The Impact of Specialized Loans of Agricultural Banks for Small and Medium Enterprises (SMEs) on the Financial Returns of the Banks in Iraq

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The financial development of a country cannot be considered complete without the financial sustainability of its financial institutions, which can be achieved by producing funds from strong investment plans and loans. Policymakers and future researchers must prioritize this element. Therefore, the current study investigates the effect of specialized loans from agricultural banks to SMEs, such as project loans, objective loans, commodity loans, and liquidity loans, on the financial performance of agricultural banks in Iraq. The study retrieved data from the databases of fifteen agricultural banks from 2011 to 2020. The relationship between variables has been examined using the Method of Moments Quantile Regression (MMQR). The results demonstrated a correlation between project financing, objective financing, commodity financing, and liquidity and the financial performance of agricultural banks in Iraq. The article guides decision-makers in the formulation of strategies to increase financial return through the use of specialty loans.

Key words: Specialized loans, project finance, objective finance, commodity finance, liquidity, financial return, small and medium enterprises.

1. INTRODUCTION

The banking sector of an economy is essential for higher economic development and financial development stability. It helps companies involved in various enterprises satisfy their financial needs, conducts various financial transactions, and supports savings and investment programs (Demirgüç-Kunt et al., 2021). Additionally, the banking industry assists the government in managing monetary and fiscal policies. It leads to the government's infrastructure development and capital formation. Moreover, because banks provide a platform for transferring funds between areas and exchanging one currency for another, they facilitate trade at the national and international levels (Ramzan et al., 2021). The two primary roles of banks are to accept deposits and to provide loans. Under some conditions, banks offer a combination of interest and a few small deposit fees. Interest is banks' principal source of income, whereas loans are their primary source of revenue. The performance of banks is determined by their financial returns, the returns on loans, and the amount of interest it generates (Nizam et al., 2019).

Loan repayment and interest rates depend on the frequency and amount of borrowing. Agricultural banks are specialized banks that are established and operated to promote agriculture. Small- and medium-sized companies (SMEs) specialized loans from banks, such as project financing, objective finance, and commodity finance, are of lower volume and higher frequency, which is advantageous for banks' financial returns (Hameedi et al., 2021). Project financing is a sort of specialized loan in which loans are issued to small and medium-sized enterprises for the execution of a particular project. Under project finance, the interest rate is proportional to the size and duration of the project. As the economic, eco-friendly infrastructure projects promote the country's development and the banks are assured of payment, the banks' financial returns might increase (Ekinci et al., 2019). Throughout their existence, various government and private-sector organizations have pursued varying goals. Loans are offered to clients under objective finance to attain certain objectives, which may be of many forms. This financing is advantageous for banks because the possibility of losing loan principal or interest is minimal. Moreover, commodity loan supplied to SMEs for handling any form of commodities to advance production, trade, construction, and development, boosts the financial returns of the banks (Taghizadeh-Hesary et al., 2019).

This study examines the performance of Iraqi banks. Iraq is a rising nation with an economy in the upper middle class. The nominal GDP of Iraq in 2022 is $297.341 billion. However, the purchasing power parity is $512.926 billion. Iraq has a burgeoning banking industry (Jadah et al., 2020). Technology and banking services in Iraq are on the verge of catching up to international standards.

Nonetheless, some issues must be handled. In 2017, according to the World Bank, only 23% of the Iraqi population had bank accounts. This is even though Iraqis continue to rely on cash payments. Financial development has been hampered by a lack of confidence in the banking system and an insufficient grasp of cashless payment methods (Salman et al., 2021). Despite having 53 privately owned banks (PSOB), seven state-owned banks (SOB), and 14 foreign bank branches, the country today has 74 financial institutions. However, in 2021, the banking industry only contributed 1.94 percent to Iraq's GDP. Despite having 904 sites throughout the country, most of Iraq's banks are located in Baghdad and Basra, which account for 37.1% and 9.3% of all branches, respectively

(Ali et al., 2021).

Different Iraqi banks include the Agricultural Cooperative Bank of Iraq, Babylon Bank, Bank of Baghdad, Bank of Iraq, Basrah International Bank for Investment, Dar Es Salaam Investment Bank, Gulf Commercial Bank, Industrial Bank of Iraq, Iraqi Islamic Bank, Islamic Cooperation Investment Bank, Rafain Bank, Rasheed Bank, Real Estate Bank of Iraq, Trade Bank of Iraq, Warka Bank, etc. (Ojah et al., 2019). However, the Iraqi baking industry is emerging and achieving economic success. However, the rate of banking development is not as rapid as it has to be to meet economic demands and compete with the financial sectors of other economies. Authorities must pay attention to the performance of individual banks. This study is a step toward fulfilling this requirement. The study aims to investigate specialized bank loans such as project finance, objective financing, and commodity finance, as well as the banks' liquidity and financial returns.

