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# Attitudes, Perceptions of Ability, Barriers, and Expectations of Lecturers in the Use of ICT in Online English Learning

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#### **Abstract**

This study aims to analyze the attitudes, perceptions of abilities, barriers, and expectations of IAIN Indonesia lecturers in the use of ICT in online English learning. The research method uses "explanatory sequential". The research sample was selected randomly and purposively. Questionnaires and interviews are used to collect the data. The quantitative data were analyzed by the SPSS program, while the interview findings were analyzed qualitatively. 80% of lecturers had positive views toward ICT use during class planning, according to the results (M = 4.2, SD = 0.7). They were thought to have a modest level of ICT proficiency, especially when it came to implementing lessons (M = 3.92, SD = 0.86). According to reports, there were few obstacles, mostly because of inadequate training and a lack of teaching facilities (M = 2.3, SD = 1.1). Expectations were high, particularly with regard to ongoing training and access to ICT infrastructure (M = 4.45, SD = 0.8). The results of this study in general, provide an overview of the attitudes and abilities that must be possessed by lecturers to minimize challenges in the hope of realizing the optimal use of ICT in online English learning.

Keywords: Attitudes, challenges, expectations, ICT, perceptions of abilities

#### Introduction

The higher education system in Indonesia has undergone significant changes during the COVID-19 pandemic. This pandemic provides an opportunity for educators to be able to use technology in the implementation of learning (Danim, 2022). The face-to-face learning system has turned into an online learning system. The online learning system is a learning system on the internet or a learning system based on technology, information, and communication (ICT). The online learning system requires lecturers and students to be proficient in using ICT. ICT is used as a learning medium that can assist lecturers in transferring knowledge to students. Technology is used as a learning medium that aims to support the education system (Seliaman & Al-Turki, 2012).

ICT has revolutionized education by making learning resources open online and accessible anytime and anywhere. It is a powerful method of teaching for learners learning English as a foreign language. Studies have shown that ICT can improve the quality of the learning process by presenting material in various multichannel learning media, motivating learners, enhancing critical thinking, providing opportunities for basic skills practice, providing access to information sources, and offering a platform for educators and learners to communicate from distant places (Apriani et al., 2020, Katemba, 2020)). ICT can also improve language skills by making class interactive, encouraging learning flexibility, strengthening educator-learner relationships, and improving technical skills. English educators have a positive perception of ICT in English language learning classrooms, as it facilitates student learning, provides information easily and quickly, and makes classes more interesting than discussion and teaching without tools.

The use of Information and Communication Technology (ICT) has a significant impact on both students and educators, particularly lecturers. Attitudes towards ICT play a crucial role in the successful implementation of new technology and its integration into the curriculum. Attitudes can be influenced by affective, cognitive, and behavioral components. Affective components involve emotional responses to objects, cognitive components involve consumer beliefs about objects, and behavioral components involve reactions to actions. Attitudes play a significant role in the integration and diffusion of ICT in the learning process, impacting work performance and the overall learning experience. A positive attitude towards ICT integration is essential for successful implementation (Kubitko et al., 2010).

The use of Information and Communication Technology (ICT) has a significant impact on both students and educators, particularly lecturers. Attitudes toward ICT play a crucial role in the successful implementation of new technology and its integration into the curriculum (Hamzah, 2022). Attitudes can be influenced by affective, cognitive, and behavioral components. Affective components involve emotional responses to objects, cognitive components involve consumer beliefs about objects, and behavioral components involve reactions to actions (Taghizadeh & Yourdshahi, 2019). Attitudes play a significant role in the integration and diffusion of ICT in the learning process, impacting work performance and the overall learning experience. A positive attitude towards ICT integration is essential for successful implementation.

Educators face numerous obstacles when integrating ICT into teaching, including limited knowledge, infrastructure issues, inadequate training, and time for lesson preparation (Bansa dan Asrini, 2019). Other main obstacles include outdated ICT, institutional leadership, high internet costs, and lack of institutional infrastructure support. Additionally, there is a lack of financial investment and resources for ICT integration. To maximize the use of ICT in English language learning, recommendations include staff training, stable electrical power, and encouraging local industries to produce ICT equipment to reduce acquisition costs (Oyediran et al., 2020). Despite these challenges, there is hope for the maximum utilization of ICT in English language learning.

Bansa and Asrini (2019) added in their research that the expectations for the use of ICT in learning are (1) increased use of computers will make classes more interactive, (2) using computers to do more interesting and imaginative work, (3) the availability of more interactive activities will provide more practical and useful knowledge, (4) there are tutors to teach how to use software or how to integrate ICT into teaching. Das (2019) in his research also stated that we can overcome the challenges of using ICT by creating awareness about ICT education, formulating policies to promote broad access to aspects of skills and competencies for learning, enlarging community participation for self-reliance in the application of ICT, developing infrastructure facilities such as electricity, internet, and others.

Despite numerous studies on ICT in learning, there is a lack of research on the use of ICT in the stages of preparation, implementation, and assessment, as well as the attitudes, perceived abilities, barriers, and expectations of English lecturers in

online learning. This lack of research is particularly concerning for lecturers, who are often overlooked in studies examining perceptions, barriers, challenges, and expectations in general. In January 2021, researchers conducted short interviews with English lecturers at IAIN Curup, IAIN Bengkulu, IAIN Madura, IAIN Surakarta, IAIN Lhokseumawe, and IAIN Palu. The results showed that lecturers' attitudes and abilities were negative, with a moderate ability to use ICT but not proficiency in up-to-date applications or platforms. Additionally, they faced numerous obstacles, such as limited facilities, workspace, health, wifi, and the ability to use ICT, which contributed to their discomfort and unfocused use of ICT.

