

ISSN: 2617-6548

URL: www.ijirss.com



# The dynamic relationship Between investment account fluctuations and profitability: Empirical evidence from Saudi Islamic Banks

Munir S. Al-Hakim<sup>1\*</sup>, DEsmat Almustafa<sup>2</sup>

<sup>1</sup>University of Petra, Faculty of Administrative & Financial Sciences, Dep. of Banking and Finance, Jordan.

<sup>2</sup>Department of Islamic Finance, King Abdulaziz University, Institute of Islamic Economics, Jeddah, Saudi Arabia.

Corresponding author: Munir S. Al-Hakim (Email: munir.alhakim@uop.edu.jo)

## **Abstract**

This study investigates the dynamic relationship between fluctuations in investment accounts (IA) and profitability of Islamic banks operating in Saudi Arabia (SA). It aims to determine how changes in IA balances, deposit returns, and interest margins affect key financial performance indicators - specifically Return on Assets (ROA) and Return on Equity (ROE) - during the period 2014–2023. This study adopts a descriptive analytical framework using panel data econometrics. The data were collected from four major Islamic banks in Saudi Arabia. Multiple regression analyses, including pooled, fixed-effects, and random-effects models, were employed. Model selection was guided by the Lagrange Multiplier and Hausman test. Control variables such as total bank assets, central bank interest rates, and inflation were included to enhance model reliability. The empirical results indicate a statistically significant positive relationship between (IA) dynamics and bank profitability. Changes in (IA) and interest margins significantly impact ROA, whereas deposit returns exert a stronger influence on ROE. The regression models explain 53.3% and 70.0% of the variance in ROA and ROE, respectively. Macroeconomic factors, particularly inflation, also influence profitability. This study underscores the need for Islamic banks to strategically manage (IA) by improving return structures, enhancing transparency, and introducing diversified Sharia-compliant financial products. Effective (IA) management is crucial to sustaining profitability and competitiveness in the Islamic banking sector.

**Keywords:** Financial performance, Investment accounts (IA), Islamic banks profitability, Return on assets (ROA), Return on equity (ROE), Saudi Arabia Islamic Banks, Sharia-compliant finance.

**DOI:** 10.53894/ijirss.v8i6.10374

Funding: This study received no specific financial support.

**History: Received:** 04 August 2025 / **Revised:** 08 September 2025 / **Accepted:** 10 September 2025 / **Published:** 30 September 2025 **Copyright:** © 2025 by the authors. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (https://creativecommons.org/licenses/by/4.0/).

**Competing Interests:** The authors declare that they have no competing interests.

**Authors' Contributions:** All authors contributed equally to the conception and design of the study. All authors have read and agreed to the published version of the manuscript.

**Transparency:** The authors confirm that the manuscript is an honest, accurate, and transparent account of the study; that no vital features of the study have been omitted; and that any discrepancies from the study as planned have been explained. This study followed all ethical practices during writing.

**Publisher:** Innovative Research Publishing

#### 1. Introduction

The Islamic banking sector has expanded significantly over the last few decades, driven by the heightened demand for Sharia-compliant financial instruments and the notable contribution of Islamic banks to fostering sustainable economic development [1]. Islamic banks in SA are an essential part of the nation's financial sector and provide various Sharia-compliant services. One such service is (IA), the principal mechanism by which Islamic banks collect capital, develop investment opportunities, and distribute profits and risks among depositors [2].

Effective management of (IA) is vital not only for customer attraction and retention, but also for the long-term financial performance and sustainability of Islamic banks [3]. Despite their significance, there is a vital need for focused research on the determinants of deposits, complexity of (IA) effectiveness, and direct and indirect contributions to bank profitability [2]. It is necessary to fill this gap to enable Islamic banks to improve their financial strategies and contribute to their national economic objectives [4].

This study provides a complete overview of the impact of (IA) on (SIB)' profitability. This study also examines the use of (IA) as a profitability and sustainable growth instrument, ascertains its risks, and reveals the key drivers of success. By providing pragmatic suggestions, this study aims to assist (SIB) in improving their (IA) management strategies to improve their financial performance and strengthen their development functions within the economy [5].

By answering these questions, this study contributes to the expansive Islamic finance literature and presents insightful information to banking managers, policymakers, and investors concerned with enhancing the stability and competitiveness of Islamic banks.

#### 1.1. Problem

#### 1.1.1. Main questions

How do fluctuations in (IA) dynamically influence Islamic banks' SA? Evidence from empirical data (2010–2023).

To answer this main question, this study investigated the following sub-questions:

- 1. To what extent does (IA) positively influence the profitability of (SIB)?
- 2. How does the profitability of (SIB) respond to the investment risks associated with (IA)?
- 3. Does bank size (measured by total assets) moderate the relationship between (IA) fluctuations and profitability?
- 4. How does the transparency of financial reporting affect customer trust in (IA)?
- 5. To what extent does the profit distribution system between banks and (IA) holders attract more customers to (SIB)?
- 1. Significance of Study

The importance of this study arises from the pressing need for specialized research on the determinants of deposits within Islamic banks operating in SA. This study aims to enhance Islamic banks' capacity to engage in long-term investments aligned with their developmental objectives by shedding light on the economic significance of deposits and identifying effective strategies for attracting depositors [6] this study aims to enhance the capacity of Islamic banks to engage in long-term investments aligned with their developmental objectives. Furthermore, this study seeks to deepen the understanding of the relationship between (IA) and the profitability of SA Islamic banks, thereby contributing to the formulation of more effective financial strategies and the overall enhancement of banking performance within the sector [7].

# 1.2. Objectives

This study provides comprehensive insights into how (SIB) can leverage (IA) to enhance their profitability and achieve sustainable growth. It seeks to analyze the impact of (IA) on bank profitability, assess the risks associated with (IA) and their effect on profitability, and identify the key factors influencing the success of (IA) in enhancing profitability. In addition, this study offers practical recommendations for Islamic banks to improve their strategies for managing (IA) and boosting their overall profitability.

# 2. Methodology

The study followed a descriptive analytical approach, in which data were collected and analyzed, and hypotheses related to (IA) and the profitability of (SIB) were tested to obtain results and recommendations.

## 2.1. Population and sample

The study population consisted of (SIB) for the period from 2014 to 2023, and their number was (4) Islamic banks, namely Alinma Bank, Al Rajhi Bank, Al Jazira Bank, and Al Bilad Bank. All Islamic banks were included in the study sample as they met the condition of having all the data necessary to calculate the study variables. Thus, the sample represented the entire study population and consisted of four Islamic banks.

## 2.2. Measuring Variables

The study investigates the effects of (IA) on sustainability and profitability of (SIB).

# 2.3. Main Hypothesis (H<sub>0</sub>)

There is no statistically significant effect on the significance level ( $\alpha \le 0.05$ ) of (IA) and their dimensions (change in (IA) , average return on deposits, and change in interest margin) on the profitability of (SIB), as measured by (ROA) and (ROE).