The current study is not merely a rehash of previous research; it provides numerous contributions to the field. In past research, the relationship between specialist loans and bank performance has been addressed primarily. The effects of project finance, objective finance, and commodity finance on the financial returns of banks have been examined in only a few research. This study contributes to the literature by examining the effects of project finance, objective finance, and commodity finance on the financial returns of banks. Second, this study did not merely investigate the effects of speciality loans such as project finance, objective finance, and commodity financing on banks' financial returns. But it sheds light on the specialized loans offered by agricultural banks to small and medium-sized enterprises. Thirdly, the study explores the role of project finance, objective finance, and commodity financing in the financial returns of Iraqi banks for the first time. The paper contains numerous interconnected sections. Analyzing past studies, the second section discusses the relationship between project finance, objective finance, commodity financing, liquidity, and the financial returns of banks. The final section outlines the research methods utilized. The fourth section presents the research findings following data analysis. In conversations, these findings are consistent with those of prior research. The study's ramifications, conclusion, and limitations are briefly discussed at the end.

2. LITERATURE REVIEW

A bank's financial services of savings, deposits, money transfer, collection and payment of money, investment, document security, etc., are crucial to the economic development of a nation. The principal source of earnings affecting the financial performance of banks is interest on loans. This source of banks' financial success is influenced by their specialized business loans (Almagtome et al., 2020). This study investigates the effects of speciality loans such as project finance, objective finance, and commodity finance on banks' financial returns. The supply of project, objective, and commodity finance boosts loan earnings, while the demand for banking services raises banks' financial returns. Previous work has investigated the relationship between project finance, objective finance, and commodity finance and the financial returns of banks. The following sections describe previous studies examining the relationship between project finance, objective finance, commodity finance and banks' financial returns. Project finance is one of the specialized bank loans available. It is offered to clients for the completion of specific projects. As its recovery is contingent upon the project's completion and the interest rate can be based on its size and profitability, it creates substantial profits for banks. It strengthens their financial situation (Almaleki et al., 2021; Kuswardinah, Ansori, Rachmawati & Fajri, 2021; Ndiaye, Ceesay & Moussa, 2022; Guellil & Benhabib, 2022; Jethwani & Ramchandani, 2022). Alonso-Conde et al. (2020) examine the effects of project financing (green bonds) on the profitability and creditworthiness of project financing organizations. This paper examines a case of financing a project with a green bond for the Sagunto regasification Plant. This funding is offered to the Sagunto Regasification Plant for eco-friendly enhancements to its operations, including the loading, unloading, and storing of liquefied natural gas from methane tankers. The study suggests that when banks or financial institutions provide project financing through green bonds, it increases capital, improves the use of capital for those projects, and reduces project costs and risks.

In the end, the risks associated with bank funding diminish, and they can increase their financial returns. Anwar et al. (2020) investigate rural banks' project financing to micro and small enterprises (MSBs) and banks' financial returns. The research spanned from 2012 to 2016, and data was collected from 212 rural banks operating in various cities in the Indonesian state of West Java. The writers made use of the performance of rural banks was analyzed using data envelopment analysis, and the relationship between bank performance and particular project loans to MSBs was examined using panel data analysis. The research reveals that special project financing from rural development banks aids in expanding micro and small enterprises (MSBs). This financing could be financially lucrative for banks, resulting in better profits. Liu et al. (2021) examine the impact of project finance on agricultural technical innovation and rural financial development banks. From 2003 to 2015, panel data regarding variables were collected from 31 provinces in China. Using available data, descriptive statistics were employed to conclude the relationship between components. The study hypothesizes that financing agricultural technological innovation results in increased agricultural output and sustainability. It would increase project finance earnings while also increasing banking services' marketing opportunities. Consequently, banks' financial returns improve. Thus, project finance adds positively to the financial returns of banks.

