

**ARTIFICIAL INTELLIGENCE IN TEACHING A
FOREIGN LANGUAGE.
TOOLS AND USES**

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“Collaboration Scholarship”

awarded by the Spanish Ministry of Education 2023-2024

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1. INTRODUCTION

In recent years, the integration of Artificial Intelligence (AI) into our lives is becoming stronger, which can be seen in many areas, such as education. This has led to a revolution in teaching methods across different disciplines, particularly in the teaching of English as a Foreign Language (EFL), where it provides useful tools for teachers. The intersection between AI and FL represents a paradigm shift in educational practice, due to its ability to personalize learning experiences, provide instant feedback, and tailor to individual student needs (Adiguzel et al., 2023). As AI can assume this kind of tasks, educators are allowed to adopt more dynamic and student-centered methods. That is one of the reasons AI holds great promise for improving EFL (Lozano & Blanco, 2023).

However, with this many options, it can seem difficult to select the most appropriate AI-powered tool given the different contexts and needs of the students. This study aims to explore the diversity of applications AI offers in the educational field, more concretely in teaching English in Primary Education in Spanish schools. Thus, the question that guides this report is: What are the options available in utilizing Artificial Intelligence (AI) for teaching English as a Foreign Language in Primary Education?

Therefore, the main goal of this report is to analyse the uses of AI tools in EFL, and to propose concrete and suitable AI tools to enhance the teaching-learning process. For this purpose, the following specific objectives were established:

- Objective 1: Examine the current landscape of AI applications in education.
- Objective 2: Explore the potential challenges and limitations of the integration of AI in EFL, including ethical issues.

For these objectives, this study used a systematic review method, which involves development of a thorough and systematic plan along with a well-defined search strategy established beforehand. The goal is to minimize bias by meticulously identifying, evaluating, and consolidating all pertinent studies pertaining to a specific subject (Uman, 2011).

2. SPECIFIC AI-POWERED TOOLS AND PLATFORMS

AI-powered tools and platform are sorted into the following categories: adaptive learning, translation, chatbots, voice assistants, pronunciation, lesson design and content creation, quiz/assessment, feedback, and online platforms.

Adaptive learning AI tools are those which use algorithms in order to personalize and adjust the learning experience based on learner's progress. Under this category Duolingo was the most mentioned one, due to different reasons such as its gamification technique, the competitive learning environment that makes the learner more engaged, and the adaption of the materials based on the learner abilities, making it available for all levels (Fitria, 2021a; Kannan & Munday, 2018).

Translation AI tools translate text or speech from one language to another. Many translators were remarked, like Google Translator, DeepL or Translator Online. These tools seem to be useful for learners, promoting self-directed learning and improving their knowledge and language skills, despite their questionable outputs. However, from the teacher's perspective, it is important to guide learners on ways to use MT tools effectively, making them aware of their possibilities and limitations (Pokrivcakova, 2019; Yiang, 2022).

Chatbots utilize natural language processing (NLP) engage in conversations and offer instant feedback, simulating an intelligent human interaction (Pokrivcakova, 2019; Sharifuddin & Hashim, 2024). ChatGPT, Rosetta Stone or Mondy are some of the chatbots regarded.

Voice assistants use speech recognition and respond to spoken questions or commands, offering assistance and answers to queries. Examples of the most mentioned voice assistants are Amazon Alexa, Google Assistant or Siri (Underwood, 2017; Fitria, 2021b).

Pronunciation AI tools analyze and provide feedback on users' speaking skills through speech recognition. ELSA and Orai are two AI tools that can be found in this category. ELSA (English Language Speech Assistant) is a mobile application that helps learners with their pronunciation. It analyses the spoken words or sentences, comparing it to voice

data from English speakers (with different accents) and providing scores from zero to 100 along with suggestions to improve (Bajaj & Bose, 2020; Fitria, 2021a).

Lesson design and content creation AI tools are those that facilitate teachers the development of instructional materials and curriculum (although these materials may need to be reviewed by teachers and adapted). Tweek comes up as one of these AI tools, specifically designed to aid teachers elaborate activities for their classes easily. One of the functions it provides are creating questions and activities about any topic and for any level (Mogunova, 2023).

Under the category of **quiz/assessment**, there are AI tools that help to create resources to assess students' progress, such as tests, and quizzes that take place in the classroom. Fobizz, Quizgecko, Conker and Kahoot are the AI tools found in this category (Kannan & Munday, 2018; Mogunova, 2023).

