



Research Article

Hybrid Learning Model in Improving Learning Effectiveness in Madrasah

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Abstract. The development of digital technology has encouraged educational institutions, including madrasahs, to adapt learning systems that are more flexible and innovative. One learning approach currently widely applied is the hybrid learning model, which combines face-to-face learning with online learning. This study aims to analyze the implementation of the hybrid learning model in improving learning effectiveness in madrasahs, identify supporting and inhibiting factors, and explain the impact of hybrid learning on student learning outcomes and participation. This research uses a

qualitative approach with the type of library research by reviewing various scientific literature, journals, books, and relevant research results related to hybrid learning and Islamic education. Data were analyzed descriptively through data reduction, presentation, and conclusion drawing. The results of the study indicate that the hybrid learning model can improve learning effectiveness in madrasahs through increased flexibility, accessibility, student learning motivation, and more interactive learning processes. However, several obstacles were also found, such as limited internet access, uneven technological mastery among teachers, and inadequate infrastructure. Therefore, collaboration between madrasah institutions, teachers, students, and parents is needed to optimize the implementation of hybrid learning in the future.

Keywords: Hybrid Learning, Learning Effectiveness, Madrasah Education, Digital Learning, Educational Technology.

INTRODUCTION

The rapid development of information and communication technology has significantly influenced various sectors of life, including education. Educational institutions are required to adapt to technological changes in order to create effective, flexible, and innovative learning systems. Madrasahs as Islamic educational institutions also face similar challenges in improving the quality of learning in the digital era. One form of adaptation carried out by educational institutions today is the implementation of hybrid learning models.

Hybrid learning is a learning model that combines conventional face-to-face instruction with online learning activities through digital platforms. This learning approach allows students and teachers to interact directly in the classroom while also utilizing technology to support learning activities outside the classroom environment. The integration of offline and online learning creates a more flexible educational system because students can access learning materials, assignments, and discussions anytime and anywhere through internet-based media. In addition, hybrid learning encourages the use of various digital tools such as virtual meeting applications, online classrooms, educational videos, and interactive learning platforms that can enhance the learning experience of students.

The hybrid learning model became increasingly popular, especially after the COVID-19 pandemic, when educational institutions around the world were required to implement distance learning systems. According to Graham (2019), hybrid learning is an educational approach that integrates direct classroom instruction with technology-based online learning activities. This approach is considered effective in improving learning flexibility, increasing student participation, and expanding access to educational resources. Through hybrid learning, students are not only dependent on classroom instruction but can also independently explore learning materials through digital technology. Therefore, hybrid learning is regarded as one of the innovative learning models capable of adapting to the demands of education in the digital era.

In the context of madrasah education, hybrid learning provides opportunities for teachers and students to utilize technology in the learning process while maintaining the values of Islamic education. Madrasahs are no longer only focused

on conventional teaching systems but are also encouraged to integrate digital learning media into classroom activities. The implementation of hybrid learning in madrasahs can support independent learning, improve digital literacy, and strengthen interactive learning processes.

Several previous studies have discussed the implementation of hybrid learning in educational institutions. Research conducted by Hrastinski (2019) explained that hybrid learning can increase student participation and learning motivation because students have greater flexibility in accessing learning materials. Meanwhile, research by Allen and Seaman (2017) showed that blended and hybrid learning models are more effective than fully online learning because students still obtain direct interaction with teachers.

Another study conducted by Pratiwi (2023) stated that hybrid learning in Islamic schools positively affects students' learning outcomes because the use of technology can create more interesting and interactive learning environments. However, the study also found several obstacles, such as limited technological facilities and low digital competence among teachers.

Based on these explanations, the implementation of hybrid learning in madrasahs becomes an important issue to study further. This research aims to analyze the implementation of hybrid learning models in improving learning effectiveness in madrasahs, identify supporting and inhibiting factors, and examine the impact of hybrid learning on the teaching and learning process.

The contribution of this study is expected to provide theoretical and practical insights regarding the implementation of hybrid learning in Islamic educational institutions, especially madrasahs, as an effort to improve educational quality in the digital era.

