel for communication between teachers and students.

As cited by Aka (2017), Wijayanti outlines four primary functions of ICT for teachers: (1) ICT can assist in completing work tasks. (2) ICT helps in creating instructional materials, such as text, images, videos, and audio. (3) ICT supports online learning activities through devices like phones, audio equipment, or computers. (4) ICT contributes to the expansion of knowledge.

Learning media plays a crucial role in engaging students in the learning process. The use of high-quality media can boost students' interest and enthusiasm, leading to increased participation in lessons. These media tools, including audiovisual resources, auditory and visual materials, and ICT, are essential for supporting effective learning, as stated by Sari (2016).

The application of ICT, particularly through computers in innovative teaching, aims to stimulate students' attention, interest, and thinking, thereby promoting effective teaching and learning processes, as noted by Hilman (2019). A teacher's competence in using ICT refers to their ability to master and develop teaching methods with the help of technology, according to Hilman (2019). Aka (2017) further emphasizes that teachers need specific competencies to effectively use ICT, with the quality of a teacher being reflected in their skills, professional attitudes, and knowledge. A teacher can be considered competent in ICT if they meet the established standards for using these technologies.

Mastering and utilizing ICT involves a broader set of digital skills, including the ability to operate digital technologies, communication tools, evaluation tools, and tools for creation and innovation, as defined by Fitriyadi (2013). Munir (2014) outlines several key competencies for teachers, including: 1) Basic computer operations, 2) Using productivity software, 3) Using communication software, and 4) Creating presentations using software applications.

Competence is defined as the potential, knowledge, skills, and attitudes associated with a profession, as stated by Rivalina (2014). In the context of ICT, teacher competence refers to the ability to use and develop teaching practices with technology. According to the Regulation of the Minister of National Education No. 16 of 2007, ICT competence for teachers serves two primary functions: self-development and support for the learning process, as explained by Niarsa (2013).

In summary, ICT competence for teachers involves their ability to develop learning through digital technologies. The quality of a teacher's ICT competence is demonstrated through their skills in using basic computer tools, software applications, and communication tools. Teachers are expected to master these competencies, including the ability to operate personal computers and their peripherals, troubleshoot, perform programming tasks, process words and data, manage databases, and create interactive presentations, as outlined by Wijayanti (2011).

According to Aka (2017), there are several challenges in using ICT, including: (1) The high cost of developing software for ICT-based learning tools. Teachers are encouraged to make use of government-provided, free ICT-based learning software or download it from the internet. (2) The lack of programming knowledge and skills among teachers to develop ICT-based learning materials or software. As not all teachers are proficient in programming, it is recommended that they utilize pre-made learning software. (3) The available programs often do not consider student creativity, which limits the ability to foster creativity in students.

Uno et al. (2010) categorize ICT media into four types: (1) Television, which converts images and sound into electricity, transmitted through cables or electromagnetic waves to be transformed back by a receiver. (2) Computers, which are versatile machines controlled by programs and used to process data into useful information. Data, which can

be numbers or images, is processed into information for decision-making. (3) The Internet, a network of computers that allows users to share information globally. (4) Satellites, a transmission medium using microwaves, which is ideal for long-distance communication, particularly in areas lacking telephone infrastructure.

The overall aim of Information and Communication Technology is to expand one's knowledge and understanding by familiarizing oneself with ICT tools, their terminology, recognizing their advantages and limitations, and using them optimally. Munir (2015) outlines several purposes for incorporating ICT in education, including: (1) Raising students' awareness of the ever-evolving potential of ICT, motivating them to continuously evaluate and study ICT for lifelong learning. (2) Encouraging students to adapt and anticipate ICT developments, enabling them to confidently manage daily activities. (3) Enhancing students' competencies in using ICT to support learning, work, and daily activities. (4) Improving learning skills based on ICT to make the learning process more engaging, efficient, and encouraging students to become skilled at finding and organizing information. (5) Developing independent, innovative, creative, and responsible learning skills using ICT for learning, work, and problemsolving.

According to Prawiradilaga (2013), ICT-based learning media serve specific purposes, including: (1) Providing diverse learning experiences that stimulate students' interest. (2) Fostering attitudes and skills in technology. (3) Creating enjoyable and memorable learning experiences. (4) Making learning more effective, efficient, and meaningful. (5) Offering opportunities for learning anytime and anywhere. (6) Motivating students to learn. (7) Making learning an essential part of students' lives.

