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Digital Accounting Information Systems and Competitive Advantage: The Mediating Role of Organizational Innovation in Islamic Banks

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ABSTRACT

Digital transformation has introduced new challenges and changes to accounting practices. Digital accounting information systems have become strategically important for providing performance enhancements and a competitive advantage to an organization. Mediating the role of organizational innovation in ascertaining the contribution of digital accounting information systems to competitive advantage in the context of Jordanian Islamic banks has received little empirical attention. This study aims at addressing this gap. Specifically, the study aims to examine the direct contribution of digital accounting information systems to competitive advantage and the indirect contribution, via organizational innovation, to the same. This research adopted a quantitative approach using a structured survey and targeting employees of Jordanian Islamic banks. Of the surveys, 189 were completed and returned. Of these, the data were analyzed using SPSS version 29 and AMOS version 29. The measurement model was assessed, and the proposed hypotheses were evaluated using confirmatory factor analysis and structural equation modeling. The results of the study found that digital accounting information systems positively influence competitive advantage and organizational innovation. The study further found that organizational innovation positively contributed to competitive advantage and partially and positively mediated the relationship between digital accounting information systems and competitive advantage. The results of this study show that digital accounting remains a value-generating resource for the Islamic banks of the study when coupled with organizational innovation.

Keywords: Digital Accounting information systems, Organizational innovation, Competitive advantage, Digital transformation, Jordanian Islamic banks.

Introduction

Rapid digital banking advancements across industries can be attributed to technological breakthroughs, customer demand, strict regulations, and growing competition (Munira *et al*., 2025). The innovations challenge financial institutions to rethink their methods for handling accounting information and for rendering and deriving value from their banking services (Ibrahim *et al*., 2026). Accounting functions have begun to shift from traditional processing of transaction records to Digitally Integrated Accounting Systems (IA) that generate and maintain precise, dependable, and instantaneous financial information that serves both functional requirements and the requirements of informed managerial decisions (Al-Zaqeba *et al*., 2023; Perez *et al*., 2011). Consequently, Digital Accounting Information Systems (DAIS) are new organizational capabilities that boost the quality of the information, financial statements, and

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internal control and improve the organization's agility toward changing business conditions (Zohry & Al-Dhubaibi, 2024). Digital Accounting Information Systems further connect the accounting function with emerging technologies, such as cloud computing, enterprise resource planning, artificial intelligence, big data and data analytics, automated reporting, and so forth (Hammouri *et al*., 2024). Empirical studies have established that sound accounting information systems contribute immensely to an organization's financial reporting and overall performance, as well as to the efficiency of daily operations that require timely accounting information of a superior quality (Duan, 2024). Recent studies have also provided evidence that the digital accounting systems of banks improve their financial performance by increasing transparency, automation, the quality of information, and operational efficiency, thereby enhancing long-term competitiveness (Michael *et al*., 2025). These systems help with financial reporting, enterprise risk management, regulatory compliance, internal auditing, and strategic planning. In Islamic banking, accounting systems also include Sharia principles that cover Islamic financial contracts. This means that according to Abu-Musa (2008), digital accounting systems develop Sharia compliance, transparency, governance, and operational reliability. Other recent evidence suggests that Islamic finance institutions prioritize strategic digital transformation, which affects operational effectiveness, governance, client experience, and competitiveness in the long run (Banna *et al*., 2022; Mahmoud *et al*., 2024).

Integrating technology with organizational capabilities and management practices is essential for creating a sustainable competitive advantage (Crossan & Apaydin, 2010). Digital accounting information systems create the quality of information, learning, and evidence that helps organizations to quickly adapt to changes in their environment (Bharadwaj, 2000; Damanpour, 1991). Their innovation incentive is maximized by the redesign of innovative processes, the integration of ideas, the participation of different departments, and the progressive advancement of the organization. Therefore, digital technologies create sustainable organizational value and a competitive advantage (Nylén & Holmström, 2015). Establishing a competitive advantage is a primary goal for banking institutions in competitive financial markets. Digital transformation has caused a competitive advantage shift in banking activities from physical assets to an advanced level of technology, organizational innovation, and sophisticated information systems (Verhoef *et al*., 2021). Banks that integrate DAIS in conjunction with state-of-the-art organizational practices stand a better chance of improving operational performance, organizational agility, customer satisfaction, and future sustainability. Evidence from Islamic banking shows that enhanced digital transformation positively impacts competitive advantage by improving operational effectiveness, service excellence, and greater organizational responsiveness (Shehadeh *et al*., 2023).

More recent empirical studies have signified the importance of digital technologies in enhancing both accounting and overall organizational performance (Khwaileh & Makhadmeh, 2026). Appelbaum *et al*. (2017) discovered that sophisticated digital technologies, of which big data analytics are the most prominent, strengthened the quality of audits, improved the quality of the decisions made, and increased the transparency of organizations. Quattrone (2016) stated that digital management accounting systems transform management control processes by incorporating a timely and cohesive methodology of financial data that aids in enhanced strategic decisions. Cockcroft and Russell (2018) identified that digital management accounting systems positively impact the quality of data and the responsiveness of the organization, which in turn facilitates sound management and the sustainability of performance. Furthermore, Rikhardsson and Yigitbasioglu (2018) indicated that business intelligence and data analytics substantively advanced the accounting profession by improving forecasting and control. From an innovation standpoint, Nambisan *et al*. (2017) asserted that digital technologies have the capacity to promote organizational innovations through the enhancement of knowledge, collaboration, and the redesign of processes. In a similar vein, Li *et al*. (2018) indicated that the digital transformation of organizations positively impacted their innovation capability and competitiveness on a sustainable basis by improving technological integration.