On the other hand, **feedback AI tools** help teachers give more individual and personalized feedback or automatically evaluate students' productions, like GradeScanner, GotFeedback or GotLearning (Mogunova, 2023). These tools can benefit EFL teaching by saving time, both for teachers and learners, but it is necessary to be aware of its limitations and its impossibility of replacing teachers (Jiang, 2022).

Lastly, **online platforms** offer English courses, including text, audio, videos, etc. MyEnglishLab is an adaptive tool created by Pearson which aims to provide a complete English course. The platform provides hands-on exercises covering various content areas, resembling a dynamic and interactive workbook that integrates multiple skills. It delivers immediate feedback tailored to each task, encompassing tasks involving text production, interpretation, audio and video comprehension, and speaking practice. MEL is suitable for self-directed learners as well as traditional and language schools alike (Delgado et al., 2020).

However, it is important to note that these categories are not exclusive since most tools have more than one function, but they have been classified based on what was considered their primary use. Table 1 reveals the tools and platforms found in the articles.

Table 1

AI-powered Tools and Platforms

Category	Tool/Platform	Sample research
Adaptive learning	<ul style="list-style-type: none"> • Duolingo • Genie Tutor • NEO 	Kannan & Munday (2018)
Translation	<ul style="list-style-type: none"> • Google Translator • Translator Online • Microsoft Translator • Foreign Word • Web Trance • DeepL 	Pokrivcakova (2019)
Chatbots	<ul style="list-style-type: none"> • Rosetta Stone • Andy • Mondly • Memrize • ChatGPT • Virtual Talk App 	Adiguzel et al. (2023)
Voice assistants	<ul style="list-style-type: none"> • Amazon Alexa • Siri • Google voice search • Cortana • Google Assistant 	Underwood (2017)
Pronunciation	<ul style="list-style-type: none"> • ELSA • Orai • Speaker Coach • Glossika 	Ghafar et al. (2023)
Lesson design and content creation	<ul style="list-style-type: none"> • Twee • Educational Copilot • Lessonplans.ai • Autoclassmate.ai • Curipod • Cram 101 • Netex Learning • Masterpiece Generator • Gamma.app • Slidesgo • Beutil.ai • Magic Write • Eleven Labs 	Bekeš & Galzina (2023)

Quiz/Assessment	<ul style="list-style-type: none"> • Fobizz • Quizgecko • Conker 	Mogunova (2023)
Feedback	<ul style="list-style-type: none"> • GradeScanner • GotFeedback • EssayGrader • Gradescope • Kejarcita platform • Criterion • Pigai 	Fitria (2021a)
Online platform	<ul style="list-style-type: none"> • MyEnglishLab 	Delgado et al. (2020)

Note. Own work.

2.1. Benefits of using AI in English teaching

Although advantages in the teaching-learning process aids both students and educators, benefits were classified based on whether they were more geared towards learners or teachers. Table 2 displays the most relevant benefits noted in the studies.

Table 2

Benefits of Integrating AI into English Teaching

	Benefit	Sample research
Learners	Individualized and personalized learning.	Kannan & Munday (2018)
	Engaging learning.	Sharifuddin & Hashim (2024)
	Enhance interest of students.	Fitria (2021a)
	Good learning atmosphere.	Fitria (2021b)
	Increases interaction.	Ceilik (2022)
	Complementary practice.	Alshumaimeri & Alshememry (2024)
	Improve outcomes.	Lazzat (2024)
Teachers	Immediate and individual feedback.	Pokrikcakova (2019)
	Group formation.	Delgado et al. (2020)
	Diagnose errors and patterns.	Mukherjee (2020)
	Design specific lesson plans.	Sumakul et al. (2022)
	Improve and adopt teaching methods and strategies.	Yang (2020)
	Audio-visual aid.	Fitira (2021)

Creating materials easily.	Mogunova (2023)
Reduce teacher workload.	Celik (2022)
Abundant resources.	Li & Huang (2022)
Cost-effectiveness.	Rebolledo & González (2023)
Insight into students' learning.	Sharma et al. (2024)
Professional development.	Sharma et al. (2024)
Teaching process more interesting	Celik et al. (2022)

Note. Own work.

2.2. Challenges of using AI in English teaching

As it has been seen, integrating AI into English teaching has many benefits. However, this transformation is not without its challenges. From concerns surrounding data privacy and bias, to questioning the role of AI in education and whether it would replace teachers. The most common are summarized in Table 3.

