

Using Artificial Intelligence in Language Teaching
- Reality and Aspirations-

العنوان باللغة العربية توظيف الذكاء الاصطناعي في تعليم اللغة
-الواقع والتطلّعات-

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Abstract:

This research addresses the use of artificial intelligence in the service of education in general and language education in particular, in light of the technological and digital development witnessed by the world today. It examines the most prominent applications used in the educational process and invests them in building effective educational content. As is well known, the use of artificial intelligence aims to provide technologies that contribute to enriching educational content and making it more effective.

Artificial intelligence, with its various programs and diverse applications, has contributed to making a qualitative leap in the field of language teaching by developing linguistic proficiency and consolidating communication skills, which has made it an indispensable tool in the present and future of language teaching. The study aims to clarify the aspects of learners' and teachers' reliance on artificial intelligence programs and applications in language teaching and in preparing educational lessons and the extent of the efficiency of these programs in teaching languages, in order to observe the extent to which the integration between technology and the human element contributes to pushing education to new horizons, more effective in terms of achievement and results, and in serving the language, teaching and learning it.

Keywords: : artificial intelligence, educational process, language teaching.

ملخص:

يتناول هذا البحث توظيف الذكاء الاصطناعي في خدمة التعليم بصفة عامة وتعليم اللغة بالخصوص في ظل التطور التكنولوجي والرقمي الذي يشهده العالم اليوم، وذلك بالوقوف على أبرز التطبيقات المستخدمة في العملية التعليمية واستثمارها في بناء محتوى تعليمي فعال. وكما هو معروف، فإن استخدام الذكاء الاصطناعي يهدف إلى تقديم تقنيات تساهم في إثراء المحتوى التعليمي وجعله أكثر فاعلية.

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لقد ساهم الذكاء الاصطناعي ببرامجه المختلفة وتطبيقاته المتنوعة في إحداث قفزة نوعية في ميدان تعليم اللغات من خلال تنمية الكفاءة اللغوية، وترسيخ مهارات التواصل، وهو ما جعله أداة لا غنى عنها في حاضر ومستقبل تعليم اللغات. وتهدف الدراسة إلى تبيان أوجه اعتماد المتعلمين والمعلمين على برامج وتطبيقات الذكاء الاصطناعي في تعليم اللغة وفي تحضير الدروس التعليمية ومدى كفاءة هذه البرامج في تعليم اللغات، وذلك من أجل ملاحظة مدى مساهمة التكامل بين التكنولوجيا والعنصر البشري في الدفع بالتعليم نحو آفاق جديدة، وأكثر فعالية من ناحية التحصيل والنتائج، وفي خدمة اللغة وتدريبها وتعلمها.

الكلمات المفتاحية: ذكاء اصطناعي، عملية تعليمية، تعليم اللغة

1. Introduction

The world today is witnessing a great wave in the field of digitization and technological development; so, the dependence on machines and what they provide from programs and applications has become a necessity that cannot be avoided. This has included all fields of knowledge and sciences without exception; rather, it has even extended to professional and social life.

Among the fields where artificial intelligence has played a remarkable role, we find the domain of education in general, and language teaching in particular. The modern trends concerned with teaching methods and how to teach language have sought to expand the use of artificial intelligence, in order to develop learners' linguistic and communicative competence. It has turned into a supportive tool for the educational process, thanks to the advantages it provides—from immediate interaction to performance evaluation, and following the progress level in covering the educational content, or accomplishing the different tasks assigned to both teachers and learners. Therefore, through this study, we wanted to stand on the importance of artificial intelligence in the field of education in general, and in language teaching in particular, where we concluded—in the end—that it plays a notable role in improving the quality of education. From this emerged the following problematics: **How can artificial intelligence be used to enhance the quality of the educational process? How did its applications contribute to language teaching? What are the goals and expectations hoped from it? And can we employ it effectively in the field of language learning in a way that guarantees us quality and efficiency?**

This development in the field of software in our present era has been accompanied by what is known as artificial intelligence, which is one of the newest sciences resulted from the technological revolution. This science has invaded all fields and, in its capabilities and qualifications, has exceeded some aspects of human efficiency. The machine performs tasks faster, is able to handle many at once, and in a very short time. It aims to understand the nature of human intelligence in order to imitate it, and to build artificial intelligence models that benefit from the human aspect and add new features to it, depending on computer programs capable of imitating the human behavior and the natural intelligence that characterizes man.

