Utilizing Free AI Tools in Creating Islamic Religious Education Learning Media

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Abstract

Innovation in learning media with artificial intelligence (AI) in the current digital era is very important, because the object of education today is the digital generation z. If Islamic Religious Education learning media does not innovate, then Islamic religious education will seem rigid, boring and uninteresting to the younger generation. It does not have to be with paid artificial intelligence (AI) tools, Islamic religious education teachers can also use free tools. This study was written to analyze the types of free artificial intelligence (AI) tools used by Islamic Religious Education teachers in creating Islamic religious education learning media in the digital era, the effectiveness of artificial intelligence (AI) tools in helping teachers create Islamic religious education (PAI) learning media and the obstacles faced by PAI teachers. The method used in this study is a descriptive qualitative method. Data collection techniques used were through interviews, observation and documentation in the form of learning media products produced such as teaching modules, presentation slides, illustrations or interactive quizzes. From this study obtained data on the use of free AI tools by Islamic Religious Education teachers including GPT chat, canva ai, gemini and wayground ai. This research also identified challenges in utilizing free AI tools to create Islamic religious education learning media, including limited features in the free artificial intelligence (AI) tools. However, overall, free AI tools can be utilized by Islamic religious education teachers in creating learning media.

Keywords: AI Tools, Learning Media, Islamic Religious Education

Introduction

Islamic Religious Education (PAI) teachers play a crucial role in transmitting spiritual and moral values to students. However, the rapid development of modern technology presents increasingly complex instructional challenges. Today's students are predominantly members of Generation Z, who have grown up in digital environments and are commonly characterized as digital natives. This situation requires a reorientation of pedagogical approaches to ensure that religious learning remains connected to contemporary developments and students' everyday experiences (Arifin Ahmad, 2025). Therefore, innovation through interactive digital media and dialogical learning approaches is a strategic step toward ensuring that Islamic values remain relevant and meaningful in students' lives (Hidayat & Nur Hasanah, 2025).

The integration of Artificial Intelligence (AI) into Islamic Religious Education offers transformative opportunities to create more adaptive, interactive, personalized, and accessible learning experiences. AI technology enables teachers to develop and present religious materials according to students' individual learning needs, abilities, and preferences (Fortuna et al., 2025; Setiyo et al., 2025). Furthermore, digital media can facilitate the delivery of instructional materials while enhancing students' engagement and spiritual learning experiences (Alya' Thaifur et al., 2026; Mashudi & Hilman, 2024). Generative AI can also assist teachers in developing visual materials and instructional resources more efficiently, thereby supporting

students' understanding of abstract religious concepts through more concrete and accessible representations (A. J. Martin et al., 2025).

PAI teachers can utilize AI as an instructional innovation to develop learning media that correspond to the characteristics and needs of Generation Z students. AI applications can help teachers produce instructional materials with engaging visual designs and interactive features (Al.Mardhafi et al., 2026), making the learning process more attractive and accessible (Gunawan, 2023). This technology also provides opportunities to transform the teacher's role from being the sole source of knowledge into a facilitator who supports student-centered learning (Nur Hasanah & Kristiyah, 2023). Such transformation can improve educational accessibility, develop essential competencies, and provide adaptive learning support tailored to students' needs (Tang, 2024).

Various AI applications are currently available to support teachers in developing learning media, including ChatGPT, Gemini, Wayground, Kahoot, and Canva for Education. These applications offer different functionalities, ranging from generating instructional content and developing learning scenarios to creating interactive quizzes, presentations, infographics, and other visual materials (Abu Eideh, 2026; Gond et al., 2024; Lee & Song, 2024; Ogunleye et al., 2024; Özdemir, 2025; Safitri et al., 2023; Try & Utomo, 2023). The availability of free features provides an opportunity for teachers to utilize AI technology without necessarily incurring additional financial costs. However, the use of these applications also requires teachers to consider their functional limitations, content accuracy, data privacy, and suitability for Islamic educational objectives.

Despite the potential benefits of AI, its implementation in educational settings presents several challenges. Free AI applications may impose restrictions on usage quotas, document uploads, and access to advanced features (Cotton et al., n.d.). Other concerns include inaccurate information and AI hallucinations (Warist, 2025), data security and privacy risks (A. J. Martin et al., 2025), and limitations in processing lengthy or complex documents (Islam Negeri Syekh Ali Hasan Ahmad Addary Padangsidimpuan, 2026). These challenges are particularly important in Islamic Religious Education because teachers must ensure that AI-generated materials are accurate, contextually appropriate, and consistent with Islamic teachings. Therefore, teachers need to develop not only technical skills but also critical and ethical competencies when utilizing AI for instructional purposes.

