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Factors affecting the financial outcomes of Iraqi-listed banks

Amanj Mohamed Ahmed*®

Department of Accounting, Darbandikhan Technical Institute, Sulaimani Polytechnic University, Sulaimaniyah, IRAQ

*Corresponding Author: Amanj Mohamed Ahmed

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ABSTRACT

This paper investigates the factors that influence bank financial outcomes in Iraq through an analysis of important financial, corporate governance, and economic aspects. Data between 2017–2021 from annual reports of 9 Iraqi banks listed on the stock exchange was collected. The study used panel data regression with the Generalized Method of Moments (GMM), particularly by utilizing Two-Stage Least Squares (2SLS) to evaluate how asset efficiency, operational performance, board size, GDP, and interest rate affect bank financial outcomes. The results show that AE affects both performance indicators (ROA and ROE) significantly, claiming that high asses efficiency boosts Iraqi banks' profitability. ROA is adversely affected by OP, suggesting that weak efficiency in operations can result in decreased profitability. BOS, as a proxy of corporate governance, has a positive and significant impact on ROE only, indicating that strategic supervision maximizes returns for shareholders. Moreover, GDP has no influence on ROE, but it has a negative impact on ROA, possibly due to greater lending or competition. The findings also illustrate that higher interest rates diminish bank performance, suggesting that banks' profitability may be constrained by rising interest rates because elevated rates can decrease demand for loans, increase the risk of default, and damage credit in general. For academics, decision-makers, and banking experts, this research provides insightful information about the elements affecting the financial outcomes of Iraqi banks. Nonetheless, the results only apply to banking institutions in Iraq; further study in different regions is required for wider generalizability. Future research could also broaden the conclusions of this study by analyzing the larger sample of Iraqi banks and explaining how political instability or changes in regulations might impact the correlations between economic parameters and bank performance.

Keywords: Bank performance; Asset efficiency; Operational performance; Corporate governance; Financial indicators



1 INTRODUCTION

The banking industry serves as a vital source of funding for contemporary trade and business. The idea of effectiveness and efficiency has gained importance due to the growing globalization, which affects both financial and non-financial entities [1]. One of the primary objectives of every bank in a highly competitive economy is to attain sustainability over the long term. To do this, performance-enhancing techniques must be created, executed in practice, and maintained [2]. Therefore, a deep comprehension of the internal and external elements affecting profitability is necessary. The complete quality and efficiency of financial organizations are determined by managers' capacity to recognize and effectively address these problems, which ultimately contributes to the banks' stability and long-term development.

Moreover, a strong banking industry is considered to be one of the key factors that significantly affect the soundness and health of the financial sector, and it may significantly contribute to the appropriate operation of any economy [3][4]. Due to their high level of leverage, banks must conform to stringent requirements set out by the regulatory policy in order to prevent collapse or crises [3][5]. In real life, nevertheless, these financial institutions are subject to economic crises in any nation, particularly those with weak regulatory controls, and consequently, they have detrimental effects on the stability and financial outcomes of banks.

The bank's earnings demonstrate the effectiveness of its management, as well as its capacity to draw clients and expand its position in the market [6]. In general terms, profitability is defined as the amount of cash that a bank makes from sales

^{274*}Corresponding author: <u>amanj.mohamed@spu.edu.iq</u> <u>https://ojs.cihanrtv.com/index.php/public</u>

after deducting all of its costs during a particular period [2][7][8][9]. It is one of the most important measures of the bank's long-term survival, shareholder satisfaction, management efficacy, and investment appeal [10].

There are some factors that affect the financial outcomes of the banking sector, and determining those parameters remains one of the main objectives of academics. Previous investigations examined several factors that affect the financial outcomes of the banking sector. These factors include bank size [2][11][12], leverage [13][14], working capital management [2][15], age [16], macroeconomic variables [17][18], efficiency [12][17][19][20], and corporate governance [21]. This study examines managerial efficiency, corporate governance, and macroeconomic factors together in light of previous empirical evidence outcomes [2][19][20], bridging the diverse and inconsistent findings in previous studies. It aims to have a broad understanding of the most important elements that influence bank financial performance in such environments, with a focus on Iraq, a developing and little-studied market.

The majority of the financial resources in Iraq are held by the banking sector, which still controls a large share of the financial industry. Iraqi banks had 127.6 trillion dinars in total deposits as of the third quarter of 2024, a 4.2% rise over the same period in 2023. The importance of the banking industry in Iraq's financial system is highlighted by this expansion [22]. According to data provided by the Iraqi Stock Exchange (ISX), the traded value for this sector has reached 512 trillion Iraqi dinars, which accounts for 76.3% of the whole traded value [23]. The total number of companies listed on the ISX was 91 in 2023, with 33 of them belonging to the banking sector, accounting for 36.3% [23].

