

ICT integration into English language teaching-learning: Insights from some private higher education institutions

Haerazi Haerazi

Universitas Pendidikan Mandalika, Indonesia
haerazi@undikma.ac.id

Manuscript received September 6, 2023, revised November 1, 2023, accepted December 1, 2023, and published online May 7, 2024.

Recommended APA Citation

Haerazi, H. (2024). ICT integration into English language teaching-learning: Insights from some private higher education institutions. *Englisia: Journal of Language, Education, and Humanities*, 11(2), 48-66. <https://doi.org/10.22373/ej.v11i2.19913>

ABSTRACT

The integration of technology within language classrooms is a pivotal facet of modern education. Due to this, this study aims to investigate the English lecturers' views about the use of educational technology in English language classrooms and the English teachers' implementation strategies about ICT integration into ELE programs in higher education. The study employs a qualitative research approach to facilitate an in-depth exploration and elucidation of its findings. The participants under scrutiny consisted of English lecturers affiliated with English language education study programs situated within private universities located in the West Nusa Tenggara region. The selection of participants was facilitated through the utilization of a convenient sampling method, which was deemed appropriate for the purposes of data collection in this study. In total, the study encompassed the involvement of 25 participants, and it is noteworthy to mention that the composition of this participant pool exhibited certain demographic characteristics. This study used semi-structured interview guidelines as the research instruments. The data analysis process encompassed several key stages, including data condensation, data display, and drawing conclusions. The research findings highlight a diverse landscape of ICT integration among English lecturers in private universities in West Nusa Tenggara, Indonesia. While some educators demonstrate a propensity for innovative and multifaceted technology integration, others exhibit more conventional and hardware-focused approaches. It can be concluded that English lecturers have views about the technology use that should be optimized in the ICT integration within English language education programs.

Keywords: *ICT integration; Digital learning; English language teaching*

1. Introduction

In the contemporary digital era, the widespread integration of technology into language classrooms has become an imperative, driven by the myriad educational benefits it offers (Abraham et al., 2022; Aşık et al., 2018, 2020). Within this context, teachers emerge as central figures endowed with the responsibility of harnessing the full potential of technology to enhance educational materials and learning experiences, tailored to the unique requirements of their students. Their role extends beyond mere facilitation; they are entrusted with the task of orchestrating technology-driven pedagogical approaches that foster meaningful and engaging learning environments (Aydin, 2013; Bahari, 2022). This evolution underscores the transformation of the traditional teacher-student dynamic, positioning educators as key enablers of technological innovation in language education, aimed at optimizing learning outcomes and facilitating a richer educational experience.

Within the framework of the American Council on the Teaching of Foreign Languages (ACTFL), there is a growing imperative for English instructors to demonstrate a higher level of qualification in effectively integrating technology into language classrooms (Biddix et al., 2016; Chien et al., 2012). This demand arises from the recognition that technology plays a pivotal role in modern language education, offering an array of pedagogical advantages. In this context, English educators are expected to not only possess proficiency in language instruction but also to adeptly incorporate technological tools and strategies to enhance the learning experience for their students (Gómez & Vicente, 2011; Hashemi et al., 2022; Kharade & Peese, 2014). Similarly, in the Indonesian context, English lecturers in higher education institutions are confronted with the responsibility of not merely imparting language knowledge but also of designing and implementing digital learning solutions tailored to the distinctive requirements of language teaching contexts. This requirement arises from the recognition that technology can serve as a potent catalyst for innovative and effective language instruction (Li, 2022; Liu et al., 2018). To guide this integration process, there exists a set of guidelines that delineate the essential technological competencies expected of both language teachers and learners. These guidelines serve as a benchmark, outlining the requisite skill sets and knowledge domains that educators and students must possess to effectively navigate the digital landscape in language education. In this manner, both the ACTFL and Indonesian higher education institutions underscore the growing significance of technological proficiency in facilitating enhanced language instruction and learning outcomes in the contemporary educational landscape.

Extensive research has unequivocally demonstrated a significant misalignment between ELE programs and the essential skills and strategies requisite for adequately preparing prospective language educators in the effective utilization of educational technology (Eickelmann & Vennemann, 2017; Govender & Govender, 2009; Gudmundsdottir, 2010; Nurdiana et al., 2023). This glaring incongruity in teacher preparation is a matter of considerable concern within the realm of language education. Nevertheless, Hu, and McGrath (2011) offer a compelling argument, contending that the

prior exposure of teachers to technology during their teacher education programs is directly and positively correlated with their subsequent use of technology within the classroom setting. This observation underscores the critical role played by teacher training institutions in equipping educators with the necessary technological competencies to foster innovation and enhance pedagogical practices (Polly et al., 2010; Uzun, 2016).

Asyik (2020) has compiled a comprehensive list of potential factors that contribute to the failure of ELE programs to meet the stringent requirements of effective technology integration. These factors encompass institutional inertia and a lack of awareness, insufficient time allocated for technology-focused courses, inadequate technological infrastructures and standards, as well as the absence of well-established methodologies and experienced educators well-versed in the nuances of educational technology (Howard et al., 2019; Ibieta et al., 2017; Jeong, 2023). These challenges pose significant impediments to the cultivation of technologically adept language teachers, and addressing them is paramount to bridging the existing gap. In consonance with these concerns, Liu et al. (2018) have underscored the imperative need for ETE programs to adopt a more contextually tailored approach, emphasizing technology's affordances and the acquisition of essential technological competencies. This call for a paradigm shift in ETE underscores the necessity of integrating meaningful technology practices into teacher education, emphasizing not just technical skills but also the pedagogical potential of technology within language education (Meniado, 2023; Moorhouse et al., 2023). The prevailing discourse within the realm of ETE highlights the pressing need for realignment, aiming to equip future language teachers with the proficiency required for meaningful and effective technology integration in language classrooms.

The integration of technology within language classrooms is a pivotal facet of modern education. However, despite the recognition of its significance, the attainment of the desired level of technology integration in language education remains an elusive goal (Nikimaleki & Rahimi, 2022; Perifanou et al., 2023). One of the primary impediments contributing to this persistent challenge is the substantial evidence indicating that language teachers often graduate from teacher education programs with limited or even negligible knowledge regarding the effective utilization of technology in language teaching contexts (Polly et al., 2010; Proctor et al., 2003). This conspicuous gap in their technological proficiency presents a formidable barrier to the successful incorporation of technology-enhanced pedagogies within language classrooms. The repercussions of this deficiency are multifaceted, affecting not only the teachers themselves but also their students and the broader educational landscape (Jimoyiannis & Komis, 2007; Kangro & Kangro, 2004; Samuel & Zaitun, 2007). Language instructors who lack the requisite technological skills may struggle to engage their students in interactive and dynamic learning experiences, consequently impeding the development of crucial language skills.