Based on this background, this study aims to identify the free AI tools used by Islamic Religious Education teachers to create learning media, analyze the effectiveness of these tools in supporting the development of instructional materials, and examine the challenges teachers encounter in their implementation. Specifically, the study focuses on three aspects: the types of free AI applications utilized by PAI teachers, their perceived effectiveness in developing learning media, and the technical, pedagogical, and ethical constraints associated with their use. The findings are expected to provide insights into the opportunities and limitations of free AI tools in supporting innovative Islamic Religious Education. Furthermore, this study is expected to contribute to the development of more adaptive, accessible, and ethically responsible technology-integrated religious learning.

Method

Research Design

This study employed a qualitative descriptive research design to provide an in-depth description of Islamic Religious Education (PAI) teachers' experiences in utilizing free versions

of Artificial Intelligence (AI) tools to create learning media in the digital era. This design was selected because the study focused on exploring the phenomenon as it naturally occurred without introducing any intervention or testing numerical hypotheses. Specifically, the research examined the types of free AI tools used by teachers, their perceptions of the effectiveness of these tools, and the challenges encountered during their implementation. Through this approach, the study sought to obtain a comprehensive understanding of teachers' experiences and practices in integrating AI into instructional media development.

Participants

The participants were five selected Islamic Religious Education (PAI) teachers recruited through purposive sampling. The selection was based on the criterion that participants actively utilized free AI tools, such as ChatGPT, Canva AI, Gemini, and Wayground AI, to develop learning media. The participants represented elementary schools in several districts of Tegal and Batang Regencies, Central Java, Indonesia. They consisted of Dedi Suwandi, S.Pd.I, from SDN Kabukan 01, Tarub District, Tegal Regency; Fina Nur Alfi, S.Pd.I, from SDN Tarub 02, Tarub District, Tegal Regency; Selamet Hadi Wibowo, S.Pd.I, from SDN Lebo 02, Warungasem District, Batang Regency; Nur Faridah, S.Pd., from SDN Kluwih 01, Bandar District, Batang Regency; and Vera Andriana, S.Pd., from Kalipucang Elementary School, Batang Regency.

Research Procedure

The research was conducted in three stages: preparation, implementation, and post-fieldwork. The preparation stage involved developing the research instruments, particularly the interview guide and documentation review sheets. During the implementation stage, data were collected through in-depth interviews, observations, and the collection of instructional media documents produced by the participating teachers. The post-fieldwork stage involved organizing and processing the collected data, conducting data analysis, and formulating conclusions based on the research findings.

Data Collection Techniques

Data were collected using in-depth interviews and documentation. In-depth interviews were conducted with the participating PAI teachers to identify the types of free AI tools they used, their perceptions of the effectiveness of these tools in developing learning media, and the obstacles they encountered during their use. Documentation was used to complement and support the interview data by examining instructional media artifacts produced by the teachers. These artifacts included teaching modules, presentation slides, illustrative images, and interactive quizzes.

Data Analysis Techniques

Data analysis followed an interactive model consisting of data reduction, data display, and conclusion drawing and verification. Data reduction involved selecting, organizing, and coding relevant information obtained from the interviews and documentation to identify patterns related to the research objectives. The reduced data were then presented through descriptive narratives and comparative tables to facilitate the identification of similarities, differences, and recurring themes across participants. Finally, conclusions were drawn and continuously verified against the collected evidence to develop a comprehensive description of the use, perceived effectiveness, and challenges of free AI tools among PAI teachers.

Results

Based on results interview in-depth, observation, and study documentation against five Islamic Religious Education (PAI) teachers at the school base, found that all over participants

has integrate various *tools* Intelligence Artificial *Intelligence* (AI) free version in developing learning media. Utilizing this AI platform customized in a way functional based on type teaching media products needed in class (SH Wibowo, personal communication, September 29, 2026).

ChatGPT and Gemini in consistent utilized For manufacturing content narrative, design teaching modules, arrangement structure channel objective learning (ATP), as well as compilation grid questions. ChatGPT is considered to be very helpful for Islamic Education teachers in formulate text modules and scenarios systematic learning (D. Suwandi, personal communication, September 29, 2026). Meanwhile that, Canva AI is utilized For visualize material learning to be more aesthetic and attractive attention participant educate Generation Z through element graphics and automatic templates (F. Nur Alfi, personal communication, September 30, 2026). For create interactivity and evaluation based games (*game-based assessment*), teachers rely on Proven Wayground AI and Kahoot awaken motivation as well as interest Study students in class (V. Andriana & N. Faridah, personal communication, September 29, 2026)

Table 1 **Utilization of Free AI Tools by Islamic Education Teachers in Preparation of Learning Media**

