Al-Tijary
Jurnal Ekonomi dan Bisnis Islam

2026, vol. 11, no. 2, Hal. 225 – 249

P-ISSN: 2460-9404; E-ISSN: 2460-9412
doi:http://dx.doi.org/10.21093/at.v11i2.12613

Determinants of Islamic Financial Inclusion in East Kalimantan: Evidence from a Mixed Methods Study

Isna Yuningsih
(Universitas Mulawarman, Samarinda, Indonesia)
isnayuningsih@feb.unmul.ac.id

Muh Shadiqul Fajri
(Universitas Mulawarman, Samarinda, Indonesia)
muhshadiqul@feb.unmul.ac.id

Nuzulia*
(Universitas Mulawarman, Samarinda, Indonesia)
correspondent author nuzulia@feb.unmul.ac.id

Abstract

Islamic financial inclusion remains a challenge in Indonesia, particularly in regions where access, financial literacy, and public confidence in Islamic financial services vary across communities. This study investigates the factors associated with Islamic financial inclusion across the ten regencies and cities of East Kalimantan, Indonesia, with particular attention to Islamic fintech, trust in Islamic financial institutions, Islamic financial literacy, and attitudes toward Islamic financial services. A sequential explanatory mixed-methods design was adopted. The quantitative phase involved 160 productive-age respondents, with the data analysed using Partial Least Squares Structural Equation Modeling (PLS-SEM). This analysis was subsequently complemented by qualitative interviews with representatives of Islamic financial institutions and academia. The results indicate that Islamic fintech has significant effects on both attitudes toward Islamic financial services and Islamic financial inclusion. Trust and Islamic financial literacy significantly influence attitudes but do not have significant direct effects on Islamic financial inclusion. The findings further indicate that attitudes play a mediating role in the relationships between Islamic fintech, trust, Islamic financial literacy, and Islamic financial inclusion. Qualitative evidence highlights digital accessibility, service convenience, and institutional credibility as important factors supporting the adoption of Islamic financial services. At the same time, limited understanding of Islamic financial products, unequal access, and insufficient practical financial experience remain important barriers. These findings suggest that expanding Islamic financial inclusion requires an integrated approach that combines digital financial innovation, stronger institutional trust, improved financial literacy, and wider access to Sharia-compliant financial services.

Keywords: *Attitude, Financial Inclusion, Islamic Fintech, Islamic Literacy, Trust.*

**Corresponding author*

INTRODUCTION

Over the past 20 years, financial inclusion has been a significant part of the global development agenda. In general, it refers to the accessibility and availability of formal financial services for people and companies in various societal groups (Bank, 2023). Financial inclusion encompasses more than physical access; it also refers to people's capacity to access and use reasonably priced, safe, suitable financial products that are provided in an ethical and sustainable way. Payments, savings, finance, and insurance are all included in these services (Pandey et al., 2022). Islamic financial inclusion provides a unique opportunity to increase access to financial services while upholding sharia principles within this larger objective. Its advancement is thought to be pertinent to advancing more equitable welfare and bolstering economic.

Islamic financial inclusion provides a unique opportunity to increase access to financial services while upholding sharia principles within this larger objective. Its advancement is thought to be important for boosting economic resilience and advancing more equitable wellbeing. According to other studies (Novreska & Arundina, 2024); (Valdebenito & Pino, 2022); (Ahmed & Salleh, 2016), increased access to Islamic financial services has been linked to advances in human development, poverty alleviation, and financial system stability. But the mere fact that Islamic financial solutions are available does not ensure that they will be used effectively. The degree to which communities are willing and able to employ these services is also influenced by public trust and adequate understanding of Islamic financial concepts (Damra et al., 2023).

In this situation, financial literacy plays a crucial role. Improved knowledge of financial ideas and products can help lower-income populations become more economically empowered and promote more positive perceptions of Islamic financial services (Njanike & Mpofu, 2024). At the same time, Islamic fintech has emerged as a different avenue for expanding financial access due to the quick advancement of technology (Damra et al., 2023). Digital financial platforms can help reach those who have historically had trouble accessing traditional financial institutions, overcome geographical restrictions, and streamline service delivery. As a result, the availability of financial institutions is only one aspect of the growth of Islamic financial inclusion; other factors include the relationship between knowledge, trust, technology, and personal attitudes.

Indonesia still has a significant gap in Islamic financial inclusion and literacy despite these opportunities. The Islamic financial literacy index was 39.11%, significantly lower than the national financial literacy rate of 65.43%, according to data from the Financial Services Authority (OJK, 2024). The Islamic financial inclusion percentage was just 12.88%, whereas the national financial inclusion rate was 75.02%, indicating a comparable discrepancy. These numbers show that equivalent levels of community participation and utilization have not yet coincided with the growth of Islamic financial institutions. Inadequate financial education, a lack of trust, and a lack of awareness continue to be obstacles that could prevent Islamic financial services from being widely adopted (Bouzekouk & Mansor, 2026; Fitria, 2025; Suaidi, 2025).

The issue is especially pertinent in East Kalimantan, where disparities in access and financial literacy among populations may affect the use of Islamic financial services (Anwar & Adhimursandi, 2026; Azqia et al., 2024; Priyandono et al., 2025). Variations in the socioeconomic and physical features of the region may influence financial access, according to reports from BPS and Bank Indonesia personnel in East Kalimantan. Furthermore, the comparatively low use of Islamic financial services in East Kalimantan is linked to low levels of trust, a lack of focused financial education, and a lack of public awareness of Islamic financial products (Mona hayati et al., 2022). These circumstances imply that improving Islamic financial inclusion in the province requires understanding both the broader institutional framework in which financial services are offered and individual-level characteristics.

The existing literature, however, leaves several issues unresolved. First, many previous studies have examined Islamic financial inclusion within particular cities, districts, or population groups, resulting in evidence that may not fully capture the dynamics of inclusion at the regional level (Hidayat et al., 2024; Kadir et al., 2025; Mungar-Jackpersad et al., 2025; Pratiwi, 2024; Wen et al., 2024). Second, research in this area has largely relied on quantitative methods, while qualitative insights from Islamic financial institutions and other relevant stakeholders have received comparatively less attention. Such insights are important for explaining why statistical relationships occur and how institutional practices may influence financial inclusion. Third, although Islamic financial literacy, trust, and Islamic fintech have been examined as factors associated with financial inclusion, less attention has been given to the role of attitudes toward Islamic financial services as a mechanism through which these factors may translate into actual inclusion outcomes. Moreover, empirical evidence from East Kalimantan remains relatively limited, despite the province's growing economic significance and its strategic position in relation to Indonesia's new capital city.

Addressing these gaps, this study investigates the effects of Islamic financial literacy, trust in Islamic financial institutions, and Islamic fintech on Islamic financial inclusion, while examining attitudes toward Islamic financial services as a mediating mechanism. The study offers three main contributions. First, it provides evidence covering the ten regencies and cities of East Kalimantan, thereby extending the geographical scope of existing research. Second, it brings together Islamic financial literacy, trust, and Islamic fintech within a behavioural framework that considers attitudes toward Islamic financial services as a mediating factor. Third, the study adopts a mixed-methods design by combining PLS-SEM with interviews involving relevant Islamic financial institutions and stakeholders. This design enables the quantitative relationships to be complemented by contextual explanations regarding the institutional and behavioural factors that shape Islamic financial inclusion in the region.

The qualitative component is particularly relevant because the determinants of Islamic financial inclusion may extend beyond individual characteristics captured through survey responses. The policies of Islamic financial institutions, the quality of services provided, financial education initiatives, and practitioners' perceptions may help explain the mechanisms behind the quantitative relationships identified in the study. Accordingly, interviews were conducted with selected institutions and stakeholders in East Kalimantan, including Bank Kaltimtara Syariah, Islamic Pawnshop, the Kita Bersama Zakat Institution, and Unikarta. The qualitative findings are used to contextualise and validate the quantitative results while providing additional insight into the institutional and regional factors that may facilitate or constrain Islamic financial inclusion in East Kalimantan.

LITERATURE REVIEW

Islamic Financial Inclusion

Islamic financial inclusion can be understood as the extent to which individuals and businesses are able to access and utilise formal financial products and services that operate in accordance with Islamic principles. The concept extends beyond the physical availability of financial institutions because it also considers whether financial services are accessible, affordable, appropriate, and consistent with Sharia requirements. In this regard, Islamic financial inclusion distinguishes itself from conventional financial inclusion by incorporating ethical and religious considerations into financial transactions. Activities involving riba (interest), gharar (excessive uncertainty), and maysir (gambling) are prohibited, while principles such as fairness, transparency, and risk-sharing are emphasised. Through these characteristics, Islamic financial inclusion has the potential to contribute to broader economic participation, poverty reduction, and social welfare (OJK., 2017; Cahyani & Al Mu’arrifin., 2024).

Households and businesses can engage in vital economic activities including saving, investing, financing, and risk management when they have access to the right financial services. Thus, increased economic involvement, more fair income distribution, and sustainable economic development have all been linked to financial inclusion (Suseno & Fitriyani, 2018; Saha & Qin, 2023; Damayanthi, 2024). A variety of tools, such as Islamic banking, Islamic microfinance, zakat, waqf, and Islamic fintech, can help advance the inclusion goal within the Islamic financial system. These tools offer several ways for people and communities to access financial services while upholding Islamic moral standards. Therefore, Islamic financial inclusion is a crucial element of inclusive development, especially in nations where Islamic finance plays a significant role in the financial system.

Islamic Financial Technology (Islamic Fintech)

Islamic fintech uses technological advancements to provide financial services and products that adhere to Islamic standards. Peer-to-peer financing, crowdsourcing, digital payments, and other technology-enabled financial solutions are just a few of the services that financial institutions have been able to offer because of digital technologies. While these services are comparable to traditional finance, Islamic fintech is unique in that its contracts, transactions, and products must adhere to Sharia law. Financial operations in particular are supposed to abstain from riba, gharar, and maysir while upholding ethics, fairness, and transparency (R. Hasan et al., 2020). Technological innovation has substantially changed the way financial services are delivered. Digital platforms can lower transaction costs, improve operational efficiency, and make financial services more accessible to groups that have traditionally been underserved by formal financial institutions (Yang et al., 2017; Gomber et al., 2017). In Indonesia, the development of Islamic fintech has also been supported by regulatory and Sharia frameworks, including DSN-MUI Fatwa No. 117/DSN-MUI/II/2018 and Financial Services Authority Regulation (POJK) No. 77/2016. These regulatory arrangements provide a framework for technology-based financing activities and may contribute to greater certainty regarding the implementation of Sharia-compliant financial services (Aulia et al., 2020; Nurlaela et al., 2020) By combining digital accessibility with Sharia compliance, Islamic fintech has the potential to reduce geographical constraints and facilitate broader participation in the Islamic financial system.