## 2.4. Sub-Hypothesis 1 (Ho1)

There is no statistically significant effect on the significance level ( $\alpha \le 0.05$ ) of (IA) and their dimensions (change in (IA), average return on deposits, and change in interest margin) on the profitability of SIB as measured by (ROA).

- Ho1a: There is no statistically significant effect of the change in (IA) on the profitability of SIB as measured by (ROA).
- Hoib: There is no statistically significant effect of the return on deposits on the profitability of SIB as measured by (ROA).
- Hoic: There is no statistically significant effect of the bank's interest margin on the profitability of (SIB) as measured by (ROA).

# 2.5. Alternative Hypothesis (H<sub>11</sub>)

There is a statistically significant effect of (IA) and their dimensions on the profitability of SIB as measured by (ROA).

## 2.5.1. Sub-Hypothesis 2 (H<sub>02</sub>)

There is no statistically significant effect on the significance level ( $\alpha \le 0.05$ ) of (IA) and their dimensions (change in (IA) , average return on deposits, and change in interest margin) on the profitability of (SIB) as measured by (ROE).

- $H_{02}a$ : There is no statistically significant effect of the change in (IA) on the profitability of SIB as measured by (ROE).
- H<sub>02</sub>b: There is no statistically significant effect of the return on deposits on the profitability of (SIB) as measured by (ROE).
- H<sub>02</sub>c: There is no statistically significant effect of the bank's interest margin on the profitability of SIB as measured by (ROF)

## 2.6. Alternative Hypothesis ( $H_{12}$ )

There is a statistically significant effect of (IA) and their dimensions on the profitability of (SIB) as measured by (ROE).Study Model

Dependent Variable: Profitability of Islamic Banks

(ROA) = Net Profit After Tax / Total Assets

(ROE) = Net Profit After Tax / Total Equity

Independent Variable: (IA)

Change in (IA) = (Current Year (IA) – Previous Year (IA)) / Previous Year (IA)

Average Return on Deposits = Net Profit After Tax / Total Deposits

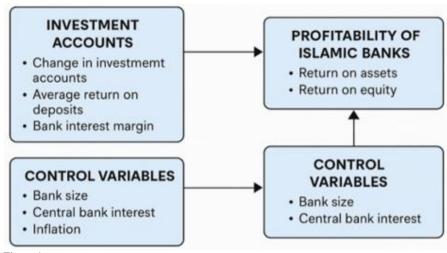
Bank Interest Margin = (Interest Income – Interest Expense) / Total Assets

Control Variables

Bank Size = Natural logarithm of Total Assets

Central Bank Interest Rate = As reported by the Saudi Central Bank

Inflation Rate = As reported by the Saudi Central Bank.



**Figure 1.** Study model.

# 2.7. Data Sources

The study data sources are secondary sources, and are divided into two types:

1. Published Reports and Documents: Such as annual reports of (SIB), financial statements, and official publications, websites, disclosures and explanations, during the period (2014-2023).

2. Previous Studies and Literature, including academic research, books, and relevant theoretical or empirical studies related to (SIB) and (IA).

#### 2.8. Statistical Methods Used in the Study

The data was processed using E-Views statistical software by applying the following tests: Descriptive statistics; Correlation and multicollinearity tests; Time series analysis and Regression analysis

#### 2.9. Previous Studies

Al-Raythi [8] identified determinants of long-term deposits in (SIB), finding that weak investment returns negatively impacted deposit volume, while bank size and branch numbers had a positive effect. The study highlighted that "higher liquidity and conventional bank interest rates negatively affect term deposits" and recommended Islamic banks develop high-yield strategies and reduce excess liquidity through mergers and Sharia-compliant instruments.

Bouhider [9] linked deposits to profitability in Malaysian Islamic banks (2010–2019), reporting a "strong positive relationship between deposit-to-asset ratios and profitability," with capital adequacy and financing ratios also boosting profits. GDP, inflation, and exchange rates had negative impacts. The study urged banks to develop deposit instruments to enhance profitability.

Haddawee and Flayyih [10] analyzed Jordanian commercial banks (2012–2016), showing that "savings deposits contributed most to profitability, followed by time deposits," and recommended strategic diversification to attract investment deposits.

Samhan and Jum'ah [11] examined how bank size and operational risks affect (IA) returns, noting that Islamic banks reinvest savings under Sharia principles, unlike interest-based conventional banks.

Kassim and Rama [12] studied Indonesian Islamic banks, revealing that "profit rate returns, and conventional deposit rates influence Islamic bank deposits" while conventional loan rates affected financing demand. The study emphasized that "profit factors expose Islamic banks to interest-rate risk."

Khalifat [13] analyzed external and internal factors influencing deposit growth in Islamic banks (2013–2022), finding that combined factors significantly impacted total deposits, while internal factors alone affected investment and current deposits. External factors showed no significant impact on investment or current deposits, with variations by country.

#### 2.10. Investment Accounts (IA)

#### 2.10.1. Introduction

Islamic banks strive to adhere to the principles of Islamic Shariah in all their banking activities, avoiding any dealings involving interest, whether by giving or receiving them [14, 15]. They rely on the principle of profit- and loss-sharing to attract investment deposits and employ various Islamic financing instruments for investment and funding activities [16]. Additionally, they provide all banking services in accordance with Islamic Shariah rules. The investment deposits that Islamic banks endeavor to attract are referred to as (IA), which are among the fundamental financial instruments of Islamic banks. Through these accounts, depositors' funds were pooled and invested in accordance with Islamic legal rules [17]. These accounts are based on the concept of *Mudarabah*, whereby a bank invests depositors' funds in projects and shares the resulting profits with them. Depositors bear losses unless the bank has proven to be negligible [18].

## 2.10.2. The Concept of (IA)

- I. Owners' deposits aim to grow and increase their funds either directly or indirectly [19].
- II. Islamic banks receive cash deposits from individuals seeking to invest in their funds to achieve profits [20].
- III. The channel through which client funds flow into Islamic banks for investment under certain conditions is derived from the rules of the *Mudarabah* contract [21].
- IV. Deposits received by banks from individuals willing to participate in the bank's financing and investment activities based on joint *Mudarabah*, entitling these accounts to a share of the profit realized during the relevant financial year. [22].

Researchers describe (IA) as agreements where clients deposit funds with a bank for investment - either broadly or in specific sectors, as outlined in the contract. In return, clients share in the profits based on the *Mudarabah* contract, following the principle that reward corresponds to risk.

# 2.11. *Types of (IA)*

# 2.11.1. Credit Accounts

Deposits that the bank can use freely, where profits and losses belong to the bank, not the depositor [23].

- I. Current Accounts: Allow unrestricted deposits/withdrawals, accessible via checks and other tools.
- II. Demand Deposit Accounts: Like current accounts but require the depositor/agent's presence for transactions, with no check withdrawals allowed.

