Jurnal Pendidikan Islam 16 (3) (2026) 409-423
DOI: 10.38073/jpi.6067
https://ejournal.uiidalwa.ac.id/index.php/jpi

p-ISSN: 2581-0065
e-ISSN: 2654-265X

Integrating Islamic Tradition and Digital Competencies: Curriculum Innovation in Madrasah Diniyah for Society 5.0

Abdul Hamid[1*], Asmad Hanisy[2], Nurul Anam[3], Hamzah Shoubaki[4], Bayu Wahyu Maulana[5]

[1,2,3] Universitas Islam KH. Achmad Muzaaki Syah, Jember, Indonesia
[4] The British University, Dubai, Uni Arab Emirates
[5] Universitas Islam KH. Achmad Muzaaki Syah, Jember, Indonesia
Email: gushamid052@gmail.com[1], asmadhanisy@gmail.com[2], nurul.anam86@gmail.com[3], hamza_ys2007@yahoo.com[4], wahyumaulana2266@gmail.com[5]
*Corresponding Author

Article Information:
Received: 3 September 2026
Revised: 12 October 2026
Accepted: 19 October 2026
Published: 28 October 2026

Keywords:
Curriculum Innovation, Madrasah Diniyah, Digital Literacy, Islamic Education, Society 5.0.

Abstract

This study examines curriculum innovation at Madrasah Diniyah Al Qodiri 1 Jember in responding to the educational demands of Society 5.0 while preserving traditional Islamic educational values. Employing a qualitative approach with a single-case study design, the research involved ten informants, comprising the head of the madrasah, a curriculum coordinator, four teachers, and four students. Data were collected through classroom observations, semi-structured interviews, and institutional documentation, and analyzed using the interactive model of Miles, Huberman, and Saldaña. Data credibility was supported through source and methodological triangulation and member checking. The findings reveal three interconnected dimensions of curriculum innovation: adaptive curriculum planning, the integration of traditional Islamic learning with contemporary pedagogical approaches, and the strengthening of digital literacy and Islamic character education. Technological adaptation is reflected in the use of projectors for *kitab kuning* instruction, basic digital attendance management, and technology-supported learning evaluation. However, implementation remains at an initial stage due to limited technological infrastructure, varying levels of teachers' digital competence, and financial constraints. The study identifies an emerging adaptive-transformative curriculum pattern in which traditional Islamic scholarship and contemporary educational competencies are integrated according to institutional characteristics and available resources. These findings suggest that curriculum innovation in Madrasah Diniyah can develop progressively without abandoning established Islamic educational traditions, highlighting the importance of contextual adaptation, institutional readiness, and the preservation of religious values.

How to Cite this Article: Hamid, A., Hanisy, A., Anam, N., Shoubaki, H., & Maulana, B. W. (2026). Integrating Islamic Tradition and Digital Competencies: Curriculum Innovation in Madrasah Diniyah for Society 5.0. *Jurnal Pendidikan Islam*, *16*(3), 409–423. https://doi.org/10.38073/jpi.6067

INTRODUCTION

The rapid development of information and communication technology has significantly transformed human life and accelerated digital transformation across various sectors, including education. In response to these developments, the concept of Society 5.0 emphasizes the integration of advanced technologies, such as Artificial Intelligence (AI), the Internet of Things (IoT), and other digital innovations, with human-centered values to improve the quality of life. Within the educational context, this paradigm encourages the

© 2026 The Author(s). Published by the Research Department, Universitas Islam Internasional Darullughah Wadda'wah, Pasuruan, Indonesia. This is an open access article under the CC BY-SA license (https://creativecommons.org/licenses/by-sa/4.0).

development of learning systems that are more adaptive, interactive, and responsive to the needs of contemporary learners. Education in the Society 5.0 era is therefore expected not only to accommodate technological advancements but also to strengthen human competencies, ethical awareness, and social responsibility (Agarwal et al., 2025; International Commission on the Futures of Education, 2021).

These developments place educational institutions in a strategic position to adapt their systems, particularly in terms of curriculum development. The curriculum is no longer merely a guideline for teaching and learning activities but also serves as a strategic instrument for responding to social, cultural, and technological changes. In the context of Islamic education, curriculum development requires a balanced approach that accommodates contemporary educational demands while preserving religious values and institutional identity. Previous studies have emphasized the importance of curriculum innovation and institutional adaptation in maintaining the relevance of Islamic educational institutions amid modernization (Cahyaningtyas et al., 2025; Hidayat & Sukari, 2025; Mustafidin et al., 2024; Zuhdi, 2006). This situation provides opportunities for Islamic educational institutions to develop more contextual and flexible curricula without abandoning their foundational educational principles.

Madrasah Diniyah, as a form of Islamic educational institution, plays a crucial role in developing learners' religious knowledge, moral character, and spiritual awareness. Its distinctive characteristics are reflected in the teaching of classical Islamic texts (*kitab kuning*) and traditional learning methods, such as *sorogan*, *bandongan*, and *halaqah*. These approaches have historically contributed to the transmission of Islamic scholarship and the preservation of pesantren educational traditions. However, contemporary educational developments require Madrasah Diniyah to consider more adaptive approaches that integrate traditional learning practices with relevant pedagogical innovations. Priyatna et al. (2024) discuss the potential of digital learning media to support traditional *sorogan* and *bandongan* methods, while Suresman et al. (2025) identify the broader transformation of pesantren learning models toward hybrid and technology-supported approaches. These developments indicate that curriculum innovation can be pursued without necessarily replacing the distinctive traditions of Islamic education.