Islamic Financial Literacy

The ability to comprehend, assess, and make financial decisions in line with Islamic principles is known as Islamic financial literacy. In addition to ordinary financial knowledge, the idea includes knowledge about Islamic financial products, Sharia contracts, and Islamic-compliant financial activities. Islamic financial literacy, according to the Financial Services Authority (OJK, 2022), comprises relevant knowledge, skills, and self-assurance that can influence financial attitudes and behaviors and help people make wise financial judgments. Higher levels of Islamic financial literacy typically put people in a better position to evaluate the acceptability of various financial products, differentiate between them, and comprehend the fundamentals of Islamic financial services. Adequate information may also boost trust in utilizing Sharia-compliant products and lessen misconceptions about Islamic financial institutions (Dinc et al., 2025). As a result, Islamic financial literacy can be regarded as a crucial component of financial participation since those with adequate knowledge are better able to identify the features and advantages of Islamic financial services and make wise choices about their use.

Theoretical Foundation

Three complementary theoretical stances are used in this study: the Diffusion of Innovation (DOI) theory, the Technology Acceptance Model (TAM), and the Theory of Planned Behavior (TPB). When taken as a whole, these viewpoints offer a technological and behavioral basis for comprehending how personal traits, institutional trust, and technological advancement may influence involvement in Islamic financial services. According to (Ajzen, 1991) Theory of Planned Behavior, attitude, subjective norms, and perceived behavioral control are the three main aspects that affect behavioral intention. Behavioral intention is significantly influenced by attitude, which is a person's favorable or negative assessment of a certain behavior. People who believe that Islamic financial services are practical, safe, reliable, convenient, and compliant with Sharia law may have more positive attitudes toward using them. These favorable assessments may strengthen their desire to engage in the Islamic financial system. As a result, TPB serves as the main theoretical foundation for this study's consideration of attitude toward Islamic financial services as a mediating mechanism (Andespa et al., 2026; Hamadou et al., 2025).

The Technology Acceptance Model (TAM), proposed by (Davis, 1989), offers a framework for understanding technology acceptance, while TPB explains the importance of attitudes in behavioral decision-making. According to TAM, users' assessments of a technology and their subsequent propensity to embrace it are influenced by perceived utility and perceived ease of use. Islamic fintech may be seen as beneficial when used to provide Islamic financial services because it offers greater convenience, faster transactions, wider accessibility, and potentially more effective service delivery. Users may form more positive opinions of digital Islamic financial services when they recognize these technological advantages and find the technology user-friendly. TAM thus contributes to explaining the possible connection between views on Islamic financial services and Islamic fintech (Alsmadi et al., 2024; Mahmoud et al., 2025).

The process by which inventions are embraced and spread within a social system is further explained by Rogers' Diffusion of Innovation (DOI) hypothesis. Perceptions of relative advantage, compatibility, complexity, trialability, and observability all have an impact on the adoption of innovations (Rogers & Everett, 2003). Technologies that provide obvious benefits, align with users' current requirements and attitudes, and lower participation barriers are more likely to be adopted in the financial services industry (Abbes et al., 2024; Anagreh et al., 2024). From the standpoint of Islamic finance, Islamic fintech may be an innovation that uses digital platforms to link consumers with official financial organizations. Because they can lessen reliance on physical financial infrastructure and make Islamic financial services more accessible, such innovations may be especially important for geographically dispersed people.

A comprehensive framework for comprehending the mechanisms behind Islamic financial inclusion is provided by the combination of TPB, TAM, and DOI (Alshurafat et al., 2024; Ibrahim et al., 2024; Musa et al., 2024; Sari, 2025). While trust in Islamic financial institutions may increase confidence in their integrity, security, and Sharia compliance, Islamic financial literacy may give people the information needed to assess Islamic financial products. At the same time, Islamic fintech may use technological innovation to make financial services more convenient and accessible. These elements might lead to more positive perceptions of Islamic financial services, which could promote further involvement in the Islamic financial system. This concept presents attitude as a psychological process that may link Islamic financial inclusion with Islamic fintech, trust, and Islamic financial literacy.

Empirical Gap

Previous studies have identified Islamic financial literacy, trust in Islamic financial institutions, and Islamic fintech as important determinants of Islamic financial inclusion (M. M. Ali et al., 2020; Takidah & Ka, 2021; Lumintang et al., 2024). However, these factors have largely been examined independently, with limited attention to their interaction within an integrated behavioural framework. In particular, the mediating role of attitudes toward Islamic financial services in linking literacy, trust, and Islamic fintech to financial inclusion remains underexplored (Ajzen, 1991); (Masrizal et al., 2024b); (Mukhlis et al., 2025); (Rehman & Mia, 2024); (Mahdzan & Zainudin, 2025). Moreover, the predominance of quantitative studies has provided limited insight into the institutional and contextual mechanisms underlying Islamic financial inclusion. Evidence from East Kalimantan is also scarce, despite the region's strategic significance following the development of Indonesia's new capital city (IKN) and its diverse urban-rural conditions and disparities in financial access and digital infrastructure.

To address these gaps, this study develops an integrated behavioural framework examining Islamic financial literacy, trust in Islamic financial institutions, and Islamic fintech as determinants of Islamic financial inclusion, with attitudes toward Islamic financial services as a mediating mechanism. Using a sequential explanatory mixed-methods design, the study combines PLS-SEM with in-depth interviews involving Islamic financial institutions and relevant stakeholders across all ten regencies and cities of East Kalimantan. This approach provides both empirical evidence and contextual explanations of how these factors shape Islamic financial inclusion, thereby offering a more comprehensive understanding of the behavioural mechanisms underlying financial participation in the region.

Relationship Between Variables and Hypothesis Development

The relationship between Sharia financial technology and attitudes

By improving the ease, accessibility, efficiency, and security of transactions, Islamic fintech can affect consumers' opinions of Islamic financial services. According to the Technology Acceptance Model (TAM), consumers' opinions about a technology's utility and usability are crucial in determining how they assess it (Davis, 1989). Peer-to-peer finance, crowdfunding, and digital payment systems have all shown promise in the financial sector for expanding the availability and adoption of technology-based financial services (Abdullah, 2025; Ansari et al., 2025; Laia, 2025; Tanchangya et al., 2025).

Users' perceptions of security and compliance in the context of Islamic finance may also be influenced by the regulatory and Sharia framework that governs Islamic fintech. A regulatory framework for technology-based financing activities in Indonesia is provided by DSN-MUI Fatwa No. 117/2018 and POJK No. 77/2016 (Aulia et al., 2020; Nurlaela et al., 2020). Users may have more positive opinions of Islamic financial services if they believe that Islamic fintech is both technologically beneficial and consistent with their religious beliefs.

H_1: Sharia Financial Technology has a positive and significant effect on Attitude.

The relationship between Sharia financial technology and Sharia Financial Inclusion

Sharia Fintech expands public access to formal financial services by digitising transactions, payments, and financing. Financial technology innovations have been shown to accelerate access, reduce costs, and reach East Kalimantan communities, as described by the Diffusion of Innovation theory (Pratiwi, 2024; Yovita, 2025). Sharia fintech is also considered inclusive because it can provide services without geographical barriers, while in accordance with Sharia principles (Darwiyanti & Rahmati, 2026; Noor et al., 2025). Empirical studies indicate that fintech plays a significant role in expanding access to Islamic financial services (Lumintang et al., 2024).

H_2: Sharia Financial Technology has a positive and significant effect on Sharia Financial Inclusion.

The relationship between trust in Islamic finance and attitudes

Trust is the belief that Islamic financial institutions operate with integrity, security, and comply with Sharia principles (S. N. Ali, 2025; Ishak & Hassanee, 2025). This trust provides the psychological basis for a positive attitude toward financial services. The existence of the Sharia Supervisory Board, transparency, and Sharia audit further strengthen trust and then influence attitudes (Alam et al., 2022; Dewindaru & Sari, 2022; Jaradat & Oudat, 2026).

H_3: Trust in Islamic finance has a positive and significant effect on attitudes.

The relationship between trust in Islamic financial institutions and Islamic financial inclusion

Theoretically, the use of financial services is heavily influenced by trust. However, some research has shown that trust does not always directly affect the use of financial services, particularly in places where infrastructure and technology are still necessary for accessibility (Ahmed & Salleh, 2016; Sholevar & Bachmann, 2025; van Zanden, 2023). Results from earlier studies have demonstrated that attitudes, rather than actual or incorporated beliefs, are more frequently used to affect judgments.

H_4: Trust in Islamic finance has a positive but not significant effect on Islamic Financial Inclusion

The relationship between Islamic financial literacy and attitudes

Understanding contracts, sharia principles, financial management, and the advantages of Islamic financial services are all improved by Islamic financial literacy (OJK., 2022; Dinc et al., 2025). People who are highly literate typically see Islamic financial products favorably. Prior research has demonstrated that literacy affects attitudes by improving comprehension and perception of the advantages of Islamic finance (Haris & Aligarh, 2024).

H_5: Sharia Financial Literacy has a positive and significant effect on attitudes.

The relationship Between Islamic financial literacy and Islamic financial inclusion

Literacy increases knowledge, skills, and awareness of Islamic financial products (Mahdzan et al., 2024; Masrizal et al., 2024a). However, various studies show that literacy often does not have a direct impact on inclusion due to behaviours that are actually influenced by psychological factors, such as attitudes (M. M. Ali et al., 2019; Brauer, 2024; Yeo et al., 2024).

H_6: Sharia Financial Literacy has a positive, but insignificant, effect on Sharia Financial Inclusion.

The relationship between attitudes and the inclusion of Islamic finance

According to the Theory of Planned Behavior (Ajzen, 1991), actual purpose and behavior constitute attitude. The decision to use Islamic financial services is influenced by a favorable view of the advantages, security, and adherence to Sharia. The adoption of Sharia-based financial services is influenced by attitudes, according to research (Purwanto et al., 2022; Taujiharrahman & Alfianto, 2024; Yuniati et al., 2024).