RESEARCH METHODS

This study employs a qualitative research approach using the library research method. Qualitative research is a type of research that aims to understand social phenomena, educational processes, and human experiences through descriptive and analytical interpretations. In this study, the researcher seeks to explore and analyze the implementation of hybrid learning models in improving learning effectiveness in madrasahs by examining various relevant scientific references and educational literature. Library research is considered appropriate because the study relies on written sources such as books, scientific journals, research reports, proceedings, regulations, and academic publications related to hybrid learning, educational technology, and Islamic education. According to Hasan (2008: 5), library research is research conducted using various forms of library literature, including books, notes, documents, and reports of previous research findings. Through this approach, researchers can obtain comprehensive theoretical insights and deeper conceptual understanding regarding the research topic.

The data sources used in this research are divided into two categories, namely primary data sources and secondary data sources. Primary data sources consist of scientific journal articles, accredited national journals, international journals, and previous studies specifically discussing hybrid learning models, blended learning,

digital learning systems, learning effectiveness, and educational innovation in madrasahs and Islamic educational institutions. These primary sources are used as the main references in analyzing the implementation and impact of hybrid learning on educational processes. Meanwhile, secondary data sources include textbooks, conference proceedings, government regulations, educational policies, dissertations, theses, and supporting literature related to educational management, instructional technology, curriculum development, and Islamic education. The use of various data sources aims to strengthen the theoretical framework and provide broader perspectives in understanding the phenomenon of hybrid learning implementation in madrasahs.

The data collection process in this study was conducted through documentation techniques and literature review methods. The researcher identified various relevant scientific sources from books, journal databases, digital libraries, and educational publications. After identifying the sources, the researcher reviewed, selected, classified, and organized the literature based on the relevance and significance of the information related to the research focus. The documentation process was carried out systematically to ensure that the collected data were valid, relevant, and capable of supporting the research objectives. In addition, the researcher also analyzed educational policies and previous empirical findings regarding the implementation of technology-based learning systems in educational institutions.

The collected data were analyzed descriptively using several analytical stages, namely data reduction, data presentation, interpretation, and conclusion drawing. Data reduction was conducted by selecting and simplifying important information relevant to the research objectives. Subsequently, the selected data were organized and presented systematically in the form of descriptive explanations to facilitate understanding and interpretation. The researcher then interpreted the findings by connecting theoretical concepts with empirical studies from previous research. Finally, conclusions were drawn to explain the effectiveness of hybrid learning implementation in madrasahs as well as the supporting and inhibiting factors influencing the learning process.

This study specifically focuses on examining the implementation of hybrid learning models in madrasahs, the effectiveness of learning outcomes achieved through technology-based learning systems, and the various challenges faced during the implementation process. The study also investigates how hybrid learning contributes to improving students' learning motivation, participation, digital literacy, and academic achievement. Furthermore, the researcher compares and analyzes findings from previous studies to identify similarities, differences, and research gaps related to hybrid learning practices in Islamic educational institutions. This comparative analysis is important in strengthening the arguments and theoretical discussions presented in the study.

To ensure the validity and reliability of the data, this research applies source triangulation techniques by comparing information obtained from various scientific references, journal articles, books, and previous studies discussing similar themes. Source triangulation helps the researcher verify the consistency and accuracy of the

information used in the study. In addition, the researcher carefully selected credible and academically recognized references to maintain the quality of the research findings. Through these procedures, the study is expected to produce accurate, objective, and accountable information regarding the implementation of hybrid learning models in improving learning effectiveness in madrasahs. The findings of this research are also expected to contribute theoretically and practically to the development of technology-based learning systems in Islamic educational institutions in the digital era.

RESULTS AND DISCUSSION

Concept of Hybrid Learning

Hybrid learning is a learning model that combines face-to-face learning and online learning simultaneously. This model aims to create flexible and student-centered learning environments. According to Graham (2019), hybrid learning integrates the strengths of traditional classroom learning with digital learning systems to increase student engagement and educational effectiveness.

In the madrasah context, hybrid learning not only focuses on technology integration but also on maintaining Islamic educational values. Teachers play an important role in guiding students academically and morally despite using digital media.