Commercial banks also give specialised financing to

businesses of varying sizes to accomplish a certain aim. They determine the interest rate and payment date based on the type and intent of the objectives to be achieved. These particular loans or credits assist the recipient organizations in developing and expanding their businesses while generating revenue and promoting the bank's services. Therefore, objective financing growth increases banks' financial returns, and the relationship between objective financing and bank financial returns is strengthened. (Jan et al., 2019; Althawaini, Elmulthum & Morsi, 2022; Khong, 2022). Danoshana et al. (2019) study the connection between objective funding for corporate governance and the financial returns of financial organizations such as banks. Study samples were selected to collect information on the funding and financial strength of Sri Lanka's 25 listed financial institutions. From 2008 to 2012, statistics and panel data for Sri Lankan financial institutions were obtained from secondary sources. The data analysis demonstrates that providing enterprises with objective financing for implementing corporate governance significantly enhances the firms' management and effectiveness, boosting their overall performance and ability to repay banks responsibly. These short-term financing objectives limit the risk of funds recovery and preserve businesses' financial returns. Soewarno et al. (2020) did a study to assess the effects of speciality loans, such as objective financing, on the financial returns of banks. The study indicates that small and medium-sized firms typically experience financial difficulties. In this circumstance, they cannot achieve objectives such as corporate governance, employee satisfaction, maintaining marketing, gaining equity market confidence, and maximizing profitability. However, the availability of objective financing from banks and other financial organizations assists businesses in achieving their goals. Under these conditions, it is more likely that businesses will interact with banks for their purposes, which significantly improves the financial returns of banks. Due to particular objective financing, Julia et al. (2020) shed light on the financial returns of Islamic and conventional banks. The writers picked several commercial banks that financed green initiatives in Bangladesh from 2012-2014. The performance of five Islamic and conventional banks was evaluated using secondary data obtained from annual and specific sustainability reports, and the data was validated via interviews. The research reveals that their financial returns are more significant when banks provide financing, especially for green aims.

Agarwal et al. (2020), in a research work on bank lending and commodity prices, examine the relationship between commodity financing and bank finance performance. The research sample consisted of 582 banks in forty countries. The banks' balance sheets and credit registries were empirically studied to obtain information regarding commodities finance for commodity exports and financial returns. Then, a regression coefficient analysis was performed on test data to determine the association

between components. The article argues that when banks supply exporters with specialist commodity finance, the quality of the goods to be exported is maintained and exporting commodities can provide substantial profits. This increases demand for the bank's loans and the total interest income from loans. Therefore, commodities finance adds positively to the financial returns of banks. Aduba Jr et al. (2021) investigate the effects of commodities financing on the financial growth of banks. For this investigation, information was acquired from Japanese commercial banks. When a policy is enacted to allow special commodity loans for SMEs, banks and other financial institutions can boost marketing for financial goods. The specialized loans pay more with less risk.

Therefore, commodity financing is essential for enhancing and maintaining the financial returns of banks. Kukah et al. (2022) investigated the relationship between Ghana's energy infrastructure commodity financing and banks' financial returns. The surveys were used to gather data from respondents. A total of seventy-eight responses were deemed comprehensive and informative. The descriptive statistics with a mean score, the Kruskal–Walli's test, and discriminant validity were employed to extract results from the data. The results demonstrated that the energy sector advances when banks fund innovative energy infrastructure. As a result, the economy has more prospects for success, and banks ultimately enjoy greater financial returns. Kanyangemu et al. (2019) discussed the financing of agricultural commodities by banks and the financial returns of banks. From 1996-1997 to 2016-2017, the authors' focus was on Tanzania's agricultural and banking sectors. The study suggests that financing banks, particularly for agricultural commodities, influence the banks' performance in two ways. First, it is less dangerous to retrieve money that has been borrowed, and the growth of agricultural and other related economic sectors boosts demand for banking services. Consequently, commodity financing boosts the financial returns of banks.

Lending money and leasing out various items to customers are the banks' primary sources of revenue. Banks need sufficient financial resources for these two revenue streams to meet market demands immediately. The liquidity of the bank's assets impacts its financial resources and, by extension, its income sources. Banks with highly liquid assets can better enter into contracts for lending or leasing and thus earn more. Thus, improving liquidity increases the financial returns of businesses Eklof et al. (2020). Sahyouni et al. (2019) examine the influence of liquidity generation on the financial returns of banks. For 2011-2016, data on liquidity generation on assets and returns on average equity were collected from 491 commercial banks in 18 MENA countries. The regression analysis was undertaken to determine the association between the factors. The results demonstrated that banks that are successful at creating asset liquidity have effective management of contingent risks. The lowering of risks preserves the profitability of banking institutions. Berger

et al. (2019) establish a connection between liquidity creation and banks' financial return consistency. Using the panel data method, data on liquidity creation and the stability of banks' financial returns were collected from Islamic commercial banks in 24 countries from 2000 to 2014. According to the study, the liquidity of assets is positively correlated with the consistency of banks' financial returns since it helps firms establish consistency in their financial business activities, such as receipts and deposits.

3. RESEARCH METHODS

This study investigates the effect of project finance, objective finance, commodity finance, and liquidity on the financial return of Iraqi agricultural banks. The study utilized the databases of fifteen agricultural banks to gather data from 2011 through 2020. The article constructed the equation based on the following current study variables:

$$ROE_{it} = \alpha_0 + \beta_1 PF_{it} + \beta_2 OF_{it} + \beta_3 CF_{it} + \beta_4 LQ_{it} +$$

$$e_{it} \tag{1}$$

Where;

ROE	=	Return on Equity
t	=	Time Period
i	=	Banks
PF	=	Project Finance
OF	=	objective Finance
CF	=	Commodity Finance
LQ	=	Liquidity

The study's dependent variable was the financial return assessed by return on equity. In addition, the study measured specialized loans as the independent variable using the ratios of project finance to total finance, objective finance to total finance, and commodity financing to total finance. The study's last control variable was liquidity, assessed by the ratio of current assets to current liabilities. Table 1 contains these proxies.