Addressing this issue necessitates a multifaceted approach that encompasses the reformulation of teacher education curricula to prioritize technology integration, the

provision of effective professional development opportunities for in-service educators, and the cultivation of a culture of continuous technological learning within the language teaching community. Only through concerted efforts to bridge this knowledge gap can language education hope to achieve the desired level of technology integration, thereby equipping teachers with the tools and competencies essential for facilitating enhanced language learning experiences in the digital age. Due to this, this study formulated two research questions to seek answers, namely; (1) what are the English teachers' views about how well ELE programs prepare prospective teachers for using educational technology in English language classrooms in higher educations? what are the English teachers' implementation strategies about ICT integration into ELE programs in higher educations?

2. Literature review

The ICT integration in ELE learning activities is supported by some theories such as the technology development in English language education, Mobile-assisted language learning, and Teaching English as a foreign language. The ICT tools elaborated in the present study are mobile devices.

2.1. Technology development in ELE program

Concerning the integration of technology into the ELE curriculum, educational institutions play a pivotal role in equipping lecturers with a diverse array of technological alternatives that can be effectively employed in their instructional practices (Aşık et al., 2020; Jeong, 2023). The technologies applied are computers, mobile devices and online platforms such as Google classroom, Moodle, digitalization, multimedia devices, flashcards, and podcast videos. This support entails offering instructors opportunities to engage in professional development activities, attend workshops, and access resources that facilitate their integration of technology into the classroom environment (Xiao & Hew, 2022; Xu & Zhu, 2023). These initiatives aim to enhance educators' technological proficiency, enabling them to make informed choices regarding the selection and implementation of digital tools and resources in their teaching methodologies. Within this context, it is noteworthy that the approach to technology integration can manifest along a spectrum, ranging from a broad exploration of various computer-assisted learning alternatives in a single course to a more specialized and intensive focus on a particular technological application or tool in another course (Hu & McGrath, 2011; Ibieta et al., 2017; Whyte, 2011).

The former approach allows educators to gain familiarity with a wide range of technological options, fostering a well-rounded understanding of potential applications across various aspects of language instruction (Tezci, 2011; Velenti Puspa et al., 2022). Conversely, the latter approach delves deeply into a specific technological platform or pedagogical strategy, equipping instructors with a more comprehensive expertise in a particular area of technology-enhanced teaching. Furthermore, in the pursuit of effective

technology integration, educators often adopt an integrated approach across their courses, incorporating technology as an integral component of their instructional practices (Şahin Kızıl, 2017; Samuel & Zaitun, 2007). This approach transcends disciplinary boundaries, as educators harness technology's potential to enhance pedagogy across a diverse array of courses within the ELE curriculum. By embracing this integrated perspective, teachers can harness technology's capabilities to serve the overarching goal of education, thereby fostering engaging and effective learning experiences for their students. This multifaceted approach to technology integration underscores the dynamic nature of modern language education, where technology serves as a versatile and essential tool to facilitate enhanced learning outcomes.

2.2. Mobile-assisted language learning

In contemporary English language teaching, technology tools predominantly favored by educators include smartphones and mobile devices (Al-Sabbagh et al., 2019; Avcı & Adiguzel, 2017; Burston, 2014). The ubiquity and widespread utilization of these mobile technologies have led to the emergence and growing popularity of mobile-assisted learning as a highly accessible and convenient instructional approach within the domain of language education. The prevalence of mobile devices empowers language learners by affording them unprecedented flexibility and convenience in their pursuit of language proficiency (Lai & Zheng, 2018; Lee & Song, 2020). By virtue of their portable nature, these devices transcend the temporal and spatial limitations traditionally associated with conventional classroom-based language learning settings. Haerazi et al. (2020) learners, equipped with smartphones or similar mobile tools, can readily access a wealth of language learning materials, resources, and activities at their own discretion, enabling them to engage in language acquisition endeavors at any time and from virtually any location. This inherent mobility of MALL not only accommodates diverse schedules and lifestyles but also reflects the evolving landscape of education in the digital age, where learning transcends the boundaries of physical classrooms and embraces the opportunities afforded by modern technological advancements (Wang et al., 2009; Q. Xu et al., 2017).

2.3. Teaching English as a foreign language

The evolution and proliferation of digital learning technologies have placed a pressing demand on English teachers, as well as prospective or preservice English teachers, to possess the requisite competencies for effectively harnessing these technologies within the realm of language education (Anwar & Sailuddin, 2022; Hadi et al., 2021; Situmorang & Simanjuntak, 2023). These competencies encompass the ability to adeptly navigate and leverage digital learning tools, platforms, and resources to facilitate enhanced language learning experiences. However, empirical research indicates that there exists a notable gap in the proficiency levels of English teachers when it comes to designing and implementing digital technology in their specific educational contexts (Adnan, 2017; Basal, 2015, 2015). Several studies have shed light on this critical issue,

revealing that a substantial portion of English teachers currently lacks the necessary capabilities to design and apply digital technology in their language learning contexts (Chang & Lan, 2021; Gao & Shen, 2021; Jiang et al., 2021).

Consequently, English teachers may find themselves ill-equipped to fully harness the educational affordances offered by these technologies, potentially hindering their ability to create engaging and effective learning environments for their students (Anggoro et al., 2022; Bilki et al., 2022; Sam, 2016). The identified gap in digital technology proficiency among English teachers underscores the urgency of targeted professional development initiatives and curriculum enhancements within teacher education programs. These measures are essential to empower English educators, both in-service and preservice, with the knowledge and skills required to navigate the dynamic landscape of digital language education effectively (Hu & McGrath, 2011; Jeong, 2023; Vallance, 2007). By addressing this competency gap, teacher education programs can better prepare English teachers to harness the transformative potential of digital learning technologies, ultimately enhancing the quality of language instruction and learning outcomes in contemporary educational settings.