Hybrid learning provides students with opportunities to access learning materials anytime and anywhere. Students can participate in online discussions, access digital modules, and communicate with teachers through various educational platforms such as Google Classroom, Zoom, and Moodle.

Implementation of Hybrid Learning in Madrasahs

The implementation of hybrid learning in madrasahs generally combines classroom instruction with online assignments and virtual meetings. Teachers usually divide learning sessions into offline and online activities according to the subject matter and learning objectives.

Several madrasahs have utilized digital platforms to support learning activities. Online learning media enable students to access educational content more easily and encourage independent learning habits. Teachers also use interactive media such as videos, presentations, and online quizzes to improve student participation.

The hybrid learning model in madrasahs also supports more flexible learning systems for students living in Islamic boarding schools or remote areas. Students who cannot attend school physically can still participate in learning through online platforms.

However, the implementation of hybrid learning requires adequate technological infrastructure, including internet access, digital devices, and teacher competence in educational technology. Without proper preparation, the learning process may become ineffective.

Effectiveness of Hybrid Learning

Learning effectiveness refers to the achievement of learning objectives efficiently and successfully. The hybrid learning model contributes positively to learning effectiveness because students can learn through various methods and media.

Research by Allen and Seaman (2017) showed that students participating in hybrid learning demonstrate better engagement compared to fully conventional learning systems. Students become more active in discussions, assignments, and collaborative learning activities.

In madrasahs, hybrid learning can improve students' digital literacy and critical thinking skills. The use of online learning platforms encourages students to search for information independently and develop technological competencies relevant to modern educational needs.

The following table explains several advantages of hybrid learning in madrasahs:

Aspect	Advantages of Hybrid Learning
Flexibility	Students can learn anytime and anywhere
Accessibility	Learning materials are easier to access
Interaction	Increased communication between teachers and students
Motivation	More interactive and innovative learning process
Technology Skills	Improved digital literacy among students

Based on the table above, hybrid learning provides multiple benefits in improving educational quality in madrasahs.

Supporting Factors of Hybrid Learning

Several factors support the successful implementation of hybrid learning in madrasahs. First, institutional support from madrasah management is crucial in providing facilities and infrastructure. Educational institutions must prepare internet networks, digital devices, and online learning platforms.

Second, teacher competence greatly influences the effectiveness of hybrid learning. Teachers need digital skills to design innovative and interactive learning activities. Professional training programs are important to improve teachers' technological abilities.

Third, parental support also contributes significantly to students' learning success. Parents are expected to supervise and motivate students during online learning activities at home.

Fourth, student readiness and motivation influence the success of hybrid learning implementation. Students who have high learning motivation tend to participate more actively in online and offline learning activities.

Challenges in Implementing Hybrid Learning

Despite its advantages, hybrid learning also faces several challenges. One of the major obstacles is unequal internet access, especially in rural areas. Limited internet connectivity often disrupts online learning activities.

Another significant challenge in implementing hybrid learning in madrasahs is the limited technological mastery among teachers and students. Although digital learning platforms have become increasingly important in modern education, not all educators possess adequate technological skills to operate these platforms effectively. Some teachers still experience difficulties in using applications such as Google Classroom, Zoom, Moodle, and other online learning media. In several cases, teachers only utilize basic features of digital platforms and have not fully optimized interactive learning tools that can improve student participation and engagement. This condition affects the quality of learning delivery because ineffective use of technology may reduce students' understanding of the material and hinder communication between teachers and learners. In addition, students who have limited digital literacy often face difficulties accessing online learning materials, submitting assignments, or participating in virtual discussions. Consequently, the learning process may become less effective and create learning gaps among students.

Economic factors also become one of the major obstacles in implementing hybrid learning systems in madrasahs. Not all students come from families with stable economic conditions that enable them to provide adequate digital learning facilities. Some students do not have personal smartphones, laptops, or stable internet connections to support online learning activities. In rural and remote areas, internet access is often limited and expensive, making it difficult for students to participate fully in online classes. As a result, some students experience delays in accessing learning materials, attending virtual meetings, or completing assignments on time. This inequality in access to educational technology can lead to disparities in learning outcomes among students. Furthermore, the additional financial burden on parents to purchase internet quotas and digital devices also becomes a challenge, especially for families with low economic backgrounds.