Table 1: Variables with Measurements

S#	Variables	Measurement	Sources
01	Financial Returns	Return on equity	Agricultural Banks
02	Specialized Loan of Agricultural Banks	The ratio of project finance to total finance	Agricultural Banks
		The ratio of objective finance to total finance	Agricultural Banks
		The ratio of commodity finance to total finance	Agricultural Banks
03	Liquidity	The ratio of current assets to current liabilities	Agricultural Banks

The research employed descriptive statistics to examine the specifics of the variables, including standard deviation, mean, maximum, and lowest values. In addition, the article investigated the correlation between variables using a correlation matrix. In addition, the study utilized the variance inflation factor (VIF) to investigate multicollinearity; the corresponding equations are shown below.

R^2_Y ⟶ $Y_{it} = \alpha_0 + \beta_2 X_{2it} + \beta_3 X_{3it} + \beta_4 X_{4it} +$
$$\beta_5 X_{5it} + e_{it} \tag{2}$$

$$j = R_Y^2, R_{X1}^2, R_{X2}^2, R_{X3}^2, R_{X4}^2, R_{X5}^2 \tag{3}$$

$$Tolrance = 1 - R_j^2 \quad VIF = \frac{1}{Tolerance} \tag{4}$$

Finally, the researchers have used the MMQR approach to examine the association among constructs. This approach was introduced by Machado et al. (2019) and had the characteristics of being "robust to outliers." It significantly controls the heterogeneity across panel cross-sections (Aziz et al., 2020). It also provides the dynamic association among the variables in different conditions, even if the framework is nonlinear (Ike et al., 2020). So, the conditional quantile estimation is $Q\tau(\tau/X)$ for the locational-scale alternate model is given as:

$$Y_{it} = \alpha_i + X_{it}\beta + (\delta_i + Z_{it}\lambda)U_{it} \tag{5}$$

In equation (5), the probability represented by $P\{\delta_i +$

$Z_{it}\lambda > 0\} = 1$. Moreover, α, β, λ and δ are the parameters, and z represents the k-vector of component X. Thus, the components are changed with element l is given as:

$$Zl = Zl(X), l = 1, \dots \dots, k \tag{6}$$

Hence, using equation (5), the conditional quantile of Y is given below:

$$Q\tau(\tau/X_{it}) = (\alpha_i + \delta_i q(\tau)) + X_{it}\beta + Z_{it}\lambda q(\tau) \tag{7}$$

In equation (7), X_{it} represents the independent variables such as PF, OF, CF and LQ, while Y_{it} is the predictive construct like ROE, which is conditional as X_{it}. On the other hand, the distinct effects could not establish intercept shift. So, $Q(\tau)$ is estimated as mentioned below:

$$Min_q = \sum_t \sum_i p\tau (R_{it} - (\delta_i + Z_{it}\lambda)q) \tag{8}$$

4. FINDINGS OF THE STUDY

The research employed descriptive statistics to examine the specifics of the variables, including standard deviation, mean, maximum, and lowest values. The results revealed that the average ROE value was 15.109 percent, the average PF value was 11.098 percent, and the average CF value was 72.019 percent. In addition, the results revealed that the OF average value was 79.092 percent while the LQ average value was 3.201%. Table 2 displays these results.

Table 2: Descriptive Statistics

Variable	Obs	Mean	Std. Dev.	Min	Max
ROE	150	15.109	0.123	11.214	22.333
PF	150	11.098	0.784	9.221	17.196
CF	150	72.019	2.091	67.102	81.201
OF	150	79.092	1.102	71.298	81.211

LQ	150	3.201	0.281	2.101	5.302

In addition, the article investigated the correlation between variables using a correlation matrix. The results indicated that project financing, objective financing, commodity financing, and liquidity have a favorable relationship with the financial return of agricultural banks in Iraq. Table 3 displays these results.

Table 3: Matrix of Correlations

Variables	ROE	PF	CF	OF	LQ
ROE	1.000				
PF	0.701	1.000			
CF	0.592	0.734	1.000		
OF	0.321	0.528	-0.753	1.000	
LQ	0.382	0.335	-0.323	-0.643	1.000

In addition, the VIF was utilized to assess multicollinearity. The results demonstrated that VIF values are less than five and reciprocals are more significant than 0.20. These results did not show multicollinearity. Table 4 displays these results.