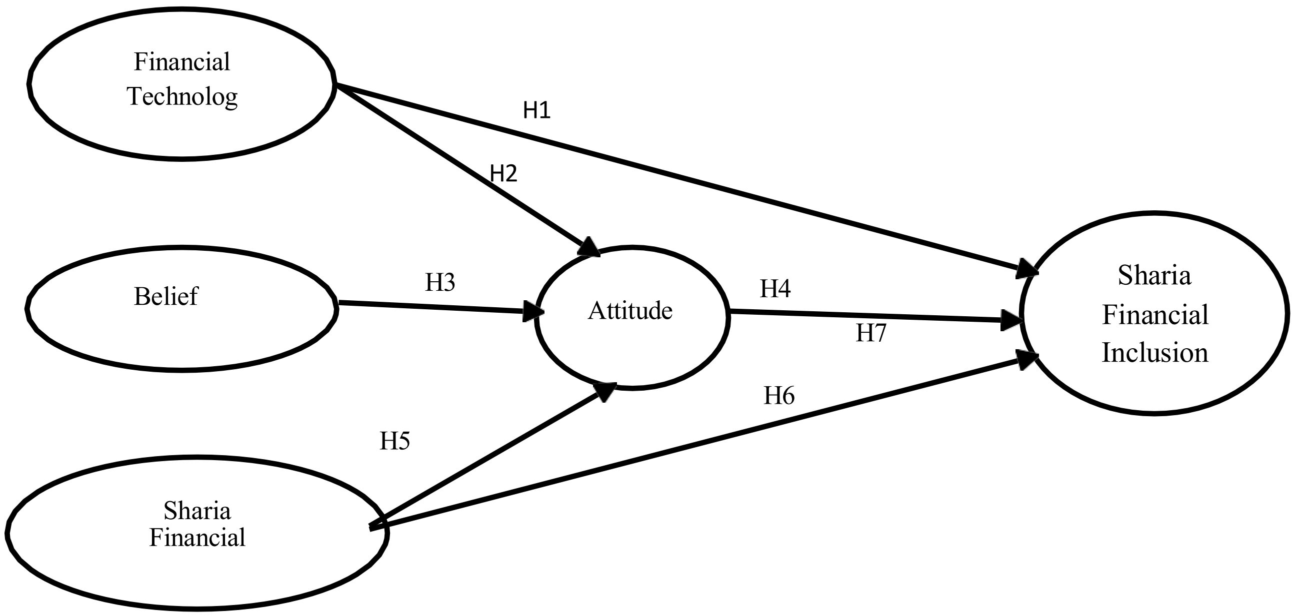
H_7: Attitudes have a positive and significant effect on Sharia Financial Inclusion.

The Role of Attitude Mediation

This research approach treats attitudes as a mediating variable that connects trust in Sharia financial inclusion, Sharia fintech, and Sharia financial literacy. According to the Theory of Planned Behavior (Ajzen, 1991), attitudes are shaped by external factors including literacy, trust, and technological access. The impact of literacy on the usage of Islamic financial products is mediated by attitude, according to research (Purwanto et al., 2022). (Taujiharrahman & Alfianto, 2024) It was discovered that positive attitudes are boosted by trust in Sharia compliance, and this has an effect on the intention to utilize Sharia financial services. According to (Yuniati et al., 2024), Islamic fintech encourages the adoption of Islamic financial services by fostering a positive attitude through perceptions of usability and convenience. As a result, attitudes are psychological processes that moderate other people's influence. The main forces behind sharia financial inclusion in East Kalimantan are trust, sharia fintech, and sharia financial literacy. The hypothesis of mediation:

H_8: Attitude of mediating the Influence of Sharia fintech on Sharia financial inclusion.
H_9: Attitude of mediating the Influence of Islamic financial literacy on Islamic financial inclusion.
H_{10}: Attitude of mediating the Influence of trust on Islamic financial inclusion.

Figure 1 presents the research framework that examines the determinants of Sharia financial inclusion in East Kalimantan, Indonesia. It shows that financial technology and belief influence attitude, which then affects Sharia financial inclusion. Sharia financial literacy also impacts both attitude and inclusion. The model, tested with a mixed-methods approach across ten administrative areas, emphasizes attitude's mediating role in these relationships.



Source : Author (2026)

Figure 1. Research Framework

METHODS

Research Area and Design

This research was conducted in East Kalimantan Province, Indonesia, encompassing ten administrative areas: Samarinda, Balikpapan, Bontang, Kutai Kartanegara, East Kutai, West Kutai, Berau, Paser, North Penajam Paser, and Mahakam Ulu. Due to the province's unique socioeconomic and demographic backdrop (Rijanta et al., 2025; Warsilah, 2023), as well as the disparities in access to Islamic financial services between urban and rural residents, East Kalimantan was chosen as the research site. Examining the role of Islamic fintech in advancing financial inclusion is also pertinent given the increasing use of digital financial services.

A quantitative phase and a qualitative phase comprised the sequential explanatory mixed-methods design (Creswell & Inoue, 2025; Takona, 2024) used in this study. 160 working-age people living in East Kalimantan's ten regencies and cities participated in a structured survey during the first phase. The purpose of the quantitative component was to investigate the connections between Islamic fintech, Islamic financial inclusion, Islamic financial literacy, trust in Islamic financial institutions, and attitude toward Islamic financial services. The analysis specifically evaluated the mediating impact of attitude toward Islamic financial services as well as the direct effects of the explanatory factors on Islamic financial inclusion and attitude.

Partial Least Squares Structural Equation Modeling (PLS-SEM) using SmartPLS was used to analyze quantitative data (Rodŕıgue et al., 2024; Suryani et al., 2024). This method was used to assess the proposed structural model and investigate the direct and indirect connections between the constructs, including the postulated mediating effects.

Qualitative Phase

A qualitative phase was carried out after the quantitative analysis to offer additional contextual understanding and interpretation of the statistical results. Selected Islamic financial institutions and pertinent East Kalimantan stakeholders, such as Bank Kaltimtara Syariah, Islamic Pawnshop, Kita Bersama Zakat Institution, Dompet Dhuafa, and Unikarta, were interviewed in-depth.

Because of their involvement in Islamic financial services, financial literacy programs, and financial inclusion initiatives in the province, the chosen institutions were deemed pertinent. The interviews covered the public's knowledge of Islamic financial services, institutional trust, the uptake of digital financial technology, the availability of Islamic financial products, and the difficulties in broadening Islamic financial inclusion.

The quantitative findings were then supplemented by the qualitative evidence. The interviews, in particular, offered institutional and contextual viewpoints that clarified the statistical connections found by the PLS-SEM research. Through this follow-up procedure, the study was able to investigate potential correlations between the variables, as well as institutional and contextual factors that could help explain the observed results.

Quantitative Sample

The quantitative analysis was based on 160 valid responses. Sample adequacy was assessed using the ten-times rule recommended by (Hair et al., 2014) which requires a minimum sample size of ten times the largest number of structural paths directed at an endogenous construct. With a maximum of four structural paths, the sample of 160 respondents exceeded the minimum requirement. However, respondents were not proportionally distributed across the ten administrative regions, with a relatively high concentration from Samarinda and younger age groups. Therefore, the findings should be interpreted in relation to the characteristics of the study sample rather than as fully representative of the entire East Kalimantan population..

Research Instrument and Measurement

The instrument comprised five latent constructs: Islamic Financial Technology, Trust in Islamic Financial Institutions, Islamic Financial Literacy, Attitude toward Islamic Financial Services, and Islamic Financial Inclusion. Measurement items were adapted from established instruments in the Islamic finance, financial technology, financial literacy, trust, and financial inclusion literature and modified for the Indonesian context (Hasan et al., 2020; M. M. Ali et al., 2020; Dinc et al., 2025). Each item was measured using a five-point Likert scale ranging from 1 ("strongly disagree") to 5 ("strongly agree"). Before the main analysis, the questionnaire was reviewed for clarity, consistency, and relevance, while redundant or overlapping items were revised or removed (Hair et al., 2014; Hair et al., 2022).

Data Analysis and Integration of Findings

PLS-SEM was used to evaluate the measurement and structural models and to assess the direct, indirect, and mediating effects among the study constructs. The quantitative and qualitative findings were integrated at the interpretation stage. While the quantitative analysis established the strength and significance of the hypothesised relationships, the qualitative evidence provided institutional and contextual explanations for the observed patterns. This sequential integration strengthened the interpretation of the findings by connecting statistical relationships with the experiences and perspectives of Islamic financial practitioners and relevant stakeholders in East Kalimantan.

The mixed-methods design enhanced the robustness of the findings by integrating statistical evidence with practitioner insights, thereby providing a comprehensive understanding of the determinants of Islamic financial inclusion in East Kalimantan.

Table 1 defines five variables for studying Sharia financial inclusion: Sharia Fintech (X1) measures technology-based Islamic services by ease, benefits, security, and compliance; Trust in Sharia Finance (X2) gauges institutional reliability and transparency; Sharia Financial Literacy (X3) assesses Islamic finance knowledge; Attitude (Z) reflects perceived benefits and willingness to use; and Sharia

Financial Inclusion (Y) tracks access and use of Islamic products, with supporting references listed.

Table 1. Operational Definitions and Variable Indicators

Variable	Operational Definition	Indicators	References
Sharia Fintech (X1)	Technology-based financial services that comply with Sharia principles and facilitate financial transactions.	Ease of use; service benefits; security; sharia compliance	(Aulia et al., 2020; R. Hasan et al., 2020; Nurlaela et al., 2020)
Trust in Sharia Finance (X2)	Public confidence in the credibility, transparency, integrity, and Sharia compliance of Islamic financial institutions.	Institutional reliability; transparency; institutional integrity; sharia compliance	(M. M. Ali et al., 2020; Mahdzan & Zainudin, 2025)
Sharia Financial Literacy (X3)	The level of knowledge, understanding, and ability to manage finances according to Sharia principles.	Basic Islamic financial knowledge; understanding of Sharia products and contracts; financial management skills; risk awareness	(Dinc et al., 2025; Haris & Aligarh, 2024; OJK, 2022b)
Attitude toward Sharia Finance (Z)	Public positive or negative evaluation of Islamic financial services.	Perceived benefits; perceived security; sharia compliance; willingness to use	(Ajzen, 1991; Purwanto et al., 2022; Taujiharrahman & Alfianto, 2024; Yuniati et al., 2024)
Sharia Financial Inclusion (Y)	The level of access, ownership, and use of Islamic financial services among the people of East Kalimantan.	Access to services; ownership of Islamic financial products; frequency of use; service benefits	(M. M. Ali et al., 2020; Cahyani & Al Mu'arrifin, 2024; Lumintang et al., 2024; OJK, 2017)

Source : compiled by author (2026)

RESULTS AND DISCUSSION

Description of Respondent Characteristics

Based on data collected from 160 Research respondents, aimed at analysing the Determinants of Sharia Financial Inclusion in East Kalimantan Province, the following description of respondent characteristics was obtained.

Table 2. Respondent Characteristics

Variable	Category	Frequency	Percentage (%)
Gender	Female	117	73.1
	Male	43	26.9
Year of Birth	Generation Z (1997–2012)	120	75.0
	Generation Y (1981–1996)	31	19.4
	Generation X (1965–1980)	9	5.6
Occupation	Student	83	51.9
	Civil Servant (ASN)	16	10.0
	Private Employee	24	15.0
	Homemaker	4	2.5
	Trader	2	1.3
	Entrepreneur	6	3.8
	State-Owned Enterprise Employee	5	3.1
	Others	20	12.5

Variable	Category	Frequency	Percentage (%)
Monthly Income	No Income	72	45.0
	< IDR 1,000,000	12	7.5
	IDR 1,000,000–2,000,000	12	7.5
	IDR 2,000,000–4,000,000	29	18.1
	IDR 4,000,000–6,000,000	19	11.9
	> IDR 6,000,000	16	10.0
Region	Samarinda	101	63.1
	Balikpapan	16	10.0
	Kutai Kartanegara	15	9.4
	Berau	8	5.0
	Kutai Timur	5	3.1
	Kutai Barat	4	2.5
	Paser	4	2.5
	North Penajam Paser	4	2.5
	Bontang	3	1.9
	Mahakam Ulu	0	0.0

Source: Authors' own analysis based on primary survey data (2026).