Researchers also interviewed several students at IAIN Curup, IAIN Bengkulu, IAIN Madura, IAIN Surakarta, IAIN Lhokseumawe, and IAIN Palu regarding English language learning using online ICT. The results of the interviews concluded that: (1) students feel bored learning using online ICT; (2) students become passive learners; (3) students feel uncomfortable when lecturers often change lecture hours; (4) student grades depend on signal conditions; (5) lecturers only present lecture material; (6) lecturers lack interaction in providing feedback; (7) lecturers only use certain ICT platforms; and (8) miscommunication often occurs between lecturers and students. It can be concluded that the attitude and ability of lecturers in using ICT affect the attitude and interest of students in the learning process.

From the results of interviews with lecturers and students above, it can be concluded that it is very necessary to conduct research related to Attitudes, Perceptions of Ability, Barriers, and Expectations of Lecturers at Indonesian State Islamic Institutes (IAIN) in the Use of Information and Communication Technology in Online English Learning. This study fills that vacuum by conducting a thorough, data-driven investigation of IAIN English lecturers' experiences with ICT integration in online learning, spanning the whole instructional cycle—planning, execution, and assessment.

## **Research Methodology**

The research design used in this study is mixed-method research. Mixed-methods research provides more evidence to study research problems than quantitative or qualitative research alone. Mixed research can use all available instruments to collect data without being limited to quantitative research or qualitative research. Mixed methods research offers new insights that go beyond

separate quantitative and qualitative results. Mixed methods research provides a bridge to cross the gap that often exists between quantitative and qualitative researchers. Mixed methods research encourages the use of different worldviews or paradigms with quantitative research and qualitative research (Creswell & Clark, 2018).

The study focuses on the attitudes, perceptions of ability, barriers, and expectations of English lecturers at Indonesian State Islamic Institutes (IAIN) in the use of technology, information, and communication online. The population includes 315 lecturers and 12,833 English students from 34 IAINs in Indonesia. The sample selection procedure involves grouping IAIN by region, randomly selecting IAIN by region with an estimated minimum of 30% of the total IAN in each region, selecting English lecturers at each IAIN by region, and selecting English students from IAIN by region. The sample used in this study is English lecturers with NIDN and recorded in PDDIKTI in 2021. The researchers used the spin wheel application to randomly select 11 IAINs, including IAIN Malikussaleh Lhokseumawe, IAIN Padangsidampuan, IAIN Curup, IAIN Bangka, IAIN Pekalongan, IAIN Tulungagung, IAIN Kudus, IAIN Purwokerto, IAIN Palu, IAIN Fattahul Muluk Papua, and IAIN Sorong. The sample consisted of 55 English lecturers and 686 students from representatives of 11 IAINs, consisting of 4 IAIN Western Region, 4 IAIN Central Region, and 4 IAIN Eastern Region. The research sample will be given a questionnaire, consisting of 686 students and 55 lecturers.

This research utilized a questionnaire as a self-report instrument to gather information about the attitudes, beliefs, values, perceptions, personalities, and behavioral intentions of English lecturers at State Islamic Institutes (IAIN) in the use of Information and Communication Technology (ICT). The questionnaire was created using a Likert Scale with five scales for attitudes, barriers, and expectations of lecturers. The ability perception questionnaire was also created using five scales. The study collected data on the attitudes, perceived capabilities, barriers, and expectations of English lecturers in the use of ICT. The questionnaires were distributed to students of IAIN Indonesia and IAIN lecturers, focusing on perceived ability and attitudes, barriers, and challenges.

**Table 1.** Blueprint for Questionnaire of Attitudes, Perceptions of Ability, Barriers, and Expectations of English Lecturers in the Use of ICT

Variable	Aspects	Number of Items
Attitudes	Attitude in English lesson planning	6
	Attitude in the	,
	implementation of English learning	6
	Attitude in English Learning Assessment	6
Perceptions of Ability	Perceived skills in English lesson planning	6
	Perceived proficiency in English language learning implementation	6
	Perceived skills in English language learning assessment	6
Barriers	Challenges in English lesson planning	4
	Challenges in implementing English language learning	4
	Challenges in English language learning assessment	4
Expectations	Expectations in English lesson planning	4
	Expectations in the implementation of English language learning	4
	Expectations in English learning assessment	4

Interviews were conducted with English language students and lecturers to understand attitudes, perceived abilities, barriers, and expectations in using ICT in online English language learning. The study used live cellular phones and WhatsApp voice notes for data collection.

**Table 2.** Interview Guidelines

No	Variables	Aspects	Questions
1.	Attitudes	Attitude in planning, implementing, and	3
		assessing English learning	
2.			3
	Ability	implementing, and assessing English	
		language learning	
3.	Barriers	Barriers in planning, implementing, and	3
		assessing English language learning	
4.	Expectations	Expectations in English language	3
		learning planning, implementation, and	
		assessment	
		Total	12 items

The researcher also collected data on the population of IAIN Indonesia through online documentation, including the State Religious College Selection website and the Higher Education Database of the Directorate General of Higher Education (PDDIKTI) of the Ministry of Education and Culture of the Republic of Indonesia. They analyzed the number of English lecturers and students at IAIN Indonesia.

The data analysis techniques used in the research are quantitative data analysis techniques and qualitative data analysis techniques. The mixed research data analysis technique in this study is that the quantitative and qualitative databases are analyzed separately (Creswell, 2015). Quantitative results were then used to plan qualitative follow-up. Data obtained from questionnaires were analyzed using quantitative data analysis techniques. Data obtained from interviews were analyzed using qualitative data analysis techniques.

The ethical guidelines for research involving human subjects were followed in this study. The principal researcher's university's institutional review board granted ethical approval before data collection. All participants, including students and lecturers, were made aware of the study's goals, the fact that participation was entirely voluntary, and their freedom to leave at any moment without incurring any fees. Before distributing the questionnaire and again before performing interviews, informed consent was acquired electronically. Throughout the whole research procedure, participant identity and data confidentiality were rigorously upheld.

