



Integrating Artificial Intelligence to Enhance University Students' Engagement: The Case of Third-Year EFL Students at the University of M'sila, Algeria

دمج الذكاء الاصطناعي لتعزيز تفاعل الطلبة: دراسة حالة لطلبة السنة الثالثة لغة الإنجليزية بجامعة المسيلة

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Received: 26/09/2025

تاريخ النشر: 2026/03/15

published: 15/03/2026

تاريخ الاستلام: 2025/09/26

Article abstract:

The present study aims to explore the extent to which AI is utilized to enhance learner engagement, focusing on the perspectives of EFL teachers at the Department of English, University of M'sila. Employing a descriptive research design, this study involved a sample of (20) EFL teachers. Data was collected through questionnaires, observations and semi-structured interviews. The findings indicate that most teachers recognize AI significance in increasing learner engagement and motivation, mainly through interactive tasks. However, they also highlight concerns about over-reliance on it and the limited professional development opportunities for AI integration.

Key words: artificial intelligence; learner engagement; motivation; over-reliance

ملخص المقال:

تهدف الدراسة الحالية إلى استكشاف مدى استخدام الذكاء الاصطناعي لتعزيز مشاركة المتعلمين، مع التركيز على وجهات نظر الأساتذة بقسم اللغة الإنجليزية بجامعة المسيلة. اعتمدت الدراسة منهجاً بحثياً وصفيّاً، وشملت عينة مكونة من (20) مدرساً. تم جمع البيانات من خلال الاستبيانات، بالإضافة إلى الملاحظة والمقابلات. كشفت النتائج أن معظم المدرسين يدركون أهمية الذكاء الاصطناعي في زيادة مشاركة المتعلمين وتحفيزهم، وذلك أساساً من خلال خاصية التفاعلية. ومع ذلك، تم تسليط الضوء أيضاً على مخاوف بشأن الاعتماد المفرط على التكنولوجيا، بالإضافة إلى ضعف فرص التطوير المهني لضمان دمجها بشكل فعال.

كلمات مفتاحية: الذكاء الاصطناعي؛ تفاعل المتعلمين؛ التحفيز؛ الاعتماد المفرط

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Introduction

Technology has revolutionized the educational landscape since it opens new avenues of effective opportunities for teachers and learners alike in today's digital world. Artificial intelligence AI is one these innovative technologies. It refers to computer systems that are designed to simulate human intelligence, such as problem solving, reasoning (Aljemely, 2024). It includes machine learning that enables to make decisions and performs well tailored and personalized tasks (Hohaus & Heeren, 2023). The integration of Artificial intelligence (AI) into the field of education in general and language learning in particular has marked a significant change on the pedagogical arena (López-Minotta et al., 2025).

Obviously, English as a foreign language (EFL) is at the forefront of this transformation where AI-based tools could improve and shape how languages are taught and learned (Suvankulova, 2024). For instance, modern AI applications such as AI driven tools like chat bots, IA- enhanced learning platforms, writing assistants and translation software are clear examples that are already used in several countries, reshaping the EFL teaching environment; however, its integration raises serious and complex questions regarding its real impact on classroom activities, teacher's role, and the practical challenges associated with its implementation (Mananay, 2024).

This study aims to delve into the power of AI- driven tools that strengthen and improve student performance and interactivity as well as to investigate the reality that surround the integration of AI in EFL teaching in the Algerian context. Further, it focuses on its influence on learner engagement and their teachers' perspectives alike. That is to say, it seeks to analyze and understand improvements that are likely to foster and enhance learners' engagement, the benefits are perceived by teachers, and the concerns or challenges they encounter in this transition. Ultimately, this study has a significant potential to contribute to a better understanding of the pedagogical implications of AI in language teaching and provide suggestions and recommendations for more effective and balanced integration.