The integration of ICT has brought about significant changes in the teaching and learning process. Traditionally, teaching focused primarily on content, with course materials centered around textbooks. Teachers relied on lecture-based methods, and activities were designed to reinforce the

knowledge presented. However, today's educators are expected to create engaging and relevant learning experiences for students. Technology plays a crucial role in making education more inclusive, as it has the potential to enhance students' academic performance, as noted by Sasan (2021).

Moreover, the use of ICT promotes a learner-centered approach, shifting away from the traditional teacher-centered pedagogy. Modern curricula emphasize students' skills and performance, focusing more on applying information than simply memorizing facts (Bindu, 2016). ICT supports the dissemination of knowledge based on these contemporary curricula. As a result, integrating ICT into teaching benefits both teachers and students by offering the potential to deliver high-quality education when used effectively.

ICT enhanced learning fosters greater student engagement. The constructivist approach views learning as interactive and student-centered, and ICT is an effective tool within this approach. It allows teachers to create simulated and customized learning environments that support students' learning, as highlighted by Sasan et al. (2022).

In this context, using educational technology as a constructivist tool enables students to showcase their ideas, express their knowledge, explore, analyze, and process information in a collaborative learning setting, according to Zhu et al. (2010). For example, software applications like databases and Excel foster inquiry-based learning activities. Multimedia tools assist in cognitive activities, helping students share and articulate their understanding. These tools support students in learning through experience, developing independent problem-solving skills. In this way, computers assist students in cultivating higher-order thinking.

Similarly, ICT integration supports the constructivist learning model, where students interact with peers, teachers, informational resources, and technology. This collaborative environment allows students to build knowledge and skills, while providing opportunities to explore various perspectives and solve problems. ICT also facilitates collaborative learning by enabling flexible learning spaces and times. This flexibility enhances interaction and information reception, contributing to changes in communication models and teaching methods, thus fostering both individual and collaborative learning experiences.

Teachers play a vital role in the integration of ICT into education. Today's educators must not only be knowledgeable about the content of their subjects but also possess the pedagogical skills necessary to effectively integrate technology into their teaching. According to Bingimlas (2009), for successful ICT integration, teachers must recognize the value of technology and believe that its use will not disrupt the classroom environment. They should also feel confident in managing technology. However, research indicates that many teachers do not fully utilize the potential of ICT to enhance learning, despite having a positive attitude toward it. Aver suggests that the potential of ICT can only be realized when confident teachers are willing to embrace opportunities to transform their classroom practices through effective ICT use. Consequently, ICT is having a significant impact on teaching methods, educational practices, school innovation, and community services.

ICT serves as a powerful tool for expanding educational opportunities. It is reshaping the teaching and learning process by infusing vitality into the learning environment. The modern education system emphasizes skills such as research, critical thinking, and evaluation, as students now have access to a vast array of information sources. Therefore, the learning environment must support the effective application of knowledge that students need to master, ensuring that the knowledge gained is not passive. Additionally, teachers must encourage students to become active learners, engaging in the construction of knowledge. This requires creating open-ended learning experiences rather than simply focusing on the transmission of facts.

ICT has the potential to create dynamic learning environments in several ways. It allows access to a wealth of information from diverse sources, enabling learners to examine information from different viewpoints, which enhances the credibility of the learning process. Additionally, ICT can help clarify complex concepts through simulations, contributing to a more authentic learning experience. As a result, ICT serves as a facilitator of active learning and higher order thinking, as noted by Vidergor (2015).

Furthermore, ICT can act as a tool for curriculum differentiation, offering the ability to tailor learning materials and activities to meet the unique needs and abilities of each student, particularly by providing personalized feedback. ICT supports a wide range of educational approaches, from traditional methods to more innovative strategies.

When used effectively, ICT can transform the classroom into a learner centered environment. Therefore, equipping classrooms with computers is essential to enhance learning opportunities through various curricular activities. An ICT-enabled environment enhances the teaching and learning experience, allowing both teachers and students to make the most of their learning time. This ICT enhanced learning environment serves as a motivating factor for both educators and learners, as stated by Kilag et al. (2022).

ICT can also improve the quality of education in various ways. It can increase student motivation and involvement by providing opportunities to acquire fundamental learning skills. Multimedia software can offer audiovisual effects that engage students and spark interest in the learning process. Interactive software applications further engage students in lesson activities.

Research shows that students using ICT for educational purposes are more engaged in learning. ICT has the ability to reshape learning tasks and the nature of problems, acting as a mediator in cognitive development and enhancing the acquisition of essential cognitive skills needed in a knowledge-based society. As more students utilize computers as tools for information and intellectual exploration, the impact of technology on student learning continues to grow, as highlighted by Sasan (2022).