Table 4: Variance Inflation Factor

	VIF	1/VIF
PF	3.782	0.264
CF	2.102	0.476
OF	2.021	0.495
LQ	1.902	0.526
Mean VIF	2.452	.

The researchers have utilized the MMQR to investigate the relationship between constructs. The results indicated that project financing, objective financing, commodity financing, and liquidity have a favorable relationship with the financial return of agricultural banks in Iraq. In addition, the results revealed that the PF has a considerable impact on ROE in quantiles 1 through 9 and that the CF has a significant relationship with ROE in quantiles 1 through 9. In addition, the results revealed that the OF has a considerable influence on ROE in quantiles 1 to 5 and 7 to 9, and that LQ has a significant relationship with ROE in quantiles 1 to 4 and 7 to 8. Table 4 displays these results.

Table 5: Panel Quartile Estimation (MMQR)

Variables	Method of Moments Quantile Regression (MMQR)										
	Location	Scale	Grid of Quartiles								
			0.10	0.20	0.30	0.40	0.50	0.60	0.70	0.80	0.90
PF	0.732***	0.663*	0.637**	0.671**	0.323*	0.527**	0.621*	0.222*	0.432*	0.433*	0.432*
CF	0.721**	0.819*	0.772*	0.666*	0.291*	0.652*	0.772**	0.921**	0.331**	0.298*	0.102**
OF	0.652**	0.212**	0.749*	0.272*	0.418*	0.291*	0.429*	0.091	0.102	0.713**	0.882*
LQ	0.611*	0.552**	0.200*	0.778**	0.661**	0.821*	0.011	0.076	0.728*	0.899*	0.036

***, **, and * represent significant level at 1%, 5%, and 10%, respectively

5. DISCUSSIONS

The results demonstrated a positive correlation between project financing and the financial performance of banks. These findings are consistent with Ichsan et al. (2021)'s examination of the impact of specialist loans on bank performance. The study demonstrates that when banks have a policy of providing specialized loans for various projects, they can increase their marketing for financial services. The number of clients increases the banks' money creation and earnings. Consequently, increased returns on equity boost the financial performance of banks. These findings are reinforced by Anvarovich (2020)'s research on the effect of project finance on bank performance. In a country where small and medium-sized enterprises (SMEs) receive project loans, banks' business needs expand, and their financial performance is likely to improve.

The findings demonstrated that objective finance has a favorable correlation with the financial success of institutions. These results are consistent with Hunjra et al. (2022)'s conclusion that small and medium-sized businesses confront financial constraints and an inability to complete specific duties. The bank's policy of providing objective financing assists these businesses in completing various responsibilities and achieving company performance. This subsequently increases demand for bank products and boosts their equity returns. These findings are further corroborated by Bătae et al. (2021), who demonstrate that in objective finance, banks have the assurance of receiving their capital, plus interest, immediately following the completion of an objective. It strengthens the bank's financial standing.

The results demonstrated a positive correlation between commodities finance and the financial performance of

banks. These results are consistent with Haralayya (2021)'s study. This study hypothesizes that banks and other financial institutions with a policy of granting loans to small and medium-sized enterprises (SMEs) to produce and distribute various commodities can increase their income sources. Therefore, they can enhance their financial performance. These findings are also **corroborated by ——-'s research,** which demonstrates that commodities finance boosts the frequency of loan distribution and the overall revenues of banks. Increased returns on equity contribute to improved financial success.

The results indicated that liquidity is positively associated with the financial performance of banks. The past research of Li et al. (2022), which studies the impact of liquidity on the performance of banks, supports these findings. This earlier study asserts that the increased liquidity of assets helps financial institutions to make loans and investments. Therefore, they can provide greater returns on equity. These findings are consistent with the findings of (Gazi et al., 2022), who theorize that increased liquidity enables banks to more effectively market their services and demonstrate business efficacy; they can sell more, earn more, and exhibit superior financial performance.

6. IMPLICATIONS

Many innovative aspects of the current study can be utilized by scholars in their future work on bank performance. This study examines the effects of speciality loans, such as project finance, objective finance, commodity financing, and liquidity, as a controlling element on banks' financial performance. The financial performance of the bank is measured by return on equity. The researchers are primarily concerned with the financial performance of agricultural banks in Iraq.

This study has numerous empirical implications for the banking sector of emerging economies, particularly for agricultural development-focused banks. There is a guideline outlining how agricultural banks' management must formulate policies to preserve their financial performance. The report recommends that agricultural banks provide project financing to small and medium-sized enterprises to increase return on equity. It is also advised that loan regulations be formulated, so financial institutions favor objective loans to agricultural SMEs to increase equity returns. In addition, the study reveals that agricultural banks must give commodity loans to SMBs to raise and preserve equity returns. The article aids policymakers in the development of policies to improve financial return through the use of speciality loans. In addition, the authors of this study assert that agricultural banks must own highly liquid assets, which ensures greater returns on equity.