The existing bodies of work on digital transformation and banking performance have largely ignored how Digital Accounting Information Systems (DAIS) strengthen competitive advantages via organizational innovation (OI), especially in developing countries' Islamic banks. Most studies focus on financial reporting, operational performance, or digital transformation individually. The role of OI in these is still largely unexplored. Studies on Jordanian Islamic banks have been especially lacking, even considering the large resources they have allocated for digital transformation. Therefore, this work will analyze the effect that DAIS has on competitive advantage (CA) and will analyze the OI of

Jordanian Islamic banks. This work will also provide the first unified theory for this subject and offer new ways to think about digital accounting systems and how they can be used to create a competitive advantage.

Literature Review

Digital transformation has triggered radical changes in the generation, processing, and application of accounting information (Jarah, 2025; ALRashdan *et al*., 2026). Unlike traditional systems, DAIS provides digital technologies embedded into accounting for the generation of precise, trustworthy, and real-time financial information (Dahiyat, 2025). DAIS improves the effectiveness of operations and provides support for the governance, strategic decisions, and activities of an organization, as well as its agility, DAIS, and IT (Vial, 2021). From the Resource-Based View (RBV), DAIS and its digital accounting capabilities, especially when combined with other organizational capabilities, provide and support sustainable accounting value and information services (Wade & Hulland, 2004). Timeliness and the quality of accounting information do enhance financial reports and aid in the improvement of internal control, governance, and the planning and execution of management activities and decisions. Zohry *et al*. (2024) have cited the quality of information and system capabilities to enhance the effectiveness of accounting information systems and promote the sustainability of business. Digital accounting technologies provide flexibility, transparency, and resilience to an organization (Prasetianingrum & Sonjaya, 2024). As stated by Perez *et al*. (2011), accounting information systems aid in the enhancement of the quality of information and the support of managerial decisions in order to foster the growth of an organization.

DAIS is strategically important to the banking sector because banks are highly regulated and require a high standard of financial information to support the governance, enterprise risk management, and compliance aspects of their business (Almatarneh *et al*., 2023). The strategic importance of DAIS goes beyond conventional banks to Islamic banks because of the additional requirements of Sharia governance (Gharaibeh *et al*., 2024). Desky and Maulina (2022) and Shehadeh *et al*. (2024) show that the digitalization of Islamic financial services improves the quality of governance, satisfaction of customers customer satisfaction, and the efficiency, flexibility, sustainability, and competitiveness of Islamic financial institutions. Unlike technology innovation, DAIS offers a new way to improve a business's internal management systems and processes (Crossan & Apaydin, 2010). Organizations that successfully combine digital technologies with innovative managerial practices, DAIS in this case, are better positioned to facilitate organizational learning, knowledge sharing, and adaptive practices that contribute to continuous improvement (Volberda *et al*., 2014; Khwaileh & Kazić-Çakar, 2025).

Accelerated innovation due to enhanced communication, integrated knowledge, and an agile organization are a few of the impacts of digital technology on an organization (Tubishat *et al*., 2024). Nylén & Holmström (2015) mentioned that digital transformation allows an organization to reconfigure its flexible response to external stimuli. This is critical for the banking sector due to innovation-intensive governance, operational and regulatory efficiency, and customer engagement (Barney, 1991; Peteraf, 1993). The digital economy has shown that sustainable competitive advantage relies more on the economy's intangible resources, for example, digital resources, organizational and workforce innovation, and information of good quality (Bharadwaj, 2000; Verhoef *et al*., 2021). Recent studies continue to substantiate the claim of that the digital accounting system and the organizational innovation value chain as are competitive resources. According to Khin & Ho (2019), organizational innovation, augmented by a digital orientation, improves business performance and competitive advantage. Matarazzo *et al*. (2021) also claim that an organization combining digital technologies and innovation-driven management practices has high adaptive capability to external competitive forces and retains a competitive advantage. According to Warner and Wäger (2019), well-developed digital capabilities result in improved agility and help maintain competitive advantage for digital organizations. Scuotto *et al*. (2021) show that digital technologies enable organizational innovations that promote the sharing of knowledge, the capacity to collaborate, and the capacity to innovate. This has a positive effect on the performance of the organization. Volberda *et al*. (2014) say that flexibility, responsiveness to customers, efficiency in operations, and the sustained competitiveness of an organization are the benefits from of innovations that are practised in an organization. Even though research on accounting information systems, organizational innovations, and sustained competitive advantage has been increasing, there are still gaps to be filled in both the theoretical and empirical domains. Earlier studies have mainly focused on the impact that accounting information systems have on the quality

of financial reporting, governance, and the performance of organizations. Little has been done to show the role of organizational innovation in the context of digital accounting information systems and sustained competitive advantage. Empirical studies are also lacking in the field of Islamic banking in Jordan, with the sector's continuous and rapid step towards digitization. From the discussion above, the proposed hypotheses are as follows.