Table 3

Challenges of Using AI in English Teaching

Challenges	Sample article
Data privacy and security	Kannan & Munday (2018)
Algorithmic Bias	Adiguzel et al. (2023)
Roles of teachers/Teacher replacement	Underwood (2017)
Lack of training and support to teachers	Sumakul et al. (2022)
Lack of technical infrastructure in schools	Celik et al. (2022)
Integration with existing systems	Owan et al. (2023)
Limited teachers' involvement in the development of AI tools	Celik et al. (2022)
Ethical use of AI	Bekeš & Galzina (2023)
Context-dependent	Schmidt & Strasser (2022)
Teachers' resistance to change	Owan et al. (2023)
Reliability and accuracy	Lazzat (2024)
Constant development	Sharma et al. (2024)
Accessibility	Rebolledo & González (2023)

Note. Own work.

3. EXAMPLES

These AI tools are mostly faced towards learning rather than teaching a foreign language. However, they can be used as a teaching tool as well. For instance, it exists *Duolingo for Schools*, a platform designed to enable English teachers to monitor their students' advancement in utilizing *Duolingo*. To utilize *Duolingo for Schools*, educators must initially establish an account and subsequently generate a virtual classroom. Upon classroom setup, instructors receive a code or link that they distribute to their students for classroom enrolment (Duolingo For Schools, n. d.).

On the other hand, translation tools are often considered slightly unhelpful for learning due to its unreliability. However, they can be integrated into EFL teaching by introducing new vocabulary, promoting independent learning, and helping comprehension and writing skills. Studies like the one carried out by Briggs (2018) revealed that despite a certain degree of scepticism regarding their accuracy, the majority of students rely on machine translation (MT) tools to assist their language studies. Moreover, Lee (2019) showed that these tools can improve writing skills. That is why teachers should take them into account instead of consider using them as “cheating”, and optimize students’ learning outcomes by fostering autonomy (Fitria, 2021a; Ghafar et al., 2023; Jiang, 2022; Pokrivcakova, 2019; Schimdt, 2022)

In addition to the previously mentioned tools, our analysis revealed the presence of several other AI-driven resources that play significant roles in EFL teaching.

First of all, there are more chatbots that can be integrated into English teaching. Among these, platforms such as *Claude.ai*, *Perplexity*, *Pi*, and *Microsoft Copilot* provide distinct features and functionalities specifically created to support language learning and teaching.

Claude.ai, designed by Anthropic, employs sophisticated natural language processing algorithms, providing interactive conversations, offering real-time feedback, and brainstorming ideas (Claude \ Anthropic, n.d.).

Similarly, *Perplexity* and *Pi* use AI technology to replicate authentic language interactions. *Perplexity* stands out from others for its ability to cite the sources from which it gathers information, which can be clicked on to get more data, as it can be seen in Figure 1 (Perplexity.AI, n.d.). *Pi* can be interacted with through text or spoken commands

and offers a wide variety of options such as playing games, translating texts, or providing feedback on writing tasks (Pi: Your Personal AI, n.d.).

Figure 1

Search Example done by Perplexity



Note. From [Text to video models \(perplexity.ai\)](https://perplexity.ai)

Additionally, *Microsoft Copilot* (Figure 2), powered by OpenAI's GPT-4 model, serves as a versatile writing aid, assisting learners in crafting coherent English sentences and as a creative tool, facilitating the composition of poems, stories, or brainstorming ideas for projects, like vacation plans or fitness training (Microsoft Copilot: Your everyday AI companion, n.d.).

Figure 2

Microsoft Copilot Interface



Note. From [Copilot \(microsoft.com\)](https://copilot.microsoft.com)

These chatbots, present educators with opportunities to enrich language teaching through innovative AI-powered tools that foster meaningful engagement, build vocabulary, promote conversation practice, and provide personalized learning experiences (Adiguzel et al., 2023; Delgado, 2020).

Voice assistants, such as *Amazon Alexa*, *Siri* or *Google Assistant* bring the opportunity of an immersive learning experience, characterised by a conversational practice, interactive learning and examples of words and phrases in English which can make students improve their pronunciation. When used by teachers in EFL classrooms, they receive positive reception from the students and seem to augment English use (Underwood, 2017).

Similarly, pronunciation AI-tools can be integrated into EFL teaching. For example, to create a more dynamic learning process using *ELSA*'s functionalities like pronunciation challenges.

