CHAPTER I
INTRODUCTION

This chapter discusses the background of the study, the research problem, the objective of the study, the significance of the study, the delimitation, and the definition of the key terms.

1.1 Background of The Study

The industrial era has changed sophisticatedly, which means the education field needs to be able to adapt to the technology that exists, such as AI (artificial intelligence), which is currently much discussed. Moreover, technology plays a big role in conveying information in the form of text, images, and sound (Rahayu & Pujiono, 2017). AI (artificial intelligence) nowadays helps make tasks easier for both teachers and students. However, technology is unable to replace human work in certain contexts. The development of artificial intelligence (AI) technologies has received more attention as a result of computational creativity in artificial intelligence (Cheng & Day, 2014). Computers have implemented artificial intelligence technology to achieve creativity. According to Rahman (2009, p. 343), artificial intelligence (AI) develops software that filters knowledge and performs other independent tasks like computing or student search. Artificial intelligence (AI) creates "intelligent" machines, such as computer systems (online platforms) and computerized machines (robots), that function and respond similarly to the human brain (Karsenti, 2019). Machine intelligence is another name for artificial intelligence (AI) (Mehrotra, 2019). In addition, AI enables learner to take the form of a chatbot that provides communication and improves learner's language skills. Then, in a study, the use of AI has been shown to reduce writing anxiety and improve writing skills (Z. Su & L. Miao, 2019). Fear of using a foreign language, particularly speaking to pupils, can decrease the student's learning achievement score. The achievement of student scores in foreign language learning is going to decrease when anxiety levels increase.

In the field of English as a Foreign Language (EFL) education, chatbots

play an important role as an innovative and interactive language learning media. These artificial intelligence-based programs provide a dynamic platform for practising and improving their English skills. Unlike traditional methods, chatbots offer personalized, allowing learners to develop their comprehension skills in a natural context. In addition, chatbots are available anytime, offering students the flexibility to engage in language practice whenever and wherever they want. The adaptive nature of chatbots allows them to tailor exercises to individual proficiency levels, providing targeted support in areas where students may need improvement. Overall, chatbots serve as dynamic and accessible allies in the EFL student journey, encouraging immersive learning experiences that extend beyond the confines of the classroom.

Chatbot, one of the artificially intelligent conversational systems, is the most recent technologies developed to speak automatically with humans and computers (Nghi et al., 2019). The effectiveness of chatbots as a learning tool has been demonstrated in previous studies, especially in English language learning (Afrianto et al., 2019). Regarding teaching and learning English, the Chatbot program will serve as an English conversation companion. Conversations, in general, can be carried out vocally or in writing. Thus, the user should be able to practice both. A grammar error correction tool and a user's daily feature are required to support the chatbot application's purpose as a medium for English conversation training. Responses indicated problems, ideas for substituting words/sentences, and error descriptions. This is an attempt to reduce mistakes in the user's sentence structure. The daily feature can help determine how far the user's practice progresses in conversation mastery and English sentence structure. Users can gain experience with conversational English and receive corrections and ratings of their performance. The simple chatbot function begins with the message sent by the user. The NLP (natural language processing) and Chatbot then interpreted the message by reference to the current database (Haristiani, 2019).

The term "experience" emerges as a complex concept in the context of my research, covering both knowledge and perception in the field of English as a

Foreign Language (EFL) students using chatbots for language learning. On the one hand, experience is interpreted as knowledge, indicating the accumulation of linguistic abilities, vocabulary, and cultural nuances obtained through interactive interaction with chatbot systems. This knowledge is not merely academic; it is grounded in practical, real-world applications that help to enhance language proficiency. Experience, on the other hand, is considered as perception, digging into the qualitative components of students' encounters with chatbots. This includes their feelings, attitudes, and subjective perceptions of the learning process enabled by these AI-powered products.

Several previous studies related to the use of chatbots for English language learning. The first research written by (Nagaletchimee Annamalai, 2023), entitled "Exploration of Undergraduate Students Lived Experiences of Using a Chatbot for English Language Learning", aimed at comprehensively understanding how English language learners benefit from using chatbots. The study found that chatbots can improve students' listening skills, provide real-world practice in English subjects, and assist in correcting any incorrect information during practice or even writing. Participants also reported that chatbots can help improve pronunciation, vocabulary, and confidence in speaking and writing English skills. These findings indicate that chatbots can potentially impact English language learning positively. Several studies on the use of chatbots found that students in the experimental cohort who interacted with the chatbot beat students in the control cohort who interacted with the course teacher. Chatbots can significantly advance and improve subject learning (Clarizia et al., 2018; Okonkwo & Ade-Ibijola, 2020). The similarities between this study and the previous studies are to investigate the students' use of chatbots for English language learning, and these studies both implemented qualitative approaches to do the research. Meanwhile, there is also a gap in this study, which is that this study only focuses on the students' experience using Chatbot in English language learning, especially writing skills.