3. Method

3.1. Research design

The present research employs a qualitative research approach to facilitate an in-depth exploration and elucidation of its findings. The study is specifically designed to delve deeply into the comprehension and interpretation of intricate phenomena or intricate social contexts (Creswell, 2009). It is distinguished by its commitment to understanding these phenomena from the vantage point of the individuals directly involved. The central objective of this study is to encapsulate the depth and richness of the experiences, beliefs, behaviors, and interactions of English teachers within the domain of preparing for the integration of teaching technology into their pedagogical practices. In the course of conducting this study, significant emphasis is placed upon the importance of the research context (Cohen et al., 2018; Creswell, 2009). The researcher acknowledges the pivotal role that context plays in shaping and influencing the experiences and perspectives of English teachers. Consequently, the investigation seeks to gain insight into the English teachers' viewpoints concerning the integration of ICT and the strategies employed in the implementation of ICT integration into ELE learning activities.

Given the intricate interplay between contextual factors and the phenomena under examination, contextualization emerges as an indispensable facet of this research endeavor, ensuring that the study offers a comprehensive and holistic perspective on the research topic (Cohen et al., 2018). By adhering to the principles of qualitative research, this study endeavors to unearth the multifaceted dimensions of English teachers' engagement with technology in the context of language education. Through the utilization of qualitative methodologies, including interviews, observations, and content analysis, it

aims to capture the nuanced intricacies of their experiences and practices, shedding light on the broader landscape of ICT integration within ELE contexts. This in-depth exploration is expected to contribute valuable insights that can inform both pedagogical strategies and teacher preparation programs, ultimately enhancing the effectiveness of technology integration in English language teaching.

3.2. Research participants

In this particular research investigation, the participants under scrutiny consisted of English lecturers affiliated with ELE study programs situated within private universities located in the West Nusa Tenggara region. The selection of participants was facilitated through the utilization of a convenient sampling method, which was deemed appropriate for the purposes of data collection in this study. In total, the study encompassed the involvement of 25 participants, and it is noteworthy to mention that the composition of this participant pool exhibited certain demographic characteristics. Specifically, 75% of the participants were identified as female, while the remaining 15% were male. It is essential to acknowledge that the observed heterogeneity among the participants can be attributed to contextual distinctions that exist across the various universities that were encompassed within the purview of this research endeavor.

3.3. Research instruments and data collection

To comprehensively investigate the perspectives of English lecturers regarding the integration of technology within ELE study programs, as well as to explore the strategies advocated by the Sequential Qualitative Design (SQD) model and the actual teaching practices of English lecturers in this context, a methodological approach involving semi-structured interviews with English lecturers was employed. This research strategy was chosen for its capacity to offer rich insights into the multifaceted dimensions of the research inquiry (Cohen et al., 2018; Creswell, 2009). Recognizing the inherent complexity of the research problem at hand, the inclusion of semi-structured interviews was considered a methodologically sound choice, as it aligns with the prevailing wisdom in the research community that advocates the use of diverse data collection procedures to provide a comprehensive and nuanced understanding of the subject under investigation. The interviews served as a vital means of engaging directly with English lecturers to elicit their viewpoints and insights pertaining to the utilization of technology within ELE study programs.

This approach facilitated a deep exploration of the participants' experiences, opinions, and practices within their specific educational contexts. The interview questions were intentionally designed to be open-ended, enabling participants to provide narrative responses that revealed not only their perspectives but also the intricacies of their lived experiences as educators. Moreover, the decision to incorporate interviews into the research design was underpinned by the rationale of data triangulation (Miles et al., 2016). By collecting data through multiple methods, such as surveys and semi-structured

interviews, the research sought to enhance the robustness and validity of the findings. The interview data, characterized by its depth and qualitative richness, served as a valuable complement to the survey results, offering additional layers of understanding and contextualization. This triangulation of data sources was instrumental in corroborating and enriching the overall research findings, ultimately contributing to a more comprehensive and insightful exploration of the role of technology in ELE study programs from the perspective of English lecturers.

3.4. Data analysis

The analysis of the interviews with English lecturers in this study was conducted employing a qualitative research method, which is well-suited for capturing the nuanced insights and perspectives of participants within complex educational contexts. To facilitate a comprehensive and systematic examination of the data, all interviews were meticulously audio-recorded during the data collection phase and subsequently transcribed verbatim. This rigorous transcription process aimed to preserve the authenticity and integrity of the participants' responses, ensuring that every spoken word, nuance, and contextual detail were accurately captured for subsequent analysis. The primary analytical approach employed for this qualitative investigation was content analysis, which serves as a robust method for identifying recurring themes, patterns, and insights within the interview data. To enhance the reliability and rigor of this process, a team of two coders independently reviewed and analyzed each interview conducted with the English lecturers.

The dual-coder approach was instrumental in promoting inter-rater reliability and minimizing potential bias. Furthermore, it provided an opportunity for coders to engage in discussions to address any discrepancies in their identified themes and collaboratively develop a shared coding scheme. In line with best practices in qualitative research, the findings derived from the analysis of the qualitative data were substantiated through the inclusion of significant quotations from the participants. These direct quotations served to anchor the identified themes within the actual responses of the English lecturers, enhancing the credibility and trustworthiness of the research findings. The data analysis process encompassed several key stages, including data condensation, data display, and drawing conclusions (Miles et al., 2016). Data condensation involved the systematic reduction and organization of the voluminous interview data into manageable units, facilitating a more focused and systematic analysis. Data display encompasses the presentation of the coded data, typically in the form of thematic matrices or visual representations, to elucidate patterns and connections among the identified themes. Finally, drawing conclusions involved the synthesis of the analyzed data to develop meaningful interpretations and insights that addressed the research objectives.

4. Findings and discussion

4.1. English teachers' views on using educational technology

Concerning the present status of ICT integration within their teaching practices, findings from the study revealed distinct patterns among the participating English lecturers hailing from private universities. Specifically, nine of these lecturers reported a diverse spectrum of technology utilization in their pedagogical approaches. Their implementations encompassed a broad repertoire of digital tools and strategies, including the development of digital educational materials, the application of Learning Management Systems such as Moodle, the adoption of blended learning models, utilization of various online platforms, incorporation of digital games, and the creation and dissemination of educational podcasts, vodcasts, and engagement with educational websites. These are able to help English learners to access various learning materials and resources (Aşık et al., 2020; Gómez & Vicente, 2011). Therefore, the educators demonstrated a multifaceted and innovative approach to integrating technology within their ELE teaching practices.