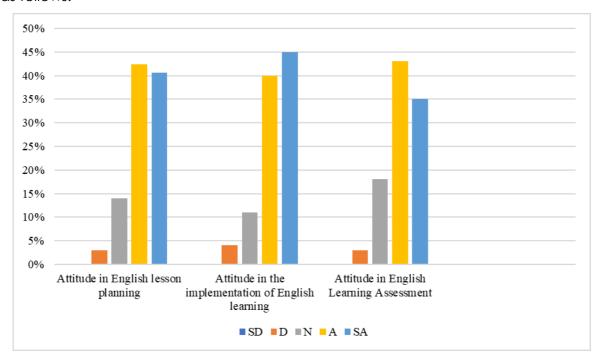
Despite using a strong explanatory sequential mixed-method design, there are a few things to keep in mind. First, social desirability bias might be introduced by using self-reported surveys, which could affect how participants assessed their skills or dispositions. Second, while lecturers from 11 IAIN campuses in various locations were sampled for the study, this does not accurately reflect all 34 State Islamic Institutes in Indonesia, which restricts how broadly the results may be applied. Third, the study did not use qualitative tools like NVivo or sophisticated statistical methods like Structural Equation Modeling (SEM), which might have offered richer theme analysis and deeper insights into the correlations between variables. More advanced analytical methods and a wider geographic sample may help future studies confirm and build on the current findings.

# **Findings and Discussion**

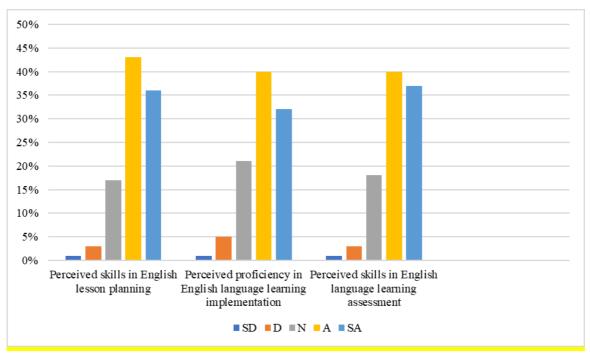
# **Findings**

## 1. Data from questionnaires

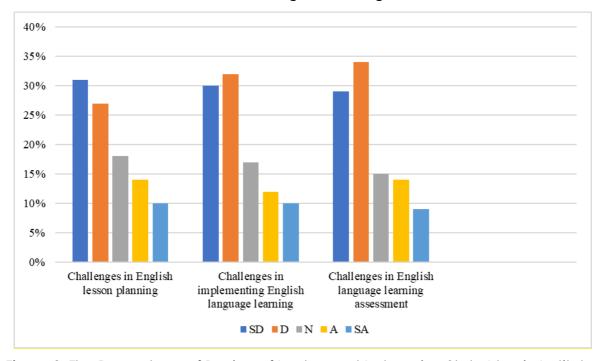
The attitudes, perceptions of ability, barriers, and expectations of English lecturers in using ICT at the online learning planning stage are presented in Table 3 as follows:



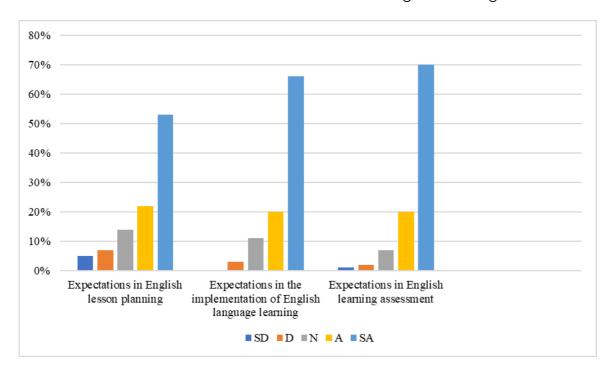
**Figure 1.** The Percentage of Attitudes, Perceptions of Ability, Barriers, and Expectations of Lecturers at Indonesian State Islamic Institutes (IAIN) in the Use of Information and Communication Technology in Online English Learning



**Figure 2.** The Percentage of Perceptions of Ability of Lecturers at Indonesian State Islamic Institutes (IAIN) in the Use of Information and Communication Technology in Online English Learning



**Figure 3:** The Percentage of Barriers of Lecturers at Indonesian State Islamic Institutes (IAIN) in the Use of Information and Communication Technology in Online English Learning



**Figure 4:** The Percentage of Expectations of Lecturers at Indonesian State Islamic Institutes (IAIN) in the Use of Information and Communication Technology in Online English Learning

As shown in Table 3, the average percentage of lecturers' attitudes toward the use of ICT at the learning planning stage is 83% which is categorized as positive with a mean value of 4.3 and a standard deviation of 0.7. The average percentage of lecturers' attitudes in using online ICT at the learning implementation stage is 85% which is categorized as very positive with a mean value of 4.2 and a standard deviation of 0.7. The average percentage of lecturers' attitudes in using online ICT at the learning outcomes assessment stage is 78% which is categorized as positive with a mean value of 4 and a standard deviation of 0.7.

The average percentage of perceptions of the ability of English lecturers to use ICT online at the lesson planning stage is 79.43% which is categorized as high with a mean value of 4 and a standard deviation of 0.76. The average percentage of the ability of English lecturers to use ICT online at the stage of implementing learning is 72.4% which is categorized as sufficient, with a mean value of 3.92 and a standard deviation of 0.86. The average percentage of lecturers' ability to use ICT online at the learning assessment stage is 77.35% which is categorized as sufficient, with a mean value of 4 and a standard deviation of 0.8.