The researcher chose Chatbot because EFL students commonly use it to learn a new language, especially English. Chatbots are believed to enable learners to improve their English proficiency capability.

1.2 Research Problems

1. How do students utilize Chatbots as an English learning tool?
2. How do students perceive the enhancement of their English proficiency due to Chatbot usage?
3. How do students perceive challenges in using Chatbots as an English learning tool?

1.3 Research Objectives

1. To find out how students utilize Chatbots as an English learning tool.
2. To find out how students perceive proficiency enhancement due to Chatbot usage.
3. To find out how students perceive challenges using Chatbots as an English learning tool.

1.4 Significance of The Study

1. The Student

    This study attempts to uncover the characteristics of chatbot interactions that contribute to higher learning outcomes by investigating how EFL students perceive and use chatbots. This study can be beneficial for EFL students since it directly impacts their learning experiences. It works to improve the quality of education and the student's journey toward English language competence by investigating how chatbots affect their learning results, engagement, and overall language development.

2. The English Teacher

    The findings can help EFL teachers make educated decisions about introducing chatbots into their language teaching practices. Understanding how chatbots work in language acquisition allows teachers to integrate their teaching approaches with modern technology, making instruction more relevant and exciting. The importance of this study for EFL teachers comes from its ability to inform and empower educators in their attempts to provide high-quality language teaching. Teachers can modify their

teaching methods and resources to create more prosperous, engaging, and student-centered language classrooms by recognizing the function of chatbots in language learning.

3. The Other Researcher

This research is essential for the broader research community by improving knowledge of the function of technology in language learning. It provides valuable insights, avenues for further research, and a paradigm for student-centered research, ultimately improving educational technology and pedagogy.

1.5 The Delimitation

There are numerous factors to consider in the learning process. However, the study concentrated on students' experiences and difficulties. Furthermore, the study is limited to object study, which is only a few college students.

1.6 Definitions of The Key Terms

To avoid misunderstanding, the author defines the key terms related to this research material so readers can understand the content.

1. AI (Artificial Intelligence)

Artificial intelligence (AI) refers to the ability of a computer or computing system to perform tasks that would typically require human intelligence. AI involves the development of algorithms and computational models that enable machines to make decisions, learn from data, recognize patterns, and interact with their environment. The ultimate goal of AI is to create systems that can understand, interpret, and respond to information in a way that resembles human intelligence.

2. Chatbot

A *chatbot* is a computer program designed to interact with humans through text or voice conversations. The primary purpose of a chatbot is to provide automated responses to users based on questions or commands they give. Chatbots can be used in various contexts, such as customer service, information services, or entertainment. Some chatbots use

artificial intelligence (AI) to understand and respond more naturally to human language.

3. Students' Experience

In its broadest meaning, experience involves all of an individual's experiences, exchanges, and observations throughout their life. The learning gained from numerous situations, events, and interactions is referred to as experience and contributes to developing skills, knowledge, and attitudes.

Individuals interpret and make sense of their experiences by perception. It includes emotional reactions, attitudes, and subjective meanings assigned to events. Experience is transformed into a personal and unique narrative formed by individual perspectives. People's perceptions and reactions to diverse events are influenced by the subtle mixture of emotions, beliefs, and cultural background, making perception an important aspect.

Experience manifests as knowledge gained by active participation and application in another dimension. This aspect of the experience is more objective, emphasizing the skills, knowledge, and practical understanding gained by direct engagement. For example, in language learning, experience as knowledge involves using grammar rules, vocabulary, and communicative methods in real-life circumstances.

Student experience refers to the activities, experiences, and learning processes a student undergoes during their education. It encompasses all aspects of learning, including interactions with teachers, subject matter, peers, and physical and digital learning environments. The student experience is critical in shaping students' understanding, knowledge and skills and can impact their motivation and learning success. The development of a good student experience is often a key focus in the improvement of education systems.