The current research provides some contributions to the existing body of literature. First, by attempting to investigate an extensive range of characteristics that may be possible sources for determining the financial performance of the Iraqi banking system, the study offers novel information regarding the drivers of stability in banks. In addition, the findings of this study can provide valuable information to professionals, scholars, regulators, policymakers, and other interested parties on the primary causes of the financial outcomes of banks in Iraq. These understandings may be used to create financial regulations, strategies for risk mitigation, and governing structures that are more efficient and increase the banking industry's resiliency. Moreover, this study can help with initiatives to boost financial stability, enhance the profitability of the banking industry, and promote economic development by recognizing significant areas of difficulty. Further investigation on banking profitability in other emerging markets, especially those with comparable institutional and financial frameworks, can benefit substantially from the results of this study.

The rest of this study is organized as follows: In the second section, the literature and factors influencing banking profitability and performance are briefly reviewed, along with the formulation of hypotheses. The material and method used in this research are explained in the third section. The fourth section presents the empirical findings and conducts an analysis of the results. The conclusion and recommendation are presented in section five.

2 LITERATURE REVIEW

2.1 THEORETICAL APPROACH

2.1.1 MARKET POWER THEORY (MPT)

According to this theory, banks that have higher market power can increase the interest rate on loans and decrease the rate on deposits. Thus, profitability can be increased [24]. The foundation of this concept is the structure-conduct-performance framework, which holds that banks can control value and improve their financial outcomes in a consolidated banking market. However, according to this belief, the concept of relative market power, banks with distinctive offerings and strong brands can continue to make profitability [25].

2.1.2 EFFICIENT STRUCTURE THEORY (EST)

According to [26], banks that have strong management and efficiency in operation are more profitable. Based on this thought, effective banks may obtain a competitive advantage by lowering expenses, allocating resources as efficiently as possible, and utilizing new technology. From this perspective, management effectiveness can determine bank outcomes, meaning that properly managed banks could exceed competitors despite the structure of the market [27].

2.1.3 AGENCY THEORY (AT)

This hypothesis was improved by [28] and describes how corporate outcomes are impacted by conflicts of interest among owners (principals) and managers (agents). Agency costs in financial organizations are a result of managerial choices that could put individual interests ahead of shareholder profit. Therefore, robust corporate governance practices, including remuneration and regulatory supervision, reduce agency issues and improve financial outcomes [29].

2.2 PREVIOUS STUDIES

There are inconsistent findings in the literature about the factors that influence bank financial performance. For example, research differs in the measurements employed or in whether it focuses on developed or emerging economies. This study attempts to overcome this variance in order to provide conclusions that are more understandable and potentially useful.

2.2.1 STRATEGIC FINANCIAL EFFICIENCY AND FINANCIAL OUTCOMES

Operational effectiveness is a key factor in determining how efficiently a bank uses its resources to create value. Financial outcomes are directly impacted by asset efficiency, which evaluates how well a bank utilizes its assets to make income [13]. Likewise, total performance is greatly influenced by operational efficiency [30], which measures how successfully a bank runs its daily operations to meet financial objectives [19]. It is predicted that enhanced financial outcomes are strongly correlated with better operational effectiveness, which is fueled by excellent management and effective asset use [31]. [32] claimed that in the banking sector, the efficiency ratio is an easy and fast method to assess how well it can convert assets into revenue. The results of previous studies are mixed. For example, [33] conducted a study to investigate the connection between efficiency and performance among Greek companies and discovered that not all profitable businesses are extremely efficient. [2][11][19][20] found a positive correlation between efficiency and bank profitability and performance, while [5][12][17] evidenced a negative association between efficiency and financial outcomes. In light of the aforementioned considerations, the following hypotheses have been set:

H1. Asset efficiency significantly affects the financial outcomes of Iraqi banks.

H2. Operational performance significantly affects the financial outcomes of Iraqi banks.

2.2.2 CORPORATE GOVERNANCE AND FINANCIAL OUTCOMES

A company's board of directors greatly influences financial outcomes by providing operational and policy guidance [34] [35]. [36][37] argues that a larger board is likely to have the specialized knowledge and abilities that are necessary to work effectively and achieve better outcomes. [38] also explains that a company's board of directors may provide important and distinctive assets and lessen its reliance on the environment. From the empirical ground, [39] claims that maintaining sufficient corporate governance procedures has a favorable influence on banks' outcomes. They also proved the substantial benefits of governance mechanisms on banks' profitability. Their investigation examined the connection between Nigerian banks' outcomes and governance standards. The study's findings showed that having larger boards significantly lowers banks' profitability and financial outcomes. However, [40][41] found a favorable link between board size and financial outcomes. Other studies by [42][42][44] reported an adverse association between the size of the board and financial outcome.

H3. There is a significant link between board size and the financial outcomes of Iraqi banks.

2.2.3 MACROECONOMIC INDICATORS AND FINANCIAL OUTCOMES

Macroeconomic factors can be seen as a crucial indicator that is widely used to examine how they affect a bank's performance [12][17]. For example, the growth rate of GDP reflects the aggregate output of a nation's economy [45]. The decline in the quality of the bank's loan portfolio due to adverse economic conditions and a surge in credit losses is sure to hike up the provisions needed against loans, thus adding more financial burdens on the banks and lowering their profitability [46]. Previous studies illustrated mixed findings, [11][20] announced that GDP affects banks' performance positively, while [47][48] reported a negative correlation, and [17] found a non-significant relationship. Furthermore, the rate of interest is the rate at which a bank receives revenue from investments, loans, and other resources that carry interest, and it is predicted to have a favorable impact on banks' earnings [19]. Previous research has shown conflicting empirical results about how interest rate influences banks' performance. From this perspective, [19] found a negative association between interest rates and bank profitability, while [49] showed a favorable connection. Based on the above arguments, the following hypotheses are proposed:

H4. GDP significantly affects the financial outcomes of Iraqi banks.