The objectives of this study can be framed as follow:

1. To evaluate the extent to which AI tools integration enhances EFL learners' engagement in higher education classrooms.
2. To probe and identify EFL teachers' perceptions regarding the benefits and the role of AI in fostering learners' engagement in higher education EFL classrooms.
3. To investigate the main challenges and concerns encountered by EFL teachers while integrating AI technologies in the teaching process in higher education.

The research questions that will guide the study are:

1. To what extent does the integration of AI tools affect learner engagement in EFL classrooms?
2. How do EFL teachers perceive the benefits and role of AI in fostering learners' engagement in higher education EFL classrooms?
3. What are the main challenges and concerns encountered by EFL teachers while integrating AI technologies in the teaching process in higher education?

1. Literature Review

1.1. Artificial Intelligence:

Artificial intelligence (AI) can be explained as a set of highly advanced computational algorithms that are designed and trained to perform tasks by predicting results, suggesting plans, and making decisions. Hence, influencing real as well as virtual settings (Narciso, 2024). The use of AI is not a recent phenomenon; remarkable developments have been made since the 1950s, mainly created to prove if a machine's actions are faster in solving problems. Surprisingly, the primary experiments laid the groundwork for the broader field of AI (Waly & Zakiyyah, 2024). Nowadays, AI performs complex problem-solving and abilities that continue to



change technology and society alike. The use of AI in educational settings has undergone significant sophisticated advancements over the past decade. Through natural language processing (NLP) AI- powered intelligent tutoring systems may assess learners' language competency and eventually deliver focused exercise and resources.

Additionally, AI's power to process large datasets and maintain real-time feedback has made it powerful tool for classroom practices. Applications like HelloTalk and Duolingo use AI to generate tailored lesson plans, providing more personalized and well-crafted learning environment in addition to innovative and engaging activities (Klimova & Chen, 2024)

1.2. Learner Engagement:

As Benjamin Franklin famously said, "Tell me, and I forget. Teach me, and I remember. Involve me, and I learn." Learners who are not well engaged, without genuine involvement, they're unlikely to retain much (Aditama et al., 2025).

Learner engagement is a multifaceted variable that can play an important and essential role in enhancing learner's success (Ariyasinghe & Premawardhena, 2025). Comprehensive understanding on how to foster learner engagement is crucial factor to improve learning. Moreover, learner engagement makes the learning process more enjoyable and satisfying. When a learner displays high levels of engagement, he is more likely to develop academically and create a good connection with the learning process. On the other hand, a Low level of engagement is most of the time linked with inappropriate outcomes, including boredom and other undesirable problems. Low level learner engagement often sets a student on a negative path, surely ending to dropout from a learning environment (Mwangi, 2024).

According to (Fredricks et al., 2004), Learner engagement can be explained based on three dimensions:

- **Behavioral Engagement:** This means learner's active participation in the learning program, doing the tasks appropriately and integrated in collaborative exercises.
- **Cognitive Engagement:** denotes learner's efforts to invest his mental abilities to understand complicated issues apply critical thinking and solve problems.
- **Emotional engagement:** refers to the extent learners' attitudes, interests and feelings are positively attracted and valued within the learning environment.

In a nutshell, enhancing learner engagement is primordial and indispensable for designing effective and rewarding educational experiences. In this respect, (Hu & Xiao, 2025) advocate that highly engaged learners tend to perform better and consequently they are less likely to drop out. Besides, Engagement also supports deeper learning and better prepares learners for real-world challenges.