# 2.11.2. Investment Accounts (IA)

Deposits used for organized investment and financing, where depositors share in profits (per contract). They are the main funding source for Islamic banks.

- I. Savings Accounts: Encourage small investors; allow limited withdrawals under certain conditions.
- II. Notice Accounts: Withdrawals require advance notice.

## III. Fixed-Term Accounts: Deposits locked for a set time as per contract.

Special (IA): Deposits designated for specific projects. Depositors bear profits and losses, while the bank earns a share of profits but isn't liable for losses unless negligent.

# 2.12. Factors Influencing the Attractiveness of (IA) in Islamic Banks

It can be classified as follows:

#### 2.12.1. Economic Factors

- I. Rate of Return: It is one of the most fundamental factors attracting depositors. The higher the return, the more attractive the account becomes [11].
- II. Inflation: It affects the purchasing power of invested funds, prompting depositors to seek accounts that offer protection against inflation [24].

## 2.12.2. Associated Risks

Operational Risks: Islamic banks face operational risks arising from the nature of their investments. These include factors such as market volatility and exchange rate fluctuations, which can negatively affect profitability and, in turn, reduce the attractiveness of (IA) [25].

- 1. External Risks: These relate to global economic changes and political conditions, which may influence a bank's stability and ability to meet obligations [26].
- 2. Trust and Credibility.
- I. Bank reputation: Islamic banks play a significant role in attracting depositors. Banks with a solid reputation and high credibility are better positioned to attract (IA) [11].
- II. Transparency: Providing clear information about how funds are invested, and profits are distributed enhances customer trust and attracts more depositors.

#### 2.12.3. Shariah Compliance and Commitment

Adherence to Islamic principles is a key factor in depositors seeking Shariah-compliant investment options. Banks that visibly demonstrate their commitment to these principles are more successful at attracting clients [25].

#### 2.12.4. Services Provided

- I. Product Diversification: Offering a broad range of investment products and financial services can increase (IA's) appeal. The more choices investors have, the greater their likelihood of attracting (Samhan & Mubarak, 2023).
- II. Technical Support and Advisory Services to investors: It builds trust and encourages depositors to open joint (IA) [27].

# 2.12.5. Best Practices for Enhancing the Profitability of (IA)

Islamic banks aim to balance financial sustainability with developmental goals in accordance with Shariah principles. To strengthen the profitability of (IA) and increase their attractiveness to clients, banks must adopt a range of best practices [28].

## 2.12.5.1. Effective Risk Management

It is fundamental for safeguarding depositor funds and maximizing returns [29].

- I. Risk Assessment: Islamic banks should conduct comprehensive evaluations of all relevant risks, including credit, market, and operational risks. Appropriate mitigation strategies must be applied to safeguard investments and ensure stable returns.
- II. Portfolio Diversification: Diversifying investments across various sectors and industries helps reduce exposure to sector-specific risks while improving the potential for higher returns [11].

## 2.12.5.2. Compliance with Shariah Standards

Adherence to Islamic legal principles is a key pillar of Islamic finance [30]:

- I. Shariah Board Empowerment: Independent Shariah supervisory boards are essential for overseeing compliance with Islamic rule. A well-functioning board boosts client confidence and encourages participation in Shariah compliant investment vehicles.
- II. Transparency in Operations: Disclosing investment methods and profit distribution mechanisms reinforces depositor trust and ensures compliance with the Shariah guidelines [31].

## 2.12.5.3. Improving Customer Experience

Client satisfaction directly influences retention and account growth:

- I. Flexible Product Offerings: Offering customizable investment products that cater to diverse depositor needs, such as short- and long-term investments, can improve the attractiveness of Islamic (IA) [24].
- II. Customer Support Services: Delivering high-quality customer service, including financial advisory support, enhances client loyalty and encourages account expansion [8].

## 2.12.5.4. Leveraging Financial Technology

Technology facilitates efficient service delivery and decision-making:

- I. Digital Transformation: Investing in financial technology (FinTech) solutions simplifies the processes of account opening, fund transfers, and investment monitoring, enhancing customer convenience [32].
- II. Data Analytics: Customer data analytics help Islamic banks better understand depositor behavior and anticipate client needs [33] which can guide the development of more targeted investment products.

## 2.12.5.5. Human Capital Development

Qualified personnel are crucial for informed investment decisions [34]:

- I. Continuous Training: Providing regular professional development and training to staff increases their competency in financial analysis and market dynamics.
- II. Recruitment of Investment **Experts:** Attracting and retaining financial professionals ensures that banks develop sophisticated investment strategies that align with the market trends.

# 2.12.5.6. Enhancing Transparency and Reporting

Transparent communication fosters depositor confidence:

- I. Periodic Reporting: Issuing regular performance reports regarding (IA) allows depositors to track returns and evaluate performance objectively [11].
- II. Clear Risk-Return Communication: Offering clear disclosures about expected returns and associated risks reduces information asymmetry and alleviates depositor concerns.

## 2.12.6. The Importance of (IA)

(IA) provide Islamic banking with an alternative to conventional fixed-term deposits. Unlike conventional deposits - where the principal and a predetermined interest are guaranteed while the depositor bears minimal risk - (IA) operate under Mudarabah contracts. In this arrangement, the depositor ( $Rabb\ al-mal$ ) provides the capital, while the bank (Mudarib) manages the investment. The bank does not guarantee principal or profit unless it is proven negligent, engages in misconduct, or breaches the contract. Profits are distributed according to actual outcomes and the profit-sharing ratio agreed upon in the contract.

The role of (IA) is more significant for Islamic banks than for conventional banks. Since Islamic banks cannot pay interest, they rely on investing these deposits directly or through partnerships to generate profits. At the end of the fiscal year, profits are distributed to depositors after deducting the bank's administrative, research, and investment management costs [35].

For a deposit to qualify as a fixed (IA) two crucial conditions must be met:

- 1. Time Element: The deposit must remain with the bank for a minimum of three months.
- 2. Minimum Amount Requirement: The deposit's value must not fall below a specified threshold, which varies by currency.

(IA) is one of the most substantial types of deposit in Islamic banking, they form a vital funding source, enabling them to support both financing and investment [36].

## 2.12.7. Methods Used by Islamic Banks to Attract (IA)

The establishment of Islamic banks in compliance with Shariah principles has been central to attracting Muslim clients, with religious motivation playing a significant role. To offer alternatives to interest-based deposits in conventional banking, Islamic banks have introduced several innovative formats [37].

- 1- Mudarabah contract between depositors (capital owner) and Islamic banks.
- 2- Qard hasan contracts (benevolent loan) between current account holder and Islamic banks.
- 1. A variety of (IA) formats, including [38] Unrestricted (IA); Restricted (IA); Investment savings accounts; Profit-loss-sharing investment certificates and Profit-loss-sharing savings certificates.

