

Banking sector development and financial performance of small and medium enterprises in Mogadishu, Somalia



Abdikarin Ahmed Abdi ^{1,*}, Fatima Mohamed Hussein ¹, Hanita Bint Kadir Shahar ²

¹Faculty of Management Science, Simad University, Mogadishu, Somalia

²School of Economics, Finance and Banking, University Utara Malaysia, Kedah, Malaysia

ARTICLE INFO

Article history:

Received 18 May 2023

Received in revised form

18 September 2023

Accepted 6 November 2023

Keywords:

Banking sector development

Financial performance

Small and medium enterprises

Correlational research design

ABSTRACT

This study attempts to establish the relationship between banking sector development and the financial performance of small and medium enterprises in Mogadishu, Somalia. Financial intermediation theory is adopted to explain this relationship. The study adopted a correlational research design with 55 SMEs operating in Mogadishu city, Somalia. These SMEs were purposively selected. The study adopted a census, and thus, all the SMEs were included in the analysis. Due to the unavailability of secondary data in Somalia, the study relied on primary data, for which questionnaires were carefully designed using the existing scales and available literature. This questionnaire was then administered to the respondents who shared their responses and were analyzed. Before collecting information from the respondents, the study adopted the questionnaire in the pilot testing stage to ensure that it was reliable and valid. The main analysis for this study includes means and standard deviations (descriptive statistics) and correlation and regression analysis. The results were that access to credit ($p < 0.05$), bank deposits ($p < 0.05$), and customer savings ($p < 0.05$) were all significant predictors of increase in profits and stability of sales. The study concludes that banking sector development is a significant predictor of the financial performance of small and medium enterprises.

© 2023 The Authors. Published by IASE. This is an open access article under the CC BY-NC-ND license (<http://creativecommons.org/licenses/by-nc-nd/4.0/>).

1. Introduction

Small and medium enterprises (hereafter addressed as SMEs) have varied definitions that are based on indicators such as the number of employees, turnover, and asset base, among others. This study adopts the definition of SMEs as provided by Buculescu (2013), which is firms having 10-250 staff with annual sales revenue of less than 50 million EUR. Given their limited scale of operations and low asset base, these firms encounter an array of challenges, including limited access to funds needed for investment to generate returns for better financial performance. It is hoped that banking sector development can contribute towards solving the challenge of limited access to funds by SMEs that, in turn, has contributed to their poor financial performance (Ademosu, 2022).

Financial performance is defined as the ability of a firm to achieve its established monetary goals in terms of profitability. According to Pacheco (2019), financial performance is one of the four perspectives of the balanced scorecard, aside from customers, learning, growth, and internal business processes (Talom and Tengeh, 2019). Although financial performance is a multifaceted concept, conventional measures that have been widely documented in the literature include returns generated on assets (ROA), equities (ROE), and investments (ROI) (Ademosu, 2022). Financial performance is important, and it has received considerable attention from scholars since it allows managers to maximize the wealth of shareholders as one of the far-reaching goals guiding firms (Dar and Mishra, 2020).

The banking sector is a critical component of the larger financial system of any country, and it plays a central role in mobilizing savings and deposits that are used to fund loans for customers (Abusharbeh, 2017). This, in turn, is expected to contribute towards the growth of the economy (Bayar et al., 2023). Although there are various indicators of banking sector development, Mhadhbi et al. (2020) used bank credit, bank deposits, and bank branch networks as key measures of banking sector

* Corresponding Author.

Email Address: abdikarincodey@gmail.com (A. A. Abdi)

<https://doi.org/10.21833/ijaas.2023.11.023>

Corresponding author's ORCID profile:

<https://orcid.org/0000-0001-9967-0546>

2313-626X/© 2023 The Authors. Published by IASE.

