



Ethical Challenges of Islam in the Digitalisation of Sharia Banking Services

Rindu Octavia Ramadhani

State Islamic University Jurai Siwo, Lampung, Indonesia

Corresponding email: rinduoktaviaa28@gmail.com

Article History:	Abstract
<p>Submitted: 3rd August, 2025</p> <p>Revised: 1st November, 2025</p> <p>Accepted: 13th November, 2025</p> <p>Published: 22nd December, 2025</p> <p>By: Journal of Islamic Digital Economics and Finance (JIDEF)</p> <p>Copyright: ©2025. Rindu Octavia Ramadhani</p>  <p>This article is licensed under the Creative Commons Attribution-Share Alike 4.0 International Licence http://creativecommons.org/licenses/by-sa/4.0/</p>	<p>Introduction: The digitisation of Islamic banking services is growing rapidly in line with technological advances and changes in customer behaviour. Digital transformation provides convenience, efficiency, and expanded access to Islamic financial services. However, digitisation also presents various ethical challenges, particularly in relation to compliance with Islamic principles such as fairness, transparency, data protection, and trustworthiness in the management of banking services.</p> <p>Objective: This study aims to examine the Islamic ethical challenges that arise in the process of digitising Islamic banking services and to analyse the application of Islamic ethical values in the operation of digital-based banking services.</p> <p>Method: This study uses a descriptive qualitative approach through a literature review. Data were obtained from scientific journals, books, regulatory documents, and reports on Islamic ethics and the digitalisation of Islamic banking. Data were analyzed using thematic analysis to identify the main ethical issues relevant to this study.</p> <p>Result: The study finds that the main ethical challenges in the digitalisation of Islamic banking include maintaining Sharia compliance in digital and automated systems, protecting customer data and privacy, ensuring transparency in digital transactions, and balancing technological efficiency with ethical accountability. The limitations of the ethical governance framework and the low level of digital literacy among some stakeholders further exacerbate these challenges.</p> <p>Implication: This study emphasises the importance of strengthening Sharia-based ethical governance, developing digital guidelines aligned with Islamic principles, and maintaining continuous oversight of the digitalisation process. These efforts are necessary to maintain public trust and ensure the sustainability of Islamic banking in the digital era.</p> <p>Keywords: Digitalisation services; Islamic banking; Islamic ethics.</p>

A. Introduction

The development of digital technology has brought about major changes in the financial services industry, including the Islamic banking sector. Digitalisation has become a strategic response to demands for efficiency, speed of service, and changes in customer behaviour, which are increasingly dependent on digital technology (Selvia et al., 2025). Services such as mobile banking, internet banking, and integration with Islamic fintech platforms have become an important part of modern Islamic banking operations. This transformation not only affects the technical aspects of services but

also fundamentally changes the interaction patterns between banks and customers (Putri et al., 2025).

In Indonesia, the digitisation of Islamic banking has accelerated significantly in recent years, in line with the push for digital financial inclusion and national financial system transformation policies. Islamic banks are required to adapt in order to remain competitive with conventional banks and other digital financial institutions. However, digitalisation in the context of Islamic banking cannot be separated from the Islamic values that form the basis of its operations, so technological innovation must go hand in hand with compliance with Islamic principles (Putri et al., 2025).

Islamic banking has specific characteristics that distinguish it from conventional banking, namely that it is based on the principles of fairness, transparency, trustworthiness, and prohibition of usury, *gharar*, and *maysir* (Asmara et al., 2025). These principles apply not only to products and contracts, but also to all operational processes, including the provision of digital services. Therefore, the digitalisation of Islamic banking cannot simply adopt existing technology, but must be adapted to Islamic ethical values (2025).

One of the main challenges in digitising Islamic banking services is maintaining consistency between technological efficiency and ethical integrity. The use of automated systems, algorithms, and artificial intelligence has the potential to increase service speed, but it also poses risks of process ambiguity, information asymmetry, and reduced human supervision (2025). From an Islamic ethical perspective, these conditions can give rise to *gharar* if customers do not clearly understand how the digital services work.