Lesson design and content creation is the category where most AI-tools were found. They serve as a valuable asset to English as a Foreign Language (EFL) teachers by simplifying the process of creating captivating and effective teaching materials. These innovative tools offer a range of features and functionalities that empower educators to enhance their pedagogical practices and meet the diverse needs of their students.

One way in which AI-driven lesson design tools aid teachers is by automating the development of learning activities and exercises tailored to specific language objectives. *Twee*, for instance, is an AI tool designed to assist educators in effortlessly generating engaging activities for their classes, providing tools that can be seen in Figure 3. By enabling teachers to create questions and activities for any topic or proficiency level, *Twee* significantly streamlines lesson planning and allows teachers to focus on providing personalized guidance and fostering active learning experiences for their students (Mogunova, 2023; Twee – Tweak Your Lessons With the Power of AI, n.d.).

Figure 3

Twee's Tools

 **Reading**

- Create a text
- Open questions
- ABCD questions
- True / False statements
- Dialogue based on topic
- Titles for a text
- Reading bits

 **Writing**

- Essay topics
- Famous quotes
- Four opinions
- Link words into sentences
- Creative writing

 **Vocabulary**

- Fill in the gap
- Word definition matching
- Sentences with target vocabulary
- Essential vocabulary
- Word formation
- Communicative situations with your vocabulary
- Collocations with target vocabulary
- Matching halves
- Extract collocations
- Word-Translation matching

 **Listening**

- Video Transcript
- YouTube video with questions
- YouTube summaries

 **Speaking**

- Dialogue based on topic
- Discussion questions
- Find facts
- Advantages and disadvantages
- Famous quotes
- Four opinions
- Lead-in activities
- Link words into sentences

 **Grammar**

- Fill in the gap
- Scramble the words
- Open-the-brackets (verbs)
- Matching halves

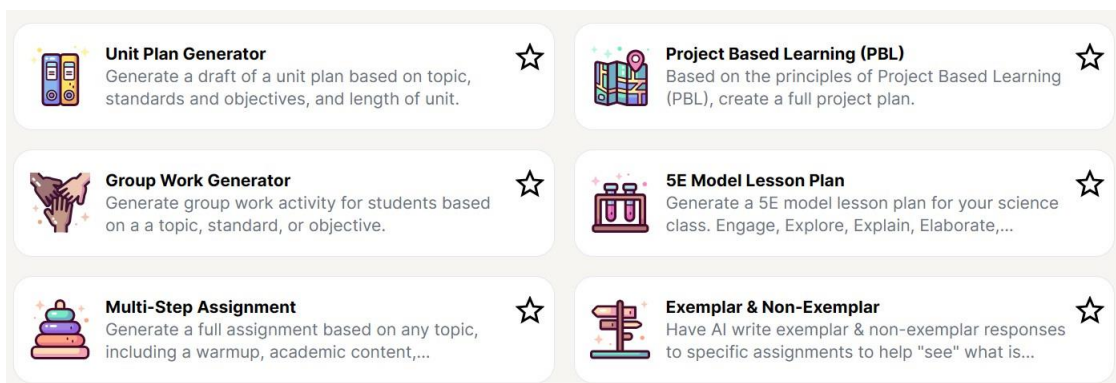
Note. From <https://twee.com/>

Another example is *Curipod*, an AI-tool that creates an interactive presentation based on the topic that you input. You can choose the grade that the lesson is for, and it will provide you with a starting slideshow that can be edited and adjusted. Nevertheless, it is compulsory to have an account in order to use its features (Full Lesson by Curipod Creator Studio - Curipod, n.d.).

Additionally, to the ones found in the analysed studies, *MagicSchool* was discovered, another AI-tool that automates tasks like lesson planning, grading, and content creation. It helps teachers with saving time with its repository of over 50 AI tools that can be searched and accessed easily. Some examples of its features include text leveller, rubric generator, text rewriter or assignment scaffolder, and more that can be seen in Figure 4 (Magic Tools, n.d.).

Figure 4

MagicSchool AI-tools Sorted by Planning



Note. From [Magic Tools - MagicSchool.ai](https://www.magictools.ai)

Moreover, *Nolej* appears as another content creator AI-tool. It generates interactive content, such as videos, flashcards or books based on content provided by users (videos, text...). The only disadvantage is its pricing. It can be used for free the first five times, but then you must pay the subscription fee (NOLEJ, n.d.).