Artificial intelligence is a technique that depends on speed, accuracy, and skill in performing many operations that the human brain completes in a very short time. For this reason, it benefits from many interrelated sciences, the most important of which are: various computer sciences, neuroscience, linguistics—especially applied linguistics—discourse analysis, text linguistics, text classification, and cognitive psychology, in addition to other sciences, knowledge, and research fields.

Since the appearance of artificial intelligence and its various applications and its use in education—especially in what is known as e-learning, which accompanied the digital and technological development—it has become necessary for teachers and learners to be familiar with the different kinds of software and to register in digital platforms in order to access advanced, simple, and easy-to-use educational programs. With one click, and by having a computer connected to the Internet, the learner can reach various platforms, attend lessons, and take tests without the trouble of moving or traveling from one place to another, and in a very short time. In fact, some universities grant recognized certificates that replace in-person degrees. And if educational matters continue as they are, with increasing dependence on technology, we might witness an era where the signs of in-person education disappear—or almost disappear.

What gives artificial intelligence this high importance and leadership in all fields is its enormous ability to process and analyze data, which has exceeded human capacity by many times. This has begun to form a danger on the human existence itself and on depending on it in human life.

In front of this new situation, it has become necessary today to make use of various artificial intelligence programs in the field of education in order to improve its quality and develop learners' competence. It contributes to meeting the needs of learners and teachers, developing educational curricula, and smart systems that save effort and time, allowing the human element to devote his effort and time to other more important matters.

1- The Term Artificial Intelligence:

For centuries, man has tried to develop machines to help him perform his physical duties in agriculture, transportation, and industry, and in various affairs of daily life, inventing what relieved mankind from many burdens. In our days, scientific research has turned toward trying to imitate the human mind, which is known as artificial intelligence. It is an attempt to employ the machine to perform functions that depend on the properties of the human mind in thinking, analysis, and synthesis—things that were not possible for non-humans to do. Thus, machines become able to act by themselves according to systems stored inside them, without needing to receive an order from humans, as if these machines had a mind that decides and acts. This appears in “the ability of digital systems to imitate the intelligent human behavior through algorithms that allow them to learn from data and make decisions based on analysis and reasoning” (Makhzoum, 2025, p. 2). It can be defined as that branch of computer science that seeks to solve problems using non-algorithmic symbolic processing, depending on a set of mechanisms to reach clear and precise results. (Al-Husseini, 2016, p. 24)

Its main goal is to simulate the human mind and to carry out various operations that humans perform, such as analysis, synthesis, and reasoning. It deals with the cognitive and intellectual processes that humans perform and that are considered intelligent from the point of view of the human element, imitating human mental characteristics.

Or it is the study of intelligent behavior and the attempt to find ways by which such behaviors can be introduced into artificial machines and applications so that they imitate the human experience (Whitby, 2003, p. 18). It is considered one of the most complex and controversial topics for all humanity. It has proven itself as a scientific field whose results have contributed to developing technology significantly. It is a science that combines technology on one side and engineering on the other, depending on advanced machines and equipment. It is one of the sciences that has received great popularity and attraction among scientists and researchers all over the world, as it “includes the study of intelligent behavior and how to benefit from it.” (Whitby, 2003, p. 17)

The use of technological means has a great role in the success of the educational process, and facilitating the learning process, and making it more effective and interactive.