In contrast, another subset of five English lecturers described a more limited, hardware-centric, and fundamental approach to technology integration in their instructional methods. Their examples of technology use were characterized by reliance on basic tools and infrastructure, such as the use of PowerPoint presentations, projection equipment, and internet access. This subgroup of lecturers appeared to employ technology in a more conventional and conventionalized manner (Eickelmann & Vennemann, 2017; Govender & Govender, 2009), emphasizing established tools rather than exploring a wide array of digital resources (Li, 2022; Ma et al., 2022). Notably, a distinct pattern emerged among two English lecturers who were both aged above 48 years and possessed nearly 25 years of teaching experience. These educators indicated a deliberate choice not to promote or integrate ICT into their teaching practices. This finding raises the intriguing hypothesis that older and more experienced English lecturers may exhibit a disinclination towards technology adoption, which could be attributed to their own personal experiences and potential gaps in ICT competencies.

The research findings highlight a diverse landscape of ICT integration among English lecturers in private universities in West Nusa Tenggara, Indonesia. While some educators demonstrate a propensity for innovative and multifaceted technology integration, others exhibit more conventional and hardware-focused approaches. The unique disposition of older and highly experienced English lecturers towards limited technology integration underscores the significance of individual factors and personal experiences in shaping pedagogical practices. Personal experiences help some English lecturers to deliver their teaching materials and their students are motivated to follow learning activities (Perifanou et al., 2023; Polly et al., 2010). Further exploration of these dynamics may provide valuable insights for enhancing technology integration within ELE programs and inform targeted professional development initiatives for educators.

Regarding their proficiency and training in ICT integration, the responses of the teacher educators in this study revealed varying levels of preparedness within the group. Specifically, a notable portion of eight TEs acknowledged that they had not undergone

any dedicated training specific to ICT integration into their teaching practices. It is in line with Kharade and Peese (2014) who argue a significant gap in formalized ICT training among this subset of educators implied that their technology integration efforts may be largely self-initiated and experiential. However, a noteworthy exception to this trend emerged among six English teachers, who, in contrast to their peers, reported having attended ICT training sessions. These educators, aged 35 and boasting 14 years of teaching experience, represent a relatively younger cohort among the study participants.

Each university in the object of the study has facilitated their lecturers to follow ICT training. English lecturers' attendance at ICT training sessions was characterized as voluntary, signifying their proactive engagement with technology-enhanced pedagogy. It indicated they have intention to develop their capability of technology use (Tezci, 2011; Uzun, 2016). Notably, one of these educators noted that following this training experience, they initiated the integration of ICT tools and recent digital resources into their teaching practices. This particular case underscores the catalytic role of targeted ICT training in motivating educators to adopt and embrace technology within their pedagogical approaches (Sert & Li, 2017; Shao et al., 2023). Nevertheless, despite these varying experiences with ICT training, the majority of English lecturers, except for six individuals, expressed reservations about their qualifications and competencies in technology use. For instance, five English lecturers affiliated with a private university, aged 45 and boasting 26 years of teaching experience, openly admitted their perceived lack of necessary ICT competences to effectively incorporate technology into their teaching methodologies. This prevailing sentiment among educators suggests that while some may have received training or engaged with ICT on a voluntary basis, they still perceive themselves as inadequately prepared to harness the full potential of technology in their teaching endeavors. "I think I don't have the technical skills to employ many things beyond simple slide software to present my teaching materials or basic use of the Moodle platform just for uploading learning materials and resources".

While it was observed that a vast majority of English lecturers participating in this study lacked formalized training in ICT integration, an intriguing subset of five educators emerged who had independently chosen to incorporate ICT into their teaching practices. These individuals made a personal decision to engage with ICT, primarily relying on self-initiated efforts and communities of learning with their fellow lecturers. These self-initiated efforts have a strong effect on applying their ICT knowledge into their teaching classes (Q. Wang & Zhao, 2021; Whyte, 2011; J. Xu & Zhu, 2023). Their motivation and commitment to ICT integration were driven by individual interests and intrinsic motivations rather than any institutional requirement or perceived necessity stemming from their academic roles (Sert & Li, 2017; Uzun, 2016). This observation leads to a notable inference that technology integration within the current courses offered by these educators, particularly among those who are older and more experienced, presents a significant challenge.

The reluctance and apprehension experienced by many of these educators regarding technology use imply a lack of confidence and perceived competence in ICT integration (Gudmundsdottir, 2010; Haerazi et al., 2020; Uzun, 2016). In this context, the integration of technology is predominantly left to the discretion of individual lecturers who are personally inclined towards its adoption. This decentralized approach to technology integration, contingent on the voluntary efforts and interests of educators, underscores the absence of a standardized or mandated framework for ICT integration within the academic contexts under examination (Biddix et al., 2016; Wu et al., 2019). Moreover, when comparing English lecturers from various private universities, a noteworthy trend emerged. Across different ELE contexts, the tendencies and competencies in ICT use among English lecturers exhibited striking similarities. This suggests a certain degree of uniformity in the challenges and experiences faced by educators when it comes to technology integration. It underscores the potential for commonalities in the barriers, perceptions, and needs related to ICT use in ELE programs, transcending the boundaries of individual institutions.

4.2. English language teachers' implementation strategies to integrate ICT in ELE program

To gain insights into the strategies employed to prepare future teachers for technology integration, in-depth interviews were conducted with English lecturers. These interviews aimed to delve into how English lecturers perceive the strategies assessed in the ICT scale concerning ELE programs (Miles et al., 2016). Although all the strategies were generally considered significant by the English lecturers involved in ELE programs, some strategies garnered more attention and detailed discussion. The majority of English lecturers primarily emphasized the strategy related to them serving as role models in ICT integration. While four English lecturers voiced their support for this strategy, five others expressed reservations, suggesting that it might not be a necessity or might not be feasible. The ensuing excerpts from the interviews provide concrete examples of these two contrasting viewpoints.

...you can become a role model in different fields and areas, including ICT, but I don't believe I can be an ICT model because it emphasizes equipment rather than the type of teacher you are...

...Not really, because most English lecturers at this university are 'digital immigrants....