Table 3 above shows that the average percentage of lecturers' obstacles in using ICT online at the learning planning stage is 23.59% which is categorized as very

low with a mean value of 2.3 and a standard deviation of 1.2. The average percentage of obstacles experienced by lecturers in using online ICT at the stage of implementing learning is 21.3% which is categorized as very low with a mean value of 2.3 and a standard deviation of 1.1. Lecturers reported that the average percentage of lecturers' obstacles in using online ICT at the learning assessment stage was 23.1% which was categorized as very low with a mean value of 2.3 and a standard deviation of 1.1.

The average percentage of lecturers' expectations in using ICT online at the lesson planning stage is 75.01% which is categorized as high with a mean value of 4 and a standard deviation of 1. The average percentage of expectations of English lecturers in using ICT online at the stage of implementing learning is 86.4% which is categorized as very high with a mean value of 4.45 and a standard deviation of 0.8. The average percentage of expectations of English lecturers in using ICT online at the learning assessment stage is 88.65% which is categorized as very high with a mean value of 4.4 and a standard deviation of 0.77.

## 2. Data from the interview

Lecturers are satisfied with using online ICT for English learning, stating it is more optimal than face-to-face lectures. One Lecturer at IAIN Palu shared:

"Teaching online is more efficient. I can post materials, communicate with students, and even administer tests without being limited to class time."

They use platforms like Google Classroom, LMS, Kahoot, and Google Forms to create semester learning plans, prepare materials, and include online links for students. One IAIN Curup lecturer observed:

"I make and distribute RPS documents, instructional videos, and digital assignments using Google Classroom. I use Quizizz or Google Forms for quizzes since they automatically gather and grade student answers. I save so much time because of this. Because students can view their scores and feedback instantly, the system also makes learning more transparent. I could create questions and produce score reports instantly, even for final exams. It empowers lecturers and students, in addition to being effective."

This approach is different from traditional classroom methods, as it is not constrained by space and time, allowing lecturers to access learning materials anytime and anywhere. Lecturers find online learning more comfortable, interesting, and varied, as students can access teaching materials quickly and lecture time becomes more efficient.

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However, face-to-face lectures are limited to traditional methods without ICT-based methods. Lecturers are patient in overcoming obstacles like limited signal and internet quotas, continuing online lectures, and recording sessions for students who may experience signal and quota limitations. An IAIN Kudus lecturer clarified:

"The most significant issue, particularly during live Zoom sessions, is the erratic internet connection. I occasionally lose focus while giving instructions or during a presentation, causing students to miss important details. To keep classes going, many of us use our own devices and data plans. If the campus offered institutional support, such as free Zoom accounts, data subsidies, or technical staff to help us, that would be beneficial."

ICT also makes the assessment process faster and easier, as it can automatically find students' grades after filling in answers to questions. An IAIN Tulungagung student shared:

"My lecturer used Google Classroom to effectively organize the course. The materials, homework, and tests for each week were posted systematically. Additionally, he offered supplementary materials such as vocabulary games, grammar PDFs, and YouTube links. The ability to download everything and study when the internet was steady was what I found to be most helpful. Compared to regular classes, it felt more structured."

They are happy and motivated to use various ICT platforms to distribute questions or exams online, making learning outcomes more interesting. Lastly, lecturers feel comfortable assessing learning using online ICT, as they can automatically recap student grades and announce exam results through various platforms, making it easier for lecturers to provide the necessary support.

Students reported that lecturers are adept at using online ICT during lesson planning. They can create discussion links with peers using Zoom meetings, formulate semester learning plans (RPS), select teaching materials, design exam questions, and select various platforms that suit student needs. However, this ability is not the same as in face-to-face lectures, where lecturers formulate semester learning plans independently. As an IAIN Bangka student thought:

"We frequently had the impression that we were merely reading slides or watching videos. The back and forth was insufficient. I was hoping for more conversations or real-world examples. We occasionally turned in assignments without receiving any response. It resembled throwing objects into a black hole. Although I believe the lecturers are aware of the resources, it's possible that they aren't utilizing them for genuine communication."

Students also reported that lecturers can design RPS, teaching materials, and materials according to their needs, including Graduate Learning Outcomes (LLO), General Skills (KU), Specific Skills (KK), material at each meeting, references, assessments, hard and soft skills, and more. Lecturers can share references, teaching materials, and materials using Google Drive, ensuring they are accessible anytime and anywhere. Students reported that lecturers can operate various online ICT platforms, such as Zoom Meeting, WhatsApp, Google Classroom, and Google Meet, making the learning process more efficient. They can summarize learning material, provide opportunities for students to ask questions, distribute questions, and check students' assignments. However, lecturers need to correct students' answers and make a recap of the total scores of all students. They can also provide feedback on students' answers using online ICT, including comments, voice notes, and discussion on high-level difficulty questions. Overall, lecturers can be more creative in using various platforms for online answering comments than during face-to-face lectures.

Online learning presents numerous challenges for lecturers, including sharing devices, a lack of workspace, and limited access to high-speed ICT devices. An IAIN Lhokseumawe student shared:

"The class time was constantly shifting, and occasionally it was only announced an hour in advance. And it's an issue for students in rural areas like mine. We miss the session if there is a poor signal or if the power goes out. The lecturer's inability to connect once resulted in the cancellation of the entire class. Despite our desire to remain dedicated, it makes learning extremely stressful."

They also struggle with limited abilities, often experiencing laptop errors and online features that don't match their specifications. Additionally, lecturers lack training in designing online syllabi and using various ICT platforms.

The campus does not provide training related to ICT implementation during online learning, unlike previous face-to-face training. In the learning assessment stage, lecturers have limited facilities and resources to assess student assignments and exams. They also have limited access to paid learning materials, which can lead to issues like blank screens, speakers, microphones, and camera malfunctions. Furthermore, the campus does not provide training on the assessment of ICT-based learning outcomes. The campus only provides information on the types of ICT platforms used for creating exams or assessing automatically, without providing instructions on how to operate these platforms.