In addition, the issue of transparency is a crucial ethical aspect in digital banking services (Meirina, 2022). Digitalisation often simplifies transaction processes, but it can also obscure the complexity of contracts and terms behind the digital interface. If information is not conveyed clearly and honestly, it may violate the principles of *shidq* (honesty) and justice in Islam. Therefore, digital system and communication designs must ensure that customers obtain adequate and easily understandable information (Ichsan et al., 2024).

Data protection and customer privacy are also increasingly prominent ethical challenges in the digital age. Digital banking services involve the collection and processing of large amounts of personal data, including transaction data, identity, and customer behaviour. From an Islamic ethical perspective, customer data is a trust that must be safeguarded. Failure to protect this data not only has legal implications, but also violates the values of trust and moral responsibility of Islamic financial institutions (Nursiana, 2015).

Another ethical challenge relates to cybersecurity. Threats of hacking, data leaks, and misuse of digital systems can harm customers financially and psychologically (Hidayah et al., 2024). Islamic banks have an ethical obligation to ensure that the digital systems they use are secure and trustworthy. Digital security is not only viewed as a technical obligation, but also as part of a moral responsibility to protect the rights and interests of customers (Utami, 2024).

On the other hand, customer digital literacy is also an important issue in Islamic banking digital ethics. Not all customers have the same level of understanding of digital technology. This literacy gap could lead to injustice if digital services are not designed to be inclusive. In the context of Islamic ethics, fairness requires Islamic banks to provide services that are accessible and understandable to all segments of society, not just tech-savvy users.

Digital marketing and data-driven service personalisation also raise ethical dilemmas. Using data to offer products tailored to customer profiles can increase business effectiveness, but it can also violate ethical principles if done manipulatively or without clear consent. Islamic ethics demand honesty, openness, and respect for customers' free will in every business interaction.

In the context of governance, the digitisation of Islamic banking requires the strengthening of Sharia supervision and audit systems. The Sharia Supervisory Board (DPS) needs a solid understanding of digital technology to ensure that digital systems and processes remain aligned with Sharia principles. Without effective supervision, digital innovation risks deviating from the Islamic ethical values that define Islamic banking.

Despite facing various ethical challenges, digitalisation also offers significant opportunities for Islamic banking to increase financial inclusion and expand service reach. Digital services enable Islamic banks to reach communities in remote areas and groups that previously had difficulty accessing formal financial services. With good ethical management, digitalisation can be a means of realising the maqashid syariah, particularly in improving welfare and social justice (W et al., 2025).

However, these opportunities can only be realised if digitalisation is underpinned by a strong and integrated Islamic ethical framework. Ethics should not be viewed as an obstacle to innovation, but rather as a guideline to ensure that innovation is carried out responsibly and sustainably (Puteri et al., 2025). Therefore, an in-depth academic study is needed on the challenges of Islamic ethics in the digitalisation of Islamic banking services.

Based on this description, this research is important for systematically examining the ethical challenges that arise in the process of digitising Islamic banking. A comprehensive understanding of ethical issues is expected to form the basis for the development of policies, governance, and digital practices that are in line with Islamic values (Rialita et al., 2025). Thus, Islamic banking can utilise digital technology without compromising its ethical identity and public credibility.

B. Research Methodology

Research methods are integral to any academic study, especially when examining complex phenomena such as Islamic ethics in the digitisation of Islamic banking services. This section explains in detail the approach used in this study, including the paradigm, type of research, data collection techniques, and the analysis procedures used to ensure valid and accountable results.

This study uses a qualitative approach because its main objective is to understand the social, cultural, and ethical values underlying the practice of digitalisation in Islamic banking. This approach allows researchers to explore experiences, meanings, and Islamic ethical practices within the context of digital banking in a deep, holistic manner. The qualitative approach has been widely used in studies discussing the digitisation of financial services and ethical issues in Islamic banking services, such as in research examining the challenges of digital banking and Sharia compliance through qualitative descriptive analysis (Haerunnisa & Sugitanata, 2024).