## 2.12.8. Core Strategies for Attracting IA [39]

- 1. Price-Based Competition Strategy: Offering higher returns to depositors to attract more clients.
- 2. Non-Price Competition Strategy
  - I. Differentiating services through quality, distribution, and customer focus rather than return rates.
  - II. Service quality becomes the benchmark for client satisfaction and IA attraction [40].

# 2.12.9. Key Non-Price Practices Include

- 1- High-Quality Banking Services: Offering diverse services such as promotional support for client businesses, home banking via direct computer links, issuing letters of credit/guarantees, managing securities portfolios, and providing banking cards.
- 2- Providing Investor Financing: Channeling depositors' funds into optimal investments, either directly, through subsidiaries, or by participating in local, regional, and international markets.
- 3- Ensuring Depositor Security: Maintaining liquidity to meet withdrawals on demand while sustaining adequate financing for investors, thereby balancing stability and profitability.

The researchers suggest that Islamic banks aim to attract direct investment by adopting prudent policies and procedures. These efforts include offering various ranges of clients benefits such as facilitating access to necessary services, delivering banking solutions directly or via multiple electronic platforms, and providing tangible and monetary incentives such as reduce or waive fees and commissions while prioritizing clients' access the available facilities.

## 2.13. Challenges and Opportunities

Challenges: Intense competition with conventional banking institutions that offer fixed interest returns on deposits [35] and Adherence to Shariah compliance requirements for all business operations, which may limit investment opportunities [26].

Opportunities: Raising awareness of Islamic investment by committing to providing Sharia-compliant investments, which increases demand for Islamic investment [27] and Improving services provided by providing more attractive investment products [39].

# 2.14. Profitability

The major goal of Islamic bank's is to maximize profitability [41] it is essential for ensuring viability, strengthening financial standing, enhancing shareholder equity, improving solvency and liquidity [18] and increasing ability to meet obligations and withstand risks. As a critical performance indicator, profitability determines a bank's competitiveness and sustainability. To achieve this, Islamic banks must focus on mobilizing depositors' funds and utilizing them efficiently to generate maximum returns [42].

# 2.15. Profitability in (SIB)

Profitability in (SIB) is a critical measure of their financial performance and sustainability and remains a key indicator of their financial health and operational efficiency [43].

Operating under Shariah-compliant principles, these banks avoid conventional interest-based transactions, instead utilizing profit-and-loss sharing models such as *Mudarabah* and *Musharakah* [44] as well as asset-backed financing instruments such as *Ijarah* and *Murabaha*.

(SIB) sector has grown substantially over the past two decades, supported by strong government backing, a large Muslim population, and an increasing demand for ethical financial products [7].

The profitability of (SIB) is shaped by a range of internal and external factors, including efficient cost control, effective risk management, quality of financing assets, and regulatory support [41]. In 2023, the sector demonstrated robust performance, with the aggregate net income of 10 Saudi-listed banks rising by 11.8% year-on-year to SAR 70.1 billion (approximately \$18.69 billion), driven by higher net interest margins and lower impairment charges [45].

Notably, Alinma Bank reported a substantial 34.5% increase in net profit, reaching SAR 4.839 billion, reflecting the bank's strong operational capabilities and alignment with the national economic growth.

Similarly, Banque Saudi Fransi achieved a net profit of SAR 4.2 billion by 2023, underscoring its solid financial performance. These figures highlight the resilience and competitiveness of (SIB) within the Kingdom's evolving financial landscape [45].

Additionally, macroeconomic elements, such as oil price fluctuations, fiscal policy, and economic diversification efforts under Vision 2030, also play a significant role. Evaluating profitability within this context provides valuable insights into the competitive positioning and long-term viability of Islamic banks in Kingdom's evolving financial landscape [46].

## 2.16. Data Analysis and Hypothesis Testing

Below is a presentation of the results of the descriptive statistical analyses of the study variables, results of the tests for the suitability of the study model, and results of the hypothesis testing.

# 2.17. Descriptive Statistics for Study Variables

This section includes the results of descriptive statistics for the independent, dependent, and control variables based on the financial data of (SIB) for the period (2014–2023).

# 2.17.1. First: Description of the Dependent Variable

The dependent variable represents the profitability of (SIB) and is measured by two indicators: return on assets and return on equity. The descriptive statistics for these two indicators are presented below.

Descriptive statistics of the profitability for the period (2014-2023).

C1-	D - 4 A 4	D -4 E
Scale	Return on Assets	Return on Equity
Arithmetic mean	1.700	12.814
Standard deviation	0.628	5.169
Maximum value	2.760	23.870
Minimum value	0.040	0.290

Table 1 shows a description of the profitability measures in (SIB) for the period (2014-2023), as the table shows that there is a large variation in the return on assets between (SIB), as the arithmetic mean was (1.700) and the standard deviation was (0.628). The maximum and minimum values were (2.760 and), while the minimum value was (0.040).

The table also shows that there is a large variation in the return on equity among (SIB), with an arithmetic mean was (12.814) and a standard deviation was (5.169). The maximum and minimum values were (23.870 and), while the minimum value was (0.290).

#### 2.17.2. Second: Description of the Independent Variable

The independent variable is represented by (IA) and measured by (three) variables: the change in (IA), change in the bank's interest margin, and average return on deposits. The descriptive statistics for these variables are presented below.

**Table 2.** Descriptive statistics for (IA) for the period (2014-2023).

Scale Change in (IA)		Change in bank interest margin	Average return on deposits	
Arithmetic mean	24.249	3.350	2.420	
Standard deviation	38.920	0.682	1.693	
Maximum value	176.000	5.170	8.520	
Minimum value	-38.307	1.900	0.620	

Table 2 shows a description of the (IA) metrics in (SIB) for the period (2014-2023), as the table shows a large variation in the change in (IA) among (SIB), with an arithmetic mean was (24.249) and a standard deviation was (38.920). The maximum value was (176.000), whereas the minimum value was (-38.307).

The table shows a large variation in the change in the bank's interest margin among (SIB), where the arithmetic mean was (3.350) and the standard deviation was (0.682). The maximum and minimum values were (5.170 and), respectively, and the minimum value was (1.900).

The table also shows a large variation in the average return on deposits among (SIB), with an arithmetic mean was (2.420) and standard deviation was (1.693). The maximum and minimum values were (8.520 and), respectively; the minimum value was (0.620).

## 2.17.3. Third: Description of the Controlling Variables

The control variables are banks' total assets, central bank interest, and inflation. The descriptive statistics for these variables are as follows.

**Table 3.** Descriptive statistics for the controlling variables for the period (2014-2023).

Scale	Total Bank Assets	Central Bank Interest	Inflation
Arithmetic mean	196,076,615.625	1.885	1.635
Standard deviation	189,177,331.847	1.471	1.692
Maximum value	808,098,272	5.592	3.445
Minimum value	45,230,000	0.633	-2.093

Table 3 shows a description of the controlling variables in (SIB) for the period (2014-2023), as it is clear that there is a large variation in the total assets between (SIB), as the arithmetic mean was (196.077) million riyals and the standard deviation was (189.177) million riyals. The maximum and minimum values were (808.098) million SR and the minimum was (45.230) million SR, respectively.