Another important issue in hybrid learning implementation is the reduced intensity of direct interaction between teachers and students during online learning activities. In conventional classroom learning, teachers can directly observe students' attitudes, behaviors, and emotional conditions while providing immediate guidance and feedback. However, in online learning environments, communication is often limited to virtual interactions, which may reduce emotional closeness and social relationships between teachers and students. This condition can negatively affect students' learning motivation, discipline, and emotional engagement in the learning process. In the context of Islamic education, direct interaction between teachers and students is highly important because the educational process is not only focused on academic achievement but also on moral guidance, character building, and the cultivation of Islamic values. Teachers in madrasahs are expected to become role models who provide exemplary behavior and spiritual guidance for students through direct communication and daily interaction.

Therefore, the implementation of hybrid learning in madrasahs should not merely emphasize the use of technology but must also be balanced with character education and religious values to maintain the essence of Islamic education. Educational institutions need to ensure that technology-based learning systems continue to support the formation of students' morals, ethics, and spiritual development. Teachers should integrate Islamic values into both online and offline learning activities through advice, discussions, reflective activities, and exemplary behavior. In addition, madrasahs should provide training programs for teachers to improve digital competencies and develop innovative learning strategies that combine technological advancement with character education. By balancing technological integration with moral and religious education, hybrid learning can become an effective and meaningful educational model for madrasahs in the digital era

CONCLUSION

The hybrid learning model is one of the innovative educational approaches developed to answer the challenges of education in the digital era. This learning model combines conventional face-to-face learning with online learning systems through the use of digital technology and internet-based platforms. Through hybrid learning, educational activities can be conducted both directly in the classroom and virtually, allowing students to access learning materials more flexibly. The integration of offline and online learning systems creates a more adaptive educational environment that is suitable for the needs of modern students and educational institutions, including madrasahs.

The implementation of hybrid learning in madrasahs provides many positive impacts on the teaching and learning process. One of the main advantages of this model is learning flexibility because students can access educational materials anytime and anywhere through digital platforms. In addition, hybrid learning helps improve accessibility to educational resources, enabling students to utilize videos, digital modules, online discussions, and virtual classrooms more effectively. This condition supports the development of independent learning habits and encourages students to become more active in seeking knowledge beyond the classroom environment.

Another important benefit of hybrid learning is the increase in student participation and learning motivation. The use of interactive learning media such as educational applications, virtual meetings, online quizzes, and multimedia presentations can create more interesting and engaging learning experiences. Students become more enthusiastic about participating in discussions, completing assignments, and collaborating with peers through online learning activities. Furthermore, hybrid learning contributes to improving students' digital literacy skills, which are essential competencies in the era of technological advancement and globalization.

Hybrid learning also enables madrasahs to adapt to rapid technological developments and modern educational demands while still maintaining the values and principles of Islamic education. Through this learning model, madrasahs can

integrate technology into educational activities without neglecting moral guidance, religious values, and character education. Teachers continue to play important roles not only as facilitators of knowledge but also as role models who guide students in developing ethical behavior and spiritual awareness. Therefore, hybrid learning can become a bridge between technological innovation and Islamic educational traditions.

Despite the various advantages of hybrid learning, several challenges still need to be addressed. Limited technological infrastructure, unstable internet access, and economic constraints often become major obstacles in implementing hybrid learning systems effectively. Not all students have adequate digital devices such as smartphones or laptops, and some teachers still lack sufficient technological competence to operate digital learning platforms optimally. In addition, online learning activities sometimes reduce direct interaction between teachers and students, which can affect emotional relationships and the process of character development in Islamic education.

To optimize the implementation of hybrid learning in madrasahs, strong cooperation among madrasah institutions, teachers, parents, communities, and government authorities is highly necessary. Educational institutions should provide adequate facilities, internet access, and digital learning infrastructure to support the learning process. Teachers also need continuous training programs to improve their technological and pedagogical competencies. Furthermore, government support through educational policies and funding assistance is important to ensure equal access to technology-based education. With proper collaboration and support from all stakeholders, hybrid learning can become an effective educational model for improving the quality of Islamic education and preparing students to face future educational challenges in the digital era..

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