At the same time, integrating technology into Islamic education presents both opportunities and challenges. Digital learning resources can improve access to educational materials, support more interactive learning activities, and strengthen competencies relevant to contemporary society. However, differences in technological infrastructure, access to digital resources, and educators' digital competencies may influence the effectiveness of curriculum innovation. Oktaviani & Setiawati (2025) emphasize the importance of developing digital literacy competencies among pesantren students, while Nasution et al. (2025) highlight the role of Islamic education teachers in integrating digital literacy with character formation. These perspectives suggest that technological adaptation in Islamic educational institutions should be accompanied by the strengthening of moral values and pedagogical readiness.

Several previous studies have examined curriculum development and educational transformation in Islamic educational institutions. As'ad et al. (2021) investigated curriculum development in Madrasah Diniyah Takmiliyah in response to educational developments in the Industry 4.0 era. Listiana et al. (2023) explored a digital-based Madrasah Diniyah development model, demonstrating how technological adaptation can be implemented while maintaining the institution's religious educational orientation. Furthermore, Humairoh & Saefudin (2025) examined the relevance of the Madrasah Diniyah curriculum in the Society 5.0 era, while Fauzia et al. (2025) investigated curriculum management in a pesantren context.

Alfiyah et al. (2025) also examined the integration of Madrasah Diniyah into the local religious curriculum of secondary schools. Collectively, these studies demonstrate increasing scholarly attention to curriculum adaptation, institutional development, and the relationship between Islamic educational traditions and contemporary educational needs.

Nevertheless, the existing studies approach curriculum transformation from different institutional and analytical perspectives. Some emphasize digital-based institutional development, while others focus on curriculum management, local curriculum integration, or changes in pesantren learning models. Although these contributions provide important foundations for understanding educational transformation, further contextual investigation is needed to explain how curriculum planning, traditional Islamic learning practices, digital competencies, and character education interact within a particular Madrasah Diniyah. Such an investigation is especially relevant for understanding how institutional characteristics, available resources, and educational priorities shape the actual implementation of curriculum innovation.

Accordingly, this study examines curriculum innovation at Madrasah Diniyah Al Qodiri 1 Jember, a pesantren-based educational institution that maintains classical Islamic learning traditions while gradually introducing more adaptive and contextual educational approaches. The study focuses on how curriculum innovation is designed and implemented, how traditional Islamic scholarship is integrated with digital competencies, and what challenges emerge during this process. Rather than viewing modernization as a replacement for traditional educational practices, this study considers curriculum development as a gradual process of adaptation that seeks to preserve institutional identity while responding to contemporary educational demands.

The main objective of this research is to analyze the forms, processes, and characteristics of curriculum innovation at Madrasah Diniyah Al Qodiri 1 Jember in response to the challenges of the Society 5.0 era. Theoretically, this study seeks to contribute to discussions on adaptive-transformative curriculum development in Islamic education by examining the relationship between traditional Islamic scholarship, pedagogical innovation, digital competencies, and character formation. Practically, the findings are expected to provide insights for educational leaders, curriculum developers, and policymakers in developing curricula that are adaptive, contextual, and firmly grounded in Islamic educational values.

METHOD

This study employed a qualitative approach with a case study design to obtain an in-depth understanding of curriculum innovation and development at Madrasah Diniyah Al Qodiri 1 Jember in the context of Society 5.0. The qualitative approach was considered appropriate because the research focused on exploring educational practices, institutional experiences, and the processes through which traditional Islamic values are integrated with modern educational competencies. The case study design enabled an intensive examination of a single educational institution within its real-life context, particularly concerning curriculum planning, learning implementation, and technological adaptation. The research was conducted at Madrasah Diniyah Al Qodiri 1 Jember, East Java, Indonesia, over a three-month period from August to October 2025, during the 2025/2026 academic year. This period allowed the researchers to observe curriculum implementation, teaching practices, and institutional efforts to integrate traditional Islamic learning with contemporary educational approaches. The study involved ten informants selected through purposive sampling based on their direct involvement in curriculum planning and implementation. The informants consisted of one head of the madrasah, one curriculum coordinator, four teachers

(*ustadz/ustadzah*), and four students from different learning levels. This selection was intended to obtain diverse perspectives on curriculum innovation from institutional management, instructional practices, and student learning experiences.

Data were collected through three main techniques: observation, in-depth interviews, and documentation. Observations were conducted during eight learning sessions to examine classroom interactions, teaching strategies, curriculum implementation, and the use of learning media. Particular attention was given to the integration of traditional Islamic instructional methods with contemporary pedagogical approaches and digital learning resources. These observations provided contextual information regarding how curriculum innovation was implemented in everyday educational practices. Semi-structured, in-depth interviews were conducted with all ten informants, with each interview lasting approximately 45–90 minutes. The interviews explored curriculum planning, educational innovation, learning practices, the integration of Islamic values, and challenges associated with technological adaptation. With participants' consent, interviews were audio-recorded and transcribed verbatim to preserve the accuracy of the information obtained. The interview data were used to understand the perspectives and experiences of institutional leaders, teachers, and students concerning curriculum development in the Society 5.0 era.

Documentation was collected to complement the observations and interviews. The documents examined included curriculum structures, lesson plans, teaching modules, evaluation reports, institutional profiles, and records of learning activities. These documents provided supporting information about curriculum organization, instructional planning, and institutional development. The use of multiple data collection techniques enabled the researchers to compare information obtained from different sources and develop a more comprehensive understanding of the research context.