H5. Interest rate significantly affects the financial outcomes of Iraqi banks.

Building on the aforementioned conversations and developing hypotheses, the conceptual framework that follows might be established:

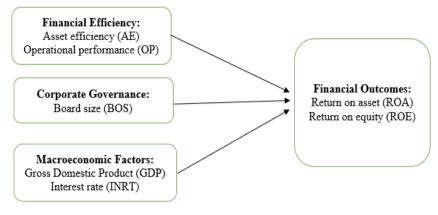


Figure 1. Research framework

3 METHODOLOGY

3.1 SAMPLE AND DATA COLLECTION

Banks that are listed on the Iraqi Stock Exchange (ISX) constitute the population utilized in this investigation. Balanced panel data from 9 banks extracted for 5 years, from 2017 to 2021, is examined in the study. Despite the fact that our original sample was larger than what was examined, some banks were eliminated since their variable definitions were inconsistent, and not all of the variables were accessible across all listed banks. Hence, the entire sample comprising 45 years of observation was included in this study. The selected sample banks in our study can represent a reasonable proportion of the Iraqi banking industry, reflecting important differences in performance or behavior. Table 1 shows the sample banks that were selected in this study, along with the year of establishment.

Name	Code	Starting year
Bank of Baghdad	BBOB	18/02/1992
Commercial Bank of Iraq	BCOI	11/02/1992
Economy Bank for Investment	BEFI	22/03/1999
Mousil Bank for Development & Investment	BMFI	23/08/2001
Union Bank of Iraq	BUOI	23/09/2002
Al-Mansour Bank	BMNS	13/09/2005
Cihan Bank for Islamic & Finance	BCIH	03/02/2008
Erbil Bank for Investment & Finance	BERI	20/04/2009
International Development Bank for Investment	BIDB	11/01/2011

Table 1. Study sample banks

3.2 VARIABLES

Return on assets (ROA) and return on equity (ROE), two commonly used measures of profitability and performance [13], [17], [19], [50]. They are used in the present research to assess the financial results of banks. As a measurement of bank performance, ROA shows how well a bank uses its assets to produce profits. However, from the eyes of investors, ROE provides information about financial leverage and profitability by capturing the return on shareholders' equity. In addition, this study will examine several factors as determinants of banks' financial outcomes. These variables were chosen in light of previous empirical evidence outcomes [2], [19], [20], [40], [42], [43], and they are bank efficiency (asset efficiency, operational performance), corporate governance (board size), and macroeconomic factors (GDP and interest rate). Together, all of these factors reflect managerial, external, and internal effects on performance for banks. Table 2 presents an overview of the variables used for the analysis.

Variables	Acronym	Formula	Source of data
Financial outcomes:			
Return on assets	ROA	Net income/total asset	Iraqi stock exchange
Return on equity	ROE	Net income/total equity	http://www.isx-iq.net/
Asset efficiency	AE	Total sales/total asset	Iraqi stock exchange
-			http://www.isx-iq.net/
Operational performance	OP	Total expenses/ sales revenue	Iraqi stock exchange
			http://www.isx-iq.net/
Board size	BOS	Number of directors on the board	Iraqi stock exchange
			http://www.isx-iq.net/
Gross Domestic Product	GDP	Annual rate of GDP growth	World Bank data
		-	https://data.worldbank.org/
Interest rate	INRT	Lending interest	Monetary Policy Report of the
		-	Central Bank of Iraq
			https://cbi.iq/index.php

Table 2. Variable specifications

3.3 METHOD AND MODEL

A quantitative approach was used in the research to explore the determinants of the bank's financial outcomes. Consequently, an explanatory research design was used in this study to examine the relationship between the dependent and independent factors. Furthermore, to reduce the possibility of endogeneity bias and consider the issues of heteroscedasticity that are reasonably predicted to be present during the estimation phase, this investigation uses the Generalized Method of Moments (GMM) estimation, particularly by applying Two-Stage Least Squares (2SLS) as the weighting method. In particular, this method is used to examine the hypotheses and explain how strategic financial efficiency, corporate governance, and macroeconomic factors affect the financial outcomes of banks. Therefore, the research used the following models to assess the relationship among the factors explained above:

$$ROA_{it} = \beta_0 + \beta_1 ROA_{it} - 1 + \beta_2 AE_{it} + \beta_3 OP_{it} + \beta_4 BOS_{it} + \beta_5 GDP_{it} + \beta_6 INRT_{it} + E_{it}$$
$$ROE_{it} = \beta_0 + \beta_1 ROE_{it} - 1 + \beta_2 AE_{it} + \beta_3 OP_{it} + \beta_4 BOS_{it} + \beta_5 GDP_{it} + \beta_6 INRT_{it} + E_{it}$$

Where, all variables are denoted by *i* for bank and *t* for time, *ROA* is the return on asset, *ROE* is the return on equity, $ROA_{it} - 1$ is lagged return on assets, $ROE_{it} - 1$ is lagged return on equity, β_0 is intercept, $\beta_1 - \beta_6$ represents an independent variable vector, *AE* is the asset efficiency, *OP* is operational performance, *BOS* is the board size, *GDP* is a gross domestic product, *INRT* is lending interest rate, and *E* is an error term.