2. Enhancing Student Engagement through AI in Higher Education

The integration of Artificial Intelligence in higher education emerges as a new force in addressing one of the most persistent challenges: student engagement. As educational institutions are filled with increasingly diverse students' learning styles, AI technologies offer unprecedented opportunities to personalize learning and foster more deeper engagement with academic content.

in this respect, Student engagement, which is traditionally known as the degree of attention, and interest that students demonstrate, is a critical predictor of academic success in higher education. moreover, (Nguyen et al., 2024) provide a framework for understanding how AI technologies can enhance student engagement (personalized, responsive, and adaptive learning environments, etc.) that traditional pedagogical approaches struggle to deliver. Their investigation highlights that AI tools in higher education are effective in addressing the different needs of contemporary generation, which enable universities to provide individualized support that was previously unfeasible.

as a matter of fact, the theoretical foundation for AI-enhanced engagement draws from constructivist learning theories and personalization paradigms. (Ezeoguine & Eteng-Uket, 2024) demonstrate that AI chat bots redefine the process of student engagement mainly by creating interactive, responsive learning environments that suits student needs, preferences, and performance. This shift from "one-size-fits-all" method to



personalized learning represents a paradigm change in how educational institutions conceptualize and deliver instruction.

Furthermore, (Naseer et al., 2024) conducted extensive study that demonstrate how deep learning techniques can create personalized learning that significantly improve student motivation and engagement. Their results indicate that students exposed to AI-tools personalized learning environments showed higher levels of engagement compared to those in traditional classroom settings. That is to say, the adaptive nature of AI systems allows for continuous adjustment of content difficulty based on real-time evaluation of student comprehension and engagement. (Villegas-Ch et al., 2024) found that AI systems employ sophisticated algorithms that can identify when students struggle and eventually adjust the learning process accordingly.

3. The Field of Work

3.1. Methodology:

Methodology is explained as a planned framework comprising systematic process and precise elements aimed at reaching well specified research objectives (Kothari, 2012). The descriptive approach is one of the most frequently adopted research methodologies, widely known for its powerful ability to analyze situations. This method seeks to describe the studied case precisely, providing both insights into its characteristics. To increase the reliability and the credibility of the study a questionnaire was distributed to EFL teachers along with interview with the same group of teachers in addition to in-depth analysis of observations, the approach enables researchers to probe the investigation under the study accurately (Anderson, 2005).

In line with this, the paper aims at investigating the current situation of AI integration the Algerian universities, mainly third-year students in the department of English at University of Mohamed Boudiaf, M'sila.

3.1.1. Participants:

This research was conducted to unveil the chaos that surrounds the integration of new technologies in the Algerian universities, notably AI that can create dynamic and learner-centered environment that promote language learning. As such, the participants of this study, selected using a convenience sampling method; a sample of 20 teachers from the department of English, M'sila University Algeria, in addition to 40 students that constitutes a third-year classroom from the same department.

3.1.2. Research tools:

Observation is a powerful tools as it enable the research to analyze first hand data (Farid, 2022), which undeniably increases the validity of the obtained results (Mills et al., 2015). An observation during the lectures were noted by the researcher to gain a comprehensive understanding about the situation of AI in the classroom and how third year English student handle such innovative technologies to serve their learning purposes. It took place during the second semester of the academic year 2024-2025, (March, 2025). In addition to classroom observation, the researcher opted for an interview and questionnaire with 20 EFL teachers. In this respect, (Aksu, 2009) advocates that use of interviews and questionnaires in human sciences investigations would lead to more meticulous studies and offer greater flexibility.

3.2. Results And Discussion:

3.2.1. Teachers' Questionnaire:

After collecting the questionnaire from 20 permanent English teachers working in the department of English, M'sila University, Algeria, the finding has been illustrated in **Table 1**.

(The questionnaire guide is included in Appendix A)

Section One: Integration AI in the classroom



When it comes to AI integration in the classroom, one out of four teachers said that they use AI always, while about a half of the sample reported that they use AI often in their classroom practices. Nevertheless, 28% use it rarely, and 5% never integrate AI into their teaching activities. These finding are supported by (Achili & Zerouki, 2024), who reported that AI integration in the Algerian higher education is, undeniably, emerging phenomenon.

That is to say, most Algerian teachers use AI often or always, which clearly showing growing movement of digital adoption in the Algerian educational settings. Thus, this aligns with Algeria's authority push for modernizing teaching, but some still rarely or never use AI, likely due to low level of internet connection or training programs that raise teachers' awareness about the benefits of AI; the same remarks are clearly pointed in (Meryem, 2025).

