CHAPTER 1
INTRODUCTION

In this digital era, technology has become an integral part of the education system. Teachers are now expected to not only master pedagogical and content knowledge, but also be able to integrate technology into their teaching. This is especially important for prospective English teachers who must prepare themselves to face the demands of the modern classroom. The TPACK framework serves as a guide to assess and develop their readiness in this area.

1.1 Background of the Problem

The rapid development of technology has brought significant changes in various aspects of life, including education. In this era, technology has become one of the most important tools in supporting teaching and learning activities. Therefore, the integration of technology in education is now inevitable because it has a major influence on teaching methods and ways of learning. Technology is able to provide easy access to various digital educational resources, as well as offer more diverse and innovative teaching methods, providing opportunities for teachers to use various media, such as videos, interactive applications, and online learning platforms, which can make learning more interesting and varied so as to increase student motivation to learn (Salsabila & Agustian, 2021). Especially in English language teaching, technology allows teachers and students to access authentic learning materials, interact through online language learning platforms, and utilize applications or software designed to improve language skills effectively.

Although technology offers many benefits and opportunities to improve the quality of learning, there are major challenges related to the readiness of prospective English Education teachers in integrating technology into the learning process. This readiness includes knowledge of pedagogy, content, technology, and a combination of the three which is commonly called Technological Paedagogical and Content Knowledge (TPACK) (Zulhazlinda et al., 2023). TPACK is a model or conceptual framework that describes the relationship and interaction between technological knowledge (TK) and each component of Paedagogical Content Knowledge (PCK)

owned by teachers (Koehler et al., 2013). The interaction between these components results in a new TPACK knowledge component consisting of seven components, namely Technological Knowledge (TK), Paedagogical Knowledge (PK), Content Knowledge (CK), Technological Paedagogical Knowledge (TPK), Technological Content Knowledge (TCK), Paedagogical Content Knowledge (PCK), and Technological Paedagogical Content Knowledge (TPACK).

The integration of technology in learning depends on individual teacher readiness (Petko et al., 2018). However, based on previous research, it is found that teacher candidates often feel underprepared or even unprepared to integrate technology in learning. Such as a study entitled "Using a multidimensional approach to examine TPACK among teacher candidates" conducted at universities in the Northeast region of the United States by Wen and Shinas (2020) states that the development of TPACK for teacher candidates is still limited as seen from their unpreparedness in integrating technology in the learning process so that researchers suggest that prospective teachers still need to prepare themselves and add insights related to the application of TPACK. Another study entitled *"Analisis Tingkat Kesiapan Guru Dalam Mengimplementasikan Teknologi Pembelajaran Berbasis Internet di Sekolah Menengah Kejuruan"* conducted at SMK Muhammadiyah 1 Playen Yogyakarta by Kurniawan (2021) states that teacher readiness is still experiencing obstacles so that they are still not ready to integrate technology in learning. This can be caused by limitations in mastering technical skills, minimal understanding of digital pedagogy, and lack of openness to technological developments. In addition, based on the researcher's direct experience while participating in the *Kampus Mengajar* Program Batch 7 in 2024 at SD N 178/IV, *Kota Jambi*, the researcher observed that there were still prospective teachers who were not fully prepared to integrate technology in learning.

Based on previous research and the researcher's direct experience, English Language Education students as prospective teachers need to master the seven components of TPACK to demonstrate their readiness to integrate technology into the learning process. This is supported by Harris et al., (2009) who stated that teachers' TPCK ability plays an important role in the successful integration of technology in teaching. Joo et al., (2018) also confirmed that TPACK significantly

influences the ease of technology use by pre-service teachers. Therefore, this study is important to analyze the level of readiness of English Education teacher candidates in integrating technology based on the TPACK framework.

This study has differences with previous studies, especially in terms of context and focus. This study specifically examines the readiness of English Education teacher candidates in integrating technology in the context of field practice through the *Pengenalan Lapangan Persekolahan (PLP)* activities. Previous research still focuses on theoretical aspects or readiness in general, while this research focuses on the real experience of prospective teachers in the field. Thus, this research is expected to provide a more concrete and applicable picture of technology integration in teaching based on the TPACK framework.

1.2 Research Question

The formulation of the problem in this study was made based on the background previously described. This research focuses on the readiness of English education teacher candidates in integrating technology in learning by using the TPACK framework. Therefore, the problem formulation in this study is:

"To what extent is the level of English Education teacher candidates' readiness in integrating technology in *Pengenalan Lapangan Persekolahan's (PLP)* teaching practice based on the TPACK framework?"

1.3 Limitation of the Research

This research only focuses the problem on the level of readiness of English Education Teacher Candidates based on the TPACK framework which consists of seven components, namely; (1) Technological Knowledge (TK)**,** (2) Pedagogical Knowledge (PK), (3) Content Knowledge (CK), (4) Technological Pedagogical Knowledge (TPK)**,** (5) Technological Content Knowledge (TCK)**,** (6) Pedagogical Content Knowledge (PCK)**,** (7) Technological Paedagogical Content Knowledge (TPACK).

1.4 Purpose of the Research

The purpose of this study is to measure the readiness of English education teacher candidates to integrate technology into their *Pengenalan Lapangan Persekolahan (PLP)* teaching practice based on the TPACK framework.

1.5 Significance of Research

The significances of this research are:

1. Theoretically, this study is expected to make a theoretical contribution to the development of the concept of teacher candidates' readiness to integrate technology in learning, especially in English Education teacher candidates. This research enriches the understanding of the application of the TPACK framework and can be the basis for further research that examines the factors that influence teacher readiness in utilizing technology effectively in the classroom.

2. Pedagogically, the results of this study are expected to provide data that can help develop the prospective teacher education curriculum, especially to improve technology integration skills. Information about the level of readiness of prospective teachers can be used to develop and evaluate more relevant courses and training programs, so that educational institutions can improve the teaching process and provide facilities and training that support the needs of prospective teacher students.

3. Practically, this study can provide guidance for prospective teachers to evaluate their readiness to integrate technology. This research also helps policy makers, educators, and students identify aspects that need to be improved in the application of technology. The results are expected to improve teaching quality, build prospective teachers' confidence in using technology, and make English language learning more effective and relevant to current educational needs.

1.6 Definition of the Key Terms

By creating these keywords, the researcher can keep the focus of the research in line with the topic discussed and not stray into irrelevant aspects. The following are some of the key terms used in this study, namely:

1. Readiness in this study refers to the ability of prospective English language education teachers as individuals who will teach by using technology in learning.

2. English education teacher candidates are a group of people who are taking formal education to become educators, by developing content knowledge, pedagogical skills, and professional competencies through teacher education programs.

3. TPACK (Technological Pedagogical Content Knowledge) is a framework that combines technology, pedagogy and content knowledge to help teachers integrate technology effectively in learning.