...Yes, students look up to you as a role model. If you use ICT, they may not have encountered it unless they're personally interested in ICT. They mostly use it for social media and basic tools like PowerPoint. So, it's important to have role models who use ICT in the classroom. Otherwise, they probably won't actively seek out how to use it....

Different viewpoints can also be related to their own ICT use and integration. For instance, three younger and tech-savvy English lecturers are willing to be role models. In contrast, English lecturers from various private universities who lack technology competence and interest admit to being role models as educators in general. The lack of technology causes them to avoid the use of technology in their classes (Kangro & Kangro, 2004; Xiao & Hew, 2022). Another commonly mentioned strategy among most English lecturers is to discuss and reflect on the role of ICT in education. They believe that this strategy should be promoted because it allows them to critically assess which technology to use and how to integrate it into their teaching, as indicated in the following excerpts.

...It's beneficial to have ICT, and we shouldn't ignore it, but I believe we shouldn't overly rely on it. Many people embrace ICT without reflecting on it. I consider this strategy crucial to raise awareness, not only about its potential benefits but also its risks...

...Yes, it's crucial to understand how technology is used in various ways, like presentations and personal use. We talk about using different technologies to enhance specific skills, but it should never replace the teacher. Instead, it can motivate younger students who are already familiar with it...

Regarding strategies for learning technology by design and utilizing it within university settings alongside peers, six English lecturers provided limited feedback. For instance, one lecturer from a private university expressed optimism that future English lecturers would possess the capability to incorporate technology into their future classrooms, attributing this expectation to the availability of technology-enhanced materials crafted by professionals. Therefore, they have the intention to apply digital learning or ICT tools in their class. According to Haerazi et al. (2020), English lecturers who have intention to try digital learning will have strong motivation and self-efficacy to carry out their teaching activities with their learners. The finding showed that some of the research participants argued that educational ICT use helps them in accessing learning resources.

...I'm uncertain if it's necessary because abundant materials are widely accessible, and as future teachers, they'll acquire resources. Most recent books already incorporate technology. However, it would be preferable if they have the opportunity to learn it independently.

The viewpoint above by other English lecturers also indicates how educational technology may be perceived by the lecturers from different angles. One sees educational technology at materials level (websites and/or CDs) rather than increased awareness of the English lecturers towards technology to create learning opportunities. It is in line with Uzun (2016) who report that educator teachers who have technology awareness are more

creative to create various learning activities and language tasks. On the other hand, the four English teachers below support the idea of educational technology training through more hands-on.

...I believe this is highly significant. Typically, I provide them with an extensive list of tools and advise them to explore and identify one they find useful for a specific class ...

...this is crucial because they design lessons but need to witness them in a real context. For instance, during practicum, it's important to promote technology use so they can understand the connection...

The provided quotations offer insights into the perspectives of English lecturers from different private universities concerning the role of technology integration within English language teacher education. Notably, English lecturers affiliated with a private university appear to endorse a pedagogical approach that emphasizes providing opportunities for English lecturers to independently explore technology tools. This perspective implies a degree of learner autonomy and self-directed learning, wherein trainees are encouraged to proactively engage with technology and discover its utility within their teaching practices (Velenti et al., 2022; Whyte, 2011; J. Xu & Zhu, 2023). In contrast, English lecturers from various private universities advocate for a more sustained and immersive approach to ICT integration during the practicum period. They argue that this extended engagement with technology within real teaching contexts allows trainees to observe the tangible benefits and challenges associated with technology use, facilitating a deeper understanding of its practical application. These divergent viewpoints underscore the multifaceted nature of technology integration in English language teacher education (Howard et al., 2019; Jimoyiannis & Komis, 2007). While some educators advocate for a more hands-on, exploratory approach, others advocate for a more structured and experiential immersion in ICT use. This diversity in perspectives can inform the development of pedagogical strategies and teacher preparation programs that align with the varying needs and preferences of English language teacher trainees. Ultimately, the adoption of ICT in teacher education programs should strike a balance between offering opportunities for self-exploration and providing structured experiences that foster a comprehensive understanding of technology's role in real teaching contexts.

In examining the perspectives of English lecturers regarding technology preparation within the context of ELE programs in private universities in Indonesia, the results derived from the ICT scale analysis revealed notable trends and commonalities across these diverse academic settings. Specifically, the findings indicated that each of the ELE contexts demonstrated substantial similarities in the strategies employed for technology preparation. Within three distinct ELE contexts, English lecturers consistently reported that all six identified strategies related to technology preparation

were addressed at an average level. This particular outcome contrasts with the findings of prior studies conducted by Kay (2006) and Zahra et al. (2019), which suggested that ELE programs often provided limited or negligible ICT preparation to future educators. The convergence of strategies across these contexts suggests a parallel set of challenges faced by ELE programs in preparing their prospective teachers for effective technology integration.

The challenges primarily revolve around the necessity for improved ICT facilities, enhanced opportunities for technology training, and more effective strategies for technology integration. While the results indicated that all three ELE contexts operated at a moderate level in the implementation of these strategies within their programs, the findings can be viewed through a lens of both concern and promise. The outcomes, while not entirely satisfactory, are promising in the sense that they indicate a potential for further development and integration of ICT through these six identified strategies within ELE programs. Moreover, the moderate level of achievement suggests that ELE contexts possess the capacity to expand their efforts and integrate additional ICT strategies for technology preparation. The findings imply that there exists an opportunity for further enhancement in the realm of technology integration within English language teacher education, as the results did not indicate a low level of engagement but rather an average one.

In line with the observed shortcomings in the preparation of English language educators in the context of ICT integration, Uzun's study conducted in 2016 revealed similar deficiencies (Uzun, 2016). Uzun's findings indicated that both educational and technical courses within ELE programs fell short in adequately supporting English lecturers in acquiring the necessary ICT knowledge and skills. This consistent pattern of inadequate ICT preparation underscores the imperative need for a comprehensive reevaluation and critical revision of ELE programs (Kay, 2006). To address these deficiencies, it is imperative that ELE programs undergo a substantial redesign, with a particular focus on enhancing the ICT competencies and strategies necessary for effectively preparing future teachers.

One promising avenue for improvement involves the creation of opportunities for more hands-on and situated practices that incorporate reflective experiences. Collaborative activities, facilitated through formal and informal peer support, mentoring, coaching, and continuous reflection, can also play a pivotal role in this transformation. Such practices have the potential to provide a more holistic and experiential approach to technology integration within teacher education. In pursuit of these objectives, recent models rooted in experiential learning cycles, as proposed by Sert and Li (2017), and ongoing reflective situated practices, as discussed by Kuru-Gonen (2019), offer valuable guidance and inspiration for the redesign of ELE programs. These models emphasize the importance of experiential learning, reflective practices, and situated learning within the context of technology integration in education.