In this study, the researchers served as the primary instruments in the data collection and interpretation processes. Supporting instruments included observation guidelines, semi-structured interview guides, and documentation sheets developed according to the research objectives. These instruments focused on three main dimensions: curriculum innovation, the integration of Islamic educational values, and adaptation to the educational demands of Society 5.0. Data analysis was conducted using the interactive model of (Miles et al., 2014), which consists of data condensation, data display, and conclusion drawing and verification. During data condensation, information obtained from interviews, observations, and institutional documents was organized and focused on issues relevant to curriculum innovation, traditional learning practices, digital adaptation, and character education. Data display involved presenting the organized findings through descriptive narratives and thematic categories to facilitate interpretation and comparison. Conclusions were developed inductively and continuously examined against the collected data to ensure consistency with the research objectives.

The coding process involved three stages. First, open coding was employed to identify initial concepts and relevant patterns emerging from the collected data. Second, axial coding was used to organize these concepts into broader categories, including curriculum planning, instructional innovation, digital learning practices, and implementation challenges. Third, selective coding was applied to identify central themes representing the characteristics of adaptive-transformative curriculum development. These coding procedures supported the thematic organization of findings within the broader interactive analysis process. Data collection and analysis continued until the researchers considered that the information obtained was sufficiently comprehensive to address the research questions and that no substantially new themes emerged from the available data. To enhance the credibility of the findings, source triangulation was conducted by comparing information provided by the head

of the madrasah, the curriculum coordinator, teachers, and students. Methodological triangulation was also applied by comparing interview findings with classroom observations and institutional documents. Furthermore, member checking was undertaken by confirming relevant findings and interpretations with participants to minimize misunderstanding and improve the credibility of the analysis.

Regarding ethical considerations, the study was conducted in accordance with principles of voluntary participation, informed consent, confidentiality, and respect for participants. All participants were informed about the purpose of the study, the nature of their involvement, and their right to withdraw from participation. Personal information was treated confidentially, and identifying details were anonymized to protect participants' privacy. Throughout the research process, the researchers also respected the institutional regulations and educational values of Madrasah Diniyah Al Qodiri 1 Jember.

RESULTS AND DISCUSSION

The development of Society 5.0 has introduced new perspectives on the relationship between technological advancement and human-centered development. Unlike Industry 4.0, which primarily emphasizes technological innovation and industrial automation, Society 5.0 places greater emphasis on integrating digital technologies into human activities to address social challenges and improve quality of life. In education, this development encourages institutions to adopt innovative learning approaches while maintaining the importance of ethical values, social responsibility, and human development (Agarwal et al., 2025). For Islamic educational institutions, technological adaptation must therefore be accompanied by efforts to preserve religious values and strengthen students' intellectual and moral competencies.

Curriculum development in the Society 5.0 era requires particular attention to three interrelated aspects: character education, the development of critical and creative thinking skills, and the meaningful integration of technology into learning. These components are important for preparing students to respond to contemporary educational challenges without neglecting their moral and spiritual development. Yusgiantara (2025) discusses curriculum and learning innovations in the Society 5.0 era, while Hidayat and Sukari (2025) emphasize the relevance of Islamic education curricula to contemporary educational needs. These perspectives suggest that curriculum transformation should be understood not simply as the introduction of technological tools but as a broader educational process that connects knowledge, competencies, and values.

Structure of the Madrasah Diniyah Curriculum

The Madrasah Diniyah curriculum is fundamentally oriented toward the systematic transmission of Islamic knowledge, religious practices, and moral values. Traditionally, curriculum development in these institutions has focused on organizing religious subjects and learning activities according to students' educational levels and institutional objectives. Alfarisi (2020) discusses the development of Islamic education curriculum components in Madrasah Diniyah, highlighting the importance of curriculum organization in supporting educational objectives. In this context, the curriculum serves not only as a framework for the delivery of learning materials but also as a means of preserving Islamic educational traditions.

Madrasah Diniyah institutions generally provide instruction in Islamic disciplines, including fiqh, tauhid, Qur'anic studies, hadith, Islamic history, and moral education. Learning activities are commonly organized through established instructional traditions and adapted to the characteristics of students and institutions. The duration and educational structure may vary depending on the institution and the levels of religious instruction provided. In Indonesia, Madrasah Diniyah Takmiliyah commonly operates through the

Awaliyah, Wustha, and Ulya levels, with learning objectives and materials adapted to the educational development of students.

Madrasah Diniyah may operate within Islamic boarding schools or independently under community organizations and educational foundations (Hamdanah, 2024; Huda et al., 2025; Sarkowi, 2022). These institutional arrangements influence curriculum management, learning schedules, educational resources, and the implementation of instructional activities. As'ad et al. (2021) examined the development of a Madrasah Diniyah Takmiliyah curriculum model in response to educational changes associated with the Industry 4.0 era. Their research provides a relevant perspective for understanding how traditional Islamic educational institutions can respond to contemporary demands through curriculum development.

In the context of Madrasah Diniyah Al Qodiri 1 Jember, curriculum development remains closely connected to the pesantren's religious educational orientation. The institution places Islamic knowledge and moral education at the center of learning activities while gradually accommodating competencies considered relevant to contemporary educational developments. This approach reflects an effort to maintain the institution's distinctive identity while creating opportunities for curriculum adaptation.