H1: Digital Accounting Information Systems have a positive and significant impact on Competitive Advantage in Jordanian Islamic Banks.

H2: Digital Accounting Information Systems have a positive and significant impact on Organizational Innovation in Jordanian Islamic Banks.

H3: Organizational Innovation has a positive and significant impact on Competitive Advantage in Jordanian Islamic Banks.

H4: Organizational Innovation mediates the relationship between Digital Accounting Information Systems and Competitive Advantage in Jordanian Islamic Banks.

Based on existing theory and empirical research, the model assumes digital accounting information systems exert a direct positive influence on competitive advantage. It further assumes the systems exert an indirect positive influence on competitive advantage through the mediation of organizational innovation. **Figure 1** presents the model.

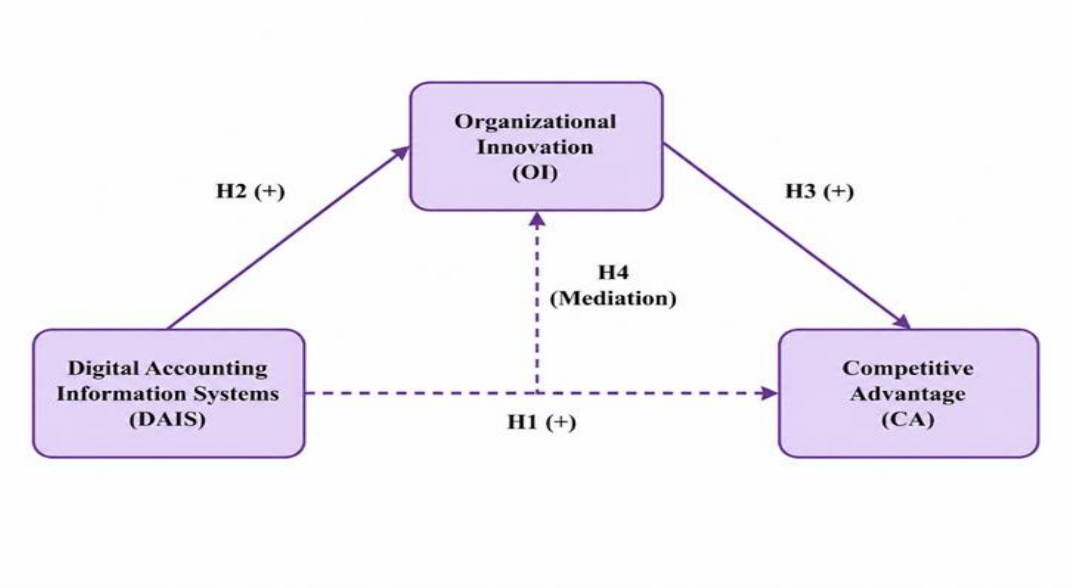


Figure 1. Proposed Conceptual Research Model

The proposed **Figure 1** outlines the presumed interconnections between the variables of the study. Digital Accounting Information Systems (DAIS) is the variable with a presumed positive influence, and Competitive Advantage (CA) is the variable with a presumed positive influence. The variable with a presumed positive influence, mediated by organizational innovation (OI), is the subject of four presupposed positive influence relationships. The other three relationships of the presumption are also direct positive influence relationships. These relationships were empirically evaluated based on the expressed opinions of employees of Jordanian Islamic banks through structural equation modeling (SEM).

Materials and Methods

To evaluate the relationships between the variables of the study, digital accounting information systems, organizational innovation, and competitive advantage in Jordanian Islamic banks, this study used quantitative research methods within a cross-sectional survey framework. The quantitative methods were appropriate as they allow the

formulation of testable research questions with statistical methods, and they allow the researchers to objectively measure and evaluate relationships among study variables.

A structured survey was administered to employees employed in Jordanian Islamic banks who have adequate knowledge and experience in accounting, finance, information systems, and administrative functions. Out of 210 distributed surveys, 196 were completed and returned. After reviewing for consistency and completeness, 7 surveys were discarded. 189 surveys were selected for a statistical study, reaching a valid response rate of 90.0%.

Collected data were analyzed using SPSS and AMOS version 29. Data screening, descriptive statistics, reliability analysis (using Cronbach's alpha), and correlation analysis were performed in SPSS. In AMOS, Confirmatory Factor Analysis (CFA) and Structural Equation Modelling (SEM) were applied. In this analysis, the measurement model, model fit, and direct and mediating relationships among the study variables were evaluated. Convergent and discriminant validities, composite reliability (CR), and average variance extracted (AVE) assessed the adequacy of the measurement model. For the evaluation of the structural model, the fit indices (chi-square/df, CFI, TLI, RMSEA, and SRMR) and standardized paths and their significance were considered along with the assessment of the structural model.