7. CONCLUSION

This study aimed to determine the impact of specialist loans on the financial performance of banks. The authors analyzed project finance, objective finance, and commodity finance, as well as the effects of liquidity on

returns on equity, and collected data from Iraqi banks. The findings reveal a positive relationship between project finance, objective finance, commodity finance, liquidity, and equity returns. The results demonstrated that under project finance, the banks' profits are proportional to the size of the project, and payment is guaranteed at the project's conclusion with project assets as collateral. This kind of loan distribution boosts banks' returns on equity. In addition, the results suggested that the issue of loans to SMBs for specific purposes increases banks' routine functions and creates more significant profits. Therefore, returns on equity are greater. The findings demonstrated that financing small and medium-sized enterprises (SMEs) for producing or selling specific commodities may increase bank profitability and boost equity returns. In addition, the study indicated that the presence of liquid assets enables banks to issue numerous loans and expand their operations. Returns on equity improve with the firm expansion.

8. LIMITATIONS

Still, there are limits to the current study, and it is believed that future researchers will eliminate them. Several aspects, such as project finance, objective finance, commodity finance, and liquidity, that affect returns on equity have been explored in this study. Numerous additional variables remain unaccounted for, including firm size, financial management, and interest rate. Future authors must also include these aspects when evaluating the financial performance of institutions. In addition, data on the financial performance of banks concerning project finance, objective finance, commodity finance, and liquidity were collected from exclusively agricultural banks in Iraq. The data from a single economy's banking sector cannot be sufficient for a complete and usually valid assessment. Therefore, it is envisaged that academics will utilize data from numerous banking systems to produce broad study conclusions applicable to any economy.

REFERENCES

Aduba Jr, J., & Izawa, H. (2021). Impact of learning through credit and value creation on the efficiency of Japanese commercial banks. *Financial Innovation, 7*(1), 1-37. doi: https://doi.org/10.1186/s40854-021-00268-8

Agarwal, I., Duttagupta, R., & Presbitero, A. F. (2020). Commodity prices and bank lending. *Economic Inquiry, 58*(2), 953-979. doi: https://doi.org/10.1111/ecin.12836

Ali, S. I., & Flayyih, H. H. (2021). The Role of the External Audit in Assessing Continuity of Companies under the Financial Crisis: An Applied Study in the Iraqi Banks Listed in the Iraq Stock Exchange for the Period 2016-2019 El Papel de la Auditoría Externa en la Evaluación de la Continu. 39 (November), 1–20. *Estudios de Economía Aplicada, 39*(11), 17. doi: https://dx.doi.org/10.25115/eea.v39i11.5925

Almagtome, A., & Abbas, Z. (2020). Value relevance of financial performance measures: An empirical

study. *International Journal of Psychological Rehabilitation, 24*(7), 6777-6791. Retrieved from https://www.researchgate.net/profile/Akeel-Almagtome/publication/343944422

Almaleki, M., Salehi, M., & Moradi, M. (2021). The relationship between narcissism, managerial overconfidence and comparability of financial statements of listed companies. *Journal of Facilities Management, 19*(5), 681-700. doi: https://doi.org/10.1108/JFM-01-2021-0002

Alonso-Conde, A.-B., & Rojo-Suárez, J. (2020). On the effect of green bonds on the profitability and credit quality of project financing. *Sustainability, 12*(16), 6695. doi: https://doi.org/10.3390/su12166695

Althawaini, H., Elmulthum, N., & Morsi, H. . (2022). A Study on the Impact of the Saudi Citizen Account as a Compensation Program to Achieve Food Security for Low-Income Citizens Under the Kingdom's Vision 2030. *Asian Development Policy Review, 10*(2), 77–87. doi: https://doi.org/10.55493/5008.v10i2.4461

Anvarovich, N. E. (2020). Banks' loans to reduce the risk of leasing lines. *Indonesian Journal of Innovation Studies, 9*, 1-4. doi: https://doi.org/10.21070/ijins.v9i.492

Anwar, M., Nidar, S. R., Komara, R., & Layyinaturrobaniyah, L. (2020). Rural bank efficiency and loans for micro and small businesses: evidence from West Java Indonesia. *International Journal of Emerging Markets, 15*(3), 587-610. doi: https://doi.org/10.1108/IJOEM-11-2017-0494

Aziz, N., Mihardjo, L. W., Sharif, A., & Jermsittiparsert, K. (2020). The role of tourism and renewable energy in testing the environmental Kuznets curve in the BRICS countries: fresh evidence from methods of moments quantile regression. *Environmental Science and Pollution Research, 27*(31), 39427-39441. doi: https://doi.org/10.1007/s11356-020-10011-y