Section Two: Students' engagement with AI technologies

When it comes to student engagement with AI innovative technologies ,40% of the teachers' sample indicate very high-level engagement, 35% noted high level, and only 5% of English teachers reported a low level of engagement.

It is evident that in today's digital generation university students show high engagement with AI innovative technologies, reflecting enthusiasm and the potential for AI to make learning more interactive despite some infrastructural challenges in schools. Also, these outcomes, aligns with several studies that shed the light on the Algerian context; for instance, (Benaissa & Yassine, 2025; Sadek, 2025).

Section Three: Level of digital literacy

Unsurprisingly, none of the teachers rated their digital literacy as high or very high. On the other hand, more than the half of the sample advocate that they significantly lack digital literacy and express their need digital skills development.

To elucidate, most teachers report low or very low digital skills, highlighting a major problem and barrier in Algeria where specialized training programs that are designed for university teachers, especially in human sciences departments are limited, or even do not exist.

In this respect, (Araiche & Benabbes, 2025) surveyed 58 teachers form different Algerian universities and has found that most of teachers believe that technology training in Algeria has not received sufficient attention as a skill that enables them to adopt these technologies effectively in daily practices.

Section Four: Frequency of challenges faced in AI integration

As far as the challenges faced by EFL teachers while integrating AI is concerned, about one-third of teachers (83%) face challenges always or often, and almost (17%) of the sample encounter challenges rarely. However, no one reported that they never face problem, mainly technical one or others that are related to lack of the digital literacy.

The majority of teachers often or always face challenges using AI, showing that obstacles like lack of training and support of the policy makers remain common in Algerian schools.

Table1: Teachers' questionnaire

Section	Option	Percentage%
1-Integration AI in the classroom	Always	25
	Often	42
	Rare	28
	Never	5
2- Students' engagement with AI technologies	Very high	40
	high	35
	Moderate	20
	Law	5
	Very law	0
3- Level of digital literacy	Very high	0

	high	0
	Moderate	22.3
	Low	25
	Very low	52.7
4- Frequency of challenges faced in AI integration	Always	33.5
	Often	49.7
	Rare	16.8
	Never	0

Made by the Researcher

3.2.2. Teachers' interview:

In order to gain more insights about the experience of integrating innovative AI applications or chat bots and to shed more light on its usefulness in maintaining learners' engagement and to support the existing literature review, a systematic semi-structured interviews were designed (The interview questions used with EFL teacher can be found in **Appendix B**), then, conducted with 10 permanent teachers, so they can express their views and concerns. The results thematically analyses are summarized in **Table 2**.

Table2: Thematic Analysis of Interview Data

Themes
1. Over- Reliance Concerns (reduced autonomous learning, less critical thinking, plagiarism risks)
2. Insufficient Training (lack of training programs)
3. Technical Barriers (accessibility problems, connectivity issues)
4. Observed Learner Engagement and Motivation when using AI tools
5. Classroom Management (AI misuse, maintaining engagement)

Made by the Researcher

Thematic Analysis of Interview Data

Theme One: Over- Reliance Concerns

Most of teachers expressed their fears from over- reliance on AI tools in the classroom;9 out of 10 teachers (90%) expressed several concerns regarding students' dependence on AI technologies, particularly impacts on autonomous learning and critical thinking development. In fact, this theme emerged as a central problem according to the majority of respondents.

One teacher expressed this concern by noting, *"I have noticed that students are becoming too dependent on these AI tools. They do not try to think critically about language problems. They just copy whatever the chatbot generates without deep understanding. They do not write anymore; most of them just generate"* As a matter of fact, this claim aligns with constructivist learning theories that emphasize the importance of activating cognitive abilities in the learning process.