Computers with internet access can significantly boost student motivation by incorporating the rich media and interactivity offered by various ICT tools. This technology provides opportunities for students to connect with real people and engage in real-life situations, which is often cited as a reason for the eagerness of "early adopters" of ICT. As a result, the integration of ICT in teaching not only enhances the learning environment but also prepares students for their future careers and lives.

The link between ICT integration and student performance has been a subject of research and discussion for the past two decades. Many believe that ICT enhances student performance by improving the interaction between teachers and students. A meta-analysis has shown that, in general, students who used computer-based learning performed better than those who did not. ICT-enhanced learning helps students better understand concepts and retain them over time. Additionally, ICT fosters a positive attitude towards learning, as students become more engaged in the process, as noted by Sasan and Rabillas (2022).

Numerous studied have recognized that ICT contributes to the development of constructivist learning methods, which transform students' approach to learning and content. It also encourages the use of asynchronous computer-mediated communication (CMC) tools, which enhance students' self efficacy and improve their academic performance. Furthermore, the use of tablets in education has been shown to enrich mathematics instruction. Therefore, the successful integration of ICT supports collaborative and constructive learning, ultimately boosting students' academic performance.

#### 1.7.3. Learning in the post pandemic era

Learning innovations in the era of the 4.0 revolution are driven by the use of information technology to enhance the quality of education and learning systems based on Information and Communication Technology (ICT), as stated by Reflianto (2019). Teachers implement innovations in the learning process by using computer devices, ICT-based learning tools, and LCD projectors.

A defining feature of 21st-century learning is the close relationship between the world and information and communication technology. To improve the quality of education, teachers must integrate ICT into their teaching activities. The ongoing developments in the era of globalization require teachers to effectively use information and communication technology. By incorporating ICT into learning, the quality of education can be improved, and technological gaps can be reduced. The advancement of ICT, including the internet and computers, impacts the competencies that teachers must master, according to Rusdi (2017).

Research findings by Malini et al. (2022) indicate that online learning, both during and after the Covid-19 pandemic, will continue to be used. Experts affirm that educators and educational institutions, as the primary agents of education, are required to adapt and transition in order to optimize the educational process. However, each transition must offer improvements, as any transition that does not lead to better educational outcomes calls for evaluation, as noted by Bao (2020). The advancement of education in the context of Industry 4.0 must progress rapidly, especially in areas where the discussion has shifted from the mere use of technology to the development of technology's role in education. For instance, online learning should be implemented more effectively.

In today's digital era, understanding and wisely applying technology is crucial to adapting to digital transformation. Technology significantly impacts the quality of education in these challenging times, with the ongoing industrial revolution pushing individuals to continuously develop their skills in order to keep up with technological advancements, as mentioned by Bashori (2018).

According to Zulfikar (2022), learning materials are typically provided based on a pre-determined printed textbook that covers specific subject matter. The themes for learning are selected by the teacher and then further developed by the students. Students continue to utilize online resources like Google, learning portals, and classroom apps to support their education. These materials are aligned with the learning syllabus that the teacher has previously developed.

Even after the pandemic, learning continues to incorporate online elements alongside face-to-face instruction. The most effective learning process occurs when there is interaction between teachers and students, utilizing information technology, such as the internet, as highlighted by Kardina (2020). Online learning remains a significant part of education after the pandemic, facilitated by the internet and supported by learning or social media platforms, according to Putra (2020).

Learning effectiveness refers to the ability to utilize resources and time efficiently to achieve optimal learning outcomes. Kahfi et al. (2021) note that online learning is still an effective tool for supporting education, as it allows for the enrichment of learning materials while students study from home. Several studies, including one by Hermawati (2018), have demonstrated the effectiveness of home-based online learning.

ICT in education is more than just the physical use of technology as a learning tool; it is a multidimensional concept. One definition of educational technology, according to the Association for Educational Communications and Technology (AECT), is the study and ethical practice of facilitating learning and improving performance by creating, using, and managing suitable technological processes and resources. Educational technology encompasses both the study and the practice of using technology to enhance learning and performance.

This shift in learning methods presents challenges in the educational environment. As Puspitasari (2016) states, social values should not be hindered by advancements in science and technology. The challenges in education include strengthening faith and values systems, which must be a part of education, and ensuring that science and technology are mastered, as the effectiveness of learning now requires the support of online media. Education must adapt to these technological developments.