Results and Discussion

Table 1. Demographic Characteristics of the Respondents (N = 189)

Variable	Category	Frequency	Percentage (%)
Gender	Male	112	59.3
	Female	77	40.7
Age	Less than 30 years	34	18.0
	30–39 years	69	36.5
	40–49 years	58	30.7
	50 years and above	28	14.8
Education	Bachelor's Degree	118	62.4
	Master's Degree	58	30.7
	PhD	13	6.9
Experience	Less than 5 years	29	15.3
	5–10 years	64	33.9
	11–15 years	55	29.1
	More than 15 years	41	21.7
Job Position	Accountant	55	29.1
	Internal Auditor	36	19.0
	Financial Officer	43	22.8
	Branch/Department Manager	30	15.9
	Other Administrative Positions	25	13.2

Table 1 provides information on 189 respondents. The gender breakdown was 59.3% male and 40.7% female. The bulk of the sample (67.2%) was 30 to 49 years of age. Respondents in this sample were likely to be experienced and to have at least a bachelor's degree (62.4%), a master's degree (30.7%), or the necessary educational qualification to appreciate and analyze digital accounting. Most respondents also had at least five (5) years of work experience (84.7%). The respondents had ample experience with accounting and business systems. The sample also included people from diverse job positions such as accounting personnel, finance officers, internal auditors, managers, and other support staff. The sample as a whole was likely to be representative. The sample was also likely to be qualified to provide informed and useful opinions regarding digital accounting information systems, organizational innovation, and competitive advantage.

Table 2. Descriptive Statistics, Reliability, and Convergent Validity

Construct	Item	Factor Loading	Mean	SD	Cronbach's Alpha	CR	AVE
Digital Accounting Information Systems (DAIS)	DAIS1	0.83	4.08	0.58	0.912	0.924	0.708
	DAIS2	0.86					
	DAIS3	0.85					
	DAIS4	0.80					
	DAIS5	0.81					
Organizational Innovation (OI)	OI1	0.81	3.97	0.61	0.901	0.915	0.683
	OI2	0.84					
	OI3	0.83					
	OI4	0.78					
	OI5	0.79					
Competitive Advantage (CA)	CA1	0.85	4.13	0.56	0.918	0.930	0.726
	CA2	0.87					
	CA3	0.88					
	CA4	0.82					
	CA5	0.80					

Note: All factor loadings, Cronbach's alpha, and composite reliability (CR) exceeded the prescribed levels of 0.70. Average Variance Extracted (AVE) and measures of reliability and convergent validity were also satisfactory.

Results concerning the descriptive statistics, reliability, and convergent validity for the study constructs are available in **Table 2**. The mean responses for the constructs that assess the digital accounting information systems, organizational innovation, and competitive advantage were all between 3.97 and 4.13, indicating that the respondents, on average, agreed positively on the constructs. The standard deviation of the responses was between 0.56 and 0.61, indicating that the responses were relatively consistent. The range of the standardized factor loadings was 0.78 to 0.88. The recommended value of a factor loading for a measurement item is at least 0.70, which was met by all measurement items in the constructs. Competitive Advantage construct measurement item CA3 was the highest at 0.88, and Organizational Innovation construct measurement item OI4 was the lowest at 0.78. The results for the constructs also showed that the measurement systems had excellent internal consistency. The reliability of the measurement constructs was also satisfactory, with a Cronbach's Alpha value for the constructs between 0.901 and 0.918 and a Composite Reliability value for the constructs between 0.915 and 0.930. The results of the constructs of this study also showed satisfactory convergent validity. Based on the average variance extracted, all the constructs of this study had a value between 0.683 and 0.726. Based on these results, all the constructs of the study are valid and reliable and provide a basis for evaluating the structural model and the proposed relationships of the study. The final CFA measurement model is illustrated in **Figure 2**.