Curriculum and Learning Format of Madrasah Diniyah

The curriculum and learning format of Madrasah Diniyah generally involve two important instructional planning components: the syllabus and lesson plans. The syllabus provides an overview of learning objectives, instructional materials, learning activities, and expected competencies, while lesson plans translate these elements into practical classroom activities. Together, these components support the systematic organization and implementation of learning.

1. **Syllabus**

   The syllabus functions as a guideline for instructional planning and the organization of learning materials. It helps teachers determine the scope of subjects, appropriate learning activities, and expected learning outcomes. Within Madrasah Diniyah, syllabus development needs to consider the characteristics of Islamic religious subjects, students' levels of understanding, and the educational traditions maintained by the institution (Humairoh & Saefudin, 2025; Musa & Marwah, 2025). Curriculum innovation may involve adapting learning materials and instructional activities to contemporary educational needs while retaining the essential objectives of Islamic education. Hidayat and Sukari (2025) discuss the relevance of Islamic education curricula to modern educational demands, providing a useful perspective for understanding the need for contextual curriculum development.

2. **Lesson Plan**

   Lesson plans provide more detailed descriptions of teaching and learning activities, including instructional methods, learning resources, classroom interactions, and assessment procedures. In Madrasah Diniyah, lesson planning supports the implementation of religious instruction through methods appropriate to the nature of the subject matter and students' educational backgrounds (Armaluddin, 2022; Hakim & Muis, 2023). Technological developments also create opportunities to strengthen instructional planning through digital learning resources, electronic documentation, and technology-supported assessment. However, the adoption of these approaches should be adjusted to institutional readiness and available educational facilities. The development of digital-based Madrasah Diniyah, as examined by Listiana et al. (2023), provides a relevant context for understanding how technology can support the organization and implementation of religious education.

Curriculum Development of Madrasah Diniyah in the Era of Society 5.0

Curriculum development in the Society 5.0 era is increasingly important for maintaining the relevance of Islamic religious education amid technological and social changes. Curriculum adaptation should not be interpreted as replacing traditional educational values with technological competencies. Rather, it represents an effort to connect established educational principles with contemporary learning needs. International Commission on the Futures of Education (2021)emphasizes the importance of rethinking education in relation to social transformation, shared responsibility, and the development of more inclusive educational futures. In the context of Islamic education, this perspective provides a broader foundation for considering how curriculum development can respond to contemporary changes while maintaining the institution's educational values and cultural identity.

Several strategies can be considered in developing Madrasah Diniyah curricula, including adjusting learning materials to students' needs, strengthening educators' competencies, developing institutional collaboration, and utilizing appropriate educational technology. Curriculum management should also consider the availability of learning resources and the capacity of institutions to implement educational innovation. Fauzia et al. (2025), in their study of curriculum management at an Islamic boarding school, provide a relevant perspective on the relationship between curriculum development and the educational demands of Society 5.0. The integration of technological resources into Islamic education also requires attention to the continuation of established learning traditions. Priyatna et al. (2024) discuss efforts to optimize traditional *sorogan* and *bandongan* methods through technological integration, while Suresman et al. (2025) examine the development of pesantren learning models from traditional approaches toward digital learning. These studies suggest that technological innovation can be understood as a means of supporting traditional Islamic education rather than necessarily replacing it. Accordingly, curriculum development in Madrasah Diniyah requires a balanced approach that considers Islamic educational values, student competencies, institutional characteristics, and the opportunities provided by digital technology.

Analysis of the Madrasah Diniyah Al Qodiri 1 Jember Curriculum

Based on the analysis of interviews, observations, and institutional documents reported in this study, the curriculum of Madrasah Diniyah Al Qodiri 1 Jember can be examined through three main aspects: curriculum structure, curriculum content, and learning approaches.

1. **Curriculum Structure**

   The curriculum implemented at Madrasah Diniyah Al Qodiri 1 Jember is organized through a structured and tiered learning system. Learning materials are arranged according to students' educational levels, enabling the gradual development of religious knowledge and understanding. Each level is intended to strengthen students' spiritual and intellectual foundations while preparing them to understand increasingly complex Islamic subjects. This structure demonstrates the institution's commitment to maintaining systematic religious instruction. At the same time, curriculum planning provides opportunities to incorporate learning activities that respond to contemporary educational developments. Curriculum adaptation is therefore carried out within the existing institutional structure rather than through the complete replacement of traditional learning arrangements.

2. **Curriculum Content**

   The curriculum content emphasizes Islamic knowledge and values, including Qur'anic studies, hadith, fiqh, tauhid, akhlaq, and Islamic history. These subjects constitute the foundation of religious education and reflect the institution's commitment

to the preservation of Islamic scholarly traditions. Alongside these core subjects, the institution introduces supplementary learning activities and contextual approaches intended to help students relate religious knowledge to contemporary social developments. This approach reflects an effort to strengthen the relevance of Islamic education while retaining the central position of religious studies within the curriculum. The relationship between curriculum continuity and educational adaptation is consistent with the broader development of Islamic education curricula discussed by Zuhdi (2006). In the context of Madrasah Diniyah Al Qodiri 1 Jember, adaptation is reflected in efforts to enrich instructional practices without substantially changing the foundational content of Islamic religious education.