The table shows that there was a large variation in the interest of the Central Bank during the study period, with an arithmetic mean was (1.635) and a standard deviation was (1.471). The maximum and minimum values were (5.592 and), while the minimum value was (0.633).

The table also shows a large variation in inflation during the study period, with an arithmetic mean (1.635) and standard deviation (1.692). The maximum value was (3.445), whereas the minimum value was (-2.093).

#### 2.18. Intercorrelation Matrix

In this study, Pearson correlation coefficients were used, and results in Table 4 indicate that no strong correlations exist between the independent variables, as all coefficients remained below the critical threshold of  $\pm 0.80$ .

**Table 4.** Intercorrelation matrix of independent variables.

Scale	Total Bank Assets	Central Bank Interest	Inflation
Arithmetic mean	196,076,615.625	1.885	1.635
Standard deviation	189,177,331.847	1.471	1.692
Maximum value	808,098,272	5.592	3.445
Minimum value	45,230,000	0.633	-2.093

#### 2.19. Variance Inflation Factor

The values of the variance inflation factors for the independent variables are shown as follows.

Table 5.

Variance inflation factors (VIF) for independent variables.

Variables	VIF
Change in Mutual Fund Accounts	1.031
Change in Bank Interest Margin	1.042
Average Return on Deposits	1.013

The values of the variance inflation factor (VIF) for the independent variables in Table 5 indicate that there are no strong correlations between them, as the value of (VIF) reached between (1.013-1.042), which is less than the value (10).

#### 2.20. Testing The Stationarity of Time Series Data

The augmented Dickey (ADF) test is commonly used in this field. It checks for the presence of a unit root by testing the null hypothesis of the presence of a unit root. The decision was made that there is no unit root (i.e., the time series is stationary) if the significance level of the calculated test value was less than 0.05. The results were distributed over the study sample as follows:

Table 6.

Unit root test results for study variables.

variable	Calculated value at level	P-Value	Result
Return on Assets	-10.712	0.000	stable at level
Return on Equity	-10.141	0.000	stable at level
Change in Mutual Fund Accounts	-4.856	0.000	stable at level
Change in Bank Interest Margin	-4.942	0.000	stable at level
Average Return on Deposits	-5.215	0.000	stable at level
Total Bank Assets	-5.839	0.000	stable at level
Interest	-6.257	0.002	stable at level
Inflation	-3.720	0.026	stable at level

Table 6 shows the results of the ADF test to examine the stability of the time series of the study variables. The probability values of any of the study variables do not exceed the value (0.05), which indicates the stability of the time series; thus, the unit root hypothesis is rejected.

# 2.21. Estimation of Study Models

The results are as follows:

Table 7.

Estimates of study models.

Lagra Lagra		agrange Multiplier Hausman			The most accurate and consistent model	
Hypotheses	Ch <sup>2</sup>	Sig	Ch <sup>2</sup>	Sig	The most accurate and consistent model	
H01	12.249	0.057	11.961	0.018	Fixed effects model	
H01-1	11.805	0.067	2.485	0.289	pooled regression model	
H01-2	10.633	0.100	13.837	0.001	Fixed effects model	
H01-3	10.067	0.122	-	-	pooled regression model	
H02	13.162	0.041	12.094	0.017	Fixed effects model	
H02-1	12.977	0.043	0.153	0.926	Random effects model	
H02-2	8.296	0.217	-	-	pooled regression model	
H02-3	8.308	0.216	1.577	0.455	pooled regression model	

Table 7 shows that the fixed effects model was the most accurate in estimating the models for the hypotheses (H01, H01-2, H02), the joint regression model was the most accurate in estimating the models for the hypotheses (H01-1, H01-3, H02-2, H02-3), and the random effects model was the most accurate in estimating the model for the hypothesis (H02-1).

# 2.22. Testing the Study Hypotheses

# 2.22.1. Main Hypothesis (H<sub>0</sub>)

This hypothesis was tested by testing its derivative hypotheses according to each measure of profitability of (SIB).

#### 2.23. Testing Sub-Hypothesis 1 ( $H_{01}$ )

The first sub-hypothesis examines the effect of (IA) on the sustainability of (SIB) profitability as measured by return on assets. This hypothesis states that: There is no statistically significant effect on the significance level ( $\alpha \le 0.05$ ) of (IA)

and their dimensions (change in (IA), average return on deposits, and change in interest margin) on the profitability of (SIB), as measured by (ROA) and (ROE).

**Table 8.** Results of testing the effect of **(IA)** on return on assets.

Uwnothogog	Lagrange Multiplier		Hausma	ın	The most accurate and consistent model
Hypotheses	Ch <sup>2</sup>	Sig	Ch <sup>2</sup>	Sig	The most accurate and consistent model
H01	12.249	0.057	11.961	0.018	Fixed effects model
H01-1	11.805	0.067	2.485	0.289	pooled regression model
H01-2	10.633	0.100	13.837	0.001	Fixed effects model
H01-3	10.067	0.122	-	1	pooled regression model
H02	13.162	0.041	12.094	0.017	Fixed effects model
H02-1	12.977	0.043	0.153	0.926	Random effects model
H02-2	8.296	0.217	-	-	pooled regression model
H02-3	8.308	0.216	1.577	0.455	pooled regression model

Table 8 shows the existence of a significant effect of (IA) on the profitability of (SIB) measured by the return on assets, where the value was (F=6.273) and at a significance level of (Sig F=0.000), which is less than 0.05. The value of the coefficient of determination (R<sup>2</sup>=0.533) also indicates that 53.3% of the variance in (return on assets) can be explained by the variance in (IA), with other factors held constant.

The value of (B=0.004) indicates that the effect of (change in (IA) is significant, as the value of t was (2.400) with a significance level of (Sig=0.022). The value of (B=0.211) indicates the effect of (return on deposits), which is insignificant, as the value of t was (1.027) with a significance level of (Sig=0.312). The value of (B=0.223) indicates the effect of (bank interest margin), which is significant, as the value of t was (2.709) with a significance level of (Sig=0.011).

For the control variables, the value of (B=0.274) indicates the effect of (total assets), which is insignificant because the value of t is (1.603) with a significance level of (Sig=0.119). The value of (B=-0.278) indicates the effect of (interest), which is significant, as the value of t was (-3.821) with a significance level of (Sig=0.001). The value of (B=-0.102) indicates the effect of (inflation), which is a significant effect, as the value of t was (-2.170) with a significance level of (Sig=0.037).

Accordingly Sub-Hypothesis 1 ( $H_{01}$ ) is rejected, and the alternative hypothesis ( $H_{11}$ ) is accepted, which states that: There is a statistically significant effect of (IA) and their dimensions on the profitability of SIB as measured by (ROA).