4 DATA ANALYSIS

4.1 DESCRIPTIVE STATISTICS

The descriptive statistics provide a summary of the study variables that are illustrated in Table 3. The mean values for ROA and ROE are 0.969 and 2.126, respectively, whereas the lowest score of -0.443 and -0.567 indicates that some banks have poor ROA and ROE. Both AE and OP have comparatively lower mean values of 0.048 and 0.639, respectively. The minimum values for AE and OP are 0.012 and 0.001, while the highest values are 0.388 and 1.878, respectively. Corporate governance proxy indicated by BOS has mean scores of 6.378 with variability of 5 to 9. Macroeconomic variables, such as GDP, have an average of -0.841 with a broad range, showing moves in the economy, meanwhile, INRT fluctuates somewhat and averages 10.820.

	ROA	ROE	AE	OP	BOS	GDP	INRT
Mean	0.969	2.126	0.048	0.639	6.378	-0.841	10.820
Median	1.127	2.400	0.034	0.640	7.000	1.502	11.900
Maximum	1.987	3.826	0.388	1.878	9.000	5.514	12.500
Minimum	-0.443	-0.567	0.012	0.001	5.000	-12.037	5.800
Std. Dev.	0.621	1.240	0.060	0.320	1.007	6.139	2.553
Obs.	45	45	45	45	45	45	45

Table	3.	Summary	statistics
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4.2 CORRELATION ANALYSIS

The correlation between independent (explanatory) factors is displayed in Table 4. In general, it demonstrates that the explanatory variables had little to no significant link. INRT have a negative and significant effect on AE, while the relationship between BOS and OP is negative and statistically significant. The relationship between GDP and INRT is also negative but statistically insignificant.

A study by [51] argues that the problem of multicollinearity must be subject to attention if the degree of linkage between explanatory components is higher than 70%. Nevertheless, as demonstrated in table 4, there is little to no significant relationship between the independent variables and the correlation among them is below 70%.

	AE	OP	BOS	GDP	INRT
AE	1				
OP	-0.025	1			
BOS	0.174	-0.248*	1		
GDP	-0.021	-0.080	-0.033	1	
INRT	-0.358**	0.081	-0.034	-0.112	1

Table 4. Pearson correlation test

***, **, * are significance levels of correlation at 0.01, 0.05, and 0.1, respectively.

Moreover, to confirm the above discussion, a test of the Variance Inflation Factor (VIF) has been conducted. According to [52] multicollinearity is considered if the value of VIF is greater than 10. From table 5, all values of VIF are much lower than 10, and the minimum value of tolerance is 0.841. Therefore, the issue of multicollinearity is not addressed in this study.

	VIF	Tolerance	
AE	1.190	0.841	
OP	1.081	0.925	
BOS	1.103	0.906	
GDP	1.024	0.976	
INRT	1.174	0.852	
Average	1.114		

Table 5. Variance Inflation Factor

4.3 FINDINGS AND DISCUSSION

Table 6 presents a dynamic panel analysis with the Generalized Method of Moments (GMM) using Two-Stage Least Squares (2SLS). According to the value of adjusted R-squared, the explanatory factors contribute to 0.545 of the variances in ROA and 0.506 of the variances in ROE. This shows that 54.5% and 50.6% of the ROA and ROE in Iraqi banks accurately describe the factors that determine banks' performance and profitability. The probability values of the Hansen J-test are 0.518 for ROA and 0.979 for ROE, indicating that the measurements are valid and unconnected to the error term. The value of the Durbin-Watson statistics for model 1 (ROA) is 2.181, and model 2 (ROE) is 2.336, which suggests no autocorrelation. These diagnostic tests confirm that GMM 2SLS is used efficiently, producing reliable and strong outcomes.

The findings illustrate that AE has a positive influence on both proxies of financial outcomes (ROA and ROE) with a coefficient of 3.847 and 2.916, respectively. This means that AE goes up by a unit, ROA and ROE increase by 3.847 and 2.916 units, respectively. In other words, AE can be considered a crucial determinant of the performance of Iraqi banks. By lowering expenses and optimizing returns, greater asset efficiency increases bank profitability while also boosting sustainability and confidence among investors. Therefore, H1 is accepted and supported by the previous work of [2], [19], [20], who argued that asset management affects firm outcomes favorably.

Although OP has no significant impact on ROE, the negative and significant link between OP and ROA indicates that a 1% increase in OP lowers ROA by 0.606 units. This adverse correlation claims that weak efficiency in operations can result in decreased profitability, poorer earning capacity, and increased costs. This unfavorable association may be caused by elements including poor asset turnover, high operating costs, and inadequate risk management. Thus, H2 is accepted for ROA only and proven by prior investigation [12].