3. Learning Approach

The learning approaches implemented at Madrasah Diniyah Al Qodiri 1 Jember combine traditional religious instruction with more participatory and contextual learning activities. Classroom practices include discussions, direct practice, and the use of selected technological resources to support instruction. These approaches are intended to encourage students to understand religious learning materials while developing communication, critical thinking, and practical problem-solving skills. Nevertheless, traditional instructional practices continue to play an important role in maintaining the institution's educational identity (Aulia et al., 2026; Maulana & Nurwulan, 2025). The integration of traditional and contemporary learning approaches demonstrates that curriculum innovation in Madrasah Diniyah does not necessarily require the abandonment of established educational practices. Instead, instructional adaptation can be implemented gradually according to institutional readiness and educational priorities. Overall, the curriculum of Madrasah Diniyah Al Qodiri 1 Jember reflects an effort to maintain continuity between religious education and contemporary educational demands. Its structure, content, and learning approaches illustrate how traditional Islamic educational principles can remain central while allowing space for gradual innovation.

Curriculum Development Innovation in the Society 5.0 Era

Curriculum innovation in the Society 5.0 era requires educational institutions to consider competencies such as critical thinking, collaboration, creativity, communication, and digital literacy. In Madrasah Diniyah, the development of these competencies needs to be integrated with Islamic values and the institution's established religious educational objectives. The use of digital learning media, including online educational resources, Islamic educational applications, and interactive multimedia, creates opportunities to support instructional activities and improve access to learning materials. However, the effectiveness of these resources depends on technological infrastructure, educators' competencies, and their suitability for the learning context. Oktaviani & Setiawati (2025) address the importance of strengthening digital literacy among students in Islamic boarding schools, providing a relevant perspective on the competencies needed in contemporary pesantren education.

Research findings indicate that Madrasah Diniyah Al Qodiri 1 Jember has begun implementing curriculum innovations as an adaptive response to contemporary educational demands. These innovations do not eliminate the traditional system but seek to integrate Islamic educational values with selected contemporary learning approaches. Based on interviews with the head of the madrasah and the curriculum team, the innovations identified in this study can be grouped into three aspects: (1) adaptive curriculum planning, (2) integrative learning implementation, and (3) the strengthening of digital literacy and character education.

First, adaptive curriculum planning is reflected in institutional efforts to evaluate existing learning arrangements and consider the relevance of instructional materials to

students' educational needs. Curriculum development remains grounded in Islamic religious education while accommodating selected contemporary competencies. Second, integrative learning implementation combines traditional Islamic instructional practices with participatory teaching strategies and appropriate technological resources. The use of technology is positioned as a means of supporting religious instruction rather than replacing traditional educational relationships. Third, digital literacy and character education are developed through efforts to introduce technological awareness while maintaining Islamic moral values as the foundation of learning. Nasution et al. (2025) examine the relationship between digital literacy and Islamic value-based character formation, offering a relevant perspective on the importance of integrating technological competencies with moral education.

Nevertheless, curriculum innovation at the institution continues to face several challenges, including limited technological infrastructure, differences in educators' digital competencies, and financial constraints. These conditions influence the pace and scope of technological integration. The findings suggest that curriculum transformation at Madrasah Diniyah Al Qodiri 1 Jember should be understood as a gradual and context-dependent process. Curriculum development is influenced not only by educational aspirations but also by available resources, institutional traditions, and the readiness of teachers and students.

Technological integration therefore requires careful planning and ongoing support. Rather than pursuing advanced digital transformation immediately, the institution has begun with relatively accessible technologies and learning practices suited to its existing capacities. This pattern illustrates the importance of contextual innovation in Islamic education, in which curriculum development is guided by the interaction between institutional identity, educational needs, and available technological resources.

Case Study and Empirical Findings

Madrasah Diniyah Al Qodiri 1 Jember is located in Gebang Poreng Village, Patrang District, Jember Regency, East Java, Indonesia. The institution was established by Kiai Achmad Muzakki Syah to respond to the community's need for continued Islamic religious education. Its development is closely associated with the Al Qodiri Islamic Boarding School Foundation, which provides various educational programs, including Qur'anic education, Madrasah Diniyah, and formal schooling. The establishment and development of Madrasah Diniyah Al Qodiri 1 Jember reflect the importance of community participation in sustaining Islamic educational institutions. As interest in religious education increased, the institution developed its educational activities to accommodate students seeking further Islamic knowledge after completing basic Qur'anic instruction. The institutional development of Madrasah Diniyah provides a relevant context for understanding curriculum adaptation within community-based Islamic education.

Based on interviews with Ustadz Ipianto, the Head of Madrasah Diniyah Al Qodiri 1 Jember, the institution's vision emphasizes the development of students who are faithful, intelligent, innovative, and characterized by noble moral conduct (*akhlaq al-karimah*). This vision is supported by educational objectives related to intellectual development, creativity, discipline, religious observance, and the internalization of Islamic values. In its curriculum implementation, Madrasah Diniyah Al Qodiri 1 Jember has introduced several initiatives intended to respond to contemporary educational developments. These initiatives include periodic curriculum evaluation, strengthening character education, introducing basic digital and data literacy, and developing students' communication, critical thinking, leadership, and problem-solving skills through discussions, presentations, and group activities.

The findings indicate that curriculum adaptation is implemented through gradual adjustments rather than comprehensive institutional transformation. Traditional Islamic

learning remains central, while contemporary instructional approaches are introduced to support students' learning experiences. An important example of technological adaptation is the use of projectors to support the presentation of classical Islamic texts (*kitab kuning*). This practice demonstrates how digital equipment can be incorporated into established instructional activities without fundamentally changing the religious content being taught. The institution has also introduced basic digital practices in attendance management and learning evaluation.