The technological revolution has contributed to the emergence of new and advanced types and methods in teaching that have created great awareness in the cognitive growth among learners. We mention among them, specifically: Technology-enhanced education: which relies on tablet devices and on artificial intelligence applications. It is one of the most technological tools that have caused a sweeping revolution in the learning process. The radical transformation that the world is witnessing today has led us to reconsider the traditional models in education, so it is no longer possible for us to practice education relying on simple techniques like the blackboard and chalk and the paper book.

This, and artificial intelligence has many other definitions; we mention some of them as examples:

- It is a behavior and certain characteristics that computer programs are characterized by, making them imitate human mental abilities and their working patterns, and among the most important of these characteristics is the ability to learn and infer and react to situations that were not programmed in the machine. (Artificial Intelligence for Everyone Team, 2000, p. 7)
- Artificial intelligence is a field of study in computer science that is concerned with developing the intelligent machine so that it can perform operations similar to human thinking operations, like inference and learning and self-correction. (Abdul Hadi, 2000, p. 20)
- Or it is "the study of mental and intellectual abilities through the use of computational models." (Abdul Hadi, 2000, p. 20)
- All these definitions point to an attempt to simulate the human brain and the human mind, and to overcome various negatives of education that prevailed before this era, and this is thanks to exploiting the machine's ability to exert unlimited effort, and its possession of flexibility in creating mechanical behavior similar to human behavior.

2- Importance of Artificial Intelligence:

a- Symbolic Representation: The first goal that artificial intelligence seeks to achieve is symbolic representation where it uses non-numeric symbols. This idea came to erase the common saying that the computer cannot deal with anything but numbers. At the basic level, the computer consists of binary circuits and these circuits cannot take but one of the two states that were agreed to be symbolized by 0, 1. The choice of these two numeric symbols led to the spread of the idea saying that the computer cannot understand anything but yes or no, and that it cannot distinguish shades of meaning between them (Bounih, 1993, p. 13). However, this reality did not last long, as researchers in the field soon managed to remedy this deficiency, and made the artificial mind capable of receiving non-binary data and producing it, as well as investing thinking operations that do not require answers of the type: no—and—yes. This development was reflected on the reality of using various outputs of artificial intelligence.

And what we can say is that artificial intelligence programs can perform some computational operations if necessary, and often the results of these operations are used at the cognitive level, in a process similar to what the human brain does, and usually these inferential or inductive operations are called: inheritance or transfer of characteristics, and it has great importance in the science of artificial intelligence. (Bounih, 1993, p. 13)

b- Heuristics: "The binary feature of artificial intelligence programs is determined by the type of issues they address, as they usually do not have a known algorithmic solution, and by that we mean the absence of a sequence of specified steps whose following leads to guaranteeing reaching a solution to the issue" (Bounih, 1993, p. 13)

c- Knowledge Representation: Artificial intelligence programs differ from statistics programs in that they have knowledge representation, as they express a match between the external world and the computer's symbolic inferential operations. (Bounih, 1993, p. 13)

d- Incomplete Data: This feature consists in the ability of artificial intelligence programs to reach solutions to issues even in the case of not having all the necessary data at the time of need to make the decision, and this happens a lot in medicine when analysis results are ready but the patient's condition does not allow waiting (for example), or in the case of incomplete mathematical data and the ability to infer it, or absence of geographical information, or dates and events. (Bounih, 1993, p. 13)

e- Conflicting Data: Where artificial intelligence has the ability to analyze data that contradict each other, and this is what we call conflicting data, meaning those data that are tainted with some logical errors, or those where some cancel the existence of others.

f- The Ability to Learn: The ability to learn from mistakes represents one of the criteria of behavior characterized by intelligence, and leads to improving performance as a result of benefiting from previous errors, and it must be said here that if we applied this criterion we would find that few humans are characterized by intelligence, yet they surpass artificial intelligence in this field. However, we must look at the human ability to improve the machine in the field of the ability to learn from errors.