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IAIN Indonesia lecturers are awaiting a dedicated room with high-speed internet access, security systems, and wifi for designing RPS and teaching materials. A lecturer from IAIN Fattahul Muluk Papua emphasized the need for institutional investment:

"We need a dedicated space on campus—maybe a multimedia room with stable internet, good lighting, and decent computers. I've been using my old laptop and a mobile hotspot. It works, but it's not ideal for designing materials or hosting online assessments. The campus should invest in infrastructure to support long-term digital learning, not just treat it as a pandemic emergency."

The room will be accessible during working hours and holidays and will include a high-speed computer, headphones/microphones, webcam, speakers, and lighting. The room is expected to cost-effectively download paid online resources and learning resources. Lecturers aim to improve their computer skills, overcome technical issues, and be more creative in lesson planning. They also expect regular meetings with professionals to upgrade free software for online learning. According to an IAIN Sorong lecturer:

"I've never had any official instruction and training on how to utilize these platforms. YouTube, trial and error, or advice from friends are the sources of everything I know. We now require pedagogical training in addition to technical training, such as how to use Zoom to teach English communicatively, assess students in real time, and provide online feedback that benefits students. If those workshops were offered, I would go to them."

They also expect policies, assistance, and leadership support for paid training in ICT online use. The campus is expected to provide free online lecture applications and accounts for downloading textbooks and teaching materials. Lecturers also aim to improve their skills in learning evaluation platforms, media, methods, materials, and assessment strategies.

#### Discussion

Based on the research results above, 4 (four) important points will be discussed in depth. First, the attitude of lecturers towards the use of ICT in online English learning. Second, what is the perceived ability of lecturers in the use of ICT in online English language learning? Third, what are the obstacles encountered by lecturers in the use of ICT in online English language learning? Fourth, what are the expectations of lecturers in the use of ICT in online English language learning?

## 1. Attitudes of IAIN Indonesia's English Lecturers on the Use of ICT Online

The first objective of this study was to determine the attitude of English lecturers at IAIN Indonesia in using online ICT at the stages of planning, implementation, and assessment of learning. Based on the questionnaire, the results showed that the attitude of English lecturers toward the use of online ICT at the stages of planning, implementation, and assessment of learning was in the positive category. This positive attitude means that English lecturers at IAIN Indonesia are diligent, passionate, confident, disciplined, and focused on using online ICT in the learning stages. Diligence and enthusiasm are the most dominant attitudes in the use of ICT. Meanwhile, the attitudes of confidence, discipline, focus, satisfaction, pleasure, motivation, courage, patience, and comfort are supporting attitudes. The results of this study are in line with Hamzah's research (2022), which found that persistence or perseverance is the main factor supporting the resilience of educators in implementing online learning during the COVID-19 period. Prasetyo & MS (2021) also found that educators innovate in every online learning using ICT so that students are excited and motivated by the learning materials presented during learning.

Kopcha, Ozel & Zelyurt (2016) and Ngo and Eichelberger (2019) also found that a positive attitude toward the use of ICT can make educators and learners excited, happy, and comfortable in using computers and the internet. Lecturers' attitudes towards the use of ICT in teaching, such as like, happiness, and excitement, are factors that affect lecturers' ability and knowledge to use ICT effectively and efficiently (Salleh & Laxman, 2014). The comfortable and motivated attitude makes lecturers routine to use ICT so that lecturers become skilled in the use of ICT (Ayub et al., 2015). A comfortable and happy attitude can affect the success of ICT implementation in learning (Finley & Hartman, 2004; Groves & Zemel, 2000). The positive attitude of English lecturers can also be caused by self-confidence and good motivation from the campus in the form of giving rewards to lecturers. Coban and Atasoy (2019) found that there is a significant relationship between educators' self-efficacy perceptions of ICT and their attitudes toward using ICT in the classroom. Aslan and Zhu (2016) also found that efficacy or confidence in the use of computers and technology is an influential factor in the ability to use ICT in the teaching and learning process. Konwar (2015) and Samuel, Onasanya & Olumorin (2018) also found that assistance, rewards, and funds from the campus to educators can be a motivation for educators to give their best in the use of ICT.

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The results of this study are in line with the results of research from Shah & Empungan (2015) and Kubitko et al. (2010), who found that educators have a positive attitude toward the use of ICT tools in Literature lessons. Kopcha, Ozel & Zelyurt (2016) also found that there is a positive attitude toward the use of technological tools in learning. A positive attitude is seen in the fun learning process when educators use ICT. Ngo and Eichelberger (2019) also found that learners show a positive attitude towards the use of ICT, namely, they feel comfortable in using computers and the internet. Albirini (2006), Kluever et al. (1994), and Apriani et al. (2021) also in their research articles that success in the use of technology in education largely depends on attitudes towards its use. The alignment of the findings of this study with the findings of previous studies can be the basis for generalizing the concept that the positive attitude of lecturers in using ICT online contributes to a sense of comfort when operating ICT, which in turn contributes to teaching success. Lecturers' comfortable attitude in using ICT causes them to be confident and motivated to use ICT routinely in learning (Ayub et al., 2015). Lecturers who feel comfortable operating ICT can influence their ability to use ICT optimally (Salleh & Laxman, 2014). So, learning will be more interesting and fun when lecturers are skilled in using various types of ICT in the learning process.