This is an open access article under the CC BY-NC-ND license

(<http://creativecommons.org/licenses/by-nc-nd/4.0/>)

development. Banking sector development provides good opportunities for SMEs to access credit facilities that are required to finance operations (Cave et al., 2020). It also enhances the financial literacy of SME managers to have a clear understanding of finance concepts like insurance, management of debts, investment, savings, and borrowing (Bayar et al., 2021). Such knowledge is particularly important in developing economies like Somalia, one of the countries that emerged from decades of fragilities and civil war that adversely affected the financial sector and systems of the country. Banking sector development can allow SMEs to expand operations, create more employment opportunities, and increase their scale of operations. This can, in turn, contribute to the amount of taxes paid to the government, which is needed to finance budgetary deficits and in support of economic growth and development (Le et al., 2021).

SMEs play an instrumental role in the growth of the economy through the creation of both formal and informal employment for millions of people in Somalia. In spite of this, the SME segment has continued to report dismal profits due to the interplay of an array of challenges, including limited access to funds (Hossain et al., 2018). Little efforts have been made by the government to enhance the financial performance of the SMEs in Somalia despite their potential to generate revenues that can be used to finance fiscal deficits (Adan and Kising'u, 2018). It is hoped that banking sector development will increase the availability of funds that are needed by these SMEs to enhance their financial performance.

The available studies include Bashiru et al. (2023), who focused on financial development and its implication on the profitability of banks in 30 countries from Sub-Saharan Africa (SSA), where a negative relationship was established. In a study done by Ozili and Ndah (2021), the focus was on the financial development and profitability of banks using Nigeria as the case, and a negative relationship was noted. Doan and Bui (2021) did a study in Vietnam with a focus on financial development and corporate performance. The study noted that financial development has a positive effect on corporate performance. However, the aforementioned studies create gaps as some, like Doan and Bui (2021), were done in more developed countries like Vietnam and not Somalia. There are also empirical gaps arising from some of these studies, like Bashiru et al. (2023), which established a negative relationship, while Doan and Bui (2021) established a positive nexus between banking sector development and performance. From a detailed review of the literature, it is evident that no study exists or has been published in the context of Somalia on banking sector development firm performance nexus. Against these gaps, this study sought to establish a relationship between banking sector development and the financial performance of small and medium enterprises in Mogadishu, Somalia

2. Literature review

2.1. Theoretical literature review

This study was guided by the financial intermediation theory, whose proponents include Akerlof (1970), Spence (1973), and Rothschild and Stiglitz (1970). The theory recognizes the central role played by commercial banks in an economy as financially established intermediaries that help in mobilizing deposits, which are used for lending purposes. As intermediaries, commercial banks play an instrumental role in facilitating payments and the creation of money within the economy. The theory recognizes the three roles played by commercial banks as intermediaries in an economy. First, they enhance the allocation of scarce funds through the provision of credit to projects that are of high efficiency. Secondly, the banking system allows people to plan and implement sound consumption using savings and borrowed funds from banks. Thirdly, commercial banks seek to enhance the provision of liquidity to an economy through the transformation of short-term to long-term liabilities (Demetriades and Fielding, 2012). Through these three roles, the banking system provides an opportunity for savers and depositors to manage their exposure to liquidity risk while supporting long-term projects with capital. Thus, banking sector development is expected to increase, strengthen, and enhance the level of financial intermediation in an economy. The increased financial intermediation that comes with banking sector development would, in turn, lower the transaction costs incurred by customers and thus increase efficiency.

2.2. Empirical review

Bashiru et al. (2023) did a study on financial development and its interaction with the profitability of banks covering 30 SSA countries. The measures of financial development adopted include institutional quality, financial openness, bank stability, and competition. After processing the gathered data, it emerged that a positive link exists between financial development and the profitability of banks. Ozili and Ndah (2021) did a study whose focus was on financial development and the link with the profitability of banks within the context of Nigeria. Deposits against gross domestic product were a measure adopted for financial sector development. It was noted after processing the gathered information the link between financial sector development and the profitability of banks was negative but significant.