Moreover, BOS as an indicator of corporate governance has a positive and statistically significant effect on ROE only, with a coefficient of 0.259. This indicates that a unit increase in BOS causes a rise of ROE by 0.259 units. A larger board improves strategic thinking, lowers agency expenses, and brings a variety of experiences. It also improves stakeholder trust and compliance with regulations, which boosts bank performance and profitability. However, the insignificant correlation with ROA suggests that a larger board does not always correspond to improved asset efficiency. This might be because larger boards have longer decision-making procedures or possible coordination issues, which can reduce their ability to impact daily activities. These results partially prove H3 and are supported by earlier studies [34], [35], [40].

Variables	Model 1	(ROA)	Model 2	(ROE)	
variables	Coefficient	t-Stat.	Coefficient	t-Stat.	
ROA_lag1	0.202*	1.817			
	(0.112)				
ROE_lag1			0.424***	8.094	
_ •			(0.052)		
AE	3.847***	19.122	2.916***	5.845	
	(0.201)		(0.498)		
OP	-0.606**	-2.427	-0.494	-0.902	
	(0.250)		(0.548)		
BOS	-0.001	-0.061	0.259***	4.176	
	(0.026)		(0.062)		
GDP	-0.006***	-3.682	0.003	1.135	
	(0.001)		(0.002)		
INRT	-0.018***	-3.952	-0.083***	-36.810	
	(0.004)		(0.002)		
С	1.164***	4.801	0.630	1.140	
	(0.242)		(0.552)		
R ₂	0.54	45	0.50)6	
Adj. R ₂	0.451		0.403		
S.E. of regression	0.503		1.102		
Hansen J-test prob.	0.5	18	0.979		
Durbin-Watson	2.18	81	2.33	36	

Table 6.	GMM Regression	Results Using	Two-Stage	Least Squares	(2SLS)

***, **, * are significance levels of correlation at 0.01, 0.05, and 0.1, respectively.

The findings also illustrate that GDP significantly and negatively affects the performance of banks as indicated by ROA, indicating that growth in the economy may put stress on banks' efficiency of assets, maybe as a result of heightened competition or shifts in lending practices during expansionary times. The insignificant relation with ROE, however, suggests that shareholder values are essentially unaffected, maybe as a result of the financial arrangements or profit-sharing plans of banks absorbing stock performance. These results partially support H4.

Furthermore, the result demonstrates that at the 1% level, INRT significantly and negatively affects the profitability of banks, with coefficients of -0.018 and -0.083 assessed by both ROA and ROE. This means that, when all other explanatory factors were held equal, an extra unit in INRT led to a 0.018 and 0.083 unit decrease in the financial performance of the Iraqi banks as measured by ROA and ROE, respectively. This implies that banks' profitability may be constrained by rising interest rates. Although lending interest rates usually give banks the chance to generate more profit, elevated rates can decrease demand for loans, increase the risk of default, and damage credit in general. As a result, banks achieve lower returns. These results prove H5 and are in line with the argument of [19]. A summary of the hypothesis testing is provided in Table 7.

The incorporation of lagged dependent variables (ROA-1 and ROE-1) reflects consistency across time and highlights the dynamic character of bank performance. The fact that ROA-1 is positive and significant at the 10% level indicates that the current ROA is considerably influenced by the previous ROA. At the 1% level, ROE-1 is also significant, suggesting a robust persistence impact on return on equity.

Hypothesis	Conclusion
H1. Asset efficiency significantly affects the financial outcomes of Iraqi	Accepted
banks.	
H2. Operational performance significantly affects the financial	Partially
outcomes of Iraqi banks.	accepted
H3. There is a significant link between board size and the financial	Partially
outcomes of Iraqi banks.	accepted
H4. GDP significantly affects the financial outcomes of Iraqi banks.	Partially
	accepted
H5. Interest rate significantly affects the financial outcomes of Iraqi banks.	Accepted

Table 7. Hypothesis testing

CONCLUSION

This study examined the factors that determine a bank's financial outcomes. The study used different factors that influence a bank's profitability and performance, such as strategic performance efficiency (asset efficiency, operational performance), corporate governance (board size), and macroeconomic variables (GDP and interest rate). The secondary data used in this investigation originates from the financial statements of 9 banks that were registered on the Iraqi stock market between 2017-2021. The study used Generalized Method of Moments (GMM) estimation, particularly by utilizing

Two-Stage Least Squares (2SLS) as the weighting method to evaluate the factors that affect the financial outcomes of Iraqi banks.