Based on this hypothesis, Sub-Hypothesis 2  $(H_{02})$  was derived to investigate the effect of joint (IA) variables on (ROA). The results are as follows.

**Table 9.** Results of testing the effect of joint (IA) variables on return on assets.

Hemothogog			Hausman		The most accurate and consistent model	
nypomeses			Sig	The most accurate and consistent model		
H01	12.249	0.057	11.961	0.018	Fixed effects model	
H01-1	11.805	0.067	2.485	0.289	pooled regression model	
H01-2	10.633	0.100	13.837	0.001	Fixed effects model	
H01-3	10.067	0.122	-	-	pooled regression model	
H02	13.162	0.041	12.094	0.017	Fixed effects model	
H02-1	12.977	0.043	0.153	0.926	Random effects model	
H02-2	8.296	0.217	-	-	pooled regression model	
H02-3	8.308	0.216	1.577	0.455	pooled regression model	

## 2.24. Ho1a: The Effect of Changes in (IA) on Return on Assets

This hypothesis states that: There is no statistically significant effect of the change in (IA) on the profitability of SIB as measured by (ROA).

Table 9 shows the existence of a significant effect of the change in (IA) on the profitability of (SIB) measured by the return on assets, where the value was (F=8.578) and at a significance level of (Sig F=0.000), which is less than 0.05. The value of the coefficient of determination ( $R^2=0.495$ ) also indicates that 49.5% of the variance in (return on assets) can be explained by the variance in the change in (IA), with other factors held constant. The value of (B=0.003) indicates the effect of (change in IA), which is a significant effect, as the value of t was (2.591) with a significance level of (Sig=0.014).

Among the control variables, total assets had a significant positive effect (B = 0.522, t = 4.848, p < 0.001), while interest showed an insignificant negative effect (B = -0.095, t = -1.891, p = 0.067). Inflation had a significant negative effect (B = -0.121, t = -2.997, p = 0.005).

Accordingly, there is no statistically significant effect of the bank's interest margin on the profitability of (SIB) as measured by (ROA).

#### 2.25. $H_{01}B$ : The Effect of the Return on Deposits on Return on Assets

This hypothesis states that: "There is no statistically significant effect of the return on deposits on the profitability of SIB as measured by (ROA).

Table 9 shows the existence of a significant effect of the return on deposits on the profitability of (SIB) measured by the return on assets, where the value was (F=19.395) and the significance level was (F=10.000), which is less than 0.05. The value of the coefficient of determination (F=10.809) also indicates that 80.9% of the variance in (return on assets) can be explained by the variance in the return on deposits, with other factors held constant. The value of (F=10.208) indicates the effect of (return on deposits), which is significant, as the value of t was (2.426) with a significance level of (F=10.208) indicates

For the control variables, the value of (B=0.403) indicates the effect of (total assets), which is significant when the value of t was (3.783) with a significance level of (Sig=0.001). The value of (B=-0.061) indicates the effect of (interest), which is significant, as the value of t was (-2.500) with a significance level of (Sig=0.018). The value of (B=-0.121) indicates the effect of (inflation), which is significant, as the value of t was (-6.212) at a significance level of (Sig=0.000).

Accordingly, it is clear that "There is a statistically significant effect at a significance level ( $\alpha \le 0.05$ ) of the return on deposits on the profitability of (SIB) as measured by the return on assets".

Hoic: The effect of the bank's interest margin on return on assets

This hypothesis states that: "Hoic: There is no statistically significant effect of the bank's interest margin on the profitability of (SIB) as measured by (ROA).

Table 9 shows the existence of a significant effect of the bank's interest margin on the profitability of (SIB) measured by the return on assets, where the value was (F=7.637) and at a significance level of (Sig F=0.000), which is less than 0.05. The value of the coefficient of determination  $(R^2=0.466)$  also indicates that 46.6% of the variance in (return on assets) can be explained by the variance in the bank's interest margin, with other factors held constant. The value of (B=0.056) indicates the effect of (bank interest margin), which is significant, as the value of t was (2.833) with a significance level of (Sig=0.008).

For the control variables, the value of (B=0.530) indicates the effect of (total assets), which is significant, as the value of t was (4.244) with a significance level of (Sig=0.000). The value of (B=-0.151) indicates the effect of (interest), which is a significant effect, as the value of t was (-2.634) with a significance level of (Sig=0.013). The value of (B=-0.105) indicates the effect of (inflation), which is a significant effect, as the value of t was (-2.811) with a significance level of (Sig=0.008).

Accordingly, it is clear that There is a statistically significant effect of (IA) and their dimensions on the profitability of SIB as measured by (ROA).

## 2.26. Testing the Sub-Hypothesis 2 ( $H_{02}$ )

The second sub-hypothesis examines the effect of (IA) on the sustainability of (SIB) profitability, as measured by return on equity (ROE). This hypothesis states that: There is no statistically significant effect on the significance level ( $\alpha \le 0.05$ ) of (IA) and their dimensions (change in (IA) , average return on deposits, and change in interest margin) on the profitability of (SIB) as measured by return on equity (ROE).

**Table 10.** Results of testing the effect of (IA) on return on equity.

Voutable	Return on equity						
Variable	В	T	SigT				
Change in Mutual Fund Accounts	0.043	3.321	0.002				
Change in Bank Interest Margin	3.080	2.496	0.018				
Average Return on Deposits	1.270	1.330	0.193				
Total Bank Assets	1.449	1.187	0.244				
Interest	-0.779	-0.814	0.421				
Inflation	-0.096	-0.304	0.763				
$\mathbb{R}^2$	0.700						
F	12.811						
Sig. F	0.000						

Table 10 shows the existence of a significant effect of (IA) on the profitability of (SIB) as measured by the return on equity, where the value was (F=12.811) and at a significance level of (Sig F=0.000), which is less than 0.05. The value of the coefficient of determination ( $R^2=0.700$ ) also indicated that 70.0% of the variance in (return on equity) can be explained by the variance in (IA), with other factors held constant.

The value of (B=0.043) indicates that the effect of (change in IA) is significant, as the value of t was (3.321) with a significance level of (Sig=0.002). The value of (B=3.080) indicates the effect of (return on deposits), which is significant, as the value of t was (2.496) with a significance level of (Sig=0.018). The value of (B=1.270) indicates the effect of (bank interest margin), which is insignificant because the value of t is (1.330) with a significance level of (Sig=0.193).

For the control variables, the value of (B=1.449) indicates the effect of (total assets), which is insignificant, as the value of t was (1.187) with a significance level of (Sig=0.244). The value of (B=-0.779) indicates that the effect of (interest) is insignificant, as the value of t is (-0.814) with a significance level of (Sig=0.421). The value of (B=-0.096) indicates that the effect of (inflation) is insignificant, as the value of t is (-0.304) with a significance level of (Sig=0.763).