5. Conclusion

The perspectives of English lecturers in private universities in Indonesia regarding educational technology use reflect a multifaceted landscape. While some educators demonstrate a proactive and tech-savvy approach to ICT integration, a significant portion expresses reservations about their ICT competencies and the extent to which technology can enhance the teaching and learning process. The study highlights the need for targeted professional development initiatives and support mechanisms to bolster educators' ICT competencies and confidence. Additionally, the findings underscore the importance of striking a balance between autonomous technology exploration and structured training to optimize ICT integration within English Language Education (ELE) programs.

The strategies employed by English teachers for integrating Information and Communication Technology (ICT) within English Language Education (ELE) programs in private universities in Indonesia exhibit a range of perspectives and approaches. While some educators endorse a hands-on and exploratory approach, emphasizing trainee autonomy in technology exploration, others advocate for a more immersive and structured integration of ICT throughout practicum experiences. These divergent viewpoints emphasize the need for flexibility in teacher preparation programs, allowing for varying levels of learner autonomy and structured ICT training. The results suggest potential avenues for enhancing technology integration, including greater focus on experiential learning cycles and ongoing reflective practices. These insights underscore the importance of a balanced approach that incorporates both autonomous exploration and structured training to foster effective ICT integration within ELE programs.

References

- Abraham, M., Arficho, Z., Habtemariam, T., & Demissie, A. (2022). Effects of information communication technology-assisted teaching training on English language teachers' pedagogical knowledge and English language proficiency. *Cogent Education*, 9(1), 1–18. <https://doi.org/10.1080/2331186X.2022.2028336>
- Adnan, M. (2017). Perceptions of senior-year ELT students for flipped classroom: A materials development course. *Computer Assisted Language Learning*, 30(3–4), 204–222. <https://doi.org/10.1080/09588221.2017.1301958>
- Al-Sabbagh, K. W., Bradley, L., & Bartram, L. (2019). Mobile language learning applications for Arabic speaking migrants: A usability perspective. *Language Learning in Higher Education*, 9(1), 71–95. <https://doi.org/10.1515/cercles-2019-0004>
- Anggoro, F., Caraka, R. E., Prasetyo, F. A., Ramadhani, M., Gio, P. U., Chen, R.-C., & Pardamean, B. (2022). Revisiting cluster vulnerabilities towards information and communication technologies in the eastern island of Indonesia using fuzzy c means. *Sustainability*, 14(6), 1-19. <https://doi.org/10.3390/su14063428>
- Anwar, I. W., & Sailuddin, S. P. (2022). Academic reading difficulties in higher education. *Journal of Languages and Language Teaching*, 10(2), 309-314. <https://doi.org/10.33394/jollt.v10i2.4849>

- Aşık, A., İnce, B. H. E., & Vural, A. Ş. (2018). Investigating learning technology by design approach in pre-service language teacher education: Collaborative and reflective experiences. *Journal of Qualitative Research in Education*, 6(1), 1–17. <https://doi.org/10.14689/issn.2148-2624.1.6c1s2m>
- Aşık, A., Köse, S., Yangın Ekşi, G., Seferoğlu, G., Pereira, R., & Ekiert, M. (2020). ICT integration in English language teacher education: Insights from Turkey, Portugal and Poland. *Computer Assisted Language Learning*, 33(7), 708–731. <https://doi.org/10.1080/09588221.2019.1588744>
- Avcı, H., & Adiguzel, T. (2017). A case study on mobile-blended collaborative learning in an English as a foreign language (EFL) context. *The International Review of Research in Open and Distributed Learning*, 18(7), 45–58. <https://doi.org/10.19173/irrodl.v18i7.3261>
- Aydin, S. (2013). Teachers' perceptions about the use of computers in EFL teaching and learning: The case of Turkey. *Computer Assisted Language Learning*, 26(3), 214–233. <https://doi.org/10.1080/09588221.2012.654495>
- Bahari, A. (2022). Teacher identity in technology-assisted language learning: Challenges and affordances. *E-Learning and Digital Media*, 19(4), 396–420. <https://doi.org/10.1177/20427530221092855>
- Basal, A. (2015). The implementation of a flipped classroom in foreign language teaching. *Turkish Online Journal of Distance Education*, 16(4), 28–37. <https://doi.org/10.17718/tojde.72185>
- Biddix, J. P., Chung, C. J., & Park, H. W. (2016). Faculty use and perception of mobile information and communication technology (m-ICT) for teaching practices. *Innovations in Education and Teaching International*, 53(4), 375–387. <https://doi.org/10.1080/14703297.2014.997778>
- Bilki, Z., Satar, M., & Sak, M. (2022). Critical digital literacy in virtual exchange for ELT teacher education: An interpretivist methodology. *ReCALL*, 35(1), 58–73. <https://doi.org/10.1017/S095834402200009X>
- Burston, J. (2014). MALL: The pedagogical challenges. *Computer Assisted Language Learning*, 27(4), 344–357. <https://doi.org/10.1080/09588221.2014.914539>
- Chang, M.-M., & Lan, S.-W. (2021). Flipping an EFL classroom with the line application: Students' performance and perceptions. *Journal of Computers in Education*, 8(2), 267–287. <https://doi.org/10.1007/s40692-020-00179-0>
- Chien, Y.-T., Chang, C.-Y., Yeh, T.-K., & Chang, K.-E. (2012). Engaging pre-service science teachers to act as active designers of technology integration: A Magdaire framework. *Teaching and Teacher Education*, 28(4), 578–588. <https://doi.org/10.1016/j.tate.2011.12.005>
- Cohen, L., Manion, L., & Morrison, K. (2018). *Research methods in education (8th Edition)*. New York: Routledge.
- Creswell, J. W. (2009). *Research design: Qualitative, quantitative, and mixed methods approaches (3rd Edition)*. SAGE Publications, Inc.
- Eickelmann, B., & Vennemann, M. (2017). Teachers' attitudes and beliefs regarding ICT in teaching and learning in European countries. *European Educational Research Journal*, 16(6), 733–761. <https://doi.org/10.1177/1474904117725899>