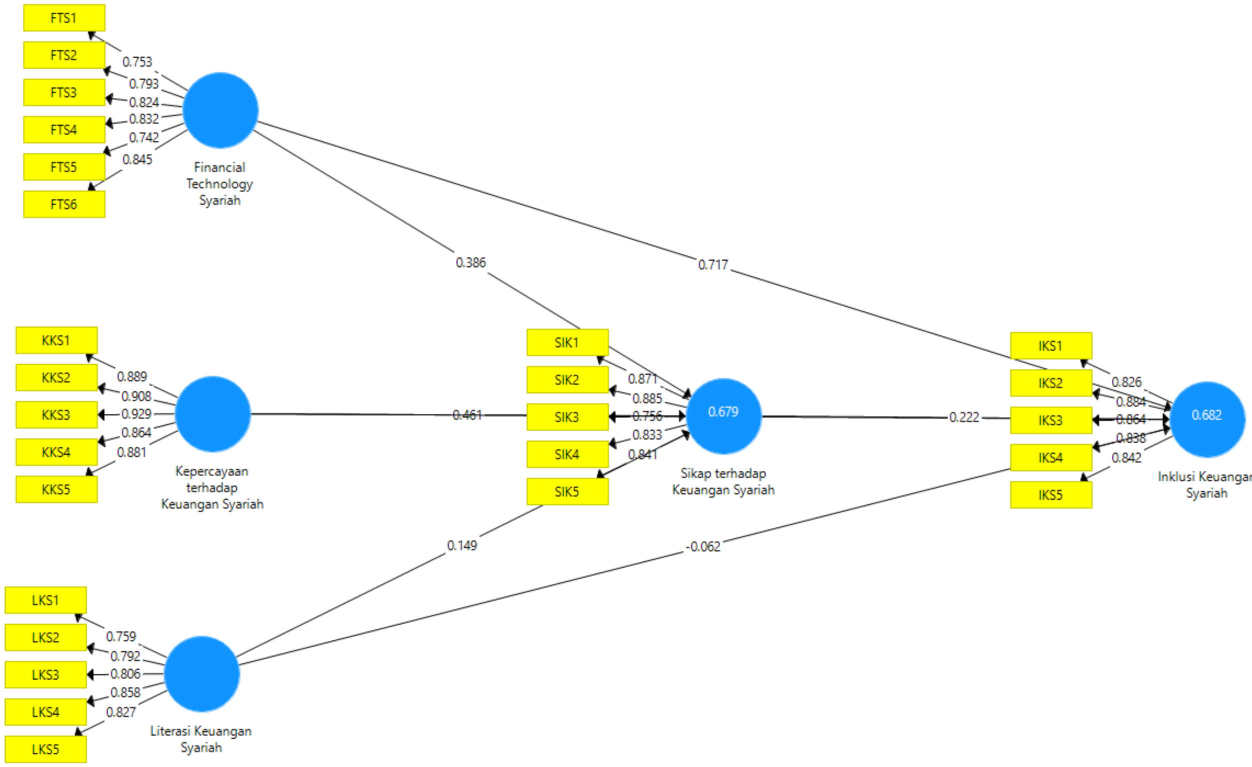
Table 2 shows the characteristics of the respondents by gender, generation, occupation, income, and residential area. Female respondents dominated the sample (117; 73%), while males accounted for 43 (27%). Generation Z was the largest group (120; 75%), followed by Generation Y (31; 19%) and Generation X (9; 6%), indicating that the sample was predominantly young and familiar with digital technology, which is relevant to the study of Islamic fintech.

By occupation, students represented the largest group (83; 52%), followed by private employees (24; 15%) and civil servants (16; 10%). Regarding income, 72 respondents (45%) had no fixed income, while 29 (18%) earned IDR 2–4 million and 19 (12%) earned IDR 4–6 million per month. This profile is consistent with the predominance of young respondents and students, whose financial capacity and experience with Islamic financial services may still be developing.

Geographically, most respondents were from Samarinda (101; 63%), followed by Balikpapan (16; 10%), while respondents from other regions accounted for smaller proportions. Overall, the sample was predominantly female, young, student-based, without fixed income, and concentrated in Samarinda. These characteristics provide important context for interpreting the findings on Islamic financial literacy, trust, attitudes, Islamic fintech, and Islamic financial inclusion in East Kalimantan.

Evaluation of Measurement Model Testing (Outer Model)

Early stages in the analysis using Partial Least Squares-Structural Equation Modelling (PLS-SEM) involve evaluating the Measurement model (outer model). This evaluation aims to assess the extent to which the indicators used represent latent constructs validly and reliably. In other words, the outer model ensures that the Research instrument developed has adequate validity and reliability before testing the relationship between the latent variables in the inner model (Hair et al., 2014).



Source : SmartPLS data processed (2026)

Figure 2. Evaluation Results of Measurement Model (Outer Model)

Figure 2 shows the results of the outer model, which describes the relationship between the latent variable and its indicators. Furthermore, the results of testing the validity and reliability of each construct are presented in the following table, indicating the extent to which the Research instrument meets the statistical criteria required in PLS-SEM.

Table 3. Model Measurement Result (Outer Model)

No	Item	Loading	Cronbach's Alpha	Composite Reliability	AVE
Sharia Financial Literacy		**0.869**	**0.904**	**0.655**	
1	I discovered that in Islamic financial operations, usury (riba), uncertainty (gharar), and gambling (maysir) are prohibited.	0.759			
2	I understand that avoiding usury (riba), uncertainty (gharar), and gambling (maysir) in financial transactions is part of complying with Sharia principles.	0.792			
3	Using Islamic financial products, in my opinion, is a component of upholding Islamic principles.	0.806			
4	I understand how to handle personal finances in accordance with Sharia law.	0.858			
5	I am aware that using products and services from Islamic financial institutions helps reduce financial risks in both the short and long term.	0.827			
Trust in Sharia Finance		**0.937**	**0.952**	**0.800**	
1	In my opinion, Islamic financial institutions handle money in accordance with Sharia law.	0.889			

No	Item	Loading	Cronbach's Alpha	Composite Reliability	AVE
2	If my money is invested or stored by an Islamic financial institution, I think it is safe.	0.908			
3	I think Islamic financial organizations provide information openly and honestly.	0.929			
4	I think Islamic financial institutions are credible and have a good reputation.	0.864			
5	In my opinion, the Sharia Supervisory Board (DPS) actively ensures that the organization complies with Sharia.	0.881			
Attitude towards Sharia Finance		**0.894**	**0.922**	**0.703**	
1	I think utilizing Islamic financial services will improve my money management.	0.871			
2	Using Islamic banking services makes me feel at ease and composed.	0.885			
3	In my opinion, Islamic financial products adhere to Islamic values.	0.756			
4	I make an effort to use Islamic financial services over the long term regularly.	0.833			
5	I would advise people to use Sharia financial services.	0.841			
Sharia Financial Technology		**0.886**	**0.914**	**0.638**	
1	I am familiar with one or more technology-based Islamic financial services, including digital waqf platforms, Islamic mobile banking, online zakat, Islamic P2P financing, and Islamic e-wallets.	0.753			
2	I make advanced use of popular technology-based Islamic financial services, such as Islamic mobile banking and Islamic e-wallets.	0.793			
3	I make use of increasingly specialized technology-based Islamic financial services, including digital waqf platforms, Islamic mobile banking, online zakat, Islamic P2P financing, and Islamic e-wallets.	0.824			
4	I believe that adopting technology-based Islamic financial services makes financial transactions quicker and more effective.	0.832			
5	I think Sharia fintech transactions are secure and compliant with Sharia law.	0.742			
6	I feel more at ease utilizing technology-based Islamic financial services than visiting a financial institution's physical location.	0.845			
Sharia Financial Inclusion		**0.905**	**0.929**	**0.724**	
1	I have a current account with one or more Islamic financial institutions, including Islamic capital markets, Islamic banks, Islamic pawnshops, Islamic insurance, BMT, and Ziswaf.	0.826			
2	I can find products and services that meet my needs from Islamic financial institutions.	0.884			
3	I can easily obtain Islamic banking services where I live.	0.864			
4	I frequently use Islamic financial services or products in my day-to-day financial dealings.	0.838			
5	The Islamic financial institution I have used so far has generally provided me with satisfactory service.	0.842			

Source: SmartPLS (data processed)

Every construct in this study satisfies the validity and reliability requirements, according to the results of the table 3 outer model test. Each indicator has a loading factor more than 0.70, indicating a strong relationship between the construct under study and each indicator. Furthermore, the Average Variance Extracted (AVE) values for every variable are greater than 0.50, indicating that each construct accounts for more than half of the variance in its indicators. Additionally, all constructs exhibit good internal consistency with Composite Reliability and Cronbach's Alpha values greater than 0.70. Thus, all constructs, namely Islamic Financial Literacy, trust in Islamic Finance, Attitude towards Islamic Finance, Islamic Financial Technology, and Islamic Financial Inclusion, are declared valid and reliable, and are suitable for testing the relationship between variables at the inner model stage.

Structural Model Testing (Inner Model)

The structural model test aims to assess whether the developed model meets the feasibility criteria (robustness) and appropriately explains the relationships among variables. The initial stage of internal model evaluation involves assessing the significance of the relationships among constructs using path coefficients. This coefficient describes the strength and direction of the hypothesised relationship between the variables. The importance of the relationship was tested using t-statistics and p-values obtained via bootstrapping.

In addition to testing the significance of the path, a model goodness-of-fit test was conducted using the R^2 values for the endogenous constructs. R^2 indicates the proportion of variance in the dependent variable explained by the independent variables, enabling assessment of the model's predictive strength. Based on the results of the analysis obtained, the evaluation of the structural model (inner model) can be explained as follows:

Model Goodness of Fit Test

The model's goodness-of-fit was assessed by examining the determination coefficients (R^2) for the endogenous constructs, namely Attitude towards Sharia Finance and Sharia Financial Inclusion. The R^2 value indicates the proportion of the endogenous variable's variation explained by the exogenous variables. According to Chin (Ghozali, 2018), the interpretation of the R^2 value of 0.67 and above is considered strong, 0.33 – 0.67 is assumed to be moderate, and 0.19 – 0.33 is considered weak.