The research paradigm is interpretative, focusing on the subjective understanding of social actors regarding the phenomenon under study. This paradigm is appropriate for studies that explore how Islamic ethical values are internalised and practised in the context of the digitalisation of Islamic banking, as described in several publications that use qualitative descriptive methods to explain the dynamics of this process. This type of research is descriptive-analytical, aiming to describe and analyse the Islamic ethical challenges identified in the digitisation of Islamic banking services. The descriptive-analytical approach was chosen because it can capture the patterns, concepts, and values that emerge in Islamic ethical practices in the digital era, as proposed in many contemporary studies that examine ethics, digitalisation, and Islamic banking.

The data sources in this study are primary and secondary. Primary data were obtained through in-depth interviews and participatory observation with key informants, including Islamic bank managers, regulators, experts in Islamic jurisprudence and ethics, and users of Islamic bank digital services. The in-depth interview approach is important for capturing the internal perspectives of actors regarding ethical practices in the digitalisation process, as implemented in qualitative research discussing ethics and the implementation of fiqh in the context of technology (Hassany, 2025).

Secondary data were collected from literature reviews of scientific journals, books, regulations, industry reports, and policy documents related to the digitisation of Islamic banking and relevant Islamic ethical principles. This literature review was conducted systematically by mapping relevant primary and secondary sources to ensure a strong theoretical and empirical foundation, as recommended in descriptive qualitative research methodologies.

The primary data collection procedure began with identifying key informants using purposive sampling criteria, namely, those with in-depth knowledge of Islamic banking digitisation and Islamic ethical issues. The purposive sampling technique was chosen because it is relevant to qualitative research that aims to obtain in-depth insights from sources who are most knowledgeable about the phenomenon being studied. Next, semi-structured interviews were conducted to allow flexibility in exploring Islamic ethical perspectives in the context of digital banking. In addition, direct observations were made of operational activities and digital systems in Islamic banking institutions to complement the interviews.

Secondary data collection was conducted through electronic literature searches of journal databases, including Google Scholar, DOAJ, and national journal portals, to identify articles relevant to the research issue. This search was conducted using keywords such as "Islamic banking digitalisation", "ethical challenges in Islamic finance", "qualitative research Islamic banking", and other related terms to ensure comprehensive literature coverage in the period 2023–2025 (Ichsan et al., 2024).

After the data has been collected, the next stage is to organise it by systematising the interview transcripts, observation notes, and identified literature. Researchers use reference management software to organise secondary sources and facilitate data analysis. Organising the data is important so that each piece of information can be mapped to themes, categories, and the relationships between variables that emerge.

Data analysis was conducted using thematic analysis, namely the process of simplifying data by identifying main themes related to Islamic ethical challenges in the digitisation of Islamic banking services. This thematic analysis included the stages of initial coding (*open coding*), category grouping (*axial coding*), and the extraction of meanings and relationships between themes that emerged from the interview data, observations, and literature. The thematic approach was chosen because it provided a systematic overview of the ethical patterns that emerged in the data.

In data analysis, researchers also use data triangulation to enhance the validity of findings, namely by comparing information obtained from interviews with observational data and existing literature. This triangulation is important to minimise bias and ensure that the conclusions drawn truly reflect the phenomena occurring in the real context and are supported by empirical evidence and valid theory.

The entire analysis process was conducted iteratively, whereby researchers continuously revised and re-examined the identified themes to gain a deep and comprehensive understanding of the ethical challenges of Islam in digitalisation. This process also involved discussions with experts in fiqh and Islamic ethics to ensure that interpretations aligned with sharia principles.

The findings of this study are then presented in a descriptive narrative that outlines the main themes, compares informants' perspectives, and examines the relationship between empirical phenomena and theoretical literature. This presentation is also accompanied by direct quotations from interviews and journal references to strengthen the analytical arguments.

To maintain the validity and reliability of the research, the researcher applied several techniques, such as *member checking* with informants to ensure that the interpretation of the data aligned with their understanding, and credibility testing through consultation with academic supervisors and research methodology experts.

Finally, this study not only focuses on describing the phenomenon but also provides practical recommendations for Islamic banking institutions in formulating ethical digital policies that are in accordance with Sharia principles based on research findings and proven literature.