The analysis shows that AE, which greatly improves both performance indicators (ROA and ROE), is a major factor in Iraqi banks' financial performance. This implies that enhanced profitability is a result of effective asset use. In addition, ROA is negatively impacted by OP, which indicates that inadequate operational methods can lower profitability, however, this connection is not statistically significant in the case of ROE. The governance element of BOS has a positive impact on ROE but is not statistically significant in the case of ROA, indicating that although strategic supervision raises shareholder returns, it might not immediately boost asset use. Moreover, GDP negatively affects the performance of banks as indicated by ROA, showing that growth in the economy may put stress on banks' efficiency of assets, maybe as a result of heightened competition or shifts in lending practices during expansionary times. However, it has insignificant effect on ROE, claiming that shareholder values are essentially unaffected by economic growth. Higher lending rates, on the other hand, have a negative link with bank performance, suggesting that banks' profitability may be constrained by rising interest rates. Although lending interest rates usually give banks the chance to generate more profit, elevated rates can decrease demand for loans, increase the risk of default, and damage credit in general.

The outcomes of this research offer novel perspectives on the variables affecting bank efficiency by exploring a variety of traits that could be useful in evaluating the financial results of the banking sector in Iraq. Furthermore, the findings of this research can give information to experts, academics, regulators, policymakers, and other interested parties about the factors driving Iraqi banks' performance.

The limitations of this study are, first, the findings of this study belong to Iraqi banks only. Therefore, future studies should focus on other countries to expand the generalizability of the findings. Secondly, the current research relies solely on secondary data, primary data, however, can also be utilized to further comprehend and gather additional information by integrating reported data to enhance future results. Lastly, future research could also broaden the conclusions of this study by analyzing the larger sample of Iraqi banks and explaining how political instability or changes in regulations might impact the correlations between economic parameters and bank performance.

REFERENCES

- S. Gul, K. Zaman, and F. Irshad, "Factors Affecting Bank Profitability in Pakistan Sustainable tourism View project Factors Affecting Bank Profitability in Pakistan," Rom. Econ. J., vol. 14, no. 39, pp. 61–87, 2011.
- [2] A. S. Alarussi and S. M. Alhaderi, "Factors affecting profitability in Malaysia," J. Econ. Stud., vol. 45, no. 3, pp. 442–458, 2018, doi: 10.1108/JES-05-2017-0124.
- [3] M. Audi, M. Kassem, and J. Roussel, "Determinants of banks fragility in the MENA region using a dynamic model," J. Dev. Areas, vol. 55, no. 1, 2021, doi: 10.1353/jda.2021.0007.
- [4] V. Swamy, "Testing the interrelatedness of banking stability measures," J. Financ. Econ. Policy, vol. 6, no. 1, pp. 25– 45, 2014, doi: 10.1108/JFEP-01-2013-0002.
- [5] I. Babela, and S. A. M. Doski, "Banking Stability and its Determinants: The case of Iraq," Seybold Rep., vol. 17, no. 12., pp. 297-315, 2022, doi: 10.5281/zenodo.7427292.
- [6] A. Z. Al-abedallat, "Factors Affecting the Profitability of Banks: A Field Study of Banks Operating in Jordan," Eur. Sci. Journal, vol. 13, no. 22, pp. 141, 2017, doi: 10.19044/esj.2017.v13n22p141.
- [7] S. R. Sdiq, and H. A. Abdullah, "The Moderating Effect of Agency Cost on the Relationship Between Capital Structure and Financial Performance: Evidence of an Emerging Market," Qalaai Zanist J., vol. 8, no. 3, pp. 1239– 1266, 2023, doi: 10.25212/lfu.qzj.8.3.51.
- [8] E. Böcskei, and I. Hágen, "Menedzsment Control-A számviteli mutatószámoktól a versenyképes stratégiáig," Acta Carolus Robertus, vol. 7, no. 2, pp. 19–36, 2017. doi: 10.22004/ag.econ.265776.
- [9] B., Fazekas, P., Becsky-Nagy, "The role of venture capital in the bridging of funding gaps-A real options reasoning," Analele Univ. Di N Oradea - Stiint. Econ. / Ann. Univ. ORADEA - Econ. Sci., vol. 24, no. 1, pp. 825–830, 2015.
- [10] M. Bekmezci, "Companies' Profitable Way of Fulfilling Duties towards Humanity and Environment by Sustainable Innovation," Procedia - Soc. Behav. Sci., vol. 181, pp. 228–240, 2015, doi: 10.1016/j.sbspro.2015.04.884.
- [11] J. Guillén, E. W. Rengifo, and E. Ozsoz, "Relative power and efficiency as a main determinant of banks' profitability in Latin America," Borsa Istanbul Rev., vol. 14, no. 2, pp. 119–125, 2014, doi: 10.1016/j.bir.2014.02.003.
- [12] N. Petria, B. Capraru, and I. Ihnatov, "Determinants of Banks' Profitability: Evidence from EU 27 Banking Systems," Procedia Econ. Financ., vol. 20, no. 15, pp. 518–524, 2015, doi: 10.1016/s2212-5671(15)00104-5.