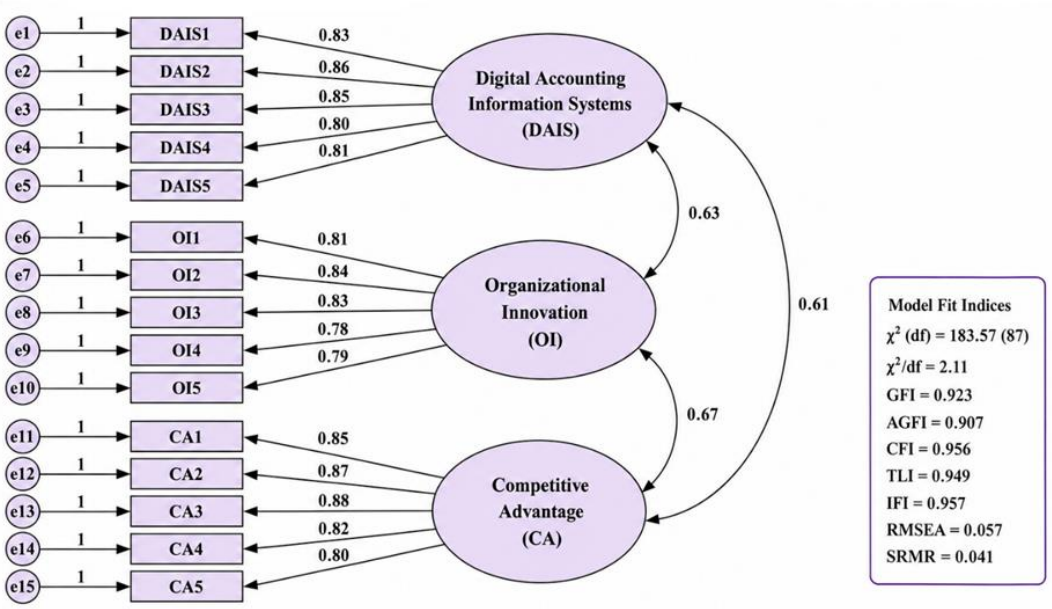


Figure 2. Confirmatory Factor Analysis (CFA) Measurement Model

Note: Loadings were standardized. They were of the order of 0.78 to 0.88. All the standardized loadings were greater than the recommended minimum of 0.70 and were statistically significant at $p < 0.001$. e1–e15 indicate error terms.

The CFA measurement model is shown in **Figure 2**. Its three measurement items had factor loadings in the range of 0.78 to 0.88 (the suggested minimum is 0.70). All loadings were sufficient to determine the model's measurement items. The CFA measurement model had a good fit when evaluated with the following indices: $\chi^2/df = 2.11$; GFI = 0.923; AGFI = 0.907; CFI = 0.956; TLI = 0.949; IFI = 0.957; RMSEA = 0.057; SRMR = 0.041. The model's good fit confirmed that the CFA measurement model was appropriate for evaluating the SEM.

Table 3. Correlation Matrix and Discriminant Validity

Constructs	DAIS	OI	CA
Digital Accounting Information Systems (DAIS)	**0.842**		
Organizational Innovation (OI)	0.648	**0.827**	
Competitive Advantage (CA)	0.692	0.715	**0.852**

Note: Diagonal values (bold) represent the square root of the Average Variance Extracted (AVE), while the off-diagonal values represent Pearson correlation coefficients.

Table 3 shows the results of the correlation matrix and the Fornell-Larcker criterion for the evaluation of discriminant validity. The correlation coefficients for the study constructs, which comprised digital accounting information systems, organizational innovation, and competitive advantage, ranged between 0.648 and 0.715. The relationships represented by the coefficients were positive, and there was a moderate to strong correlation between the constructs. The coefficients on the diagonals are the square roots of the AVE and were greater than the other inter-construct correlation coefficients. The square root of AVE for DAIS was 0.842, for organizational innovation was 0.827, and for competitive advantage was 0.852. Therefore, each construct was empirically distinct from the others. The Fornell-Larcker criterion was satisfied, indicating that discriminant validity was achieved. This also supported the appropriateness of the measurement model for SEM.

Table 4. Model Fit Indices

Fit Index	Recommended Value	Obtained Value	Assessment
χ^2/df	< 3.00	2.11	Accepted
GFI	≥ 0.90	0.923	Accepted

AGFI	≥ 0.90	0.907	Accepted
CFI	≥ 0.90	0.956	Accepted
TLI	≥ 0.90	0.949	Accepted
IFI	≥ 0.90	0.957	Accepted
RMSEA	≤ 0.08	0.057	Accepted
SRMR	≤ 0.08	0.041	Accepted

Table 4 gives the goodness-of-fit indices for the measurement and structural models with estimates from AMOS. The values reported show a fair fit overall. The ratio of chi-square to the degrees of freedom ($\chi^2/df = 2.11$) is less than the recommended 3.00, which indicates an overall fit of the observed data with the proposed model. The incremental fit indices, GFI (0.923), AGFI (0.907), CFI (0.956), TLI (0.949), and IFI (0.957), all exceed the threshold of 0.90 and suggest the model is an adequate representation of the data. The error indices also show an adequate model fit, with RMSEA (0.057) and SRMR (0.041), which are both below the adequate fit model threshold of 0.08. Overall, the measurement and structural models, which are examined using SEM, fit the data with an adequate level of satisfaction and support the testing of the proposed hypotheses.

Table 5. Structural Model Results and Hypothesis Testing

Hypothesis	Structural Path	β	S.E.	C.R.	p-value	Decision
H1	Digital Accounting Information Systems → Competitive Advantage	0.341	0.071	4.801	<0.001	Supported
H2	Digital Accounting Information Systems → Organizational Innovation	0.627	0.065	9.645	<0.001	Supported
H3	Organizational Innovation → Competitive Advantage	0.452	0.078	5.794	<0.001	Supported
H4	Digital Accounting Information Systems → Organizational Innovation → Competitive Advantage (Indirect Effect)	0.283	—	—	<0.001	Supported

Results of the structural model estimated with SEM **Table 5**. Using SEM, the results showed that Digital Accounting Information Systems (DAIS) positively influence competitive advantage (H1, $\beta = 0.341$, $p < 0.001$). Thus, the position of Jordanian Islamic banks is positively affected by the advancement of their digital accounting systems. Furthermore, DAIS positively impacts organizational innovation (H2, $\beta = 0.627$, $p < 0.001$), meaning that the innovation of accounting systems at the digital level reinforces the innovation of managerial and process-oriented practices at the level of the organization. Positive impacts of organizational innovation on competitive advantage (H3, $\beta = 0.452$, $p < 0.001$) mean that the competitive advantage of an organization is more sustainable the more the organization is innovative. Furthermore, the results of the mediation analysis confirmed that organizational innovation positively mediates the relationship between competitive advantage and digital accounting information systems (H4, $\beta = 0.283$, $p < 0.001$). Thus, the competitive advantage provision of digital accounting information systems is achieved in both a direct and an indirect form through organizational innovation. Moreover, the structural model's explanatory power is satisfactory. Digital Accounting Information Systems accounted for 39% of the variance of organizational innovation ($R^2 = 0.39$) and 61% of the variance of competitive advantage ($R^2 = 0.61$) when combined with organizational innovation. Thus, the given model explains the relationships of the study variables with moderate to substantial power. Presented in **Figure 3** is the finalized structural model displaying the standardized path coefficients and the coefficients of determination (R^2) of the model.