C. Results and Discussion

The digitisation of Islamic banking services has become a transformative phenomenon in the Islamic finance industry. This change has been motivated by the need for operational efficiency, rising customer expectations for digital services, and increasingly fierce competition between Islamic and conventional financial institutions. A number of studies show that digitisation significantly improves access to financial services, process efficiency, and broader market penetration. In Indonesia, Islamic banking has implemented services such as mobile banking, internet banking, and Sharia-based digital wallets to meet the needs of modern customers. This aligns with findings that digitisation is an important factor in expanding Islamic financial services and promoting financial inclusion among previously underserved segments.

However, digital transformation not only has operational implications but also raises complex ethical questions. On the one hand, digital services help Islamic banks become more responsive and competitive; on the other hand, Islamic ethical challenges are becoming increasingly relevant amid the rapid digitalisation process. This transformation requires the development of an ethical framework that is in line with Sharia principles, so that technological innovation does not neglect the basic moral values in Islamic economics (Sudarmanto et al., 2024).

Islamic ethics play a central role in Islamic banking operations because the Islamic financial system is built on principles such as amanah (trust), sidiq (honesty), adl (justice), and sharia compliance. In the context of digitalisation, these principles must be upheld so that digital services do not merely pursue technical efficiency but also meet moral and spiritual demands. For example, Islamic marketing ethics in the digital age should ensure transparency of information, protect customer data, and uphold fairness in digital interactions, rather than simply exploiting algorithmic personalisation that could lead to consumer manipulation.

Research on business ethics in Islamic banking highlights that challenges arise when Islamic ethical values are tested in a digital context, as many informal rules and digital practices have not been explicitly integrated with traditional Sharia principles. This creates an urgent need to develop digital ethical guidelines that are not only based on positive law, but also in line with maqasid al-syariah (sharia objectives), which emphasise welfare, justice, and openness (Setiawan et al., 2025).

One of the main ethical challenges in the digitisation of Islamic banking services relates to customer privacy and data security. Digital banking and Islamic fintech rely on collecting large amounts of data to offer more personalised and efficient services. However, personal data is a trust that must be kept confidential. Failure to protect such data not only has the potential to violate privacy laws but also contradicts the principles of trust and moral responsibility in Islam.

Research shows that the digitisation of Islamic finance faces significant challenges in terms of electronic security and compliance with Shariah principles. Issues such as data protection, electronic transaction integrity, and the implementation of digital security standards must align with Shariah values, especially as new technologies such as the Internet of Things (IoT) and big data are

adopted in banking services.

In addition, cybersecurity is a critical focus, as digital attacks such as hacking, identity theft, and malware can cause economic losses and damage customer trust in Islamic financial institutions. Research in the context of Islamic digital transformation shows that cybersecurity threats are a global issue that requires collaboration between banks, regulators, and technology providers to build a strong defence system while maintaining the ethical values of (Fadhillah, 2025).

Sharia compliance is the main foundation of Islamic banking. The digitisation of services, including the development of applications and backend systems, must ensure that digital products and processes comply with applicable fatwas and sharia guidelines. Challenges arise when automation and digital algorithms are used to make decisions that were previously made by humans, such as in credit assessment or product recommendations.

The use of *artificial intelligence* and big algorithms in Islamic banking has raised concerns about how Sharia principles are translated into code and technical parameters. Studies on the challenges of implementing AI in Islamic banking state that regulatory and Islamic ethical considerations need greater consideration, particularly when decisions affecting customers' interests are made automatically without human oversight.

This phenomenon raises an important question: to what extent can digital systems guarantee that every transaction, recommendation, and digital interaction remains subject to the sharia principles established by the Sharia Supervisory Board (DPS)? The answer requires integration between technology and *sharia governance* to ensure that religious values remain the main foundation, even though services are carried out digitally.

Another ethical challenge is the low level of digital literacy among customers. Sharia-compliant digital banking is effective and ethical only if customers understand how digital services work, including privacy risks and the legal implications of electronic transactions. Low digital literacy can lead to misinterpretation and even misuse of digital services, which in turn can harm customers.

In addition, low literacy levels can create disparities in access to Islamic financial services. In the context of Islamic ethics, Islamic banks must anticipate this inequality in access through customer education strategies that cover both technological aspects and Islamic principles. This is important not only to increase financial inclusion but also to ensure that digital services are not discriminatory towards vulnerable or technologically illiterate groups.