From the results of previous studies, it can be seen that the positive attitude of lecturers toward the use of ICT is considered the main predictor of the use of new technology in the classroom (Albirini, 2004). Seo (2013) also found that lecturers' attitude is a key factor in driving ICT adoption in education. The positive attitude of lecturers in using technology also has an impact on work performance, which is very helpful in integrating technology into the teaching process (Elkaseh et al. 2015). The higher the positive perception of teachers about ICT, the higher the utilization of ICT in learning (Hudayati et al., 2021). Makhlouf & Bensafi (2021) also stated that there is a statistically significant positive correlation between the attitude of teaching staff and the use of ICT. Widodo, Ariyani, and Setiyadi (2018) also found a significant relationship between attitude and motivation, where a positive attitude will create motivation to act even better in using ICT. The existence of strong motivation will make someone more resilient in facing the obstacles encountered. So, this strong motivation makes lecturers less likely not give up easily on using ICT when teaching. Lecturers will try to give their best even though there are they face obstacles during the learning process.

## 2. Perceptions of the Ability of IAIN Indonesia's English Lecturers to Use ICT Online

The second objective of this study is to find out how the perception of the ability of English lecturers at IAIN Indonesia in the use of ICT online at the stages of planning, implementation, and assessment of learning. The research data shows that, according to the students, the lecturers' ability to use ICT online can be categorized as sufficient. This means that, according to English students at IAIN Indonesia, their English lecturers' ability to use ICT is sufficient in operating ICT or using various ICT platforms at the stages of planning, implementation, and assessment of learning. Lecturers' ability to use ICT includes the ability in the aspects of website knowledge, application knowledge, tool knowledge, website use, application use, and computer use (Taghizadeh & Yourdshahi, 2019). The ability to master ICT includes lecturers being able to operate computers, internet searches, and computer programs (Ojeniyi & Adetimirin, 2016).

The most dominant ability possessed by lecturers is being able to create teaching materials, conduct discussions, and check and assess online exam questions. Meanwhile, (1) the ability to design a syllabus, e-attendance, and e-assessment; (2) the ability to deliver material and provide feedback; and (3) the ability to make e-quiz and discuss exam results are supporting abilities. The ability to create teaching materials, conduct discussions, and check and grade exam questions online is very important. Yaumi (2012) found that learning using ICT-based teaching materials and materials was more effective than learning with printed materials. Discussions using ICT make the class more interesting than discussions without using ICT. (Katemba, 2020). The implementation of learning evaluation using ICT makes the assessment process more flexible without being limited by space and time, more effective, and more efficient in its implementation (Sofyana & Roza, 2019).

The ability of lecturers to use online ICT in the sufficient category may be due to several intrinsic and extrinsic factors. Intrinsic factors are the lack of confidence of lecturers in improving competence in using ICT (Dudeney and Hockly, 2007). Meanwhile, extrinsic factors are the lack of facilities (Dudeney and Hockly, 2007; Bingimlas, 2009) and training in the use of ICT both independently and guided (Dewi et al., 2019). Training in the use of ICT is effective in improving teachers' positive attitudes towards integrating ICT in EFL classes (Hafifah, 2020).

This sufficient ability makes lecturers improve their abilities even better so that they can use more varied online learning media according to the technical difficulties faced by both lecturers and students (Ratnawati & Utama, 2021). Therefore, lecturers must equip themselves with ICT skills and update technology applications to cope with 21st-century teaching, or they will be replaced by technology itself (Hafifah and Sulistyo, 2020).

The results of this study are in line with the results of the research found by Rodliyah (2018) and Hafifah & Sulistyo (2020). Rodliyah (2018) found that lecturers have sufficient ability to operate ICT in the learning process. Hafifah and Sulistyo (2020) also found that the ability to use ICT in Indonesian higher education is in a fairly good category. They know and can operate various forms of ICT tools that can be used for teaching.

The ability to use ICT can directly influence lecturers to be productive not only in teaching but also in their academic research (Amua-Sekyi & Asare, 2016). The same findings were also found by Febrialismanto & Nur (2019), Akpan (2014), and Lubis, Idrus, & Sarji (2018). Febrialismanto & Nur (2019) found that sufficient ability to use ICT can support efforts in making learning material development, communicating learning development results, and disseminating information on learning development results. Akpan (2014) also found that there is a significant influence of teachers' ICT competency level on their effectiveness in classroom instruction, research/publication, communication, and record keeping. The ability and knowledge of using ICT have a positive impact on the quality of the learning process (Lubis, Idrus, & Sarji, 2018). Low ability to use ICT can cause ineffectiveness and inefficiency in the learning process, so the results are not optimal (Adisel and Prananosa, 2020).

# 3. Barriers to IAIN Indonesia's English Lecturers in Using ICT Online

The third objective of this study is to find out how the barriers faced by English lecturers at IAIN Indonesia in the use of online ICT at the stages of planning, implementation, and assessment of learning. Data from English lecturers at IAIN Indonesia show that the barriers faced by English lecturers in using online ICT at the stages of planning, implementation, and assessment of learning are in a very low category. The most dominant obstacle experienced by lecturers is limited costs. Other barriers are caused by limited facilities, skills, and training. Rana & Rana (2020) agree that cost is the main factor influencing the use of ICT. The absence of funding

from the government and universities causes limitations in purchasing ICT facilities to provide ICT training for teaching and education personnel. Nikolopoulou & Gialamas (2016) found that cost limitations are the main obstacle to the use of ICT. In line with the above opinion, Ogunode & Olatunde-Aiyedun (2021) also found that funding is the biggest obstacle to the use of ICT in learning. Facility limitations are also caused by the limited costs that users have. Cost limitations consist of low income, internet quota costs, and the cost of buying ICT equipment (Apriani et al., 2022).