Through what has been mentioned above, we conclude that artificial intelligence has an important role in improving the quality of education and developing students' skills, as it contributes to developing sciences and advancing research.

3- Cognitive Skills of Artificial Intelligence:

There are three basic skills that applications of artificial intelligence seek to achieve; we mention them in sequence:

a- Learning: Obtaining data and creating rules for how to transform data into executable information (algorithms).

b- Thinking and Reasoning: Choosing the correct algorithm to reach the desired result.

c- Self-Correction: Programming artificial intelligence to continuously improve algorithms and ensure that they provide the most accurate results possible. (Artificial Intelligence for Everyone Team, 2020, p. 11)

4- Concept of Artificial Intelligence Applications Used in Education:

It is a set of softwares and systems that rely on artificial intelligence, and by their nature they try to imitate human behavior in the process of teaching and learning; that is: they imitate the behavior of teachers and the behavior of supervising administrations, as well as the bodies that oversee setting the educational curriculum and implementing it. Accordingly, the applications used in education have features that allow them to perform their tasks with high efficiency exceeding the human element. And in general, these applications possess: smart educational aids, platforms for analyzing educational data, automatic correction programs for tests and assignments, and sites for simulating the educational reality virtually. And below is a brief definition of these basic elements:

✓ Adaptive Learning Systems:

We can define these systems as electronic teaching programs that rely on artificial intelligence and are based on one of the most prevalent educational ideas in our era; which is: considering individual differences, and it is "environments based on multiplicity and diversification of presenting content according to the learning styles specific to each learner, so it presents the content as if it is directed to each student individually, so that a diverse set of adaptive activities is presented that takes into account the differences in learners' styles and is suitable for their potentials and mental abilities." (Al-Asimi, no date, p. 50)

So, adaptive learning is a methodology for learning that seeks to customize lessons and readings and training activities and assessments for individual students based on their skills and their current performance. Adaptive learning programs use the learning process by relying on artificial intelligence applications and machine learning to adapt the learning path presented to each student in real time, and this means the possibility of customizing the educational process for one student alone, or for a group of students who achieve the same degree of progress in a certain educational program, without that affecting the progress of their colleagues; whether they are at a lower level or a higher one. And this necessarily leads to improving the reality of education, its quality and effectiveness, and thus:

achieving the goals of the educational learning process.

✓ **Smart Educational Aids:**

It is one of the basic tools used in all fields of electronic and traditional education, and that is because of the obstacles and problems that educational environments face in the process of obtaining information or perceiving it or retrieving it, and this led to resorting to what is known as educational support, in order to help learners reach information in an easy and simple way, and in a way that suits solving many problems and difficulties they face during their learning, and during accomplishing the required educational tasks, and improving performance in order to achieve the desired educational goals. (Al-Sheikh, 2021, p. 158)

These educational supports aim to improve the understanding of science and its application, and improving critical thinking skills, and enhancing the passion for learning among students, and directing learners to valuable knowledge sources, and reducing the chances of feeling frustration and not wasting time in failed experiments, as well as helping to solve problems, and motivating the learner, and providing him with guidance, and facilitating understanding and improving it, and providing the necessary direction and helping to perform the difficult tasks, and also simplifying the information. (Hamed, 2024, p. 6)

Also, the smart educational supports require new and different methods from what we are used to in classical education, and they provide easier access ways, and use many techniques to attract learners' attention, and motivate them to perform the educational support activity, and also accustom them to skipping the frustration resulting from their feeling of cognitive deficiency. And in other words: the educational supports that various applications and education platforms use possess considerable efficiency in improving the cognitive side of the learner when facing an educational obstacle that needs support or feedback, or during performing an educational function.