Technological changes have given rise to new forms of ethical risks such as digital fraud, digital money laundering, and virtual fraud. In this context, codes of ethics play an important role in preventing the misuse of technology that could violate Sharia principles such as trustworthiness and fairness. Research examining the role of codes of ethics in preventing fraud in the era of digital transformation states that Islamic-based moral and professional guidelines are important instruments in guiding the behaviour of auditors and Sharia management in digital financial institutions.

The code of ethics is not merely a formal document; it must be integrated into the organisation's culture and the digital system itself. This includes guidelines for developing automated systems that respect privacy, maintain data integrity, and ensure that every digital decision remains within the bounds of Islamic values. The role of ethics in preventing digital fraud is increasingly important, given the complexity of digital systems and their susceptibility to manipulation without strong ethical controls.

Islamic ethics are not only about formal compliance with Sharia law but also reflect the value of religious moderation. Sharia digital finance must reflect the principle of balance (*i'tidal*), in which technology is used proportionally rather than excessively, and it avoids practices that can harm the wider community. Studies on religious moderation in digital finance emphasise the importance of principles such as transparency, inclusivity, and social justice in the development of Sharia-compliant digital financial services.

This value of religious moderation can form a strong ethical basis for developing digital technology policies for Islamic banking. This includes ensuring that algorithms do not trigger discrimination, that data is used fairly, and that digital services strengthen community welfare without causing exploitative effects. The incorporation of religious moderation values into digital systems allows Islamic banking to remain technologically relevant without compromising its spiritual values.

Sharia fintech is an important part of the Islamic digital financial ecosystem. This financial technology offers ease of transactions, peer-to-peer financing, and investment services that are in accordance with sharia principles. However, the integration of fintech must be accompanied by the internalisation of Islamic business ethics. Research on the internalisation of business ethics in Islamic fintech highlights the importance of responsibility, information transparency, fairness, and anti-violation principles such as *gharar* (*uncertainty*) and *tadlis* (*deception*) in Islamic fintech practices (Triwibowo & Sya'adi, 2025).

The incorporation of business ethics into Islamic fintech is not merely a matter of compliance with formal rules; it also entails establishing a corporate culture that respects Islamic moral values. This is reflected in honest product design, fair risk management processes, and transparent information for all parties involved. Thus, Islamic fintech can contribute to the stability and public trust in the broader Islamic financial system.

Regulators play an important role in facilitating ethical digitalisation. This includes data protection policies, digital security standards, and sharia compliance guidelines in information technology systems. Research discussing the challenges of digital banking in Indonesia notes that the alignment between technological practices and legal regulations remains an obstacle, particularly in ensuring that digital innovation complies with sharia principles and applicable national laws.

Synergy between regulators and Islamic banking institutions is key to establishing a robust ethical framework, ensuring that digitalisation is not only efficient but also fair and in line with Islamic values. Regulators can develop technical standards that accommodate Sharia principles, encourage regular digital audits, and

establish digital compliance guidelines based on Islamic moral values.

Customer trust is a key element in the success of Islamic banking. When digital services are designed without fully considering Islamic ethical principles, customer trust can erode. Conversely, when Islamic moral values serve as the basis for every stage of digitalisation—from system design to customer communication—Islamic banks can strengthen customer loyalty and ensure long-term sustainability. This shows that Islamic ethics are not merely a moral attribute, but also an important business strategy in the era of digitalisation. Studies show that financial institutions that integrate ethics into technological innovation are more likely to win public trust.

Digitalisation also brings important opportunities to expand the reach of Islamic financial services to previously underserved segments of society. For example, mobile banking and Shariah-compliant fintech services open up access to finance for rural communities and low-income groups. However, this expansion must be carried out with ethical inclusion, ensuring that digital services are accessible without discrimination, that the needs of vulnerable groups are understood, and that adequate education is provided. This principle is relevant to the *maqasid syariah*, which emphasises the overall welfare of the community.