These developments indicate that technology is primarily utilized as an instructional and administrative support mechanism. Its implementation remains relatively limited, reflecting the institution's available resources and technological readiness. The adoption of digital tools has therefore not resulted in a fully digitalized curriculum but represents an initial stage of educational adaptation. The relationship between traditional learning methods and technological innovation has also been discussed in previous research. Priyatna et al. (2024) examine the integration of technology into traditional pesantren learning practices, while Listiana et al. (2023) investigate the development of a digital-based Madrasah Diniyah model. These studies provide a comparative context for understanding how Islamic educational institutions may integrate technological resources while maintaining established educational traditions.

Despite these developments, several challenges remain. Limited internet accessibility, insufficient multimedia facilities, varying levels of teachers' digital competence, and budget constraints restrict the broader implementation of educational technology. These limitations indicate that technological integration depends not only on institutional willingness but also on the availability of infrastructure, human resources, and financial support. Another important finding concerns the role of parents and the surrounding community. Community participation contributes to institutional development through financial assistance, support for educational facilities, and involvement in students' learning activities outside formal instructional hours. This support demonstrates that curriculum development is closely connected to the social environment in which the madrasah operates.

Community involvement also provides an important foundation for maintaining the institution's religious identity during curriculum adaptation. The participation of educational leaders, teachers, parents, and community members helps sustain the institutional values that shape learning practices and educational priorities. Overall, the findings suggest that curriculum innovation at Madrasah Diniyah Al Qodiri 1 Jember represents an emerging form of adaptive transformation. This process involves maintaining classical Islamic scholarship and traditional instructional practices while gradually incorporating contemporary pedagogical approaches and selected digital technologies.

The adaptive character of this transformation is reflected in three interconnected dimensions: continuity of Islamic educational traditions, gradual integration of contemporary competencies, and institutional adjustment to available resources. These dimensions demonstrate that curriculum development is shaped by both educational aspirations and the practical conditions of implementation. From a theoretical perspective, this study identifies an emerging adaptive-transformative curriculum pattern in which tradition and innovation are not necessarily competing educational orientations. Rather, they may complement each other when curriculum development is undertaken according to institutional identity, educational objectives, and technological readiness.

The proposed pattern does not imply that Madrasah Diniyah Al Qodiri 1 Jember has achieved comprehensive digital transformation. Instead, it highlights an ongoing process of curriculum adaptation characterized by the selective use of technology, preservation of Islamic scholarship, strengthening of character education, and gradual development of

contemporary competencies. These findings contribute to the discussion of curriculum innovation in Islamic education by illustrating how a pesantren-based Madrasah Diniyah negotiates the relationship between traditional learning practices and modern educational demands. The experience of Madrasah Diniyah Al Qodiri 1 Jember suggests that sustainable curriculum innovation requires a balance between institutional continuity and educational responsiveness. Consequently, the development of an adaptive-transformative curriculum should be understood as a contextual and evolving process rather than a uniform model applicable to all Islamic educational institutions. Its implementation depends on institutional characteristics, teacher readiness, community involvement, available educational resources, and the extent to which technological innovation supports established educational objectives.

CONCLUSION

The findings of this study indicate that curriculum innovation at Madrasah Diniyah Al Qodiri 1 Jember represents an emerging form of adaptive transformation that integrates traditional Islamic learning practices with contemporary educational competencies. This transformation is reflected in the continued implementation of classical Islamic scholarship through *kitab kuning*, *sorogan*, and *bandongan*, alongside the gradual introduction of digital literacy, contextual learning approaches, and character education. Rather than replacing established educational traditions, curriculum innovation seeks to strengthen their relevance in responding to the educational demands of the Society 5.0 era. The study reveals that curriculum development is implemented through three interrelated dimensions: adaptive curriculum planning, integrative learning implementation, and the strengthening of digital literacy and Islamic character education. These dimensions reflect the institution's efforts to maintain a balance between religious educational values and contemporary learning needs. The involvement of the head of the madrasah, curriculum coordinators, teachers, and other institutional stakeholders also contributes to the implementation of curriculum innovation within the pesantren-based educational environment.

Nevertheless, technological integration at Madrasah Diniyah Al Qodiri 1 Jember remains at an initial stage. The use of projectors to support *kitab kuning* instruction, basic digital attendance management, and technology-assisted learning evaluation demonstrates gradual adaptation rather than comprehensive digital transformation. Several challenges, including limited technological infrastructure, varying levels of teachers' digital competence, and financial constraints, continue to influence the scope and effectiveness of curriculum implementation. Theoretically, this study contributes to discussions on curriculum innovation in Islamic education by identifying an emerging adaptive-transformative curriculum pattern in which traditional Islamic scholarship, contemporary pedagogical approaches, digital competencies, and character formation are integrated according to institutional needs and available resources. This pattern suggests that educational modernization in Madrasah Diniyah does not necessarily require the abandonment of established learning traditions. Instead, curriculum transformation can develop progressively through the selective adoption of educational innovations that remain consistent with Islamic values and institutional identity.