Accordingly, Sub-Hypothesis 2 (H<sub>02</sub>) is rejected, and the Alternative Hypothesis (H<sub>12</sub>) is accepted, which states that There is a statistically significant effect of (IA) and their dimensions on the profitability of (SIB) as measured by (ROE).

Based on this hypothesis, Sub-Hypothesis 2 ( $H_{02}$ ) was derived to investigate the effect of joint (IA) variables on (ROE). The results are as follows.

**Table 11.** Results of testing the effect of joint (IA) variables on return on equity.

Hypothesis	H02-1		H02-2		H02-3	
Variable	В	T (SigT)	В	T (SigT)	В	T (SigT)
Change in Mutual Fund Accounts	0.037	$(0.046)\ 2.070$	-	-	ı	-
Change in Bank Interest Margin	-	-	2.797	(0.016) 2.525	ı	-
Average Return on Deposits	-	-	-	-	0.367	(0.718) 0.365
Total Bank Assets	3.787	(0.000) 4.182	2.377	(0.024) 2.366	5.341	(0.036) 2.194
Interest	-0.231	-0.500(0.620)	0.377	(0.387) 0.875	-0.515	-0.365(0.718)
Inflation	-0.650	-1.630(0.112)	0.184	(0.538) 0.622	-0.383	-1.324(0.195)
$\mathbb{R}^2$	0.444		0.580		0.564	
F	6.980			12.089		5.922
Sig (F)		0.000	0.000			0.000

#### 1. Effect of Change in (IA) on (ROE)

There is a significant positive effect (F=6.980, Sig=0.000, R²=0.444; B=0.037, t=2.070, Sig=0.046). Total assets were significant; interest and inflation were not.

2. Effect of Return on Deposits on (ROE)

A significant positive effect was found (F=12.089, Sig=0.000, R<sup>2</sup>=0.580; B=2.797, t=2.525, Sig=0.016). Total assets significant; interest and inflation not.

3. Effect of Bank's Interest Margin on (ROE)

No significant effect observed (F=5.922, Sig=0.000, R<sup>2</sup>=0.564; B=0.367, t=0.365, Sig=0.718). Only total assets were significant.

# 3. Findings

- 1. (SIB) differs in asset efficiency due to financing portfolio quality and operational size.
- 2. Differences in (ROE) arise from capital structures, dividend policies, and investment efficiency.
- 3. Variations in (IA) changes reflect differing fund strategies and risk exposures.
- 4. Interest margin differences result from financing costs and pricing strategies.
- 5. Deposit return differences stem from profit distribution and deposit characteristics.
- 6. Total asset variations relate to bank size, strategy, and efficiency.
- 7. Central Bank interest rate shifts (2014–2023) were driven by economic events.
- 8. Inflation varied due to oil prices, taxes, and policy changes.
- 9. (IA) factors significantly impact profitability (ROA and ROE) and play key roles in deposit returns and fund mobilization.

#### 4. Recommendations

- 1. Banks should improve portfolio management and optimize operational scale to enhance asset efficiency.
- 2. Adopt prudent capital structuring, balanced policies with reinvestment, and focus on improving investment efficiency.
- 3. Develop consistent, risk-adjusted fund mobilization strategies while diversifying IA products to reduce exposure.
- 4. Refine pricing models, manage financing costs effectively, and adopt competitive strategies to stabilize interest margins.
- 5. Standardize and increase transparency in profit distribution policies to enhance depositor trust and maintain competitiveness.
- 6. Align asset growth strategies with sustainable expansion plans, leveraging economies of scale to improve efficiency.
- 7. Strengthen macroeconomic monitoring and adopt flexible strategies to adapt to policy and interest rate changes.
- 8. Implement hedging and diversification strategies to mitigate the impact of inflation on investment returns.
- 9. Prioritize the development of IA) by innovating Shariah-compliant investment products, improving service quality, and increasing depositor awareness to maximize profitability.

#### References

- [1] A. A. Farah, M. A. Mohamed, M. Ali Farah, I. A. Yusuf, and M. S. Abdulle, "Impact of Islamic banking on economic growth: a systematic review of SCOPUS-indexed studies (2009–2024)," *Cogent Economics & Finance*, vol. 13, no. 1, p. 2490819, 2025. https://doi.org/10.1080/23322039.2025.2490819
- [2] R. Zamil and S. Srairi, "Islamic banks' profitability in the GCC: Evidence from a post-oil price shock environment," *Emerging Markets Finance and Trade*, vol. 59, no. 4, pp. 1234–1250, 2023.

