Integrating Artificial Intelligence Into Arabic Language Curriculum Evaluation

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ARTICLE INFO	ABSTRACT
	The integration of Artificial Intelligence (AI) in teaching the Arabic Language (A L), particularly in the realm of Arabic language curriculum evaluation has marked a momentous from traditional evaluation approaches. Therefore, the study aimed to highlight how to integrate artificial intelligence into Arabic language curriculum evaluation. It sought also to show how AI applications can be utilized to provide consistent and unbiased evaluation outcomes. The descriptive method was adopted, wherein the most relevant literature and related studied were reviewed. Two types of Arabic language curriculum evaluations were addressed, namely, internal and external evaluations. Findings of the study revealed that AI applications like Automatic Evaluation Systems, AI Chatting Robots, Neural Machine Translation Tools, Intelligent Virtual Environment, Affective Computing (AC) in ITSs and Intelligent Tutoring Systems (ITSs) can be utilized to make the evaluation process more flexible, interactive, collaborative, valid. recursive and free of personal preferences and impressions. Findings also showed that AI applications are easy to use by trained educators, teachers, other stakeholders and student and provide immediate evaluative feedback. These findings adduce the importance of incorporating AI tools into Arabic language curriculum evaluation.
	KEYWORDS: Artificial Intelligence, AI Applications, AI-based Curriculum Evaluation.

Introduction

Arabic language curriculum development and evaluation has witnessed crucial developments over the past few years. Arabic language curriculum evaluation means making decisions and evaluative judgments on all the curriculum elements including the goals/objectives, content, teaching and learning methods/techniques and strategies, activities, learning materials and instructional devices such as books, teaching materials, software, evaluation methods and tools, and the learning environment of the curriculum. It is a process of collecting data to determine to what extent the Arabic language curriculum is effective in achieving its predetermined goals. It includes two types of evaluation. The first is called internal evaluation, which refers to the evaluation of the curriculum effectiveness in terms of meeting the criteria set for its components and foundations The second type is the external evaluation, which means pinpointing the curriculum effectiveness in bringing about the required changes in the learners.

Arabic language curriculum evaluation is vital for curriculum design and development as well as its leaning outcomes. It is undertaken in order to ensure that the Arabic language learners' needs and interests are adequately addressed (Hwang & Kim:2019).. Thus, evaluation of Arabic language curriculum has become very common in all Arabic language contexts. This has coincided with the efforts of the educational authorities to adopt recent technological innovations like artificial intelligence in curriculum evaluation to ensure better, quicker more consistent , objective and accurate evaluation.

Artificial intelligence (AI) is a rapidly evolving technology involving the development of intelligent tools that can perform tasks that are typically accomplished by human intelligence, such as recognizing patterns, understanding natural language, and making decisions based on data (Owan, et., al. : 2023). It is also seen as the duplication of human capabilities such as recognition, language processes and decision making via robots

and machines. Its applications are designed to behave like humans. It marks a new shift to new advances in the field of learning ,teaching and evaluation. The advent of AI applications like ChatGPT has led to significant changes in evaluation landscapes, particularly in Arabic language curriculum evaluation. These applications have positive effects on for both curriculum evaluation and development as they apply uniform standards that guarantee consistent evaluation outcomes (Davenport:2018).

Accordingly, the current study sought to reveal how to integrate artificial intelligence into Arabic language curriculum evaluation and how to utilize AI applications to achieve consistent and unbiased evaluation outcomes.

The Study Problem

Although artificial intelligence has flourished to reach various educational landscapes, careful review of literature reveals a current paucity of research on applying AI in the field of Arabic language curriculum evaluation. Little research has been conducted and gaps in the literature are still present in the realm of Arabic language curriculum evaluation. Moreover , most studies tended to focus on the technical implementation of AI rather than its educational implications. (Porter :2012; Al Braiki, et. al, 2020; Jiang: 2022; Wang:2022).

Purpose of the Study

The main purpose of this study was to highlight how to improve the quality of Arabic language curriculum evaluation by utilizing artificial intelligence applications. It to provide a brief and profound overview of how to incorporate artificial Intelligence into Arabic language curriculum evaluation.

Significance of the Study

Focusing on integrating artificial Intelligence into Arabic language curriculum evaluation, the current study was hoped to bridge a gap in literature concerning Artificial Intelligence-based Arabic language Curriculum evaluation. Few studied focused on evaluating Arabic language Curriculum via Artificial Intelligence applications (Al Braiki, et. al, 2020; Jiang: 2022; Wang:2022).