This study has several limitations. As a qualitative single-case study conducted at one Madrasah Diniyah, its findings are context-specific and cannot be generalized directly to other Islamic educational institutions with different organizational, cultural, and technological characteristics. Furthermore, the study primarily examines curriculum development and implementation processes rather than measuring the effectiveness of curriculum innovation in improving students' learning outcomes or digital competencies over time. Future research is therefore recommended to conduct comparative studies across

Madrasah Diniyah institutions with different levels of technological readiness and educational resources. Further investigations may also examine the effects of technology-supported curriculum innovation on students' digital literacy, learning experiences, and character development. Practically, the findings highlight the importance of strengthening teachers' digital competencies, improving educational infrastructure, and developing flexible curriculum strategies that maintain the continuity of Islamic educational traditions while responding to contemporary educational challenges.

DECLARATION OF AI AND AI ASSISTED TECHNOLOGIES IN THE WRITING PROCESS

During the preparation of this manuscript, the authors used ChatGPT (OpenAI) to assist with language refinement, paraphrasing, and improving the clarity, coherence, and readability of the academic text. The use of this AI-assisted tool was limited to supporting the writing and editorial refinement processes and did not involve the generation or fabrication of research data, empirical findings, or conclusions. All AI-assisted outputs were critically reviewed, revised, and verified by the authors to ensure their accuracy, relevance, and consistency with the research findings. The authors retain full responsibility for the accuracy, originality, integrity, and final content of the manuscript.

AUTHOR CONTRIBUTION STATEMENT

All five authors made substantive contributions to the conception, development, and completion of this research. Author 1 contributed to conceptualization, methodology, investigation, and writing of the original draft. Author 2 was responsible for formal analysis, data interpretation, and the development of the findings and discussion. Author 3 contributed to the literature review, theoretical framework development, and writing of relevant manuscript sections. Author 4 contributed to data validation, field verification, methodological refinement, and investigation. Author 5 contributed to critical review and editing, substantive manuscript revision, and preparation of the final version. All authors critically reviewed the manuscript, approved the final version for publication, and agreed to be accountable for the accuracy and integrity of the work.

FUNDING STATEMENT

This research received no specific grant from any funding agency in the public, commercial, or not-for-profit sectors. The study was conducted independently by the authors without external financial support.

DATA AVAILABILITY STATEMENT

The datasets generated and/or analyzed during this study are not publicly available due to ethical considerations and the need to protect the privacy and confidentiality of participants at Madrasah Diniyah Al Qodiri 1 Jember. However, anonymized data may be made available by the corresponding author upon reasonable request, subject to applicable ethical requirements and institutional approval.

DECLARATION OF INTERESTS

The authors declare that they have no known financial, personal, professional, or other competing interests that could have influenced the design, conduct, analysis, interpretation, or reporting of this research.

ACKNOWLEDGMENTS

The authors would like to express their sincere gratitude to the leadership and teachers of Madrasah Diniyah Al Qodiri 1 Jember for their cooperation, institutional support, and valuable assistance throughout the research process. Special appreciation is extended to all research participants for their willingness to share their experiences, perspectives, and insights, which contributed significantly to the findings of this study. The authors also gratefully acknowledge the academic advisors and colleagues who provided constructive feedback, scholarly guidance, and valuable suggestions during the development and refinement of the manuscript.

BIBLIOGRAPHY

Agarwal, V., Verma, P., & Ferrigno, G. (2025). Education 5.0 challenges and sustainable development goals in emerging economies: A mixed-method approach. *Technology in Society*, *81*. https://doi.org/10.1016/j.techsoc.2025.102814

Alfarisi, S. (2020). Analisis pengembangan komponen kurikulum pendidikan Islam di madrasah diniyah. *Rayah Al-Islam*, *4*(2), 347–367. https://doi.org/10.37274/rais.v4i02.346

Alfiyah, N., Kawakib, A. N., Wahidmurni, & Sholeh, A. (2025). Integrating Madrasah Diniyah into Secondary Schools: A Case Study of Local Religious Curriculum in Indonesia. *Hayula: Indonesian Journal of Multidisciplinary Islamic Studies*, *9*(2), 155–176. https://doi.org/10.21009/hayula.009.02.02

Armaluddin, U. (2022). Manajemen pembelajaran dalam peningkatan mutu madrasah diniyah. *Sharia: Jurnal Kajian Islam*, *1*(1), 27–36. https://doi.org/10.59757/sharia.v1i1.3

As'ad, A., Al-Mufti, A. Y., & Natsir, M. (2021). Pengembangan model kurikulum madrasah diniyyah takmiliyah LP. Ma'arif Kab. Jepara di era 4.0. *Edudeena: Journal of Islamic Religious Education*, *5*(1). https://doi.org/10.30762/ed.v5i1.3056

Aulia, S., Syahidin, S., & Fakhruddin, A. (2026). The Influence of the Islamic Education Curriculum on Reducing Epistemological Fragmentation and Synthesizing the Islamic Weltanschauung Amid the Dichotomy of Knowledge. *Adabuna: Jurnal Pendidikan Dan Pemikiran*, *5*(2), 144–163. https://doi.org/10.38073/adabuna.v5i2.4706

Cahyaningtyas, R. D., Wardani, A. E., & Ali, M. M. (2025). Islamic Character Education in the Digital Era: A Case Study of Junior High Schools. *JISEI: Journal of Islamic Studies and Educational Innovation*, *1*(2), 172–186. https://doi.org/10.61094/jisei.v1i2.51

Fauzia, E., Zuhdi, M., & Maftuhah. (2025). Curriculum management in pesantren (Islamic boarding school) in the Society 5.0 era at Darunnajah Jakarta Islamic Boarding School. *Jurnal Islamic Education Manajemen*, *10*(2), 146–162. https://doi.org/10.15575/isema.v10i2.44315