- [3] M. Khan and R. Rabbani, "Financial performance of Islamic banks: A study using CAMELS model in Saudi Arabia," *Journal of Islamic Accounting and Business Research*, vol. 13, no. 1, pp. 18–35, 2022.
- [4] M. Abdullahi, A. Abdul-Rahman, and M. Abduh, "The role of Islamic banking in promoting inclusive economic development: Evidence from selected OIC countries," *International Journal of Islamic and Middle Eastern Finance and Management*, vol. 14, no. 3, pp. 495–513, 2021.
- [5] A. Raza, N. Shah, and T. Ahmed, "The nexus between IA management and bank performance: Empirical insights from Islamic financial institutions," *Research in International Business and Finance*, vol. 55, p. 101322, 2021.
- [6] S. Rajha, "The impact of determinants on the development of saving and acceptance of deposits in commercial banks in Saudi Arabia during the period 2008–2012," *Shaqra University Journal*, vol. 6, pp. 99–124, 2016.
- [7] F. Aysan, M. Disli, and H. Ozturk, "Banking sector performance and macroeconomic indicators: Evidence from Islamic and conventional banks in the MENA region," *Journal of International Financial Markets, Institutions and Money*, vol. 68, p. 101232, 2020.
- [8] Y. Al-Raythi, "An econometric study of the determinants of investment deposits in Saudi Islamic banks," *The International Journal for Publishing Research and Studies*, vol. 21, no. 6, pp. 82-120, 2021.
- [9] R. Bouhider, "Econometric study of the effect of deposits on Islamic banks profitability: Evidence from Malaysia," *Economics Bulletin*, vol. 41, no. 3, pp. 1292-1302, 2021.
- [10] A. H. Haddawee and H. H. Flayyih, "The relationship between bank deposits and profitability for commercial banks," *International Journal of Innovation, Creativity and Change*, vol. 13, no. 7, pp. 226-234, 2020.
- [11] H. Samhan and K. Jum'ah, "The impact of Islamic banks' size and operational risks on the profitability of unrestricted investment accounts holders," *Dirasat: Shari' and Law Sciences*, vol. 45, no. 2, Suppl. 2, pp. 1–14, 2018.
- [12] S. Kassim and A. Rama, "Analyzing determinants of assets and liabilities in Islamic banks: Evidence from Indonesia," *Review of Islamic Economics, Finance, and Banking. Indonesia*, 2013.
- [13] M. Khalifat, "The impact of external and internal factors on deposit growth in Islamic banks," PhD Thesis, The World Islamic Sciences and Education University Jordan, 2012.
- [14] M. Ali, "The prohibition of riba and its impact on Islamic banking practices," *Journal of Islamic Accounting and Business Research*, vol. 12, no. 2, pp. 163–177, 2021.
- [15] P. Abedifar, P. Molyneux, A. Tarazi, and Z. Iqbal, "Islamic banking and finance: Recent empirical literature and directions for future research," *Journal of Economic Surveys*, vol. 34, no. 4, pp. 779–818, 2020.
- [16] M. Abduh and I. Umar, "Profit-and-loss sharing in Islamic banks: Issues and challenges," *Journal of Islamic Marketing*, vol. 12, no. 8, pp. 1534–1548, 2021.
- [17] S. Archer and A. Karim, Islamic finance: Principles and practice. Chichester, UK: Wiley, 2022.
- [18] J. Boukhatem and M. Djelassi, "Liquidity risk in the Saudi banking system: is there any Islamic banking specificity?," *The Quarterly Review of Economics and Finance*, vol. 77, pp. 206-219, 2020.
- [19] M. Masmali, "Rulings on profit in Islamic jurisprudence and its application in modern transactions," 1993.
- [20] M. Hussain, A. Shahmoradi, and R. Turk, "An overview of Islamic finance (IMF Working Paper No.WP/15/120)," 2015. https://www.imf.org/en/Publications/WP/Issues/2016/12/31/An-Overview-of-Islamic-Finance-42973
- [21] A. Qandouz, Hedging and risk management. UK: E-Books, 2018.
- [22] J. Rafia, M. Ziky, and N. El Hamidi, "Şukūk al-muḍārabah as a financing and liquidity management tool for Islamic banks in Morocco: exploratory analysis of expectations and obstacles," ISRA International Journal of Islamic Finance, vol. 16, no. 2, pp. 65-87, 2024.
- [23] A. Al-Mamoori and M. Al-Amiri, "A scrutiny of the demand deposit (current account) through the lenses of law and Islamic jurisprudence," *Law and World*, vol. 4, no. 1, pp. 54-72, 2022.
- [24] N. Shawwaqfeh, "The impact of inflation risks on the profitability of Jordanian Islamic banks," *Advanced Economic Research Journal*, vol. 7, no. 1, pp. 486–506, 2022.
- [25] M. Ali and A. Sanoussi, "Risks unique to Islamic banks: Operational risk as a model A field study of Al Baraka Bank Agency of Al-Aghwat," *Contemporary Economic Research Journal*, vol. 2, pp. 14-26, 2020.
- [26] IFSB, "Islamic financial services industry stability report," 2020. https://www.ifsb.org/
- [27] M. Farooq and S. Zaheer, "Are Islamic banks more resilient during financial panics?," *Pacific Economic Review*, vol. 20, no. 1, pp. 101-124, 2015. https://doi.org/10.1111/1468-0106.12096
- [28] S. Shehab and Q. Morshed, The impact of credit risk mitigation on the profits of investment deposits in Islamic banks. In N. Mansour & L. Bujosa (Eds.), Islamic Finance: Contributions to Management Science. Cham: Springer, 2024.
- [29] M. Abdeldayem and H. Aldulaimi, "Risk management practices and performance in Islamic banks: Evidence from the GCC region," *International Journal of Islamic and Middle Eastern Finance and Management*, vol. 14, no. 2, pp. 367–386, 2021.
- [30] D. Kusuma and T. Suryanto, "Weathering the storm: Shariah compliance, digital innovation, and stock performance during COVID-19," *Journal of Islamic Monetary Economics and Finance*, vol. 11, no. 2, pp. 385–418, 2025. https://doi.org/10.21098/jimf.v11i2.2437
- [31] H. Samhan and M. Mubarak, "Accounting of Islamic banks: Types of deposits (accounts) in Islamic banks," 2023. https://mail.almerja.com/more.php?idm=207668
- [32] A. Ahmed, "Digital transformation in Islamic finance: Opportunities and strategic focus," *Journal of Islamic Accounting and Business Research*, vol. 12, no. 5, pp. 765–782, 2021.
- [33] J. Smith, "Investment behavior in Islamic banks," *Journal of Islamic Finance*, vol. 12, no. 3, pp. 45–67, 2020.
- [34] V. Nienhaus, Human capital and governance in Islamic financial institutions. In Islamic finance in Europe: Towards a plural financial system. Cheltenham, UK: Edward Elgar Publishing, 2020.
- [35] I. Lukonga, "Islamic finance, consumer protection, and financial stability (IMF Working Paper No. 15/107). IMF," 2015. https://doi.org/10.5089/9781513515106.001
- S. Adznan, "Investment account: Issues, challenges and the way forward," *The Journal of Muamalat and Islamic Finance Research*, vol. 15, no. 1, pp. 1-19, 2018. https://doi.org/10.33102/jmifr.v15i1.98
- [37] M. Obaidullah and N. S. Shirazi, "Islamic finance for micro and medium enterprises," *Islamic Economic Studies*, vol. 23, no. 1, pp. 1–32, 2015.

- [38] AAOIFI, Shari'ah standards. Manama, Bahrain: Accounting and Auditing Organization for Islamic Financial Institutions, 2015.
- [39] V. Naimy and A. Boughanmi, "Enhancing the performance of Islamic banks through digital finance adoption: A MENA perspective," *International Journal of Emerging Markets*, vol. 17, no. 3, pp. 1–20, 2022.
- [40] M. Basheer, *Determinants of choosing Islamic banks from the perspective of individual clients in Kuwait: A field study,* Unpublished Master's Thesis. Middle East University, Jordan, 2013.
- [41] M. Ali, A. Raza, and A. Rauf, "Fintech adoption and profitability in Islamic banking: Evidence from MENA region," *Technological Forecasting and Social Change*, vol. 189, p. 122306, 2023.
- [42] F. Alqahtani, G. Mayes, and K. Brown, "Islamic banking and risk: The impact of profitability on risk," *Research in International Business and Finance*, vol. 42, pp. 860–873, 2017.
- [43] T. Beck, A. Demirgüç-Kunt, and O. Merrouche, "Islamic vs. conventional banking: Business model, efficiency and stability," *Journal of Banking & Finance*, vol. 148, p. 106179, 2022.
- [44] R. Ahmed and L. Khan, "Risk-sharing mechanisms in Mudarabah," *International Review of Islamic Economics*, vol. 8, no. 2, pp. 101–118, 2019.
- [45] Alinma Bank Zawya, "Profit of 10 Saudi-listed banks surged 12% to nearly \$19bln in 2023," 2024. https://www.zawya.com/en/business/banking-and-insurance/profit-of-10-saudi-listed-banks-surged-12-to-nearly-19bln-in-2023-y2apckun
- [46] K. Hassan and S. Aliyu, "A contemporary survey of Islamic banking literature," *Journal of Financial Stability*, vol. 47, p. 100693, 2020.