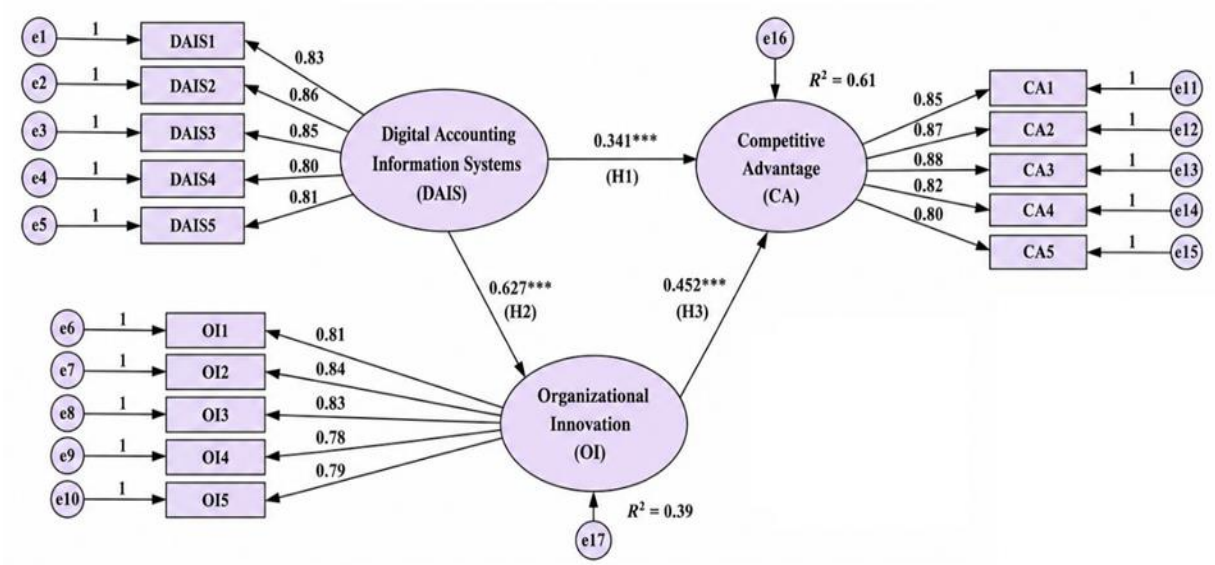


Figure 3. Structural Equation Model (SEM) Results

Note: The standardized path coefficients (β) displayed refer to the structural paths, with all paths statistically significant at $p < 0.001$. The determination (R^2) coefficients indicate that 39% of the variance in organizational innovation and 61% of the variance in competitive advantage were reflected in the model. The error terms were depicted as e1–e17.

Figure 3 shows the finalized structural equation model with the study variables and the standardized path coefficients. Digital Accounting Information Systems has a significant positive impact on competitive advantage ($\beta = 0.341$, $p < 0.001$), which helps to substantiate H1. Digital accounting information systems have a positive impact on organizational innovation ($\beta = 0.627$, $p < 0.001$), which helps to substantiate H2. Organizational innovation positively impacts competitive advantage ($\beta = 0.452$, $p < 0.001$), which helps to substantiate H3. The impact of digital accounting information systems on competitive advantage was through organizational innovation ($\beta = 0.283$, $p < 0.001$), which substantiates H4 and the mediation of organizational innovation. The structural model accounted for 39% of the organizational innovation ($R^2 = 0.39$) and 61% of the competitive advantage ($R^2 = 0.61$), which is considered acceptable.

The findings suggest that Digital Accounting Information Systems (DAIS) can enhance the competitive advantage of Jordanian Islamic banks both directly and through innovation. The improvement of digital accounting technologies will optimize operational processes and improve the governance of the organization while also empowering the bank to make better-informed strategic decisions, improving its competitive advantage. This reflects the Resource-Based View (RBV), which focuses on the strategic importance of organizational resources and capabilities and supports Perez *et al*. (2011), Zohry *et al*. (2024), Prasetianingrum and Sonjaya (2024), and Shehadeh *et al*. (2024). The findings affirm that the presence of DAIS can enhance organizational innovation via the support of organizational learning, system integration, and knowledge sharing while simultaneously improving processes. This is in agreement with Nylén and Holmström (2015), Khin and Ho (2019), Warner and Wäger (2019), and Scuotto *et al*. (2021), where it was noted that digital integration positively impacts an organization's flexibility, agility, innovativeness, and ultimately performance. It was also noted that the improvement in innovation positively impacts the competitiveness of an organization. This reflects the findings of Damanpour (1991) and Crossan and Apaydin (2010) and is also in agreement with Volberda *et al*. (2014) and Matarazzo *et al*. (2021), where it is noted that the integration of digital systems and business processes has a positive impact on competitiveness and organizational resilience. Finally, it was observed that organizational innovation positively impacts the relationship between DAIS and competitive advantage. This suggests that there is a greater positive impact of the digital accounting systems on the competitive advantage of Jordanian Islamic banks when the modes of operation of the organization are improved using digital technologies.