Theme two: Insufficient Training

Admittedly, all interviewed teachers emphasized the total absence of professional development programs or training sessions that focus on how to integrate AI tools into their daily teaching practices. This concern reveals a critical gap between the rapid development of AI technologies in educational settings and the professional skills required. One of participants stated frankly: *"We have received no training on how to use these AI applications in our classrooms. The university expects us to adapt to this new technology, but they have not provided us with any support or guidance or."*

This statement would reveal a misalignment between institutional expectations and the existing resources; hence, it creates a situation in which teachers are held responsible for adapting to modern technologies change without any sort of digital pedagogical tools to do so effectively.

The sense of inadequate preparation is clear in teacher's statement; a 'written expression' teacher asserted *"I feel completely unprepared to deal with AI in my teaching. I do not know which tools are reliable or how to incorporate these technologies in a sound way."* This position highlights multiple dimensions of the training deficit: technological literacy, assessment strategies, and pedagogical integration, or in another words, all essential factors of effective AI-enhanced instruction.

Another respondent, a research methodology teacher, went more further, and emphasized this shortcoming by observing, *"There's a huge gap between the reality of AI in education and our preparation for it. We need workshops, seminars, or at least some basic training on how to navigate this new landscape."*

The call for valid and structured professional development activities suggests that teachers are aware and recognize their need for formal and systematic training.

Undeniably, the consequences of this deficit would extend beyond individual teacher competence to affect overall classroom effectiveness. in the same line of thought, this observation reveals how insufficient professional development can create a ripple effect that impacts student learning experiences and classroom dynamics.

Theme Three: Technical Barriers

Internet connectivity emerged as the most frequently cited technical obstacle, with all teachers describing its disruptive impact on AI-enhanced instruction. In Algerian classrooms, unreliable connectivity forces teachers to abandon planned lessons that integrate AI powered learning platforms, to explain complex ideas.

In this respect, one of the participant's added: *"I'll plan an entire lesson around using AI powered tools...and then the internet connection fails mid-class. Students get frustrated, we waste class time trying to resolve technical issues, and unfortunately, I end up abandoning the activity altogether."*

Not far from this description, another teacher added: *"Even when the connection works, many students can't access AI tools on their personal devices because they have limited credit. This creates equity issues where some students can benefit from AI while others are excluded. So, we can't build pedagogical practices on technologies that aren't universally accessible to all our learners."*

Theme Four: Observed Learner Engagement and Motivation when using AI tools

The availability of AI tools impacts student engagement, participation, and motivation in the Algerian EFL context. This fact creates what teachers describe as a fundamental shift in learning behaviors. On one hand, most of interviewed teachers recognized the benefits of AI integration.

One respondent advocated, *"I have noticed that students become more curious when they are allowed to use AI tools in classroom activities. They are more willing to explore independently, ask questions, and show greater interest for language tasks that were previously considered boring."*

Another teacher elaborated, *"AI tools like learning applications provide immediate feedback, which keeps students engaged. most of them can practice at their own pace without fear of judgment, and this builds their confidence, especially for shy or struggling learners. For instance, students may use AI to brainstorm ideas, and this helps them overcome several barriers."*



When asked about observable changes in student engagement one teacher stated *“Classroom discussions have become difficult to facilitate. When I pose a question about a text or a grammatical rule, students immediately ask AI rather than engaging in collaborative thinking with their peers. The oral interaction that is crucial for language development is disappearing.”*

This observation underscores how AI accessibility displaces the collaborative learning that is essential for language acquisition, particularly in Algeria where English exposure outside the classroom is limited.

Besides, when teachers ask students to complete tasks without AI assistance, they encounter significant resistance rooted in both efficiency concerns and decline of confidence. On of the respondents articulated, *“Writing in English requires practice and tolerance for making mistakes. Our students traditionally struggled but persevered, gradually improving their expression. Now, I see students who cannot write a single paragraph without AI assistance.”*

This paradoxical situation, in which AI may appear to improve students’ output; in fact, it may deteriorate their existing competence. In other words, tools that promise to facilitate learning may ultimately undermine learners’ confidence in their own autonomous language production abilities. Hence, the tools that promise to facilitate learning may result in losing autonomous language production capabilities.