- Gao, C., & Shen, H. (2021). Mobile-technology-induced learning strategies: Chinese university EFL students learning English in an emerging context. *ReCALL*, 33(1), 88–105. <https://doi.org/10.1017/S0958344020000142>
- Gómez, J. I. A., & Vicente, C. P. (2011). Communicative competences and the use of ICT for foreign language learning within the European student exchange programme Erasmus. *European Educational Research Journal*, 10(1), 83–101. <https://doi.org/10.2304/eej.2011.10.1.83>
- Govender, D., & Govender, I. (2009). The relationship between information and communications technology (ICT) integration and teachers' self-efficacy beliefs about ICT. *Education as Change*, 13(1), 153–165. <https://doi.org/10.1080/16823200902943346>
- Gudmundsdottir, G. B. (2010). When does ICT support education in South Africa? The importance of teachers' capabilities and the relevance of language. *Information Technology for Development*, 16(3), 174–190. <https://doi.org/10.1080/02681102.2010.498409>
- Hadi, M. S., Izzah, L., & Larasati, I. (2021). The influence of mangarock online comics in teaching writing a narrative text. *Journal of Languages and Language Teaching*, 9(2), 243–249. <https://doi.org/10.33394/jollt.v9i2.3546>
- Haerazi, H., Utama, I. M. P., & Hidayatullah, H. (2020). Mobile applications to improve English writing skills viewed from critical thinking ability for pre-service teachers. *International Journal of Interactive Mobile Technologies (IJIM)*, 14(07), 58–72. <https://doi.org/10.3991/ijim.v14i07.11900>
- Hashemi, A., Si Na, K., Noori, A. Q., & Orfan, S. N. (2022). Gender differences on the acceptance and barriers of ICT Use in English language learning: Students' perspectives. *Cogent Arts & Humanities*, 9(1), 1–20. <https://doi.org/10.1080/23311983.2022.2085381>
- Howard, S. K., Thompson, K., Yang, J., & Ma, J. (2019). Working the system: Development of a system model of technology integration to inform learning task design. *British Journal of Educational Technology*, 50(1), 326–341. <https://doi.org/10.1111/bjet.12560>
- Hu, Z., & McGrath, I. (2011). Innovation in higher education in China: Are teachers ready to integrate ICT in English language teaching? *Technology, Pedagogy and Education*, 20(1), 41–59. <https://doi.org/10.1080/1475939X.2011.554014>
- Ibieta, A., Hinostroza, J. E., Labbé, C., & Claro, M. (2017). The role of the Internet in teachers' professional practice: Activities and factors associated with teacher use of ICT inside and outside the classroom. *Technology, Pedagogy and Education*, 26(4), 425–438. <https://doi.org/10.1080/1475939X.2017.1296489>
- Jeong, K.-O. (2023). Integrating technology into language teaching practice in the post-covid-19 pandemic digital age: From a Korean English as a foreign language context. *RELC Journal*, 54(2), 394–409. <https://doi.org/10.1177/0036882231186431>
- Jiang, L., Meng, H., & Zhou, N. (2021). English learners' readiness for online flipped learning: Interrelationships with motivation and engagement, attitude, and support. *Language Teaching Research*, 25(5), 1–22. <https://doi.org/10.1177/13621688211027459>

- Jimoyiannis, A., & Komis, V. (2007). Examining teachers' beliefs about ICT in education: Implications of a teacher preparation programme. *Teacher Development*, 11(2), 149–173. <https://doi.org/10.1080/13664530701414779>
- Kangro, A., & Kangro, I. (2004). Integration of ICT in teacher education and different school subjects in Latvia. *Educational Media International*, 41(1), 31–37. <https://doi.org/10.1080/0952398032000105076>
- Kay, R. (2006). Addressing gender differences in computer ability, attitudes and use: The laptop effect. *Journal of Educational Computing Research*, 34(2), 187–211. <https://doi.org/10.2190/9BLQ-883Y-XQMA-FCAH>
- Kharade, K., & Peese, H. (2014). Problem-based learning: A promising pathway for empowering pre-service teachers for ICT-mediated language teaching. *Policy Futures in Education*, 12(2), 262–272. <https://doi.org/10.2304/pfie.2014.12.2.262>
- Kuru-Gönen, S. İ. (2019). A qualitative study on a situated experience of technology integration: Reflections from pre-service teachers and students. *Computer Assisted Language Learning*, 32(3), 163–189. <https://doi.org/10.1080/09588221.2018.1552974>
- Lai, C., & Zheng, D. (2018). Self-directed use of mobile devices for language learning beyond the classroom. *ReCALL*, 30(3), 299–318. <https://doi.org/10.1017/S0958344017000258>
- Lee, J., & Song, J. (2020). The impact of group composition and task design on foreign language learners' interactions in mobile-based intercultural exchanges. *ReCALL*, 32(1), 63–84. <https://doi.org/10.1017/S0958344019000119>
- Li, B. (2022). Ready for online? Exploring EFL teachers' ICT acceptance and ICT literacy during covid-19 in Mainland China. *Journal of Educational Computing Research*, 60(1), 196–219. <https://doi.org/10.1177/07356331211028934>
- Liu, H., Lin, C.-H., Zhang, D., & Zheng, B. (2018). Chinese language teachers' perceptions of technology and instructional use of technology: A path analysis. *Journal of Educational Computing Research*, 56(3), 396–414. <https://doi.org/10.1177/0735633117708313>
- Ma, M., Chen, J., Zheng, P., & Wu, Y. (2022). Factors affecting EFL teachers' affordance transfer of ICT resources in China. *Interactive Learning Environments*, 30(6), 1044–1059. <https://doi.org/10.1080/10494820.2019.1709210>
- Meniado, J. C. (2023). Digital language teaching 5.0: Technologies, trends and competencies. *RELC Journal*, 54(2), 461–473. <https://doi.org/10.1177/00336882231160610>
- Miles, M. B., Huberman, A. M., & Saldana, J. (2016). *Quantitative data analysis: A methods sourcebook (3rd. Ed.)*. Los Angeles: Sage Publication.
- Moorhouse, B. L., Kohnke, L., & Wan, Y. (2023). A systematic review of technology reviews in language teaching and learning journals. *RELC Journal*, 54(2), 426–444. <https://doi.org/10.1177/00336882221150810>
- Nikimaleki, M., & Rahimi, M. (2022). Effects of a collaborative AR-enhanced learning environment on learning gains and technology implementation beliefs: Evidence from a graduate teacher training course. *Journal of Computer Assisted Learning*, 38(3), 758–769. <https://doi.org/10.1111/jcal.12646>