Bătae, O. M., Dragomir, V. D., & Feleagă, L. (2021). The relationship between environmental, social, and financial performance in the banking sector: A European study. *Journal of Cleaner Production, 290*, 125791. doi: https://doi.org/10.1016/j.jclepro.2021.125791

Berger, A. N., Boubakri, N., Guedhami, O., & Li, X. (2019). Liquidity creation performance and financial stability consequences of Islamic banking: Evidence from a multinational study. *Journal of Financial Stability, 44*, 100692. doi: https://doi.org/10.1016/j.jfs.2019.100692

Danoshana, S., & Ravivathani, T. (2019). The impact of the corporate governance on firm performance: A study on financial institutions in Sri Lanka. *SAARJ Journal on Banking & Insurance Research, 8*(1), 62-67. doi: http://dx.doi.org/10.5958/2319-1422.2019.00004.3

Demirgüç-Kunt, A., Pedraza, A., & Ruiz-Ortega, C. (2021). Banking sector performance during the COVID-19 crisis. *Journal of Banking & Finance, 133*, 106305. doi: https://doi.org/10.1016/j.jbankfin.2021.106305

Ekinci, R., & Poyraz, G. (2019). The effect of credit risk on financial performance of deposit banks in Turkey. *Procedia Computer Science, 158*, 979-987. doi: https://doi.org/10.1016/j.procs.2019.09.139

Eklof, J., Podkorytova, O., & Malova, A. (2020). Linking customer satisfaction with financial performance: an empirical study of Scandinavian banks. *Total Quality Management & Business Excellence, 31*(15-16), 1684-1702. doi: https://doi.org/10.1080/14783363.2018.1504621

Gazi, M. A. I., Nahiduzzaman, M., Harymawan, I., Masud, A. A., & Dhar, B. K. (2022). Impact of COVID-19 on financial performance and profitability of banking sector in special reference to private commercial banks: empirical evidence from Bangladesh. *Sustainability, 14*(10), 6260. doi: https://doi.org/10.3390/su14106260

Guellil, N. ., & Benhabib, A. . (2022). Determinants of Social Security Financing in Algeria: A Marketing Approach using a Logit Model . *Journal of Social Economics Research, 9*(1), 27–38. doi: https://doi.org/10.18488/35.v9i1.2903

Hameedi, K. S., Al-Fatlawi, Q. A., Ali, M. N., & Almagtome, A. H. (2021). Financial performance reporting, IFRS implementation, and accounting information: Evidence from Iraqi banking sector. *The Journal of Asian Finance, Economics and Business, 8*(3), 1083-1094. doi: https://doi.org/10.13106/jafeb.2021.vol8.no3.1083

Haralayya, B. (2021). Financial Statement Analysis of Shri Ram City Union Finance. *Iconic Research And Engineering Journals, 4*(12), 183-196. Retrieved from https://www.irejournals.com/formatedpaper/1702794.pdf

Hunjra, A. I., Mehmood, A., Nguyen, H. P., & Tayachi, T. (2022). Do firm-specific risks affect bank performance? *International Journal of Emerging Markets, 17*(3), 664-682. doi: https://doi.org/10.1108/IJOEM-04-2020-0329

Ichsan, R., Suparmin, S., Yusuf, M., Ismal, R., & Sitompul, S. (2021). Determinant of Sharia Bank's Financial Performance during the Covid-19 Pandemic. *Budapest International Research and Critics Institute-Journal (BIRCI-Journal), 8*, 298-309. doi: https://doi.org/10.33258/birci.v4i1.1594

Ike, G. N., Usman, O., & Sarkodie, S. A. (2020). Testing the role of oil production in the environmental Kuznets curve of oil producing countries: New insights from Method of Moments Quantile Regression. *Science of the Total Environment, 711*, 135208. doi:

https://doi.org/10.1016/j.scitotenv.2019.135208

Jadah, H. M., Hameed, T. M., & Al-Husainy, N. H. M. (2020). The impact of the capital structure on Iraqi banks' performance. *Investment Management & Financial Innovations, 17*(3), 122. doi: http://dx.doi.org/10.21511/imfi.17(3).2020.10

Jan, A., Marimuthu, M., bin Mohd, M. P., & Isa, M. (2019). The nexus of sustainability practices and financial performance: From the perspective of Islamic banking. *Journal of Cleaner Production, 228*, 703-717. doi: https://doi.org/10.1016/j.jclepro.2019.04.208

Jethwani, K., & Ramchandani, K. (2022). Patel Farms: Drip irrigation, the ray of hope, International *Journal of Instructional Cases, 6*. Retrieved from http://www.ijicases.com/search/the-zoo_case/