Thus, while teachers recognize AI benefits to enhance involvement and motivation, they also emphasize the need for balanced pedagogical frameworks. that is to say, opportunities for autonomous skill as a result of AI integration and tradition interaction

. These findings that align with (Sebbah, 2025) study that was conducted with 305 graduate and undergraduate EFL subjects in the Department of English of the University of Algiers 2. She found that engagement occurs when AI is strategically utilized; or when used correctly, AI can promote learner active participation in the Algerian EFL context.

Theme Five: Classroom Management

All of the interviewed teachers described difficulties to maintain fertile learning environments when students had unrestricted access to AI tools.

Plus, one teacher raised concerns about classroom management while using AI chatbots, any misuse of this technology makes it challenging to maintain order during the session: *“When my students have their phones out, it's impossible to monitor whether they're actually engaging with course content or just with social media, chatting with friends, or even shopping online. The boundary between productive and distraction AI becomes very difficult, and, to be honest, I find myself spending more time policing technology use than facilitating learning.”*

Two other teachers agreed: *“we tried use AI-based activities, but the classroom dynamics changed. Instead of collaborative discussion and peer interaction, everyone was isolated, staring at screens.”* these claims align with a study conducted by (Boukhelkhal, 2025) who found similar results in his study conducted with a sample of 205 students at the Foreign Languages Department, Medea University, Algeria.

3.2.3. Classroom Observations

Table 3 Observation Grid

Category	Observed Indicator
The Physical Environment	Usage of smart phones, availability of internet
Students' Engagement	Active participation, time on task, etc.
AI tools usage	Structured vs random usage of AI tools, quality of Internet
Teacher's role	Monitor, motivator, etc.
Gender distribution	Male vs female

Made by the researcher

Using observation grid, Table 3, Classroom observations revealed a comprehensive understanding regarding several angles:

- **Engagement Patterns:** When the teacher allowed his students to use smartphones for research, the behavioral engagement increased immediately. Students expressed the findings enthusiastically.
- **Usage Quality:** The use of AI (Deep Seek, Perplexity, Gemini, etc.) was largely unstructured. Students always accepted AI outputs without any sort of verification. Additionally, Despite the fact that most of students use their smart phones to brainstorm ideas which help them to be more motivated, they use AI application like Deep Seek or Chat GPT randomly and in unorganized manner, without clear plan or structure. In addition to the connectivity issues during the whole sessions, this random usage will end in inconsistent engagement and less benefits from AI integration.
- **Teacher Role:** The teacher struggled most of the time to monitor all screens; some students engaged in other activities that are not related to the task given by the teacher. The classroom atmosphere has one-directional; the teacher speaks and the students listen; in other words, the teacher centered approach is the dominant method.
- **Gender distribution:** Based on the researcher's observation during the official sessions, most of the learners are females (35 out of 40 students, in the four sessions of observation).

Through classroom observation, students' engagement is unquestionably enhanced; hence, these finding confirms Both previously mentioned research tools' findings that modern technologies, notably AI tools, stimulate and enhance engagement.

This aligns with findings by (Ariyasinghe & Premawardhena, 2025), who note that digital tools are key to new generations engagement.

On the other hand, the teacher utilized these tools but his own skills are clearly very low. This indicates “*survival usage*” rather than effective pedagogical mastery. As noted by (Aljemely, 2024); that is to say, without proper training, AI integration remains totally superficial.

Further, the Infrastructure Challenge in Algerian universities remain a huge obstacle. As highlighted by Algerian studies (Guerid & Abdellatif, 2018) since the lack of reliable high-speed internet hinders the seamless implementation of AI tools.