Regarding quiz/assessment AI-tools, *Conker*, *Fobizz*, and *Quizgecko* are the ones listed. These platforms serve as an easy way to create quizzes and assessments through questions with its answers, and provide instant feedback, if they are right or wrong. The former also allows users to confirm their responses carrying out a Google search and generate a question sheet that can be printed (Kannan & Munday, 2018; Mogunova; 2023). In

addition to those mentioned in the studies, *Questionwell* and *Quizizz AI* are two other tools that we find in this category. The first one generates questions based on a topic given or a reading. These AI-generated questions include multiple choice, fill in the blank, essential questions or short answer. Then, they can be exported to different educational tools like *Kahoot*, *Moodle* or *Google Forms* (*QuestionWell | AI Question Generator, n.d.*). Likewise, *Quizizz AI* creates quizzes in seconds, but it also provides instant data that allows teachers to identify gaps among students (*Quizizz AI | Your Personalized Teaching Assistant, n.d.*).

Lastly, *gotFeedback* by *gotLearning* is mentioned as a feedback AI-tool. It frees up time for teachers by providing feedback on the submissions that are uploaded to the platform. Teachers should define what they expect from students' work and then *gotFeedback* will create individual feedback for each learner, such as the ones that can be seen in Figure 5 (Mogunova, 2023). Moreover, *MagicSchool* has a student work feedback tool that provides targeted feedback (Magic Tools, n.d.).

Figure 5

Examples of Feedback Provided by GotFeedback

Feedback

The narrative structure of this writing assignment is not well-developed. The plot is not clear and the transitions between scenes are choppy and abrupt. To improve the narrative writing, the student should focus on developing a clear plot with a beginning, middle, and end. They should also work on making the transitions between scenes smoother and more natural. Additionally, they should work on adding more details and descriptions to make the story more engaging and vivid.

Feedback

This is a good start to your writing assignment, but to make your claims stronger and better supported, you could consider the following:

1. Provide specific evidence from the text to support your claims. For example, when you say the citizens have relinquished their emotions and memories, which specific scenes or quotes from the book support this claim?
2. Consider exploring the role of the government in creating and maintaining the utopian community. How does the government limit individual freedoms and control the citizens? Can you find examples from the book that illustrate this?
3. Consider conflicting opinions or perspectives on the idea of a perfect society. For example, Jonas' mother seems to believe in the community's rules and regulations, while Jonas becomes increasingly disillusioned with the community's lack of diversity and individuality. Can you find additional characters or events in the book that might represent a differing perspective on the utopian society?

Note. From [gotFeedback lite \(gotlearning.com\)](https://gotlearning.com)

4. CONCLUSIONS

In conclusion, this report has explored the integration of Artificial Intelligence (AI) for teaching English as a Foreign Language (EFL) in Primary Education, focusing on three specific objectives.

To begin with, the current landscape of AI applications in education was explored, revealing a wide variety of tools that can be used to improve the teaching and learning process, ranging from adaptive learning to content creation. The results showed the transformative potential of AI in education. AI integration can enhance the learning process for students and teachers. These tools have the potential to provide automate feedback, and adapt the process to learners' needs, allowing students to progress at their own pace and fostering engagement, interaction, and a good learning atmosphere. Moreover, AI-tools aid teachers discover areas where students may have difficulties, diagnosing errors and patterns and providing an insight into students' learning so they can adapt their teaching strategies and methods accordingly. In addition, these platforms can reduce teacher workload by automating some tasks like grading, and help them to create materials easily, freeing up valuable time for educators.

Nevertheless, alongside these advantages, the results also underscored potential challenges and limitations of the integration of AI in EFL, fulfilling the second proposed objective. Among these challenges, the concern of data privacy and security was the most frequently mentioned. AI platforms require access to large amounts of student data, raising doubts about how this data is collected, stored, and used. As educational institutions and professionals increasingly incorporate and rely on AI-powered tools, it is essential to prevent misuse and pay attention to this aspect, establishing clear policies and procedures.

Furthermore, algorithmic bias was another challenge found. If the data used to train these systems is biased, AI systems will be too, leading to inequalities and unfairness, which makes us question the reliability of these tools. Therefore, it is imperative to make sure that the data used to train AI tools is diverse and represents all students and monitor AI use to address any biases that may occur. Additionally, some teachers worry that AI may replace them, but, while AI-tools offers a wide range of benefits, it is not prepared to replace the human relationship and emotional support that human teachers give. Lastly,

the lack of training and support for teachers in the integration of AI in their lessons arises as another obstacle, demonstrating the need for providing them with the necessary knowledge to effectively utilize AI resources.

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