And perhaps it is worth mentioning that the smart supports possess super precision, as the databases of smart programs can separate topics and information and knowledge in a partial way that we humans do not assimilate in general, and teachers in particular; we tend often to put the information in its historical and scientific context, instead of presenting it directly.

✓ **Educational Data Analysis:**

It is the process of using digital data to understand the learning process and improve it, through collecting data about students and their performance, so through it "it is possible to track and analyze the extent of students' improvement and identify their behavior patterns and customize the learning experience, as it contributes to improving the quality of educational content and assessment and also improving the presentation of electronic educational resources" (Sedkaoui & Khelfaoui, 2019, p. 2–16). And it is almost what the teacher should do throughout the academic year, and it takes time and effort. And the machine performs this task with enormous speed that does not exceed a few seconds, and follows that by classifying learners into groups to customize each group with what suits it from the adaptive education programs that we talked about above.

✓ **Simulation and Virtual Reality:**

Virtual reality technology is considered one of the most important modern technological applications used in simulating diverse human experiences and experiments in various fields through creating virtual environments processed by the computer. And this term divides into two parts: the first is reality which means the set of physical and moral events and experiences that man passes through and acquires through practice, and the word virtual which means imaginary or approximate. (Khalil et al., no date, p. 364)

And it is not bad to point out that some universities and institutes and schools and public and private educational institutions have already started offering educational classes with reality simulation, or with virtual reality technology, where the learner is the only human element in the educational process.

5- Reality of Employing Artificial Intelligence in Language Teaching:

Technological development has led to making education easier, through access to educational resources prepared for students, especially for those who find problem in attending, or in timing, or nature of the educational courses wanted to be presented to learners, or in dealing with numbers of learners, and specifically: the large ones from them, which is difficult to frame by the human element alone. Accordingly, education has become available to everyone, with their different ages, and geographical locations, and cognitive, doctrinal, political backgrounds and others. And the educated individual has become able to practice education outside school in a systematic way supervised by the institution, without need for continuous or permanent intervention by the teacher.

And here we ask: What is the reality of using artificial intelligence in language teaching?

And before we start answering this question, it is necessary to remind that language learners are not the same; among them is the learner of the language who speaks it, and among them the learner of the language who speaks other than it, and among them learner of the second and third language and perhaps more, and among them specialist in a branch of language branches, and among them student of a level from language levels, and among them studier of linguistics science, and others than these who seek a kind of knowledge different from what others seek, or aim to acquire a competence different from what other learners aim. Also, the educational process differs between systematic institutions, and private institutions, and self-learning.

Accordingly, here we will point to what is possible from various methods and techniques of artificial intelligence used in language teaching, without detailing the type of learners or nature of the educational process, for what we see of lack of importance of mentioning this matter in this study.

And I will start here by pointing to speech performance programs, which some educational institutions use in testing learners' pronunciation performance, and language teaching departments in universities are the best example on this pattern of use. And this program works on correcting pronunciation, and also training the hearing sense.

And recently, some applications appeared that perform the pronunciation correction process for the learner like application: speakometer available for free to users, and there are

others from applications that specialize in one language or many languages, like program: learn arabic pronunciation which is an application specific for teaching Arabic language pronunciation and correcting errors occurring in pronouncing sounds.

Technology can help teachers in preparing students for the future through teaching them the skills necessary for success, so using programming and artificial intelligence is important to help students develop thinking skills and problem solving. And in this context, artificial intelligence provides many services to teachers through helping them in preparing interactive lessons that are prepared by programs like: Opel, power point, speaker coach, these programs provide them with attractive and effective presentation shows for achieving successful scientific communication, as they make education more flexible where they work on attracting learners' attention and maintaining their focus and participation during the lesson, also we find application slides AI as an artificial intelligence tool that helps teachers in creating visually attractive and effective presentation shows for teaching different educational materials. (Kamal Al-Din, no date, p. 31)

These tools make teachers' work more capable of achieving the desired goals, and that through investing the visual sense, and visual stimulation by colors, unlike traditional education which is limited in this aspect, and which relies on using pictures. As for artificial intelligence programs, they distribute effort on various senses of the learner, and his organic devices, which may mean a great degree of integration in the educational process.