No	PAI Group Name	Free AI Tools Used	Produced Learning Media Products
1.	Dedi Suwandi, S. Pd.I	Canva AI Gemini ChatGPT	Learning Module Presentation slides Illustration Image
2.	Fina Nur Alfi, S.Pd	Canva AI Gemini ChatGPT	Teaching Module Presentation slides
3.	Slamet Hadi Wibowo, SPd.I	Canva AI Gemini ChatGPT Wayground	Teaching Module Presentation slides Quiz Interactive
4.	Nur Faridah, S. Pd.I	Canva AI Gemini ChatGPT Wayground	Learning Module Presentation slides Quiz Interactive
5.	Vera Andrana, S.Pd	Canva AI Gemini ChatGPT Wayground	Learning Module Presentation slides Quiz Interactive

Discussion

This study demonstrates that free AI tools such as ChatGPT, Gemini, Canva AI, and Wayground AI effectively assist Islamic Education teachers in creating interactive, visual, and adaptive learning media for Generation Z without high subscription costs. The integration of AI enhances accessibility and supports personalized learning outcomes (Fortuna et al., 2025). Utilization technology intelligence artificial this is also proven give impact significant to improvement results Study student in system modern education (Madanchian et al., 2025). In addition, the adoption of AI by universities and schools support provision source Power more learning flexible (Wang et al., 2024). By applying a multi-tool strategy across various free AI platforms, Islamic Education teachers can optimally create tailored teaching modules, visual slides, illustrations, and interactive quizzes that align with student characteristics.

Integration of AI by Islamic Education teachers in study This in harmony with Technological Pedagogical Content Knowledge (TPACK) framework. The TPACK framework emphasizes that effectiveness teaching religion in the digital era is very dependent on the teacher's ability to blend knowledge materials, pedagogical strategies, and utilization generative AI technology (Liu & Zhong, 2025). The use of AI has been proven speed up efficiency administration and preparation material without sacrifice depth substance religious, so that Islamic Education teachers have more Lots room For designing learning media responsive interactive to characteristics Generation Z. In general special, design teaching AI- based combined with principle Bloom's taxonomy helps educator reformulate taxonomy think student from level understanding base going to analysis critical (Abu Eideh, 2026). Visualization of stories Islamic, verses of the Koran, and Asbabun Nuzul use Canva AI and ChatGPT help create abstract PAI material become more concrete. This is strengthening cognitive, affective, and psychomotor domains student through optimization burden cognitive (load reduction instruction)(K. D. Martin & Zimmermann, 2024). Approach pedagogical this is the end capable increase students' spiritual involvement in a way comprehensive in class.

Beside that, acceptance student towards learning media proven AI- based give impact significant positive to achievements results Study If compared to with paper media conventional. Use of interactive AI agents also support learning models collaborative based computer -supported collaborative learning that facilitates discussion group in a way dynamic. Learning trends collaborative this AI- based consistent show improvement results Study in modern education. Although Thus, integration This still need role central teacher, where expertise educator (teacher expertise) becomes determinant main so that the explanation AI-generated concepts are examined in a way critical thinking by students (Lee & Song, 2024). Integration think critical together AI technology is very necessary For hone ability analysis participant educated (Salido et al., 2025).

Using this free version of AI tools No let go from a number of constraint technical, ethical, and pedagogical. Limitations limitation quota processing (quota & feature limits), size window context (context window), and risk hallucinations information where AI generates reference or arguments that are not accurate to be challenge main challenges faced by teachers (Ogunleye et al., 2024). This in line with findings studies systematic that highlights the need guide ethics and policies clear institutional in adopting Generative AI (Belkina et al., 2025). Perception as well as level AI adoption by educators is greatly influenced by factors environment and readiness technology in schools (Taheri et al., 2025). The experiences and perspectives of teachers in the postdigital era also show importance readiness professional in face disruption technology (Moylan et al., 2025). Therefore that, the competence of Islamic Education teachers in do verification factual (cross-checking) against fixed AI output being the main filter that is not may abandoned.

Conclusion

Free AI tools such as ChatGPT, Canva AI, Gemini, and Wayground AIeffectively transform Islamic Religious Education (PAI) learning media into adaptive, interactive, and varied resources for Generation Z without budget constraints, while reinforcing the TPACK model and overcoming technical and hallucination risks. Practically, this multi-tool approach offers an inclusive, replicable solution for cost-conscious schools. However, due to study limitations involving a small sample of five elementary school teachers and a focus on teacher perceptions, future research should adopt quantitative or mixed-methods approaches with

broader samples at the secondary level, alongside developing ethical and content verification training frameworks for educators.

Saying Thank You

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Conflict interest

Writer state that No There is conflict interests, both in a way financial, personal, and professional, who can influence the implementation process research, data analysis, or writing script This.

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