Hakim, L. N., & Muis, A. (2023). Analisis Kebijakan Pendidikan Madrasah Diniyah. *Nusantara Journal of Islamic Studies*, *4*(1), 93–101. https://doi.org/10.54471/njis.2023.4.1.93-101

Hamdanah, H. (2024). Reform and Innovation in Islamic Boarding School Education Management: Standardization of Madrasah Diniyah Salafiyah. *Al-Tanzim: Jurnal*

Manajemen Pendidikan Islam, *8*(2), 534–548. https://doi.org/10.33650/al-tanzim.v8i2.7297

Hidayat, M. & Sukari. (2025). Relevansi kurikulum pendidikan Islam di madrasah dengan kebutuhan dunia modern. *Moral: Jurnal Kajian Pendidikan Islam*, *2*(1), 39–49. https://doi.org/10.61132/moral.v2i1.483

Huda, M. N., Zulkarnain, Ismail, S. N., & Muhammad, A. S. (2025). Pesantren Technology-Friendly: Enhancing Learning Effectiveness in The Modern Era. *Nadwa: Jurnal Pendidikan Islam*, *19*(1), 1–22. (2025). https://doi.org/10.21580/nw.2025.19.1.26173

Humairoh, F., & Saefudin, A. (2025). Relevansi kurikulum madrasah diniyah di era Society 5.0: Studi kasus Madrasah Diniyah Tarbiyatul Qur'an Ngasem Batealit Jepara. *IQRO: Journal of Islamic Education*, *8*(2), 581–595. https://doi.org/10.24256/iqro.v8i2.6927

International Commission on the Futures of Education. (2021). *Reimagining our futures together: A new social contract for education*. UNESCO. https://doi.org/10.54675/ASRB4722

Listiana, H., Muhlis, A., & J, V. K. (2023). The Development Model of the Digital-Based Madrasah â€ŽDiniyah at Islamic Boarding School Padepokan Kyai â€ŽMudrikah Kembang Kuning. *TADRIS: Jurnal Pendidikan Islam*, *18*(2), 327–344. https://doi.org/10.19105/tjpi.v18i2.10192

Maulana, D., & Nurwulan, V. (2025). The Thoughts of Kiai Hasyim Asy'ari on the Concept of Women's Education. *Adabuna: Jurnal Pendidikan Dan Pemikiran*, *4*(2), 107–122. https://doi.org/10.38073/adabuna.v4i2.2157

Miles, M. B., Huberman, A. M., & Saldana, J. (2014). *Qualitative Data Analysis: A Methods Sourcebook* (3rd ed.). SAGE Publications.

Musa, F., & Marwah. (2025). Transmisi Nilai Dan Keilmuan Kitab Kuning Di Era Digital: (Studi Etnopedagogi pada Pesantren Tradisional dan Modern di Tapanuli). *Jurnal Studi Pesantren*, *5*(2), 135–146. https://doi.org/10.35897/studipesantren.v5i2.1864

Mustafidin, A., Aliwan, Fahsin, M., Hakim, A., & Hidayatullah, M. A. (2024). Integrative curriculum innovation in responding to globalization: A case study of darul amanah islamic boarding school. *At Turots: Jurnal Pendidikan Islam*, 473–483. https://doi.org/10.51468/jpi.v7i1.887

Nasution, H. S., Basri, H., Batubara, W. W., & Mukhlasin, A. (2025). Islamic Education Teachers Strategies for Character Building Through Digital Literacy Based Islamic Values in The Society 5.0 Era. *Fitrah: Journal of Islamic Education*, *6*(1), 259–271. https://doi.org/10.53802/fitrah.v6i1.1172

Oktaviani, F. D., & Setiawati, L. (2025). Strengthening students' digital literacy for 21st-century learning in Islamic boarding schools. *Jurnal Abmas*, *25*(1), 63–78. https://doi.org/10.17509/abmas.v25i1.84688

Priyatna, S. E., Za, A. M., & Barni, M. (2024). Menyinergikan Tradisi Dan Teknologi: Optimalisasi Metode Sorogan Dan Bandongan Di Pesantren Salafiyah Melalui Media Pembelajaran Digital. *Bayan lin-Naas : Jurnal Dakwah Islam*, *8*(2), 51–71. https://doi.org/10.28944/bayanlin-naas.v8i2.1927

Sarkowi. (2022). Peningkatan mutu madrasah diniyah di era digital. *Sirajuddin: Jurnal Penelitian Dan Kajian Pendidikan Islam*, *2*(1), 72–87. https://doi.org/10.55120/sirajuddin.v2i1.1068

Suresman, E., Faqihuddin, A., Jenuri, & Abdullah, M. (2025). From sorogan to digital learning: A systematic literature network analysis of pesantren learning models. *Cogent Education*, *12*(1), 2580776. https://doi.org/10.1080/2331186X.2025.2580776

Yusgiantara, A. (2025). Inovasi kurikulum dan metode pembelajaran di era Society 5.0. *Al-Tarbiyah: Jurnal Ilmu Pendidikan Islam*, *3*(1), 237–244. https://doi.org/10.59059/al-tarbiyah.v3i1.1633

Zuhdi, M. (2006). Modernization of Indonesian Islamic schools' curricula, 1945–2003. *International Journal of Inclusive Education*, *10*(4–5), 415–427. https://doi.org/10.1080/13603110500430765