- [13] A. M. Ahmed, D. P. Nugraha, and I. Hágen, "The Relationship between Capital Structure and Firm Performance: The Moderating Role of Agency Cost," Risks, vol. 11, no. 6, pp. 1–17, 2023, doi: 10.3390/risks11060102.
- [14] A. M. Ahmed, N. A. Sharif, M. N. Ali, and I. Hágen, "Effect of Firm Size on the Association between Capital Structure and Profitability," Sustain., vol. 15, no. 14, pp. 1–17, 2023, doi: 10.3390/su151411196.
- [15] M. Alipour, M. F. S. Mohammadi, and H. Derakshan, "Determinants of Capital Stucture : An Empirical Study of firms in Iran," Int. J. Law Manag., vol. 57, no. 1, pp. 53–83, 2015. doi: 10.1108/IJLMA-01-2013-0004.
- [16] D. Yazdanfar, "Profitability determinants among micro firms: Evidence from Swedish data," Int. J. Manag. Financ., vol. 9, no. 2, pp. 151–160, 2013, doi: 10.1108/17439131311307565.
- [17] E. A. Durguti, E. H. Krasniqi, and D. Krasniqi, "Assessing the performance of factors affecting the profitability of the banking system: Evidence from Kosovo," Eur. J. Sustain. Dev., vol. 9, no. 2, pp. 304–314, 2020, doi: 10.14207/ejsd.2020.v9n2p304.
- [18] T. D. Le and T. Ngo, "The determinants of bank profitability: A cross-country analysis," Cent. Bank Rev., vol. 20, no. 2, pp. 65–73, 2020, doi: 10.1016/j.cbrev.2020.04.001.
- [19] F. A. Almaqtari, E. A. Al-Homaidi, M. I. Tabash, and N. H. Farhan, "The determinants of profitability of Indian commercial banks: A panel data approach," Int. J. Financ. Econ., vol. 24, no. 1, pp. 168–185, 2019, doi: 10.1002/ijfe.1655.
- [20] A. Nuhiu, A. Hoti, and M. Bektashi, "Determinants of commercial banks profitability through analysis of financial performance indicators: Evidence from Kosovo," Bus. Theory Pract., vol. 18, pp. 160–170, 2017, doi: 10.3846/btp.2017.017.
- [21] E. Aslam and R. Haron, "Does corporate governance affect the performance of Islamic banks? New insight into Islamic countries," Corp. Gov., vol. 20, no. 6, pp. 1073–1090, 2020, doi: 10.1108/CG-11-2019-0350.
- [22] CBI, "Central Bank of Iraq announces monetary policy indicators during 2024," 2024. Available: https://cbi.iq/news/view/2748. Accessed November 5, 2024.
- [23] ISX, "Annual Market Report," 2023. Available: http://www.isx-iq.net/isxportal/portal/uploadedFilesList.html. Accessed December 13, 2024.
- [24] M. Smirlock, "Evidence on the (Non) Relationship between Concentration and Profitability in Banking," J. Money, Credit Bank., vol. 17, no. 1, pp. 69-83, 1985, doi: 10.2307/1992507.
- [25] A. N. Berger, "The Profit-Structure Relationship in Banking-Tests of Market-Power and Efficient-Structure Hypotheses," J. Money, Credit Bank., vol. 27, no. 2, pp. 404–431, 1995, doi: 10.2307/2077876.
- [26] H. Demsetz, "Industry Structure, Market Rivalry, and Public Policy," J. Law Econ., vol. 16, no. 1, pp. 1–9, 1973.
- [27] A. N. Berger and D. B. Humphrey, "Efficiency of financial institutions: International survey and directions for future research," Eur. J. Oper. Res., vol. 98, no. 2, pp. 175–212, 1997, doi: 10.1016/S0377-2217(96)00342-6.
- [28] M. C. Jensen and W. H. Meckling, "Theory of the Firm: Managerial Behavior, Agency Costs and Ownership Structure," J. financ. econ., vol. 3, no. 4, pp. 305–360, 1976, doi: 10.1016/0304-405X(76)90026-X.
- [29] E. F. Fama and M. C. Jensen, "Separation of Ownership and Control," J. Law Econ., vol. 26, no. 2, pp. 301–325, 1983.
- [30] B., Fazekas, P., Becsky-Nagy, "Mit jelez a tulajdonosi szerkezet?-A tulajdonosi szerkezet és a vállalkozások teljesítményének kapcsolata információs aszimmetriák mellett a magyarországi kockázatitőke-befektetések tükrében" Vezetéstudomány-Bud. Manage. Rev., vol. 50, no. 7–8, pp. 31–38, 2019, doi: 10.14267/VEZTUD.2019.07.03.
- [31] D. Maletič, M. Maletič, B. Al-Najjar, and B. Gomišček, "An analysis of physical asset management core practices and their influence on operational performance," Sustain., vol. 12, no. 21, pp. 1–20, 2020, doi: 10.3390/su12219097.
- [32] M. Y. Arafat, A. Warokka, A. D. Buchdadi, and Suherman, "Banking efficiency and performance: A test of banking characteristics in an emerging market," J. Glob. Bus. Adv., vol. 6, no. 1, pp. 13–23, 2013, doi: 10.1504/JGBA.2013.053475.
- [33] I. Keramidou, A. Mimis, A. Fotinopoulou, and C. D. Tassis, "Exploring the relationship between efficiency and profitability," Benchmarking, vol. 20, no. 5, pp. 647–660, 2013, doi: 10.1108/BIJ-12-2011-0090.