Pamungkas et al. (2018) argue that learning must be integrated with information and communication technology. As such, both educators and students must possess the ability to develop technology-based media. Understanding technology and information is essential for students, as it ensures they are not left behind in various fields of knowledge. In the teaching and learning process, teachers use structured methods and approaches to help students develop knowledge and understanding, complete assignments independently, and apply constructive learning experiences in their environment. Teachers also design lessons that stimulate interest and motivation, leading to active learning and maximizing the effectiveness of the learning process, as emphasized by Zulfikar (2022).

# 1.8. Previous Research

To prevent overlap with previous studies regarding the research topic, the researcher reviewed several relevant studies. After reviewing it, it was found that there were prominent differences and similarities between existing research findings and research problems of current interest, including:

The first previous study Diningrat et al, (2020) regarding the perceptions of early childhood education lecturers regarding barriers to online teaching and pedagogic competence. The findings indicate that key challenges in emergency online teaching include limited internet connectivity and bandwidth, insufficient student engagement and feedback. Additionally, issues such as computer viruses, the quality of instructional materials, and online assessments contribute to these difficulties.

The second previous study Khusuma (2020) about *elementary school teachers in online learning during the Covid19 pandemic*. This demonstrates that while teachers have an understanding of the online learning context, practical challenges persist, including issues with facilities, networks, data packages, planning, and the evaluation of learning, as well as collaboration with parents.

The third previous study was conducted by Konkin et al (2021) on *the prospects for using innovation in post-pandemic higher education*. They discovered that the implementation of asynchronous distance education practices has significant potential to enhance the overall quality of higher education.

The fourth previous study was done by Junadi, J (2023) *English teachers' perceptions of utilization and the challenges of use of ICT in senior high schools in pekanbaru,* The findings of this study suggest that teachers need to have a positive perception of the use of ICT in teaching and learning, as this can effectively support the integration of ICT within schools

Fiffth, Pardede (2020) *studied secondary school EFL teachers' perceptions of the use of ICT in learning and teaching*. The results reveal that teachers have a positive perception of using ICT in EFL teaching and learning activities. Most have successfully integrated ICT into their EFL classes. Despite occasional facility issues and technical challenges, they seek assistance from technicians or colleagues. Additionally, many believe in the value of attending training to enhance their skills in utilizing ICT for teaching and learning.

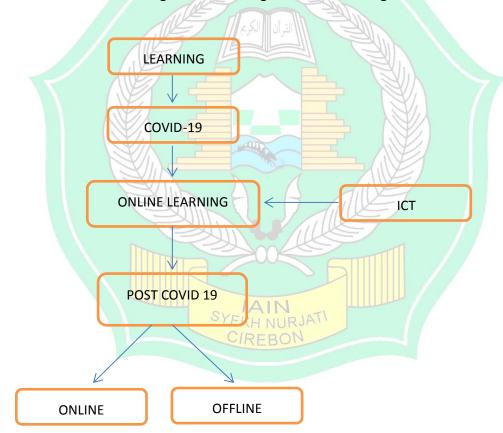
Sixth, Yana (2022) studied *English Teachers' Perceptions of Information Technology and Digital Literacy*. This study revealed that almost all respondents reported being able to use digital technology and effectively incorporate it into the teaching and learning process.

The seventh previous study was done by Yusuf (2015) on *Perceptions of EFL Teachers on the Use of ICT in Their Teaching: Use or Refuse*, The findings showed that 31 teachers exhibited high motivation to use ICT, driven by their belief that integrating ICT into ELT enhances the learning experience by making it more engaging, enjoyable, and effective, among other positive outcomes. In contrast, the remaining 11 teachers, despite acknowledging the growing importance of ICT, displayed low motivation. Their lack of enthusiasm was attributed to insufficient training and limited financial and non-financial support from their workplace.

Related to the research above, there are differences between this research and previous research. The difference lies in the object of research. The object of this research is teachers of junior high school. Then the focus of this study is only on the implementation of ICT after the pandemic and the teachers' perspective on using ICT learning in the post-pandemic era, while other previous studies mostly focus on online learning during pandemic.

# 1.9. Framework of Thinking

The corona virus came and changed all the education systems that were usually carried out face-to-face to study from home. all schools use online learning with various media such as information and communication technology. During online learning, there are advantages and disadvantages in learning. Therefore, the researcher wanted to find out about learning after this pandemic, whether to continue using online learning or offline learning.



## 1.10. Research Method

This part discusses the research method. In this research method, the researcher explained the research methods, sources and types of data, research instruments, data collection techniques, and data analysis techniques.