Table 4.
R Square Value

Variabel	R Square	R Square Adjusted
Sharia Financial Inclusion	0.682	0.674
Attitude towards Sharia Finance	0.679	0.673

Source: SmartPLS data processed (2026)

Based on the table 4, the Attitude towards Sharia Finance accounted for 0.679 of the variance. This value indicates that Sharia Fintech, trust in Islamic Finance, and Sharia Financial Literacy explain 67.9% of the variation in attitudes, while variables outside the Research model account for the remaining 32.1%. This value falls within the strong category, so the attitude prediction model is optimal. Sharia Financial Inclusion has an R^2 value of 0.682. This indicates that Sharia Fintech, trust, Islamic Financial Literacy, and Attitude towards Islamic Finance explained 68.2% of the variation in Islamic financial inclusion. Additionally, this result is in the strong category, suggesting that the model's predictive power is excellent.

Overall, the R^2 values for both endogenous constructs indicate that the structural model is relatively strong, suggesting that the relationships among variables in this study have good predictive power and are suitable for drawing Research conclusions.

The hypothesis-testing stage is used to evaluate the strength and direction of relationships among variables in a structural model grounded in the Research's conceptual framework. The primary purpose of this test is to assess the extent to which independent variables, namely Sharia Financial Literacy (X1), trust in Sharia Finance (X2), and Sharia Financial Technology (X3), affect the dependent variable of Sharia Financial Inclusion (Y), either directly or through the mediating variable Attitude towards Sharia Finance

(Z). The results of the hypothesis test, including direct and indirect effects via mediating variables, are presented in the following table.

Hypothesis Testing Results

To ascertain the importance of the variables' influence in the structural model, hypothesis testing was done. Path coefficients, t-statistics, and p-values were the leading indications in the test, which was conducted using a bootstrapping process in SmartPLS. If the t-statistic value is greater than 1.96 at a 5% significance level ($p < 0.05$), the hypothesis is deemed acceptable.

Table 5. Hasil *Path Coefficient*

Hipotesis	Original Sample (O)	Sample Mean (M)	Standard Deviation (STDEV)	T Statistics (|O/STDEV|)	P Values	Information
FTS -> IKS	0.717	0.714	0.062	11.844	0.000	Signifikan
FTS -> SIK	0.386	0.394	0.080	4.445	0.000	Signifikan
KKS -> IKS	-0.051	-0.040	0.079	0.02	0.484	Insignificant
KKS -> SIK	0.461	0.441	0.086	5.377	0.000	Singnifikan
LKS -> IKS	-0.062	-0.061	0.052	1.007	0.315	Insignificant
LKS -> SIK	0.149	0.163	0.060	2.346	0.020	Singnifikan
SIK -> IKS	0.222	0.220	0.095	2.372	0.019	Singnifikan
Indirect Effect						
FTS -> SIK -> IKS	0.086	0.088	0.040	2.161	0.032	Signifikan
KKS -> SIK-> IKS	0.103	0.103	0.049	2.091	0.038	Signifikan
LKS -> SIK -> IKS	0.035	0.035	0.022	1.519	0.131	InSignifikan

Source: SmartPLS data processed (2026)

Table 5 presents the results of the hypothesis testing using SmartPLS. Sharia Financial Technology (FTS) has a positive and significant effect on Sharia Financial Inclusion (IKS) ($\beta = 0.717$, $p = 0.000$) and Attitude toward Sharia Finance (SIK) ($\beta = 0.386$, $p = 0.000$). This indicates that Islamic fintech contributes directly to financial inclusion and positively shapes public attitudes toward Islamic financial services.

Trust in Sharia Finance (KKS) does not significantly affect IKS ($\beta = -0.051$, $p = 0.484$), but has a positive and significant effect on SIK ($\beta = 0.461$, $p = 0.000$). Similarly, Sharia Financial Literacy (LKS) has no significant direct effect on IKS ($\beta = -0.062$, $p = 0.315$), but significantly and positively affects SIK ($\beta = 0.149$, $p = 0.020$). Meanwhile, SIK positively and significantly influences IKS ($\beta = 0.222$, $p = 0.019$).

The indirect effects show that SIK significantly mediates the relationships between FTS and IKS ($\beta = 0.086$, $p = 0.032$) and between KKS and IKS ($\beta = 0.103$, $p = 0.038$). However, the mediation of SIK in the relationship between LKS and IKS is not significant ($\beta = 0.035$, $p = 0.131$). Overall, Table 4 indicates that Islamic fintech is the strongest direct predictor of Islamic financial inclusion, while trust and financial literacy primarily influence inclusion through their effects on attitudes toward Islamic financial services.

Discussion

This discussion integrates quantitative results from PLS-SEM analysis and qualitative findings from interviews with four Islamic financial institutions in East Kalimantan. This integration is undertaken to deepen understanding of the mechanisms underlying relationships among model variables and to validate quantitative findings through field confirmation (explanatory follow-up).

The Influence of Sharia Fintech on People's Attitudes towards Sharia Finance

The results indicate that Sharia fintech has a positive and significant effect on attitudes toward Sharia finance ($\beta = 0.386$, $p = 0.000$). This finding suggests that greater exposure to convenient, secure, and Sharia-compliant digital financial services can foster more favourable attitudes toward Islamic financial services. The result is consistent with the Technology Acceptance Model, which explains that perceived usefulness and ease of use shape users' attitudes toward technology adoption (Davis, 1989) and with the Diffusion of Innovation theory, which emphasises the role of perceived advantages and compatibility in encouraging innovation adoption (Rogers & Everett, 2003). Previous studies also indicate that digital financial technology can improve accessibility, convenience, and acceptance of Islamic financial services (R. Hasan et al., 2020); (Aulia et al., 2020); (Lumintang et al., 2024).

The qualitative findings reinforce this relationship. Informants from Bank Kaltimtara Syariah, Pegadaian Syariah, Dompet Dhuafa, and LAZ Kita Bersama highlighted the growing use of mobile banking, QRIS, and online zakat platforms, which have improved transaction convenience, accessibility, and service efficiency. These findings suggest that digitalisation can reduce practical barriers to Islamic financial services, particularly in geographically dispersed areas such as East Kalimantan. The institutional perspectives are consistent with previous research showing that fintech can expand financial access, reduce transaction barriers, and improve service delivery (Gomber et al., 2017); (R. Hasan et al., 2020); (Yulia et al., 2024).

Overall, the findings demonstrate that Sharia fintech functions not only as a technological innovation but also as a behavioural mechanism that strengthens positive attitudes toward Islamic financial services. The significant relationship between fintech and attitudes indicates that digital convenience and accessibility may increase public acceptance of Sharia-based financial services. This finding extends previous evidence by demonstrating that, in East Kalimantan, the role of Islamic fintech is particularly relevant in shaping favourable attitudes among communities experiencing differences in financial access and digital infrastructure (Anika et al., 2023); (Lumintang et al., 2024); (Yulia et al., 2024).

The Influence of Islamic Fintech on Sharia Financial Inclusion

The results show that Islamic fintech has a positive and significant effect on Sharia financial inclusion, indicating that digital financial technology can expand access to Sharia-compliant financial services in East Kalimantan. This finding is consistent with the Diffusion of Innovation theory, which suggests that innovations offering relative advantages and reducing barriers to access are more likely to be adopted (Rogers & Everett, 2003). Digital platforms can reduce geographical and transaction barriers while improving the accessibility and convenience of Islamic financial services (R. Hasan et al., 2020); (Anika et al., 2023); (Yulia et al., 2024).

The qualitative findings reinforce this result. Representatives from Bank Kaltimtara Syariah, Pegadaian Syariah, Dompet Dhuafa, and LAZ Kita Bersama highlighted that mobile banking, QRIS, and digital zakat platforms have improved service accessibility and transaction efficiency, particularly for communities located far from physical financial institutions. These observations are consistent with previous studies showing that fintech can broaden financial service coverage, reduce transaction barriers, and facilitate access to formal financial services (Gomber et al., 2017); (R. Hasan et al., 2020); (Yulia et al., 2024).

The findings further indicate that Islamic fintech is particularly relevant in East Kalimantan, where geographical dispersion and differences in infrastructure can constrain conventional financial service delivery. By enabling financial transactions through digital platforms, Islamic fintech can complement physical financial institutions and provide more flexible access to Sharia-compliant products. This finding extends previous evidence by demonstrating that the benefits of Islamic fintech for financial inclusion are also evident in a region characterised by diverse urban and rural conditions (Anika et al., 2023); (Yulia et al., 2024); (Lumintang et al., 2024).

The Influence of Trust in Islamic Financial Institutions on Attitudes toward Islamic Financial Services

The findings demonstrate that trust in Islamic financial institutions has a positive and significant influence on attitudes toward Islamic financial services. This suggests that individuals are more likely to develop favourable attitudes when they perceive Islamic financial institutions as reliable, transparent, professionally managed, and committed to sharia principles. This finding is consistent with the Theory of Planned Behavior (Ajzen, 1991), which posits that individuals' beliefs and evaluations shape attitudes that subsequently influence behavioural intentions.

The qualitative findings reinforce this relationship. Informants from Bank Kaltimtara Syariah, Pegadaian Syariah, Dompet Dhuafa, and LAZ Kita Bersama emphasised transparency, accountability, sound financial management, and consistent adherence to sharia principles as key foundations of public trust. Academic informants from Unikarta further highlighted service quality, institutional reputation, and financial education as important factors in maintaining trust. These findings align with recent studies showing that trust, institutional credibility, and perceived compliance with Islamic principles are important determinants of consumers' acceptance and attitudes toward Islamic financial services (Sudarsono et al., 2023); (Sofyan et al., 2024); (Hoque et al., 2022).

Thus, trust primarily operates as a psychological mechanism that shapes favourable attitudes before translating into actual financial behaviour. Individuals are more likely to consider adopting Islamic financial services when they are confident that institutions operate ethically, transparently, and in accordance with sharia principles. Therefore, strengthening institutional credibility, transparency, service quality, and public financial education is essential for increasing the acceptance of Islamic finance. In the context of East Kalimantan, the findings further suggest that trust contributes to Islamic financial inclusion indirectly by fostering positive attitudes toward Islamic financial services.

The Influence of Trust in Islamic Financial Institutions on Islamic Financial Inclusion

The findings indicate that trust in Islamic financial institutions does not have a significant direct effect on Islamic financial inclusion. Although individuals may perceive Islamic financial institutions as credible, transparent, and sharia-compliant, such perceptions alone are insufficient to encourage actual adoption of Islamic financial services. Trust therefore appears to function as an important psychological foundation that requires supporting factors, such as service accessibility, perceived usefulness, affordability, and digital convenience, to translate into actual financial participation.

The qualitative findings reinforce this result. Informants from Bank Kaltimtara Syariah noted that although public trust has improved, the use of Islamic financial products remains constrained by limited digital access and the greater familiarity of conventional financial services. Similarly, Dompet Dhuafa and LAZ Kita Bersama indicated that trust facilitates participation in zakat and charitable activities but does not necessarily extend to broader Islamic financial products, including savings, financing, and digital services.