Lecturers can create e-syllabi, e-attendance, e-assessments, PPT, teaching materials, and quizzes using various online ICT platforms. This is due to a positive attitude and sufficient ICT skills. Lecturers have been accustomed to using ICT in both online and face-to-face lectures. They have adequate facilities and infrastructure, such as laptops, mobile internet quotas, and training for online learning. This low barrier can be attributed to internal factors like a positive attitude and sufficient ICT skills. Ayub et al. (2015) found that lecturers who have a positive attitude and sufficient ability are confident and motivated, causing no significant barriers to the use of ICT. Positive attitudes and sufficient ability in the use of ICT are also experienced by English lecturers at IAIN Indonesia. The data from this study shows that English lecturers at IAIN Indonesia provide their own ICT used in the online teaching and learning process. Lecturers are also confident and motivated to use various ICT platforms in learning, such as Google Classroom, e-learning, Zoom meetings, Google Meet, and so on. The campus also provides facilities such as internet-connected computers.

A few barriers to integrating ICT can be caused by lecturers' cognitive behavior or lecturers' high confidence when it comes to integrating ICT in learning activities. Cox, Preston, and Cox (1999); Osborne & Hennessy (2003); and Balanskat et al. (2006) in their research found that educators who are confident in using technology in their classroom cause to understand the usefulness of ICT. Liu et al. (2017), Olefare et al. (2017), and Widodo, Ariyani, and Setiyadi (2018) also found that there is a significant impact of educators' positive attitude toward the use of information and communication technology (ICT), which enables them to minimize the barriers that can potentially be found in its use. In addition, Kristiawan & Muhaimin (2019) in their research also found that to minimize the barriers

experienced by lecturers, the institution must encourage lecturers to increase their confidence by providing ICT resources consisting of hardware and software.

A positive attitude is not the only factor that affects the successful use of ICT in the teaching and learning process (Semerci & Aydin, 2018). Other variables influence this, such as ICT infrastructure factors owned by the campus or the approach used by the campus in implementing ICT in the campus environment. The availability of ICT facilities is one of the supporting factors for lecturers so that they do not experience significant obstacles in using ICT online. Snoeyink and Ertmer (2001) in their research found that problems with the use of ICT in the classroom are a lack of resources, unreliable equipment, and a lack of technical assistance. Khan et al. (2011) & Hafifah and Sulistyo (2020) also found that ICT facilities which include internet access and availability of technology devices, are the main obstacles faced in the integration of ICT in learning.

However, some other researchers, such as Rahayu (2019), Diningrat et al. (2020), Lestiyanawati (2020); & Woyo (2020) found different results. Their research found that there are significant barriers to the use of ICT in online learning, namely the lack of ICT facilities and infrastructure, the low ability of lecturers to operate ICT, and the lack of training related to the use of ICT. These obstacles are an obstacle for educators and students, causing the learning process to be suboptimal, namely, not maximizing the use of ICT in the classroom, and the inefficiency of the learning process. From the results of the previous research above, there are differences with the results of this study. This obstacle may be caused by the implementation process in using ICT, offline, blended learning, and some fully online. The previous studies above were conducted during the implementation of offline learning and blended learning using ICT, while in this study, the implementation of English language learning using ICT online during the Covid-19 period.

## 4. Expectations of IAIN Indonesia's English Lecturers in Using ICT Online

The fourth objective of this study is the expectations of English lecturers at IAIN Indonesia in the use of online ICT. The research data shows the expectations of English lecturers at IAIN Indonesia in the use of online ICT at the stages of planning, implementation, and assessment of learning in the high category. The most dominant expectation experienced by lecturers is the expectation related to training. Expectations related to facilities, costs, and abilities are supporting expectations of training expectations. Kalogiannakis (2010) in his research also found

that educators have a high desire to attend further training programs on the pedagogical development of ICT use. Training in the use of ICT is a key element in improving digital competence (Romero-Tena, 2020). Training also has a positive impact on confidence in ICT use (Galanouli & Gardner, 2004).

Data from English lecturers at IAIN Indonesia show that lecturers' high expectations in the use of ICT come from the external aspect; lecturers want support and attention from the campus related to facilities, costs, training, motivation, and assistance in terms of integrating the right ICT according to the needs of online learning. Lecturers are also aware that technology will not replace lecturers, but lecturers who have technological capabilities will replace lecturers who do not have technological capabilities (Hafifah and Sulistyo, 2020). Therefore, lecturers must have high expectations to improve their ability to use ICT so that they can compete locally, nationally, and globally. These expectations motivate educators to give their best in the use of ICT (Konwar, 2015; Samuel, Onasanya & Olumorin, 2018).

This high expectation in the use of ICT can be caused by the barriers faced by lecturers when using ICT in learning (Al-Shboul et al., 2017). These barriers consist of intrinsic and extrinsic barriers. Intrinsic barriers are a lack of confidence in integrating ICT and inadequate competence. Extrinsic barriers are facility constraints, ineffective professional development, and the absence of technical support from the campus (Upitasari, 2020). Data from interviews with English lecturers at IAIN Indonesia show that lecturers' barriers to using ICT are very low, but they agree that they have high expectations in using ICT online so that they can minimize the barriers. English lecturers at IAIN Indonesia face low barriers to using ICT, but these barriers drive high expectations for online ICT use. They are motivated to learn about new technologies and adapt their teaching methods. Although they have basic ICT equipment, they have high expectations for more sophisticated areas and continuous professional development. The campus demands creative, innovative, and imaginative online learning, and lecturers are eager to provide the best with maximum facilities and infrastructure. The study highlights the need for ICT equipment to be harmonized with teaching English, and lecturers' motivation to improve their skills and knowledge in the ever-evolving technology landscape.

The existence of obstacles in the use of ICT causes high expectations of lecturers in the use of ICT. This means that there are a lot of things that need to be improved by lecturers, campuses, and the government regarding the use of ICT in

English language learning. Expectations will become a new problem if not followed up on immediately by the relevant parties. These expectations can be followed up by both lecturers, the campus, and the government. All these parties must be actively involved in fulfilling these expectations so that the online learning process using ICT can run according to the desired goals.