It satisfied an exigent need for infusing AI based evaluation into Arabic language curricula amidst the increasing influence of AI in various educational fields. It called for a shift from traditional to more advanced AI tools to ensure quicker, better and more accurate evaluation.

Review of Literature

1. Arabic language Curriculum Evaluation

Arabic language curriculum evaluation is a systematic inquiry that collect data for decision-making and helps Arabic language course designers make judgments about the merit, worth, value, or significance of the evaluated curriculum. Thus, it enables educators, teachers , students and other stakeholders to obtain information about the effectiveness of the curriculum. Such data can help them make decisions about the program (Kuzu, et. al., : 2021). Therefore, evaluation is an integral component of all curriculum models.

1.a. Reasons for Arabic language Curriculum Evaluation

The following are the reasons for curriculum evaluation (Abdulla:2021 Natsir: 2023; AlHussein:2022; & Hamid, et. al.: 2018):

- The communications revolution and the global communication it brought about, and the accelerations in the cultural spread have urged the educational systems to pay attention to Arabic language curriculum evaluation and led them to reconsider the existing Arabic language curricula to identify how far they cope with these rapid changes.

-The cognitive and technological revolutions in various aspects of life has made Arabic language curricula that do not rush to keep pace with them via continuous evaluation and development lag behind these technological revolutions, and incapable of achieving their learning outcomes.

- The rapid economic, cultural and changes, and the accompanying emergence of new trends, values, notions, customs and ways of thinking (democratization of education, sustainable development, linking education to the labor market and interest in technical and vocational education…etc..) have adduced the importance of evaluating Arabic language curricula on a regular audit.

2.Artificial Intelligence

Artificial intelligence is one of the recent developments in technology that has resulted in significant changes in all aspect of educational sectors, including Arabic language curriculum. It is a branch of computer engineering, designed to create machines that behave like humans (Davenport :2018). With the easy and quick availability and accessibility of the Internet, artificial intelligence applications witnessed rapid accelerations and developments accompanied with various intelligent tools that have influenced the field Arabic language curriculum evaluation.

2.a.AI-based Curriculum Evaluation vs traditional Evaluation

Compared to traditional evaluation, AI-based curriculum evaluation utilizes intelligent and innovative tools such as ChatGPT that can provide efficient and timely grading/ assessment /evaluation. In addition, AI tools apply uniform standards/criteria to guarantee consistent and unbiased curriculum evaluation outcomes. Moreover, AI applications like Automatic Evaluation Systems, AI Chatting Robots, Neural Machine Translation Tools, Intelligent Virtual Environment, Affective Computing (AC) in ITSs and Intelligent Tutoring Systems (ITSs) make the evaluation process more flexible, interactive, collaborative, valid. recursive and free of personal preferences and impressions. Furthermore, they can offer detailed and immediate feedback to all the parties involved Arabic language curriculum evaluation (Merritt et., al:2012; Owan, et., al. : 2023; Alper : 2024; & Avsheniuk, et., al; Jowallah : 2024).

2.a.AI-Automatic Evaluation Systems

 Applications of IA technological tools in formative and summative Arabic language curriculum assessment/ evaluation offer innovative solutions to various evaluation challenges. The potentials of AI in evaluation are vast, involving various evaluation domains and benefiting educators, teachers, stakeholders and learners. One of the significant evaluating applications of AI technology is the automatic grading system, which empowers the evaluation/ assessment processes by leveraging machine learning algorithms to evaluate learners' assignments and provide immediate feedback. This not only saves teachers effort and valuable time but also offers consistent and objective assessment outcomes (Vera:2023).

2.b. Effective AI Curriculum Assessment/ Evaluation

A few recent studies dealt with AI-based assessment/ evaluation systems (Abdulla :2021 & Hamid,, et. al., 2020) involving   automatic discovery of skill models for online courses and students' performance with Machine Learning methods. Effective curriculum assessment/ evaluation recons on AI tools for collecting of evidences and information to pinpoint the extent to which learners achieved the intended learning outcomes (external curriculum assessment/ evaluation). This type of assessment/ evaluation is significant as it has a supportive influence on curriculum design and development which- in turn- improve student learning. It also allows Arabic language teachers to quantify and evaluate the efficacy of their teaching practices along with the manner of course management and regulation by associating students performance with the target learning objectives. Thus, teachers are empowered to institutionalize effective teaching mechanisms and revise failed ones in their fields **(**AlHussein, et. al., :2020).