- [34] B. Abebe Zelalem, A. Ali Abebe, and S. Wodajo Bezabih, "Corporate governance and financial performance in the emerging economy: The case of Ethiopian insurance companies," Cogent Econ. Financ., vol. 10, no. 1, pp. 1-18, 2022, doi: 10.1080/23322039.2022.2117117.
- [35] G. Asamoah, "Effect of Board Size on Corporate Financial Performance: The Case of 10 Selected Companies Listed on the Ghana Stock Exchange," Working Paper Series, no. 4, 2013.
- [36] R. J. Williams, P. A. Fadil, and R. W. Armstrong, "Top Management Team Tenure and Corporate Illegal Activity: The Moderating Influence of Board Size," J. Manag. Issues, vol. 17, no. 4, pp. 479–493, 2005.
- [37] A. M. Ahmed, M. N. Ali, and I. Hágen, "Corporate Governance and Capital Structure: Evidence from Europe," Int. J. Prof. Bus. Rev., vol. 8, no. 7, pp. 1–22, 2023, doi: 10.26668/businessreview/2023.v8i7.1663.
- [38] J. Pfeffer, "Size and composition of corporate boards of directors: The organization and its environment," Adm. Sci. Q., vol. 17, no. 2, pp. 2018–228, 1972, doi: 10.2307/2393956.
- [39] L. Okoye, F. Olokoyo, J. Okoh, F. Ezeji, and R. Uzohue, "Effect of corporate governance on the financial performance of commercial banks in Nigeria," Banks Bank Syst., vol. 15, no. 3, pp. 55–69, 2020, doi: 10.21511/bbs.15(3).2020.06.
- [40] A. M. Ahmed, and I. Hágen, "Corporate Governance and Its Relationship with Financial Performance in Iraq," Acta Carolus Robertus, vol. 13, no. 1, pp. 76–89, 2023, doi: 10.33032/acr.4099.
- [41] R. Ria, "Determinant Factors of Corporate Governance on Company Performance: Mediating Role of Capital Structure," Sustain., vol. 15, no. 3, pp. 1-15, 2023, doi: 10.3390/su15032309.
- [42] W. M. Y. Falah, "The Effect of Corporate Governance on the Financial Performance of Listed Companies in Palestine Exchange (PEX)," Int. Res. J. Financ. Econ., vol. 7, no. 162, pp. 97–102, 2017.
- [43] N. Gupta and J. Mahakud, "Ownership, bank size, capitalization and bank performance: Evidence from India," Cogent Econ. Financ., vol. 8, no. 1, pp. 1-39, 2020, doi: 10.1080/23322039.2020.1808282.
- [44] H. Abdullah and T. Tursoy, "The Effect of Corporate Governance on Financial Performance: Evidence From a Shareholder-Oriented System," Iran. J. Manag. Stud., vol. 16, no. 1, pp. 79–95, 2023, doi: 10.22059/IJMS.2022.321510.674798.
- [45] A. M. Ahmed, "Financial Market Development and its Implication on Economic Performance: Evidence from APEC countries," Acad. J. Int. Univ. Erbil, vol. 2, no. 02, pp. 149–159, 2025.
- [46] A. M. Martins, A. P. Serra, and S. Stevenson, "Determinants of real estate bank profitability," Res. Int. Bus. Financ., vol. 49, pp. 282–300, 2019, doi: 10.1016/j.ribaf.2019.04.004.
- [47] T. W. Abate and E. A. Mesfin, "Factors Affecting the Profitability of Private Commercial Banks in Ethiopia," vol. 6, no. 1, pp. 881–891, 2016.
- [48] A. Rashid and S. Jabeen, "Analyzing performance determinants: Conventional versus Islamic Banks in Pakistan," Borsa Istanbul Rev., vol. 16, no. 2, pp. 92–107, 2016, doi: 10.1016/j.bir.2016.03.002.
- [49] A. T. Yahya, A. Akhtar, and M. I. Tabash, "The impact of political instability, macroeconomic and bank-specific factors on the profitability of Islamic banks: An empirical evidence," Invest. Manag. Financ. Innov., vol. 14, no. 4, pp. 30–39, 2017, doi: 10.21511/imfi.14(4).2017.04.
- [50] H. Abdullah, "Profitability and Leverage as Determinants of Dividend Policy: Evidence of Turkish Financial Firms," Eurasian J. Manag. Soc. Sci., vol. 2, no. 3, pp. 15–30, 2021, doi: 10.23918/ejmss.v2i3p15.
- [51] J.-H. Lee, and J.-H. Cho, "Firm-Value Effects of Carbon Emissions and Carbon Disclosures-Evidence from Korea," Int. J. Environ. Res. Public Health, vol. 18, no. 22, pp. 1–16, 2021, doi: 10.3390/ijerph182212166.
- [52] A. K. Panda and S. Nanda, "Determinants of capital structure; a sector-level analysis for Indian manufacturing firms," Int. J. Product. Perform. Manag., vol. 69, no. 5, pp. 1033–1060, 2020, doi: 10.1108/IJPPM-12-2018-0451.