Digital literacy and understanding of digital ethics remain major challenges in implementing Islamic banking services. Many customers do not yet understand the risks, legal implications, and ethical considerations of digital services. Islamic banks need to play an active role in consumer education, including training in the use of applications, understanding security risks, and explaining the Islamic principles underlying these digital services. This education is an integral part of a broader ethical strategy to strengthen customer awareness of their rights, obligations, and protections within the digital ecosystem.

The digitisation of Islamic banking is not only about adopting technology (Triwibowo & Adam, 2023) but also how that technology is used to reinforce Islamic principles while delivering service innovations. For example, blockchain integration can increase transaction transparency and accountability, while Islamic fintech enables Shariah-compliant microfinance for MSMEs. Research indicates that the synergy between technology and Islamic ethics can create service models that are not only efficient and secure but also aligned with religious and social values (Putra et al., 2025).

The success of ethical digitalisation is also influenced by organisational culture and leadership in Islamic banking (Putri et al., 2022; Triwibowo et al., 2024). Leadership that understands and internalises Islamic ethical values and translates them into technology policies will create organisations that are resilient to digital ethical risks. Ethically strong organisations will be better able to navigate digital challenges without compromising their moral values. This cultural change involves commitment from all stakeholders, including leaders, IT staff, and the Sharia Supervisory Board.

Based on the above discussion, several ethical recommendations can be proposed to support the responsible implementation of digitalisation in Sharia

services. First, sharia banks need to develop comprehensive, clear digital ethics guidelines grounded in sharia values. Second, regulators and sharia authorities need to work together to establish sharia compliance standards in digital systems. Third, improving customer digital literacy and ethics must be a continuous programme. Fourth, the development of a strong code of ethics and digital audits must be integrated into internal control functions. Fifth, an organisational culture that respects Islamic moral values must be the foundation of every technology strategy. These strategies will ensure that digitalisation not only improves efficiency but also strengthens trust and the sustainability of Islamic banking in the digital age (Nurcahyo et al., 2025) .

Research findings indicate that the main ethical challenges in the digitalisation of Islamic banking include customer data and privacy protection, cybersecurity, transparency of contracts and digital information, Sharia compliance in automated systems and algorithms, and gaps in customer digital literacy. These challenges are interrelated and require a comprehensive approach, not only from a technological perspective but also from governance, regulation, and organisational culture. Digitalisation without a strong ethical framework risks giving rise to elements of gharar, unfair access, and violations of the principle of amanah.

Furthermore, this study emphasises that the role of the Sharia Supervisory Board has become increasingly strategic in the digital era. The Sharia Supervisory Board is not only required to understand the aspects of muamalah fiqh but also to have adequate technological literacy to effectively supervise digital systems, algorithms, and automated processes. Strengthening digital sharia governance is an important prerequisite to ensure that sharia compliance does not stop at the normative level but is actually implemented in daily digital service practices.

From a social perspective, the digitisation of Islamic banking based on Islamic ethics has great potential to support the achievement of maqasid syariah, particularly in asset protection, social justice, and community welfare. Digital services can be a strategic way to reach community groups that were previously underserved by the formal financial system. However, this potential can only be realised if Islamic banks actively address the digital literacy gap and design services that are inclusive and easy to understand for all levels of society.

Based on the overall analysis, it can be concluded that Islamic ethics should not be positioned as an obstacle to digital innovation, but rather as a normative and strategic guideline in ensuring the sustainability of Islamic banking digitalisation. The integration of technology, Islamic ethics, and good governance will strengthen customer trust, increase industry competitiveness, and maintain the distinctive character of Islamic banking amid global competition.

This study has practical and academic implications. In practice, the results of this study can serve as a basis for Islamic banking and regulators to formulate ethical and Sharia-compliant digital policies. Academically, this research enriches the study of Islamic ethics in the context of financial digitalisation and opens space for further empirical and quantitative research. Thus, the digitalisation of Islamic banking services is expected to not only to advance technologically, but also be ethically sound

and consistent with Islamic values.