Conclusion

Digital Accounting Information Systems (DAIS) enhance competitive advantage for Jordanian Islamic banks. DAIS increases operational efficiency, aids governance and facilitative decision-making, and stimulates innovation. It was further shown that DAIS has a value-add effect on the innovation process via the sharing of information, organizational learning, and the improvement of communication and processes. Innovation strengthens competitive advantage by enabling Islamic banks to enhance their practices and capabilities. Overall, the results indicate that organizational innovation plays a substantial role of mediation in relation to DAIS. This implies that investing in digital accounting innovations in conjunction with a strategy of organizational innovation sustains the competitive advantage of Jordanian Islamic banks.

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Conflict of Interest: None

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Ethics Statement: Participation in the study was voluntary. All participants provided informed consent prior to participation. Confidentiality and anonymity were maintained throughout the study.

References

Abu-Musa, A. A. (2008). Information technology and its implications for internal auditing: An empirical study of Saudi organizations. *Managerial Auditing Journal, 23*(5), 438–466.

Almatarneh, Z., Zaqeeba, N., Jebril, I., & Jarah, B. A. F. (2023). The role of financial accounting technology in improving customer relationship management in Jordanian banks. *Asian Economic and Financial Review, 13*(12), 1008.

AlRashdan, M. T., Alomari, K. F., AlJabal, A. M. A., Jarah, B. A. F., & Alzoubi, M. E. M. (2026). FinTech-driven digital service infrastructure and operational efficiency in Jordanian Islamic banks. *Journal of Logistics, Informatics and Service Science, 13*(4), 136–155.

Al-Zaqeba, M. A. A., Shubailat, O. M., Hamid, S. A., Jarah, B. A. F., Ababneh, F. A. T., & Almatarneh, Z. (2023). The influence of board of directors' characteristics on corporate social responsibility disclosures in Jordanian Islamic banks. *International Journal of Advanced and Applied Sciences, 10*(11), 1–13.

Appelbaum, D., Kogan, A., Vasarhelyi, M., & Yan, Z. (2017). Impact of business analytics and enterprise systems on managerial accounting. *International Journal of Accounting Information Systems, 25*, 29–44.

Banna, H., Hassan, M. K., Ahmad, R., & Alam, M. R. (2022). Islamic banking stability amidst the COVID-19 pandemic: The role of digital financial inclusion. *International Journal of Islamic and Middle Eastern Finance and Management, 15*(2), 310–330.

Barney, J. (1991). Firm resources and sustained competitive advantage. *Journal of Management, 17*(1), 99–120.

Bharadwaj, A. S. (2000). A resource-based perspective on information technology capability and firm performance: An empirical investigation. *MIS Quarterly, 24*(1), 169–196.

Cockcroft, S., & Russell, M. (2018). Big data opportunities for accounting and finance practice and research. *Australian Accounting Review, 28*(3), 323–333.

Crossan, M. M., & Apaydin, M. (2010). A multi-dimensional framework of organizational innovation: A systematic review of the literature. *Journal of Management Studies, 47*(6), 1154–1191.

Dahiyat, E. A. R. (2025). Sustainability and UAE consumer protection law: Renewed questions and expected challenges. *International Journal of Law and Management*.

Damanpour, F. (1991). Organizational innovation: A meta-analysis of effects of determinants and moderators. *Academy of Management Journal, 34*(3), 555–590.

Desky, H., & Maulina, I. (2022). Digital transformation in Islamic banking. *International Journal of Multidisciplinary Research and Analysis, 5*(12), 3616–3622.

Duan, Y. (2024). Design of accounting information big data analysis platform based on cloud computing. *Procedia Computer Science, 247*, 1128–1136.

Gharaibeh, Z. I. Y., Alazzam, F. A. F., Salih, A. J., & Aldrou, K. K. A. R. (2024). Examining challenges and prospects associated with implementing legal protections for electronic governance: A generic perspective from a developing country. *BBR. Brazilian Business Review, 21*(5), e20231773.

Hammouri, J. A., Almahasneh, A. A. A., Khwaileh, K. M., & Al-Raggad, M. M. (2024). The criminal liability of artificial intelligence entities. *Pakistan Journal of Life and Social Sciences, 22*(2), 8785–8790.

Ibrahim, A., Gourari, F., & AlQodsi, E. (2026). Artificial intelligence between legal governance and professional ethics: A comparative study. *Social Sciences & Humanities Open, 13*, 102841.

Jarah, B. A. F. (2025). Application of artificial intelligence in Jordanian banks and its impact on the quality of services. In *Conference on Sustainability and Cutting-Edge Business Technologies* (pp. 84–92). Springer Nature Switzerland.