Julia, T., & Kassim, S. (2020). Exploring green banking performance of Islamic banks vs conventional banks in Bangladesh based on framework. *Journal of Islamic Marketing, 11*(3), 729-744. doi: https://doi.org/10.1108/JIMA-10-2017-0105

Kanyangemu, A., & Kundu, K. (2019). Trade performance of agricultural commodities of Tanzania. *Indian Journal of Economics and Development, 15*(3), 427-434. doi: http://dx.doi.org/10.5958/2322-0430.2019.00053.2

Khong, T. D. (2022). Vertical and Horizontal Coordination in Developing Countries' Agriculture: Evidence from Vietnam and Implications. *Asian Journal of Agriculture and Rural Development, 12*(1), 40–52. doi: https://doi.org/10.55493/5005.v12i1.4429

Kukah, A. S., Anafo, A., Kukah, R. M. K., et al. (2022). Exploring innovative energy infrastructure financing in Ghana: benefits, challenges and strategies. *International Journal of Energy Sector Management, 16*(2), 248-264. doi: https://doi.org/10.1108/IJESM-12-2020-0010

Kuswardinah, A., Ansori, M., Rachmawati, R., & Fajri, M. P. (2021). Female Farmers' Knowledge as the Start-Up Capital for an Agribusiness Incubator: A Perspective of Banyubiru Village, Semarang Regency, Central Java, Indonesia. *Nurture, 15*(1), 43–49. doi: https://doi.org/10.55951/nurture.v15i1.6

Li, K., Ying, H., Ning, Y., et al. (2022). China's 2060 carbon-neutrality agenda: the nexus between energy consumption and environmental quality. *Environmental Science and Pollution Research, 29*, 1-15. doi: https://doi.org/10.1007/s11356-022-19456-9

Liu, Y., Ji, D., Zhang, L., An, J., & Sun, W. (2021). Rural financial development impacts on agricultural technology innovation: Evidence from China. *International Journal of Environmental Research and Public Health, 18*(3), 1110. doi: https://doi.org/10.3390/ijerph18031110

Machado, J. A., & Silva, J. S. (2019). Quantiles via moments. *Journal of Econometrics, 213*(1), 145-173. doi: https://doi.org/10.1016/j.jeconom.2019.04.009

Ndiaye, M. B. O., Ceesay, E. K., & Moussa, Y. M. (2022). International Commodity Price and Economy Growth: Panel Data Analysis in Sub-Saharan Africa. *International Journal of Applied Economics, Finance and Accounting, 13*(2), 82-94. doi: https://doi.org/10.33094/ijaefa.v13i2.625

Nizam, E., Ng, A., Dewandaru, G., Nagayev, R., & Nkoba, M. A. (2019). The impact of social and environmental sustainability on financial performance: A global analysis of the banking sector. *Journal of Multinational Financial Management, 49*, 35-53. doi: https://doi.org/10.1016/j.mulfin.2019.01.002

Ojah, H. K., Malik, Y. S., & Ali, A. M. M. (2019). Capital solvency and its impact on the stock prices of banks Listed on Iraq Stock Exchange- Applying to National Bank of Iraq. *International Journal of Multidisciplinary Research and Publications (IJMRAP), 2*(5), 31-36. Retrieved from https://www.researchgate.net/profile/Ahmed-Mahar/publication/340661517

Ramzan, M., Amin, M., & Abbas, M. (2021). How does corporate social responsibility affect financial performance, financial stability, and financial inclusion in the banking sector? Evidence from Pakistan. *Research in International Business and Finance, 55*, 101314. doi: https://doi.org/10.1016/j.ribaf.2020.101314

Sahyouni, A., & Wang, M. (2019). Liquidity creation and bank performance: evidence from MENA. *ISRA International Journal of Islamic Finance, 11*(1), 27-45. doi: https://doi.org/10.1108/IJIF-01-2018-0009

Salman, M. D., Mohammed, A. H., & Flayyih, H. H. (2021). Financial safety indicators under financial crises and their impact on banking finance: An Applied study in Iraqi banks. *Estudios de Economia Aplicada, 39*(11). doi: https://dx.doi.org/10.25115/eea.v39i11.5923

Soewarno, N., & Tjahjadi, B. (2020). Measures that matter: an empirical investigation of intellectual capital and financial performance of banking firms in Indonesia. *Journal of Intellectual Capital, 21*(6), 1085-1106. doi: https://doi.org/10.1108/JIC-09-2019-0225

Taghizadeh-Hesary, F., & Yoshino, N. (2019). The way to induce private participation in green finance and investment. *Finance Research Letters, 31*, 98-103. doi: https://doi.org/10.1016/j.frl.2019.04.016