4. Conclusion

This paper illuminates the integration of AI-driven innovative technologies that have become integral to everyday life, in the Algerian high educational system. Interviews, observations and questionnaires, it provides crystal clear a comprehensive understanding about the situation of AI adoption. Besides, it tries unveil and figure out the obstacles and the hindrances that face its fully integration. Furthermore, it sheds some light on the impact of AI integration on students' engagement and performance abilities, stressing the necessity of maintaining a good balance between virtual and traditional teacher-student interaction within the educational setting.

Last but not least, although the study encountered several limitations mainly the sample size which was relatively small that could affect its representativeness, one can end up with a set of recommendations that may help to raise the awareness of both educational community and policy makers alike:

- Policymakers should invest more in AI learning systems that would personalize educational content to increase engagement since these systems can provide real-time feedback that help students identify knowledge gaps, and eventually offer customized learning resources matched to individual learning styles.
- Policymakers must allocate sufficient funding to develop AI platforms integrated with MOODLE, specifically designed to address the motivation crisis in Algerian higher education. Priority investments should include: (a) AI-powered academic support, and even, emotion recognition systems to detect student frustration or disengagement during online sessions.
- Policymakers should provide comprehensive and ongoing training programs that focused on AI tools and enhancing teachers' digital literacy skills. This step would foster their abilities to overcome the current literacy gap
- Administration should create a systematic plans and guidelines on how AI should be used during the teaching process and learning activities. That is to say, these restrictions would minimize random or unorganized AI use to maximize learning benefits and ensure desirable engagement.
- Policy maker should provide educational setting in general and universities in particular with high-speed internet access to maintain uninterrupted use of AI technologies. Hence, good digital infrastructure is key to leveraging digital tools accordingly.
- Teachers should Maintain and promote balanced use of AI since AI should support, not replace
- Administration should also ensure equal access to technology by providing devices to students who lack access.
- Policymakers, administration and parents should organize and attend workshops, study days and conferences to keep themselves up dated and aware about these emerging technologies.
- Teachers should utilize AI tools to provide personalized support that increases individual student engagement despite large class sizes typical in Algeria.

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APPENDIX : A

Teachers' Questionnaire

Dear teachers, the following questionnaire aims to gather your perspectives and experiences regarding the integration of artificial intelligence (AI) tools in English language teaching at the tertiary level. Your responses will contribute to understanding current practices, challenges, and opportunities for AI adoption in EFL classrooms.

1. Integration AI in the classroom

Response	Frequency
Always	
Often	
Rare	
Never	

2. Students' engagement with AI technologies

Response	Frequency
Very high	
High	
Moderate	
Law	
Very law	

3. Level of digital literacy

Response	Frequency
Very high	
High	
Moderate	
Law	
Very law	

Frequency of challenges faced in AI integration

Response	Frequency
Always	
Often	
Rare	
Never	

Thank you for your participation in this research



APPENDIX: B

Interview

Research site: Department of English, M'sila university, Algeria

Participants : EFL permanent teachers, (N=10)

Interview Duration: 10-20 minutes per teacher

Section one: Background Information:

1. How long have you been teaching English as a foreign language at the university?
2. Are you familiar with AI applications such as chat bots and AI powered learning platforms?

Section two: Perceptions of AI integration in higher education

1. What are your own perceptions on integrating AI applications and chatbots into English language teaching?
2. In your opinion, what are the benefits of using AI tools in EFL classrooms?

Section three: Pedagogical implications and challenges

1. Do you believe AI tools enhance or hinder the development of students' critical thinking and autonomous learning skills?
2. Has the university provided any training or professional development opportunities on how to integrate AI tools into language teaching?
3. How would you describe the internet connectivity and technological infrastructure available for teaching at the university?

Section four: Learner Engagement and Participation

1. Did you notice any changes in student engagement, participation, or motivation since AI tools became widely available?
2. Can you describe the way your students react when you encourage them to complete tasks without AI assistance?