AI applications can also be used to evaluate the Arabic language curriculum components : goals/objectives, content, teaching and learning methods/techniques and strategies, activities, learning materials and instructional devices such as books, teaching materials, software, evaluation methods and tools, and the learning environment of the curriculum(external curriculum assessment/ evaluation). This type of assessment/ evaluation is crucial for updating and developing the components of the Arabic language curriculum. AI applications can provide evaluative information about the components of the Arabic language curriculum as follows (Hamid,et. al, :2022; Abdulla :2021 & Susiawati:2022):

2.b.1 Goals

-How far the general goals of the Arabic language curriculum are in line with the general aims of education, the goals of the educational stage and the objectives of the Arabic languag**e** courses.
-The extent to which the specific objectives of Arabic language courses emerge from their general goals.
-The extent of clarity and well formulation of goals/ objectives.
-How far the course objectives are SMART .
-How far the course objectives include skills from the cognitive, psycho-motor and emotional domains
-The extent to which the goals and objectives adress all aspects of student development.

2.b.2 Content
2.b.2.a Content selection:
- How far the content is consistent with the desired goals and objectives.
- The extent to which the content is consistent with the learners culture.
- How far the content is catered for the learners needs, interests and level
- The extent of content validity and significance.

2.b.2.b Content organization:
 - The extent to which the balance between logical and psychological order is taken into account.
- The extent to which the content organization is flexible.

2.b.2.c. Content language:
- How far the language of the content is adequate, clear, accurate and suitable for the level of learners

2.b.3. Teaching and Learning Methods:
- The extent to which teaching and learning methods are:
- Consistent with the desired goals/ objectives.
- Suitable for the content.
- Suitable for the learners' interests and level

2.b.4. Teaching Materials:
- The extent to which the teaching materials achieve the target goals/ objectives.
- The extent to which the teaching materials are relevant to the content .
- The extent to which the teaching materials are available.
- The extent to which the teaching materials are suitable for the learners' interests and level.

2.b.5. Activities:
- The extent to which the activities are consistent with the target goals/ objectives
- The extent to which the activities are suitable for the learners' interests and level.
- The extent to which the activities are diverse to address various learning styles.

2.b.6.Evaluation
- The extent to which the evaluation tools are valid and reliable.
- The extent to which the evaluation tools are accurate and easy to use.
- The extent to which the evaluation tools are appropriate in terms of time ,effort and cost.

Method
In this study, the descriptive qualitative research method was adopted to gain a deeper understanding of the topic under investigation. To gather and analyze data, literature review involved an extensive exploration of current research related to the topic. Literature review enabled the researcher to synthesize and extract important insights from previous studies and scholarly works, which served as a foundation for the current study.

Findings and Recommendations:

Findings:
Findings of the study revealed that , being one the latest innovations of recent technologies, artificial intelligence applications can provide ample opportunities for educators, teachers, and learners to participate in the Arabic language curriculum evaluation processes, surpassing the limits of time and space. They showed also that AI applications like Automatic Evaluation Systems, AI Chatting Robots, Neural Machine Translation Tools, Intelligent Virtual Environment, Affective Computing (AC) in ITSs and Intelligent Tutoring Systems (ITSs) make the evaluation process more flexible, interactive, collaborative, valid. recursive and free of personal preferences and impressions. Furthermore, these applications can provide detailed and immediate feedback to all the parties involved in the Arabic language curriculum evaluation process and ensure better, quicker,more consistent and accurate evaluation.
These findings emphasize the importance of integrating artificial intelligence into Arabic language
curriculum evaluation as it provides new insights into conduct authentic curriculum evaluation. In addition, they foregrounded that AI applications can be used for
evaluating the curriculum components as well as its learning outcomes.

Recommendations
Based on the findings of the study, the following recommendations were made:
- AI applications should be incorporated into Arabic language curriculum evaluation.
- Educators, teachers, other stakeholders and student should be trained on how to adopt AI applications in Arabic language curriculum evaluation.
- Arabic language curriculum evaluation should include curriculum components and outcomes.
- Arabic language teachers should be encouraged to use AI tools to conduct formative and summative evaluations.

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