From the lecturers' side, lecturers can improve their quality in using ICT online so that they can adapt to the needs, learning styles, and skills of the 21st century. Lecturers are expected to improve basic knowledge/skills in the use of ICT and the integration of ICT in research and teaching (Bingimlas, 2009; Dionys, 2012). Lecturers are also expected to attend training related to the use of ICT in learning. Akbaba-Altun (2006) & Ertmer, Ottenbreit-Leftwich, Sadik & Sendurur (2012) explained in their articles that educators need training and retraining in this new technology to facilitate the integration of ICT in education, especially teaching. The campus is required to invest in ICT infrastructure and programs to improve the quality of education. Research suggests that adequate hardware and software, sufficient computers, and a large budget are essential for a more engaging learning process and easier communication with students. Emerging technologies like video and podcasting require large bandwidth, so the campus must invest in these resources to ensure the best possible learning experience.

From the government side, the government is expected to formulate strategic policies and programs related to the use of online ICT in higher education. This expectation is in line with the opinion of Warmayana (2018), namely 3 (three) things need to be streamlined in utilizing ICT to improve the quality of higher education, namely: (1) the process of policy formulation by universities related to the implementation of ICT-based academic service quality management is formulated properly and according to stakeholder needs, (2) process policy documents, in planning ICT-based academic service quality management properly and comprehensively by involving proportionally related elements, (3) and policy implementation programs.

The same findings were also found by Obuekwe & Eze (2017), Bansa and Asrini (2019), Das (2019) & Oyediran et al. (2020). The results of their research found that there are high expectations for the use of ICT in learning. Oyediran et al. (2020) & Obuekwe & Eze (2017) found that educators have high expectations for improved facilities, skills, and training in the use of ICT. Bansa and Asrini (2019) also found that

educators' high expectations for the use of ICT in learning are (1) increased use of computers will make classes more interactive, and (2) there are tutors or technicians to teach how to use the software or how to integrate ICT into teaching. Das (2019) in his research also found that educators can overcome the challenges of using ICT by (1) creating awareness about ICT education, (2) formulating policies to promote broad access to aspects of skills and competencies for learning, (3) enlarging community participation for independence in the application of ICT, and (4) developing infrastructure facilities such as electricity, internet, and others. The alignment of expectations in this research with the previous research above is that both have high expectations in the aspects of facilities, costs, abilities, and training.

Limitations in the implementation of this study consist of aspects of (1) variables, (2) subjects, and (3) research data analysis. First, the research variables are still very few of the many variables that exist and may be observed from the problem under study. This is an opportunity for further research by observing different variables. Second, the data source sample subjects are still relatively limited compared to the total population spread across 34 PTKIN. The sample of affordable data source subjects in this study only covers several provincial areas, which may not represent the characteristics of provincial areas that are not sampled as data source subjects. Third, the results will certainly be more complete and accurate if the data analysis uses SEM and NVivo analysis.

Although the aggregate findings indicate that English instructors at IAIN institutions have favorable attitudes and moderate competence, the data show significant regional and institutional variance. Lecturers from Eastern Indonesia, such as IAIN Fattahul Muluk Papua and IAIN Sorong, cited more problems with ICT infrastructure, such as restricted access to high-speed internet, obsolete hardware, and fewer possibilities for formal training. One Papuan lecturer stated that they depended only on personal devices and did not have access to campus-provided resources, highlighting the paucity of institutional investment in ICT assistance.

In contrast, lecturers from Western and Central areas, such as IAIN Curup and IAIN Tulungagung, reported more consistent access to ICT platforms, improved support systems, and greater incorporation of digital tools into their teaching. These instructors displayed greater autonomy in creating online learning tools and communicating with students across numerous platforms. Students at these

universities also expressed increased satisfaction with the organization, clarity, and regularity of feedback in their online learning experience.

This discrepancy is most likely caused by geography and infrastructure disparities between locations, which have an impact on both institutional policies and lecturer preparation. These disparities indicate that a one-size-fits-all strategy to ICT deployment may be ineffective. Tailored assistance programs—adjusted to regional restrictions and capacities—are required for equitable ICT integration across all IAIN campuses.

## **Conclusion and Suggestion**

#### Conclusion

The study reveals that lecturers at IAIN Indonesia have a positive attitude towards using ICT in online English language learning, with a focus on diligence, enthusiasm, and effective, creative learning. Students' perceptions of their ability are moderate, with the most dominant element being the ability to create teaching materials, implement the learning process, and evaluate properly. Technical mastery related to ICT hardware and software is not sufficient.

Obstructions faced by lecturers include limited facilities, costs, and abilities due to limited training. The cost element is the most dominant factor. The expectation for lecturers is to fulfill the needs of online learning activities, financial aspects, and learning facilities, as well as implement continuous training to meet evolving needs. The study highlights the need for lecturers to possess the necessary attitudes and abilities to effectively utilize ICT in online English language learning.

## **Suggestions**

The researcher proposes several suggestions to improve English language learning at the State Islamic Institute (IAIN) Indonesia. These include providing teaching rooms and computer facilities with high-speed internet access, providing premium Zoom meeting accounts for lecturers, conducting online training, offering rewards and punishments for lecturers, and providing technicians or assistants to help overcome obstacles.

Lecturers at IAIN Indonesia are expected to provide complete facilities and infrastructure, participate in training activities, and enrich online learning methods and strategies. Other researchers are expected to conduct comprehensive research on students' and lecturers' use of online ICT, follow-up research on ICT-based

teaching materials, and explore other aspects such as motivation, self-confidence, self-defense, strategies, methods, and techniques related to online ICT. Comprehensive research using SEM analysis or path analysis can help understand the relationship between these aspects and enhance the quality of English language learning.

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