### 1.10.1. Research Method

According to Sugiyono (2012), the research method is a scientific way that has a specific purpose. The scientific way means rational, empirical, and systematic. There are two types of research: Qualitative and Quantitative research. One of the differences between the two is that in qualitative research, data are analyzed using sentences, while in quantitative research, data are analyzed using numbers. Moleong (2014) states that qualitative research is research conducted using open interviews to understand or examine attitudes, views, feelings, and behavior of a person or group, the most important thing in qualitative research is efforts to understand attitudes, views, behaviors, and feelings in individuals and groups of people.

This research is categorized as qualitative descriptive research. Qualitative research is used to describe a phenomenon (Alwasilah, 2000). This study aimed to investigate teachers' perceptions of the implementation of the use of ICT after the covid 19 pandemic. In addition, this research can also be categorized as a hermeneutic phenomenological research because this research aims to interpret and identify the perceptions and experiences of research subjects. This is in line with the objectives of the hermeneutic phenomenological study presented by Fuster (2019).

### 1.10.2. Sources and Types of data

This part discusses the Sources and Types of data. The researcher explained the types of data and sources of data as follows.

# 1.10.2.1. Type of data

In this study, the researcher answered two research questions using two types of data. The types of data used in this study are as follows:

1. Primary data

Individuals who become informants provide data received from people (people who directly become research subjects). Nonhuman data sources come from documents in the form of notes. According to Lofland as cited in Moleong, 2018), " In qualitative research, the primary data sources consist of words and actions, while supplementary data, such as documents and other materials, serve as additional resources. ". The primary data in this study were interview transcripts from Teachers SMP Hidayatusshibyan.

2. Secondary data

Secondary data have two different meanings. First, the data have undergone additional processing, such as being converted into tables and graphs. Second, information is obtained from sources other than the researchers themselves such as organizations or other individuals who are not considered their own information (Widiyoko, 2014). Secondary data in this study were in the form of information from electronic journals and books about the use and utilization of ICT.

# 1.10.2.2. Source of data

In this study, both primary and secondary data sources were obtained. Primary data were obtained by conducting interviews with the English teachers at SMP Hidayatusshibyan. Secondary data in this study were obtained in the form of information from electronic journals and books about the use and utilization of ICT.

## 1.10.3. Research Instruments

Research instruments as stated by Arikunto (2006) Tools or instruments are utilized by researchers to facilitate data collection, making their tasks more efficient and yielding results that are more accurate, comprehensive, and systematic for easier analysis and interpretation.

In this study, the data collection instruments were humans or the researcher himself by asking, listening, and taking research data. To collect data from information sources (informants), the researcher as the main research instrument needs tools. In this study, the researcher used an interview guideline.

#### 1.10.4. Data Collection Techniques

In this study, the data collection techniques used by the researcher were interviews and documentation.

1. Interview

In this step, the researcher interviewed teachers about the postpandemic use of ICT learning. Before the interviews the researcher prepared the interview guideline. During the interview, the researcher used tape recorders to get clear data. The researcher interviewed the English teachers who taught at Hidayatusshibyan Junior High School who had been selected by the researcher.

2. Documentation

To strengthen the data obtained from interviews, the researcher also used the documentation technique in data collection. The researcher took several photos while interviewing the teachers and the researcher make the result interview guidlines.

## 1.10.5. Data Analysis Techniques

Data analysis is a process by which researchers must systematically organize and search for data to increase understanding of the data. Miles and Huberman (1984) stated that qualitative data analysis is conducted interactively and continuously until the data reaches a point of saturation. According to Sugiyono (2015), the key activities in this process include data reduction, data presentation, and drawing or verifying conclusions. After the researcher collected the data, the researcher analyzed the data with the following stages:

## 1. Data reduction

The researcher gathered a substantial amount of data in the field, which required careful and detailed documentation. Data reduction involved summarizing the information, identifying key points, focusing on significant aspects, identifying themes and patterns, and eliminating irrelevant data. During this stage, the researcher utilized interview transcripts and simplified them for analysis.

# 2. Data Presentation

Following data reduction, the next step is data presentation. Presenting the data helps to better understand the events or phenomena being studied. In this process, the researcher used descriptive texts to display the data.

# 3. Drawing Conclusions (Conclusion Drawing/Verification)

The final step in qualitative data analysis is drawing conclusions. This stage aims to uncover new findings that have not been previously identified. These findings may include detailed descriptions of previously unclear objects, causal or interactive relationships, hypotheses, or theories. In this phase, the researcher formulated conclusions based on the research findings.