D. Conclusion

The digitisation of Islamic banking services is inevitable given technological developments and changes in customer behaviour in the digital economy. This transformation has significantly improved operational efficiency, expanded access to financial services, and promoted Islamic financial inclusion, particularly in countries with large Muslim populations, such as Indonesia. However, the results of this study show that the digitisation of Islamic banking not only presents opportunities but also raises complex and multidimensional ethical challenges.

This study confirms that Islamic ethics play a central role in maintaining public identity and trust in Islamic banking amid the wave of digitalisation. Basic principles such as trustworthiness, honesty, fairness, transparency, and compliance with Sharia law must remain the main foundation of every digital innovation. Without strengthening Islamic ethics, digitalisation risks shifting Islamic banking's orientation toward mere technical efficiency and profitability, which could ultimately erode the moral and spiritual values that distinguish it from conventional banking.

E. Bibliography

- Asmara, A. R. P. P., Adetio, R., & Sumarni, Y. (2025). Mengkaji Relevansi Etika Pemasaran Bank Syariah Di Era Marketing Digital. *Jurnal BAABU AL-ILMI: Ekonomi Dan Perbankan Syariah*, 10(2), 257–267. <https://doi.org/10.29300/ba.v10i2.8512>
- Delima, D., & Fadhillah, M. I. (2025). Perkembangan Perbankan Syariah pada Era Ekonomi Digital. *Jurnal Inovasi Manajemen, Kewirausahaan, Bisnis Dan Digital*, 2(3), 45–51. <https://doi.org/10.61132/jimakebidi.v2i3.604>
- Haerunnisa, H., & Sugitanata, A. (2024). Eksplorasi Teori Disrupsi Digital Clayton Christensen Dan Maqashid Syariah Terhadap Inovasi Perbankan Syariah Di Era Digital. *J-EBI: Jurnal Ekonomi Bisnis Islam*, 3(01). <https://doi.org/10.57210/j-ebi.v3i01.290>
- Hassany, E. E. J. P. (2025). Open Banking Meets Islamic Finance: A Qualitative Content Analysis of Sharia – Compliant Digital Inclusion. *Jurnal Magister Ekonomi Syariah*, 4(1 Juni), 758–778. <https://doi.org/10.14421/jmes.2025.041-03>
- Hidayah, N., Amanda, A., & Jahra, S. A.-. (2024). Menelaah Tantangan Bank Syariah dalam Menghadapi Perkembangan di Era Digital. *Journal of Waqf and Islamic Economic Philanthropy*, 1(3), 1–8. <https://doi.org/10.47134/wiep.v1i3.295>
- Ichsan, M., Fitriyanti, F., Setiorini, K. R., & Al-Qudah, A. M. (2024). Digitalization of Islamic Banking in Indonesia: Justification and Compliance to Sharia Principles. *Jurnal Media Hukum*, 31(2), 244–261. <https://doi.org/10.18196/jmh.v31i2.22485>
- Meirina, N. (2022). Pembaharuan Sistem Perbankan Syariah Indonesia Dalam Menghadapi Arus Ekonomi Global. *Jurnal Unpal*, 20(2), 177.