Khin, S., & Ho, T. C. (2019). Digital technology, digital capability and organizational performance: A mediating role of digital innovation. *International Journal of Innovation Science, 11*(2), 177–195.

Khwaileh, K. M., & Makhadmeh, N. M. (2026). Criminal liability for spreading fake news: A study of Jordanian law in light of international standards. *Frontiers in Sociology, 11*, 1815400.

Khwaileh, K., & Kazić-Çakar, E. (2025). Illicit trade in counterfeit medicines: Challenges, solutions, and a case study of Indonesia. *Journal of Indonesian Legal Studies, 10*(1), 165–210.

Li, L., Su, F., Zhang, W., & Mao, J. Y. (2018). Digital transformation by SME entrepreneurs: A capability perspective. *Information Systems Journal, 28*(6), 1129–1157.

Mahmoud, M., Ismail, S., Ahmad, S., Dahmash, F. N., & Ghaidan, E. (2024). The impact of risk disclosure on the corporate social responsibility of banks. *Journal of Governance and Regulation, 13*(1).

Matarazzo, M., Penco, L., Profumo, G., & Quaglia, R. (2021). Digital transformation and customer value creation in Made in Italy SMEs: A dynamic capabilities perspective. *Journal of Business Research, 123*, 642–656.

Michael, M., Ariani, Y., & Widjaja, W. (2025). Digital transformation in accounting: Cloud-based AIS, management support, and financial information quality in retail. *JASa (Jurnal Akuntansi, Audit dan Sistem Informasi Akuntansi), 9*(1), 91–105.

Munira, M. S. K. (2025). Digital transformation in banking: A systematic review of trends, technologies, and challenges. *Strategic Data Management and Innovation, 2*(1), 78–95.

Nambisan, S., Lyytinen, K., Majchrzak, A., & Song, M. (2017). Digital innovation management: Reinventing innovation management research in a digital world. *MIS Quarterly, 41*(1), 223–238.

Nylén, D., & Holmström, J. (2015). Digital innovation strategy: A framework for diagnosing and improving digital product and service innovation. *Business Horizons, 58*(1), 57–67.

Perez, E. R., Urquia, G. E., & Munoz, C. I. (2011). The impact of accounting information systems (AIS) on performance measures: Empirical evidence in Spanish SMEs. *The International Journal of Digital Accounting Research, 11*, 25–43.

Peteraf, M. A. (1993). The cornerstones of competitive advantage: A resource-based view. *Strategic Management Journal, 14*(3), 179–191.

Prasetianingrum, S., & Sonjaya, Y. (2024). The evolution of digital accounting and accounting information systems in the modern business landscape. *Advances in Applied Accounting Research, 2*(1), 39–53.

Quattrone, P. (2016). Management accounting goes digital: Will the move make it wiser? *Management Accounting Research, 31*, 118–122.

Rikhardsson, P., & Yigitbasioglu, O. (2018). Business intelligence & analytics in management accounting research: Status and future focus. *International Journal of Accounting Information Systems, 29*, 37–58.

Shehadeh, M., Almohtaseb, A., Aldehayyat, J., & Abu-AlSondos, I. A. (2023). Digital transformation and competitive advantage in the service sector: A moderated-mediation model. *Sustainability, 15*(3), 2077.

Shehadeh, M., Atta, A., Barrak, T., Lutfi, A., & Alrawad, M. (2024). Digital transformation: An empirical analysis of operational efficiency, customer experience, and competitive advantage in Jordanian Islamic banks. *Uncertain Supply Chain Management, 12*(2), 695–708.

Tubishat, B. M. A.-R., Alazzam, F. A. F., Hryhoruk, P., Blikhar, M., Zhyhulin, O., & Karvatska, N. (2024). Sustainable legal development in the region: Strategy for integrating e-commerce platforms in the domestic market in the era of Industry 5.0. *International Journal of Sustainable Development and Planning, 19*(6), 2221–2228.

Verhoef, P. C., Broekhuizen, T., Bart, Y., Bhattacharya, A., Dong, J. Q., Fabian, N., & Haenlein, M. (2021). Digital transformation: A multidisciplinary reflection and research agenda. *Journal of Business Research, 122*, 889–901.

Vial, G. (2021). Understanding digital transformation: A review and a research agenda. In *Managing digital transformation* (pp. 13–66).

Volberda, H. W., Van Den Bosch, F. A., & Mihalache, O. R. (2014). Advancing management innovation: Synthesizing processes, levels of analysis, and change agents. *Organization Studies, 35*(9), 1245–1264.

Wade, M., & Hulland, J. (2004). The resource-based view and information systems research: Review, extension, and suggestions for future research. *MIS Quarterly, 28*(1), 107–142.

Warner, K. S., & Wäger, M. (2019). Building dynamic capabilities for digital transformation: An ongoing process of strategic renewal. *Long Range Planning, 52*(3), 326–349.

Zohry, A. F., & Al-Dhubaibi, A. A. S. (2024). Optimizing business performance through effective accounting information systems: The role of system competence and information quality. *Journal of Risk and Financial Management, 17*(11), 515.