These findings are consistent with the Theory of Planned Behavior (Ajzen, 1991), which suggests that beliefs and perceptions influence behaviour primarily through attitudes and behavioural intentions. Recent studies also indicate that trust alone may not be sufficient to promote financial inclusion when accessibility, convenience, and perceived usefulness remain limited (Adel, 2024); (Muradi, 2025);

(Appiah & Venyo, 2025). Thus, strengthening institutional credibility should be accompanied by improving service accessibility, digital infrastructure, product convenience, and the practical benefits of Islamic financial services to convert public trust into actual financial inclusion.

The Influence of Islamic Financial Literacy on Attitudes toward Islamic Financial Services

The findings demonstrate that Islamic financial literacy has a positive and significant influence on attitudes toward Islamic financial services. Individuals with greater knowledge of sharia principles, including the prohibition of riba, gharar, and maysir, tend to develop more favourable perceptions of Islamic financial services. This finding supports the Theory of Planned Behavior (Ajzen, 1991), which suggests that knowledge and beliefs contribute to the formation of attitudes that subsequently influence behavioural intentions.

The qualitative findings reinforce this relationship. Informants from Bank Kaltimtara Syariah indicated that although public awareness of Islamic finance has increased, knowledge of specific products, sharia contracts, and digital financial services remains limited. Similar perspectives were expressed by Dompet Dhuafa and academic informants from Unikarta, who noted that financial education has improved understanding of Islamic principles but has not always been accompanied by sufficient practical knowledge regarding product selection and utilisation. Thus, literacy strengthens positive attitudes toward Islamic finance, but does not necessarily lead directly to service adoption.

These findings are consistent with previous research indicating that financial literacy plays an important role in shaping attitudes and behavioural intentions toward Islamic financial services (Mukhlis et al., 2025); (Rehman & Mia, 2024); (L. Khan & Arif, 2022). Recent evidence further highlights the importance of Islamic financial knowledge in strengthening consumers' awareness, confidence, and engagement with Islamic financial products (Mahdzan & Zainudin, 2025). In the East Kalimantan context, Islamic financial literacy therefore serves as an important cognitive foundation for developing favourable attitudes, while practical knowledge, accessibility, and other contextual factors remain necessary to translate these attitudes into actual participation in the Islamic financial system.

The Influence of Islamic Financial Literacy on Islamic Financial Inclusion

The findings indicate that Islamic financial literacy does not have a significant direct effect on Islamic financial inclusion. Although respondents generally understood basic concepts such as the prohibition of riba, gharar, and maysir, this knowledge did not necessarily translate into the actual use of Islamic financial services. The characteristics of the sample may explain this result, as 51.9% of respondents were students, 75% were Generation Z, and approximately 45% had no regular income. Thus, limited financial capacity and practical experience may constrain the translation of literacy into financial participation.

The qualitative findings support this interpretation. Informants from Bank Kaltimtara Syariah, Pegadaian Syariah, Dompet Dhuafa, and LAZ Kita Bersama noted that although public awareness of Islamic finance has improved, limited knowledge of specific products, digital services, and accessibility remain barriers to adoption. These findings suggest that Islamic financial literacy primarily increases awareness and understanding but requires complementary factors, including financial capability, accessibility, digital convenience, and practical experience, to promote financial inclusion. This is consistent with previous research showing that financial literacy does not automatically lead to greater financial inclusion (M. Hasan et al., 2021); (Didenko et al., 2023); (F. Khan et al., 2022). Therefore, Islamic financial inclusion requires an integrated strategy combining literacy programmes with accessible products and practical initiatives that facilitate actual service utilisation.

The Mediating Role of Attitudes in Islamic Financial Inclusion

The mediation analysis demonstrates that attitudes play a critical role in explaining how trust and Islamic fintech influence Islamic financial inclusion. Attitudes significantly mediate the effects of trust and Islamic fintech on financial inclusion, whereas the indirect effect of Islamic financial literacy through attitudes is not significant. This indicates that favourable attitudes alone are insufficient to translate financial knowledge into actual participation.

The significant mediation of trust supports the Theory of Planned Behavior (Ajzen, 1991), suggesting that beliefs and perceptions influence behaviour through attitudinal mechanisms. Individuals who perceive Islamic financial institutions as trustworthy and sharia-compliant tend to develop more favourable attitudes, which subsequently encourage financial participation. This finding reinforces previous evidence that trust, institutional credibility, and perceived sharia compliance shape consumers' acceptance of Islamic financial services (Hoque et al., 2022); (Sudarsono et al., 2023); (Sofyan et al., 2024). However, as trust has no significant direct effect on financial inclusion in this study, its impact appears to depend on the formation of positive attitudes and supporting conditions such as accessibility and service convenience.

Islamic fintech exhibits partial mediation, indicating that digital financial services contribute to financial inclusion both directly and indirectly through positive attitudes. By improving convenience, accessibility, and efficiency, fintech can strengthen acceptance while simultaneously reducing practical barriers to service utilisation. This finding is consistent with evidence that Islamic fintech expands access and functions as a behavioural enabler of financial inclusion (Anika et al., 2023); (Lumintang et al., 2024); (Yulia et al., 2024).

In contrast, the non-significant mediation of Islamic financial literacy indicates that knowledge and favourable attitudes alone are insufficient to generate actual participation. This result complements previous findings that Islamic financial literacy strengthens awareness, attitudes, and behavioural intentions (Mukhlis et al., 2025); (Rehman & Mia, 2024); (Mahdzan & Zainudin, 2025), but does not necessarily translate into financial inclusion without adequate financial capability and access (R. Hasan et al., 2020); (Didenko et al., 2023); (F. Khan et al., 2022). Overall, the findings suggest that expanding Islamic financial inclusion requires an integrated strategy combining institutional trust, digital accessibility, and financial literacy with practical conditions that enable individuals to convert positive attitudes into actual financial behaviour.

CONCLUSION

This study concludes that Islamic fintech is the strongest determinant of Islamic financial inclusion in East Kalimantan, both directly and indirectly through positive attitudes toward Islamic financial services. While trust and Islamic financial literacy strengthen favourable attitudes, they do not directly increase financial inclusion, indicating that knowledge and trust alone are insufficient without accessible digital services and practical user experience. The findings imply that policymakers, regulators, and Islamic financial institutions should prioritise expanding digital Islamic financial services, strengthening institutional credibility, and promoting practical financial literacy to improve inclusive access, particularly in underserved areas. This study also contributes to the literature by providing a mixed-method analysis that integrates behavioural and institutional perspectives on Islamic financial inclusion. However, the findings should be interpreted with caution because respondents from Samarinda, Generation Z dominated the sample, students were employed as non-probability sampling, and a limited number of institutional informants were included. Future research should use probability sampling, more representative respondent profiles, and broader stakeholder participation to enhance the generalisability of the findings.

REFERENCES

Abbes, M., Julien, A., Hao, S., & Touzani, M. (2024). Adopting digital signatures for complex financial products in the French banking sector: How technology acceptance and user literacy matter. *IEEE Transactions on Engineering Management*, *71*, 5536–5546.

Abdullah, G. I. (2025). FinTech and the Development of Crowdfunding Models in Indonesia. *Indonesian Journal of Law and Economics Review*, *20*(4), 10–21070.

Adel, N. (2024). The impact of digital literacy and technology adoption on financial inclusion in Africa , Asia , and Latin America. *Heliyon*, *10*(24), e40951. https://doi.org/10.1016/j.heliyon.2024.e40951

Ahmed, H., & Salleh, A. M. H. A. P. M. (2016). Inclusive Islamic financial planning: A conceptual framework. *International Journal of Islamic and Middle Eastern Finance and Management*, *9*(2), 170–189. https://doi.org/10.1108/IMEFM-01-2015-0006

Ajzen, I. (1991). The Theory of Planned Behavior. *Organizational Behavior and Human Decision Processes*, *50*(December), 179–211. https://doi.org/10.1016/0749-5978(91)90020-T

Alam, M. K., Rahman, M. M., Runy, M. K., Adedeji, B. S., & Hassan, M. F. (2022). The influences of Shariah governance mechanisms on Islamic banks performance and Shariah compliance quality. *Asian Journal of Accounting Research*, *7*(1), 2–16.

Ali, M. M., Devi, A., Furqani, H., & Hamzah, H. (2020). Islamic financial inclusion determinants in Indonesia: An ANP approach. *International Journal of Islamic and Middle Eastern Finance and Management*, *13*(4), 727–747. https://doi.org/10.1108/IMEFM-01-2019-0007

Ali, M. M., Sakti, M. R. P., & Devi, A. (2019). Developing an Islamic Financial Inclusion Index for Islamic Banks in Indonesia: A Cross-Province Analysis. *Journal of Islamic Monetary Economics and Finance*, *5*(4), 691–712. https://doi.org/10.21098/jimf.v5i4.1098

Ali, S. N. (2025). Building trust in Islamic fi nance products and services. *Society and Business Review*, *12*(November), 356–372. https://doi.org/10.1108/SBR-03-2017-0017

Alshurafat, H., Arabiat, O., & Shehadeh, M. (2024). The intention to adopt metaverse in Islamic banks: An integrated theoretical framework of TAM and religiosity intention model. *Journal of Islamic Marketing*. https://www.emerald.com/jima/article/doi/10.1108/JIMA-10-2023-0310/1255883

Alsmadi, A. A., Aalrawashdeh, N., Al-Gasaymeh, A., Al_hazimeh, A. M., & Alhawamdeh, L. (2024). Adoption of Islamic Fintech in lending services through prediction of behavioural intention. *Kybernetes*, *53*(6), 1921–1938.

Anagreh, S., Al-Momani, A., Maabreh, H. M. A., Sharairi, J. A., Alrfai, M. M., Haija, A. A. A., Rahahle, M. Y., Alzyoud, M., Mohammad, A. A. S., & Al-Hawary, S. I. S. (2024). Mobile Payment and Digital Financial Inclusion: A Study in Jordanian Banking Sector Using Unified Theory of Acceptance and Use of Technology. In A. M. A. Musleh Al-Sartawi, A. S. Aydiner, & M. Kanan (Eds.), *Business Analytical Capabilities and Artificial Intelligence-Enabled Analytics: Applications and Challenges in the Digital Era, Volume 1* (Vol. 1151, pp. 107–124). Springer Nature Switzerland. https://doi.org/10.1007/978-3-031-56015-6_8

Andespa, R., Md Razak, M. I., Huda, Y., & Hulwati, H. (2026). Customer perspectives on reputable and accountable Islamic finance: A behavioural intention model with a meta-analysis SEM approach. *Journal of Financial Reporting and Accounting*, *24*(2), 719–743.

Anika, R., Harahap, M. I., & Syafina, L. (2023). Journal la sociale. *Journal La Sociale*, *04*(06), 599–610. https://doi.org/10.37899/journal-la-sociale.v4i6.1418

Ansari, I., Azim, K. S., Bhujel, K., Panchal, S. S., & Ahirrao, Y. S. (2025). Fintech innovation and IT infrastructure: Business implications for financial inclusion and digital payment systems. *Emerging Frontiers Library for The American Journal of Engineering and Technology*, *7*(09), 49–73.