- Nurchahyo, S. A., Ferdianto, R., Arismaya, A. D., & Anis, M. (2025). Toward Sustainable Islamic Banking: The Role of FinTech, Knowledge Management, Green Banking, and Sharia Compliance. *Economica: Jurnal Ekonomi Islam*, 16(1), 91–118. <https://doi.org/10.21580/economica.2025.16.1.23752>
- Nursiana, A. (2015). Pengaruh Internet Banking, Kualitas Layanan, Reputasi Produk, Lokasi, Terhadap Loyalitas Nasabah Dengan Intermediasi Kepuasan Nasabah. *Jurnal Keuangan Dan Perbankan*, 19(3), 450–462. <https://doi.org/10.26905/jkdp.v19i3.43>
- Puteri, A. H., Syarifah, N., & Arlina, A. S. (2025). Peluang & Tantangan Digitalisasi Ekonomi Syariah di Indonesia dalam Era Ekonomi Digital. *SANTRI : Jurnal Ekonomi Dan Keuangan Islam*, 3(3), 295–310. <https://doi.org/10.61132/santri.v3i3.1654>
- Putra, W. S., Yulita, S., & Hastomo, H. (2025). Opportunities and Challenges of Islamic Banking in Digital Transformation. *Al-Muwazanah: Indonesian Journal of Islamic Economics*, 1(1), 26–38.
- Putri, C. A., Fasa, M. I., Suharto, & Fachri, A. (2022). Inovasi Green Banking pada Layanan Perbankan Syari'ah. *Mutanaqishah: Journal of Islamic Banking*, 2(2), Article 2. <https://doi.org/10.54045/mutanaqishah.v2i2.402>
- Putri, T. A., Bahrudin, M., & Fitri, A. O. (2025). Strategi Digitalisasi terhadap Bank Syariah untuk Meningkatkan Daya Saing. *Jurnal Bersama Ilmu Ekonomi (EKONOM)*, 1(2), 146–153. <https://doi.org/10.55123/ekonom.v1i2.191>
- Rialita, A. J., nuraeni, & Putri, M. cahya. (2025). Moderasi Beragama sebagai Prinsip Etis dalam Digital Finance Berbasis Ekonomi Syariah. *Srikandi: Journal of Islamic Economics and Banking*, 4(2), 1–13. <https://doi.org/10.25217/srikandi.v4i2.6530>
- Safriatullah, Auliadi, R., Amrullah, Nurmalawati, & Jais, M. (2025). Tantangan Implementasi AI di Perbankan Syariah: Perspektif Regulasi dan Etika | *Jurnal Ilmiah Guru Madrasah*. <https://jigm.lakaspia.org/jigm/article/view>
- Selvia, R., Sari, F. P., & Fitri, A. O. (2025). Pengembangan Layanan Perbankan Digital dalam Perbankan Syariah. *Jurnal Bersama Ilmu Ekonomi (EKONOM)*, 1(2), 103–110. <https://doi.org/10.55123/ekonom.v1i2.111>
- Setiawan, J., Faturrahman, R., & Sarpini, S. (2025). Penerapan Etika Bisnis di Industri Perbankan Syariah: Tantangan dan Peluang. *Wawasan : Jurnal Ilmu Manajemen, Ekonomi Dan Kewirausahaan*, 3(1), 187–196. <https://doi.org/10.58192/wawasan.v3i1.2872>
- Sudarmanto, E., Yuliana, I., Wahyuni, N., Yusuf, S. R., & Zaki, A. (2024). Transformasi Digital dalam Keuangan Islam: Peluang dan Tantangan. *Jurnal Ilmiah Ekonomi Islam*, 10(1), 645–655. <https://doi.org/10.29040/jiei.v10i1.11628>
- Triwibowo, A., & Adam, M. A. (2023). Etika Bisnis Islam Dalam Praktek Bisnis Di Era Digital Ekonomi. *Margin: Jurnal Bisnis Islam Dan Perbankan Syariah*, 24–36. <https://doi.org/10.58561/margin.v2i1.65>
- Triwibowo, A., Baidhowi, M. M., & Nita, V. A. (2024). Strategi Pemasaran Bank Aman Syariah Dalam Menarik Minat Nasabah Tabungan Haji Mabrur (Tajimabrur).

Al-Intaj : Jurnal Ekonomi Dan Perbankan Syariah, 10(1), 14.

<https://doi.org/10.29300/aij.v10i1.2381>

Triwibowo, A., & Sya'adi, N. (2025). The Role of Service Quality in Increasing Interest in Using Islamic Mobile Banking in the Digital Era. *Journal of Islamic Digital Economic and Finance*, 1(01), Article 01.

<https://doi.org/10.2711/jidef.v1i01.87>

Utami, N. (2024). Transformasi Digital Usaha Mikro Mendukung Ekonomi Digital. *JPEK (Jurnal Pendidikan Ekonomi Dan Kewirausahaan)*, 8(3).

<https://doi.org/10.29408/jpek.v8i3.25796>

W, M., M, Maharani, & M, Masyhuri. (2025). Peran Kode Etik Dalam Mencegah Fraud di Era Transformasi Digital Pada Lembaga Keuangan Syariah di Indonesia. *Journal of Sharia Economics Scholar (JoSES)*, 3(1).

<https://doi.org/10.5281/zenodo.15489620>