In addition to this, artificial intelligence programs help in planning educational lessons like program education copilot which every teacher in the classroom needs, due to its important role in helping teachers design their curricula, this program is distinguished by its ability and speed in formulating tasks and assignments and other educational materials, and program vue in accomplishing lesson plans and mind maps to make lessons more simplified. (Kamal Al-Din, no date, p. 31) Also it assists the teacher in organizing his educational material, and directing attention to the most important knowledges, and gradation in that.

Artificial intelligence also contributes in helping the teacher customize the type of teaching and full support for students through creating adaptive educational content and needs of each student individually, like what many language teaching programs offer, for example application Duolingo which is a famous language learning platform and presents interactive lessons that are mostly in the form of questions and answers and fill in the blanks, and performing patterns of sentences, and recognizing word meanings, with presenting possibilities that start from the easiest possibility and develop to the hardest, and all this is built through levels. And it must be admitted that application Duolingo and its likes provide huge educational materials, reaching to the extent of being able to perform a certain language correctly up to excellent in a time frame that humans may not be able to do like it.

Application Duolingo presents a mix of language levels, in which the specialization standard progresses, and degree of ease also, and looking at the educational environment that this application provides, it can be said that it relates to "adaptive teaching", where the

application puts a special educational program for the learner unlike others, and that is after conducting a test to assess competence and previous knowledges.

And regarding its methodology in teaching; this application focuses first on the lexical material, then introduces the rest of levels gradually, and reaches in its highest degrees to precise writing free from errors, and ideal vocal performance.

This application (and its likes) from applications presents an educational environment that does not imitate school classes, nor study curricula, but it tries to approach the daily use of language, which reminds us of the communicative method in language teaching, which is a method that relies on raising the learner's efficiency in using language during different real situations instead of teaching him vocabulary and grammar of language in place of learning, and by this way we get a learner more proficient in the language, and less knowledgeable of its rules.

And even if this application does not present curricula nor study classes nor educational courses, some platforms use artificial intelligence to accomplish educational courses specialized for each category based on their interests and inclinations and their prior acquisitions, and among examples of it platform: coursera, which is a very famous platform, created by professors from Stanford Bridge University in Britain. And the truth is that this platform is not specialized for teaching languages only.

Coursera works on presenting courses and curricula, and organizing training courses, and receiving virtual study classes through artificial intelligence. And thanks to this platform, the learner can undergo a training course, or follow a study course, or join a study class from his private home in any country in the world, and this is crowned by obtaining a certificate in a certain language, or in learning a part of it, or mastering a level from its levels, and it is a certificate recognized internationally.

And from the tangible reality witnessing the use of artificial intelligence in language teaching; we find platform 51Talk which is a paid global platform for teaching English language remotely, presents specialized lessons with professional teachers, also we find platform go talky which helps in speaking English language by resorting to teachers. And these two models represent the entry of artificial intelligence as an alternative to the teacher, where these platforms try to imitate teachers' behavior, and formulate it in the form of an electronic educational environment supported by a self-teacher through the application.

And in the context of the digital revolution, large language models jump to the forefront, and their products appear in the form of electronic applications or platforms or web sites, and they are artificial intelligence programs that since their creation work on providing advanced and innovative educational content, and the most famous of them in our day: chat gpt and deep and kimi k2 and gemini and others.

These models were created with very huge databases, and directed basically to answer users' questions in various fields of sciences and knowledges. But besides that, they provide many services that fall into the category of language teaching; and among that writing texts of all kinds, and rephrasing texts, and formulating sentences and arranging them and parsing them, and also translation and summarization and abbreviation, and expanding an idea. And

all this from the basic skills that we try to present to students and learners, as language teaching programs provide.