Anwar, H., & Adhimursandi, D. (2026). Financial Behavior Of Bank Syariah Indonesia Customers In East Kalimantan: Trust As Mediation. *Journal of Accounting Research, Utility Finance and Digital Assets*, *4*(4), 493–506.

Appiah, T., & Venyo, V. (2025). Heliyon The interplay of perceived benefit , perceived risk , and trust in Fintech adoption: Insights from Sub-Saharan Africa. *Heliyon*, *11*(2), e41992. https://doi.org/10.1016/j.heliyon.2025.e41992

Aulia, M., Yustiardhi, A. F., & Permatasari, R. O. (2020). An overview of Indonesia regulatory framework on Islamic financial technology (fintech). *Jurnal Ekonomi Dan Keuangan Islam*, *6*(1), 64–75. https://doi.org/10.20885/JEKI.vol6.iss1.art7

Azqia, H., Ali, M. M., & Nurhasanah, S. (2024). Islamic Financial Inclusion Index in Indonesia and its

Correlation to Women's Quality of Life. *Ekonomi Islam Indonesia*, *6*(1). https://www.academia.edu/download/131991467/451.pdf

Bouzekouk, S., & Mansor, F. (2026). Drivers and barriers to mass adoption of Islamic unit trust funds in Malaysia: A qualitative study. *Qualitative Research in Financial Markets*, *18*(4), 861–878.

Brauer, M. (2024). Stuck on Intergroup Attitudes: The Need to Shift Gears to Change Intergroup Behaviors. *Perspectives on Psychological Science*, *19*(1), 280–294. https://doi.org/10.1177/17456916231185775

Cahyani, R. I., & Al Mu'arrifin, S. F. (2024). Implementasi Esensi Pengelolaan Syariah dalam Mendalami Ruang Lingkup dan Prinsip-prinsip Syariah. *Jurnal Maps (Manajemen Perbankan Syariah)*, *8*(1), 63–68. https://doi.org/10.32627/maps.v8i1.981

Creswell, J. W., & Inoue, M. (2025). A process for conducting mixed methods data analysis. *Journal of General and Family Medicine*, *26*(1), 4–11. https://doi.org/10.1002/jgf2.736

Damayanthi. (2024). Financial Inclusion: Does It Play an Important Role in a Country? Review of the Literature. *Journal of Accountancy & Finance*, *11*(1), 35–57. https://doi.org/10.57075/jaf1112403

Damra, Y., Yasin, S., & Albaity, M. (2023). "Trust but verify" financial inclusion in the MENA region. *Borsa Istanbul Review*, *23*(6), 1430–1447. https://doi.org/10.1016/j.bir.2023.09.008

Darwiyanti, Y., & Rahmati, A. (2026). Sharia Fintech as an Instrument for Accelerating Financial Inclusion of Muslim Communities in the Perspective of Maqashid Sharia. *MALIA: Journal of Islamic Banking and Finance*, *10*(1), 51–60.

Davis, F. D. (1989). Perceived Usefulness, Perceived Ease of Use , and User Acceptance of Technology Information. *Management Information Systems Research Center*, *13*(3), 319–340.

Dewindaru, D., & Sari, E. (2022). Can the characteristics of the sharia supervisory board increase the trust of sharia bank customers? *Journal of Islamic Accounting and Finance Research–Vol*, *4*(1). https://www.researchgate.net/profile/Dini-Dewindaru/publication/362090355_Can_the_characteristics_of_the_sharia_supervisory_board_increase_the_trust_of_sharia_bank_customers/links/62d6333ebf4b98532233dbf9/Can-the-characteristics-of-the-sharia-supervisory-board-increase-the-trust-of-sharia-bank-customers.pdf

Didenko, I., Petrenko, K., & Pudlo, T. (2023). The role of financial literacy in ensuring financial inclusion of the population. *Financial Markets, Institutions and Risks*, *7*(2), 72–79. https://doi.org/http://doi.org/10.21272/fmir.7(2).72-79.2023

Dinc, Y., Çetin, M., Bulut, M., & Jahangir, R. (2025). Islamic fi nancial literacy scale: An amendment in the sphere of contemporary fi nancial literacy. *Islamic Financial Literacy Scale*, *13*(2), 251–263. https://doi.org/10.1108/IJIF-07-2020-0156

Fitria, T. N. (2025). Islamic banking digitalization: Challenges and opportunities in the era of industrial revolution 4.0. *Jurnal Ilmiah Ekonomi Islam*, *11*(01). https://www.jurnal.stie-aas.ac.id/index.php/jei/article/view/16855

Gomber, P., Koch, J., & Siering, M. (2017). *Digital Finance and FinTech: Current Research and Future Research Directions* (Issue January).

Hair, J. F. J., Sarstedt, M., Hopkins, L., & Kuppelwieser, V. G. (2014). Partial least squares structural equation modeling (PLS-SEM) An emerging tool in business research. *European Business Review*, *26*(February), 106–121. https://doi.org/10.1108/EBR-10-2013-0128

Hamadou, I., Hamidi, M. L., & Yumna, A. (2025). Potential customers' intention to use Islamic banking products in Cameroon: The mediating effect of attitude. *Journal of Islamic Marketing*, *16*(2), 373–401.

Haris, H., & Aligarh, F. (2024). Do Muslim Investors Consider Sharia literacy in Their Behavior When Trading Stocks? Experiences of Indonesian Stock Investors. *Jurnal Penelitian Sosial Dan Keagamaan*, *18*(1), 75–98.

Hasan, M., Le, T., & Hoque, A. (2021). How does financial literacy impact on inclusive finance? *Financial Innovation*, *7*. https://doi.org/10.1186/s40854-021-00259-9

Hasan, R., Hassan, M. K., & Aliyu, S. (2020). Fintech and Islamic Finance: Literature Review and Research Agenda. *International Journal of Islamic Economics and Finance (IJIEF)*, *1*(January), 75–94.

Hidayat, S. E., Musari, K., Masrohatin, S., & Smolo, E. (2024). *The future of Islamic finance*. https://www.emerald.com/books/edited-volume/17243/chapter/94220867

Hoque, M. N., Rahman, M. K., Said, J., & Begum, F. (2022). What Factors Influence Customer Attitudes and Mindsets towards the Use of Services and Products of Islamic Banks in Bangladesh ? *Sustainability*, *14*.

Ibrahim, M. H., Fitri, F., & Ahmad, R. S. (2024). The Role of Technology Readiness in Islamic Financial Technology Acceptance Among MSMEs: An Empirical Integration Analysis TPB and TAM Framework. *AL-MUZARA'AH-Journal of Islamic Economics & Finance*, *12*(1). https://search.ebscohost.com/login.aspx?direct=true&profile=ehost&scope=site&authtype=crawler&jrnl=23376333&AN=178957815&h=c866DPXbDeE4JvnbgqZ4ryv1K6X8lxVwfFysrutcGzAAe77WrjLz73TC0Rzqbd9jRnd%2FoE%2FFu8bnvpWqb%2BulJQ%3D%3D&crl=c

Ishak, K., & Hassanee, N. (2025). Sharia compliance sustainability with good corporate governance as intervening: Trust, service quality, and commitment. *Jurnal Akuntansi Syariah*, *9*(1), 159–179.

Jaradat, H., & Oudat, M. S. (2026). Enhancing clarity and transparency in Islamic financial practices: The role of regulatory influence. *Journal of Financial Reporting and Accounting*, *24*(2), 607–625.

Kadir, R. D., Tri Wahyudi, S., Maski, G., & Devia Sagita Sumantri, V. (2025). The role of financial inclusion in reducing household poverty: Insights from Eastern Indonesia. *Cogent Economics & Finance*, *13*(1), 2588925. https://doi.org/10.1080/23322039.2025.2588925

Khan, F., Siddiqui, M. A., & Imtiaz, S. (2022). Role of financial literacy in achieving financial inclusion: A review , synthesis and research agenda. *Cogent Business & Management*, *9*(1). https://doi.org/10.1080/23311975.2022.2034236

Khan, L., & Arif, I. (2022). Islamic Financial Literacy and Intention to Use Islamic Banking: A Role of Financial Considerations. *Journal of Finance & Economics Research*, *7*, 47–59. https://doi.org/10.20547/jfer2207104

Laia, E. (2025). The role of peer-to-peer (P2P) lending in developing countries: A systematic literature review. *International Journal of Innovation Science*. https://www.emerald.com/ijis/article-abstract/doi/10.1108/IJIS-01-2025-0036/1277154

Lumintang, J., Zuhroh, I., & Anindyntha, F. A. (2024). The Impact of Financial Inclusion and Financial Technology on Economic Growth in Indonesia. *International Journal of Economics Development Research*, *5*(1), 645–660.

Mahdzan, N. S., & Zainudin, R. (2025). Does Islamic fi nancial literacy and motives in fl uence the holdings of Islamic fi nancial products? A study on bank customers in Klang Valley , Malaysia. *Journal of Islamic Marketing*, *15*(9), 2286–2309. https://doi.org/10.1108/JIMA-05-2022-0158

Mahdzan, N. S., Zainudin, R., Wan Ahmad, W. M., & Hanifa, M. H. (2024). Does Islamic financial literacy and motives influence the holdings of Islamic financial products? A study on bank customers in Klang Valley, Malaysia. *Journal of Islamic Marketing*, *15*(9), 2286–2309.

Mahmoud, M. A., Ma'aji, M. M., Abdullahi, M. S., Karaye, A. B., & Garba, A. S. (2025). Factors influencing the Islamic Fintech acceptance: Moderating role of Islamic financial literacy. *Journal of Islamic Accounting and Business Research*. https://www.emerald.com/jiabr/article/doi/10.1108/JIABR-08-2024-0322/1255575

Masrizal, M., Sukmana, R., & Trianto, B. (2024a). The effect of Islamic financial literacy on business performance with emphasis on the role of Islamic financial inclusion: Case study in Indonesia. *Journal of Islamic Marketing*, *16*(1), 166–192.

Masrizal, Sukmana, R., & Trianto, B. (2024b). The effect of Islamic financial literacy on business performance with emphasis on the role of Islamic financial inclusion: Case study in Indonesia. *Journal of Islamic Marketing*, 166–192. https://doi.org/10.1108/JIMA-07-2022-0197

Mona hayati, Nirmala Agustina, Virda bin Jusman, Helda Indah Sari, & Gesti Wulandari. (2022). Analis Faktor Penghambat Perkembangan Perbankan Syariah Di Kalimantan Timur. *An-Nafis: Jurnal Ilmiah Keislaman Dan Kemasyarakatan*, *1*(2), 145–156. https://doi.org/10.62196/nfs.v1i2.55

Mukhlis, I., Irfanul, M., & Zain, H. (2025). Financial Behavior Dynamics of MSME Actors: A Contemporary Islamic Financial Management Study on Literacy, Attitude, Intention, Personality, and Legal Aspects. *Metro Islamic Law Review*, *4*(1), 129–155.