- Nurdiana, S., Sudirman, S., Laaribi, M., & Chuyen, N. T. H. (2023). Applying Wattpad Platform as an Instruction Medium to Improve Reading Skills Viewed from Reading Strategies. *Journal of Language and Literature Studies*, 3(1), 80–91. <https://doi.org/10.36312/jolls.v3i1.999>
- Perifanou, M. A., Tzafilkou, K., & Economides, A. A. (2023). Teacher intention to transfer ICT training when integrating digital technologies in education: The teacher transfer of ICT training model (TeTra-ICT). *European Journal of Education*, 58(1), 111–129. <https://doi.org/10.1111/ejed.12534>
- Polly, D., Mims, C., Shepherd, C. E., & Inan, F. (2010). Evidence of impact: Transforming teacher education with preparing tomorrow's teachers to teach with technology (PT3) grants. *Teaching and Teacher Education*, 26(4), 863–870. <https://doi.org/10.1016/j.tate.2009.10.024>
- Proctor, R. M. J., Watson, G., & Finger, G. (2003). Measuring information and communication technology (ICT) curriculum integration. *Computers in the Schools*, 20(4), 67–87. https://doi.org/10.1300/J025v20n04_06
- Şahin Kızıl, A. (2017). EFL learners in the digital age: An investigation into personal and educational digital engagement. *RELC Journal*, 48(3), 373–388. <https://doi.org/10.1177/0033688216684285>
- Sam, D. P. (2016). Natural approach of teaching English language on a flipped classroom platform to tertiary level engineering learners. *International Journal of Educational Sciences*, 14(1–2), 13–18. <https://doi.org/10.1080/09751122.2016.11890474>
- Samuel, R. J., & Zaitun, A. B. (2007). Do teachers have adequate ICT resources and the right ICT skills in integrating ICT tools in the teaching and learning of English language in Malaysian schools? *The Electronic Journal of Information Systems in Developing Countries*, 29(1), 1–15. <https://doi.org/10.1002/j.1681-4835.2007.tb00196.x>
- Sert, O., & Li, L. (2017). A qualitative study on CALL knowledge and materials design: Insights from pre-service EFL teachers. *International Journal of Computer-Assisted Language Learning and Teaching*, 7(3), 73–87. <https://doi.org/10.4018/IJCALLT.2017070105>
- Shao, K., Kutuk, G., Fryer, L. K., Nicholson, L. J., & Guo, J. (2023). Factors influencing Chinese undergraduate students' emotions in an online EFL learning context during the COVID pandemic. *Journal of Computer Assisted Learning*, 39(5), 1465–1478. <https://doi.org/10.1111/jcal.12791>
- Situmorang, K. M., & Simanjuntak, D. C. (2023). EFL teachers' perceptions of kahoot as an online learning platform in promoting basic english vocabulary. *Journal of Languages and Language Teaching*, 11(2), 251–262. <https://doi.org/10.33394/jollt.v11i2.7525>
- Tezci, E. (2011). Factors that influence pre-service teachers' ICT usage in education. *European Journal of Teacher Education*, 34(4), 483–499. <https://doi.org/10.1080/02619768.2011.587116>
- Uzun, L. (2016). The educational and technical courses in the ELT program in Turkey: Do they contribute to ICT skills? *Cogent Education*, 3(1), 1–21. <https://doi.org/10.1080/2331186X.2016.1141454>

- Vallance, M. (2007). An information and communications technology (ICT)-enabled method for collecting and collating information about pre-service teachers' pedagogical beliefs regarding the integration of ICT. *Research in Learning Technology*, 15(1), 51–65. <https://doi.org/10.3402/rlt.v15i1.10912>
- Velenti, P. N., Puspita Ratri, D., & Urifah, U. (2022). Epals: Utilizing ICT to promote English language learning for young learners through global connection. *Education of English as a Foreign Language Journal*, 5(1), 35–47. <https://doi.org/10.21776/ub.educafl.2022.005.01.05>
- Wang, M., Shen, R., Novak, D., & Pan, X. (2009). The impact of mobile learning on students' learning behaviours and performance: Report from a large blended classroom. *British Journal of Educational Technology*, 40(4), 673–695. <https://doi.org/10.1111/j.1467-8535.2008.00846.x>
- Wang, Q., & Zhao, G. (2021). ICT self-efficacy mediates most effects of university ICT support on preservice teachers' TPACK: Evidence from three normal universities in China. *British Journal of Educational Technology*, 52(6), 2319–2339. <https://doi.org/10.1111/bjet.13141>
- Whyte, S. (2011). Learning theory and technology in university foreign language education: The case of French universities. *Arts and Humanities in Higher Education*, 10(2), 213–234. <https://doi.org/10.1177/1474022210364783>
- Wu, B., Yu, X., & Hu, Y. (2019). How does principal e-leadership affect ICT transformation across different school stages in K-12 education: Perspectives from teachers in Shanghai. *British Journal of Educational Technology*, 50(3), 1210–1225. <https://doi.org/10.1111/bjet.12766>
- Xiao, Y., & Hew, K. F. (2022). The relationships among ICT-related psychological factors, school contextual factors and secondary students' reading performance: A multilevel analysis across 47 economies. *Journal of Educational Computing Research*, 60(5), 1166–1196. <https://doi.org/10.1177/07356331211070975>
- Xu, J., & Zhu, Y. (2023). Factors influencing the use of ICT to support students' self-regulated learning in digital environment: The role of teachers in lower secondary education of Shanghai, China. *Psychology in the Schools*, 60(11), 4312–4331. <https://doi.org/10.1002/pits.22938>
- Xu, Q., Dong, X., & Jiang, L. (2017). EFL learners' perceptions of mobile-assisted feedback on oral production. *TESOL Quarterly*, 51(2), 408–417. <https://doi.org/10.1002/tesq.335>
- Zahra, W., Inderawati, R., & Petrus, I. (2019). The use of ICT in authentic assessment of the students' productive skills. *English Review: Journal of English Education*, 8(1), 81. <https://doi.org/10.25134/erjee.v8i1.2110>