And we mention in this context application Quillbot which is an artificial intelligence rephrasing tool that uses advanced algorithms to help teachers save time in creating lesson materials and worksheets and assessments, and we find here also program Narakeet which is distinguished by helping the teacher convert written texts to audible speech and synchronizing it with presentation shows, this allows students greater understanding and more interaction.

And in our days, some companies developed the idea of the communicative method in language teaching so they created virtual dialogues that perform a double function: creating an environment simulating real life with what it includes of different social situations for learning different ways of correct linguistic performance, and also plays the role of the teacher who corrects errors, and alerts to slips, and with using audio and visual effects; these media are capable of attracting attention, and investing learners' awareness and their inclination toward non-school topics, or non-systematic ones. And regarding the educational material, artificial intelligence works on providing additional diverse educational resources like educational videos and texts and others. (Kamal Al-Din, no date, p. 32) And machine learning technology and artificial intelligence are considered the best way through which the learning experience can be improved, by using programming means and artificial intelligence applications to make education efficiency more effective, where artificial intelligence takes over choosing the suitable educational resources, and employing them with speed and accuracy and comprehensiveness.

Among the positives of education relying on technology and artificial intelligence applications, making the learner the center of the educational process and not the teacher, as learning has become more flexible and easy and smooth, and more exciting and stimulating by using programs and applications, so the educational process moved from an interaction and participation process between teacher and learner, to a self system where the learner plays most roles with the help of the machine.

6- Prospects of Using Artificial Intelligence in Language Teaching:

Through the current reality of using artificial intelligence, the prospects of using artificial intelligence appear very bright, and that by looking at the continuous development in its techniques, and ease of use and its speed, and high flow of internet.

Also, the development of computer sciences, and neuro-linguistics, and especially developing research methods that blend between the two sciences, all this encourages producing linguistic education models capable of imitating teacher behavior, and predicting learners' behavior, which increases the efficiency of the educational process, and contributes in achieving its goals within standard time frames, and with less effort; physically and financially.

And on the other hand, benefiting systematic education from artificial intelligence appears an urgent necessity for what it has of positives, and for what it causes to the educational process impact; however, the obstacles in this path are big; and among them the difficulty of

separating language teaching from teaching other educational courses, and especially in the early stages of education where the learner receives different educational materials.

And based on the difference in individual abilities and innate readinesses; the levels of learners in educational materials are often not uniform, which makes dividing learners into groups a matter of great difficulty.

And on the civilizational level, non-producing countries for artificial intelligence programs stand in an embarrassing position because these latter rely on content produced by companies from different cultures, and in other words: artificial intelligence is the most dangerous tool among globalization tools. We chew the content of these electronic programs and platforms and applications and large language models with what they contain of electronic content that we did not contribute to shaping except by a very tiny bit, and it is content that differs to varying degrees from our culture and religion and beliefs.

Conclusion:

In conclusion, it can be said that artificial intelligence is no longer just a technology or a modern and innovative means, but an effective tool that contributes in developing teaching methods in general, and language teaching in particular, through providing interactive environments that grant learners opportunities and prospects for research and excellence, and here at this point specifically, artificial intelligence applications have become a complementary tool for the teacher's role, not a substitute for him, and by this language teaching becomes more effective and comprehensive in the era of digitization and accelerating technological development.

And this research concluded that using artificial intelligence in language teaching is taking rapid steps, and that investing artificial intelligence techniques is no longer a choice, nor an aspect of material or technological luxury, but a civilizational necessity whose good exploitation leads to shortening time and effort, and distributing roles among all poles of the educational process. And finally, the characteristic of emotional intelligence and social intelligence and also the variation in cognitive growth among humans, and difference in its speed from one learner to another are real challenges facing researchers in the field of artificial intelligence, and open the door to questioning: To what extent can artificial intelligence replace the human school?

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