Mungar-Jackpersad, A., Telukdarie, A., & Tshukudu, C. (2025). Financial inclusion for economic sustainability: A systems thinking approach. *Discover Sustainability*, *6*(1), 485. https://doi.org/10.1007/s43621-025-01323-5

Muradi, M. H. R. (2025). Machine Learning-Based Consumer Behavior Prediction Models for E-Commerce Platforms: Enhancing Digital Financial Inclusion and. *1 St Global Research and Innovation Conference 2025*, (April), 2078–2118. https://doi.org/10.63125/pnz32s94

Musa, H., Ahmad, N. H. B., & Nor, A. M. (2024). Extending the Theory of Planned Behavior in financial inclusion participation model – evidence from an emerging economy. *Cogent Economics & Finance*, *12*(1), 2306536. https://doi.org/10.1080/23322039.2024.2306536

Njanike, K., & Mpofu, R. T. (2024). Factors Influencing Financial Inclusion for Social Inclusion in Selected African Countries. *Insight on Africa*, *16*(1), 93–112. https://doi.org/10.1177/09750878231194558

Noor, A., Maruf, M., Mawahib, M. Z., & Habib, M. A. (2025). Developing Inclusive Regulations for Muslim Disabled Entrepreneurs' Access to Sharia Fintech: Legal and Accessibility Perspectives. *Jurnal Ilmiah Al-Syir'ah*, *23*(1), 70–86.

Novreska, S., & Arundina, T. (2024). The Role of Islamic Financial Inclusion in Poverty, Income Inequality, and Human Development in Indonesia. *Journal of Islamic Monetary Economics and Finance*, *10*(1), 135–154. https://doi.org/10.21098/jimf.v10i1.1973

Nurlaela, N., Luthfiyana, M., Sulastri, A., & Wahyunita, E. S. (2020). Reviewing the fatwas related to fintech applications in islamic financial institutions in Indonesia. *Jurnal Ekonomi Dan Keuangan Islam*, *9*(2), 206–226. https://doi.org/10.22373/share.v9i0.7989

OJK. (2017). Surat Edaran Otoritas Jasa Keuangan Nomor 31 /Seojk.07/2017 Tentang Pelaksanaan Kegiatan Dalam Rangka Meningkatkan Inklusi Keuangan Di Sektor Jasa Keuangan. *Otoritas Jasa Keuangan (OJK)*, 9–25.

OJK. (2022a). *Edukasi Keuangan*. https://ojk.go.id/id/kanal/edukasi-dan-perlindungan-konsumen/Pages/literasi-keuangan.aspx

OJK. (2022b). *Edukasi Keuangan*. https://ojk.go.id/id/kanal/edukasi-dan-perlindungan-konsumen/Pages/literasi-keuangan.aspx

OJK. (2024). *Survei Nasional Literasi dan Inklusi Keuangan (SNLIK) 2024*. OJK. https://ojk.go.id/id/berita-dan-kegiatan/publikasi/Pages/Survei-Nasional-Literasi-dan-Inklusi-Keuangan-(SNLIK)-2024.aspx

Pandey, A., Kiran, R., & Sharma, R. K. (2022). Investigating the Impact of Financial Inclusion Drivers, Financial Literacy and Financial Initiatives in Fostering Sustainable Growth in North India. *Sustainability (Switzerland)*, *14*(17). https://doi.org/10.3390/su141711061

Pratiwi, R. (2024). *Uncovering determinants, barriers, and impacts of financial inclusion in Indonesia: Major empirical analyses and insights* [PhD Thesis, RMIT University]. https://research-repository.rmit.edu.au/articles/thesis/Uncovering_Determinants_Barriers_and_Impacts_of_Financial_Inclusion_in_Indonesia_Major_Empirical_Analyses_and_Insights/28728812

Priyandono, L., Boubekri, A., & Kharista, M. (2025). Examining Sharia Financial Literacy And Capital Access For MSME Sustainability: A Mixed-Methods Study In East Kalimantan. *AJIS: Academic Journal of Islamic Studies*, 435–450.

Purwanto, P., Dasuki, A. I., & Ghofur, A. (2022). Attitude and Behaviour Intention of Muslim Z Generation to Save in Islamic Banks: The Role of Knowledge and Religiosity. *Economica: Jurnal Ekonomi Islam*, *13*(2), 259–282. https://doi.org/10.21580/economica.2022.13.2.11519

Rehman, K., & Mia, A. (2024). Determinants of financial literacy: A systematic review and future research directions. *Future Business Journal*, *10*(1), 1–25. https://doi.org/10.1186/s43093-024-00365-x

Rijanta, R., Wibisono, H., Saputra, E., Musthofa, A., Chairani, M. S., Aditya, M. Y., Safina, S. W., Susanti, A., Kumalawati, R., Budiman, P. W., Pratomo, R. A., & Raharjo, J. T. (2025). Frontier Urbanisation in East Kalimantan: Displacement, Livelihood Shifts, and Contested Development in Indonesia's New Capital. *International Journal of Sustainable Development and Planning*, *20*(08), 3541–3551. https://doi.org/10.18280/ijsdp.200834

Rodrígue, J. C., Merwe, J. van der, Wahid, S. M., Cesna, G. P., & Prabowo, D. A. (2024). Improving Natural Resource Management through AI: Quantitative Analysis using SmartPLS. *International Transactions on*

Artificial Intelligence, *2*(2), 135–142. https://doi.org/10.33050/italic.v2i2.548

Rogers, E. M., & Everett, M. (2003). *Diffusion of innovations*.

Saha, S. K., & Qin, J. (2023). Financial inclusion and poverty alleviation: An empirical examination. In *Economic Change and Restructuring* (Vol. 56, Issue 1). Springer US. https://doi.org/10.1007/s10644-022-09428-x

Sari, N. (2025). Islamic Fintech and Digital Banking Adoption: A Systematic Review of Established Models of Fintech Adoption and Their Influence on Sharia Financial Inclusion and Performance. *IHTIYATH: Jurnal Manajemen Keuangan Syariah*, *9*(1), 73–90.

Sholevar, M., & Bachmann, R. (2025). Patterns of trust in financial services: Critical factors and gender differences. *Journal of Financial Services Marketing*, *30*(2), 10. https://doi.org/10.1057/s41264-025-00303-0

Sofyan, A., Sari, A. L., & Setiawan, I. (2024). Evaluating The Impact Of Shariah-Compliant Business Practices On Consumer Trust And Market Growth In. *Seminar Nasional Ekonomi Dan Bisnis Islam Tahun 2*, *42*, 15–24.

Suaidi, S. (2025). Bridging institutional and regulatory gaps: Enhancing sharia compliance in islamic financial institutions in indonesia. *El-Uqud: Jurnal Kajian Hukum Ekonomi Syariah*, *3*(1), 23–39.

Sudarsono, H., Afandi, A., Ridha, A., & Perdana, A. (2023). Determinants of Consumer Decisions to Adopt Islamic Banking Services in Indonesia. *Amwaluna: Jurnal Ekonomi Dan Keuangan Syariah*, *7*(1), 144-161 Cite.

Suryani, E., Saufi, A., & AulianaSoesetio, R. R. D. (2024). *Implementation of SEM Partial Least Square in Analyzing the UTAUT Model*.

Suseno, P., & Fitriyani, Y. (2018). Role of Islamic Finance Development to Financial Inclusion: Empirical Study in Islamic Banking Countries. *Jurnal Ekonomi & Keuangan Islam*, *4*(1), 1–8. https://doi.org/10.20885/jeki.vol4.iss1.art1

Takidah, E., & Ka, S. (2021). *Determinants of Islamic Financial Inclusion in Indonesia: A Demand-Side Analysis*. *10*(2), 38–52.

Takona, J. P. (2024). Research design: Qualitative, quantitative, and mixed methods approaches / sixth edition. *Quality & Quantity*, *58*(1), 1011–1013. https://doi.org/10.1007/s11135-023-01798-2

Tanchangya, T., Islam, N., Naher, K., Mia, M. R., Chowdhury, S., Sarker, S. R., & Rashid, F. (2025). Financial Technology-Enabled Sustainable Finance for Small- and Medium-Sized Enterprises. *Environment, Innovation and Management*, *01*, 2550006. https://doi.org/10.1142/S3060901125500061

Taujiharrahman, D., & Alfianto, A. N. (2024). The Effect of Sharia Compliance, Attitudes, Satisfaction and Perceived Usefulness on Continued Intention to Use Sharia Digital Banking: A Study of Muslim Customer Behavior. *Internasional Journal of Integrative Sciences (IJIS)*, *3*(10), 1153–1172.

Valdebenito, A., & Pino, G. (2022). Local Financial Access and Income Inequality in Chile. *Economics Letters*, *210*, 110170. https://doi.org/10.1016/j.econlet.2021.110170

van Zanden, J. L. (2023). Examining the relationship of information and communication technology and financial access in Africa. *Journal of Business and Economic Options*, *6*(3), 26–36.

Warsilah, H. (2023). Reconstruction of Ethnic Identity in the Development of a New Capital City in East Kalimantan: Participation and Access to City Resources. In H. Warsilah, L. Mulyani, & I. K. Nasution (Eds.), *Assembling Nusantara* (pp. 81–97). Springer Nature Singapore. https://doi.org/10.1007/978-981-99-3533-8_7

Wen, C., Xiao, Y., & Hu, B. (2024). Digital financial inclusion, industrial structure and urban–Rural income disparity: Evidence from Zhejiang Province, China. *Plos One*, *19*(6), e0303666.

Yang, Y., Hsueh, H., Huang, M., Cho, T., & Kishi, Y. (2017). Effect of Fintech on the Productivity in the Taiwan Banking Industry. *International Journal of E-Education, e-Business, e-Management and e-Learning*, *7*(4), 255–263. https://doi.org/10.17706/ijeeee.2017.7.4.255-263

Yeo, K. H. K., Lim, W. M., & Yii, K.-J. (2024). Financial planning behaviour: A systematic literature review and new theory development. *Journal of Financial Services Marketing*, *29*(3), 979–1001. https://doi.org/10.1057/s41264-023-00249-1

Yovita, M. (2025). The Role Of Financial Technology In Enhancing The Development Of Fisheries Msmes In Coastal East Kalimantan. *International Journal of Economics, Business and Accounting Research (IJEBAR)*, *9*(2). https://www.jurnal.stie-aas.ac.id/index.php/IJEBAR/article/view/17215

Yulia, D., Vidiati, C., & Nursindi, M. (2024). The role of digital islamic economics in increasing financial inclusion in the fintech era. *Advances in Social Humanities Research*, *2*(1), 2279–2289.

Yuniati, T., Andriansyah, Y., Duarte, J., Martins, M., Studi, P., Islam, E., Ilmu, F., Islam, A., & Indonesia, U. I. (2024). Factors influencing user interest in using study of SyarQ in Yogyakarta , Indonesia Sharia-compliant Fintech services: A case. *Journal of Islamic Economics Lariba*, *10*(1), 513–542.