In a study by Doan and Bui (2021), the main focus was on establishing the implication of financial development on firm performance. This study was done in Vietnam and focused on the logistics sector. After processing the information that had been obtained, the study established evidence that financial sector development and corporate performance are positively linked with each other.

Hossain et al. (2018) did a study whose focus was on financial development, accessibility to credit facilities, and the link with the financial performance of SMEs in Bangladesh between 1999-20. The study observed that expanding the branch operations of the banks would lead to a rise in competition among banking institutions in finding sound borrowers, and this reduces the credit default risk. The inquiry pointed out that an increase in bank branches would lead to a rise in productivity and, thus, the financial performance of the SMEs, thus creating a positive nexus. Lerskullawat (2017) covered Indonesia, the Philippines, Malaysia, and Thailand to conduct an appraisal of banking sector development and its implication on monetary policy. It was noted that banking sector development with regard to the development of capital, increased liquidity, and banking activities contribute towards the weakening of the monetary via lending channel.

2.3. Conceptual framework

Fig. 1 is the conceptual framework to guide the study. From Fig. 1, BSD is operationalized into credit access, bank deposits, and customer savings, as earlier adopted by Abusharbeh (2017). Financial performance, according to Ademosu (2022), includes stability in sales and profitability of an enterprise.

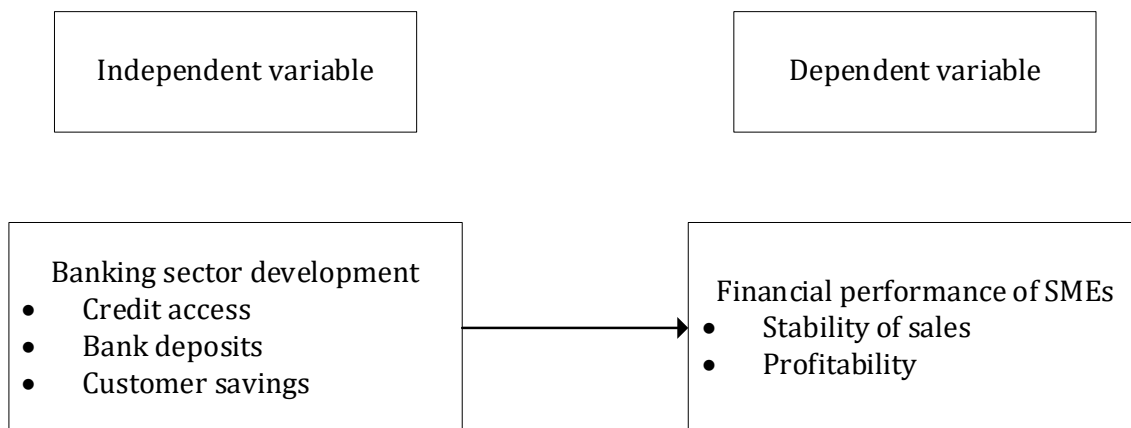


Fig. 1: Conceptual framework

$$FP = \beta_0 + \beta_1 BSD + \epsilon \quad (2)$$

where, FP is profitability, BSD is banking sector development (as a function of access to credit, bank deposits, and customer savings), and ϵ is error term.

4. Results and discussion

4.1. Response rate

Of the 55 questionnaires that were administered to SMEs in Mogadishu, 43 of them were completely filled out and collected. This was equivalent to a response rate of 78.2%. This response rate was supported by Creswell and Creswell (2017), who said that a response above 70% is adequate to support the analysis of the findings as presented in the subsequent sections.

3. Research methodology

The study adopted a correlational research design so as to establish the link between variables. A total of 55 SMEs operating in Mogadishu, Somalia, were targeted. The study adopted a census since the target population was small and could easily be accessed. Because of the non-availability of secondary data in Somalia, the study relied on primary data, for which a questionnaire was carefully designed using the existing scales and the available literature. This questionnaire was then administered to respondents who shared their responses that were analyzed. Before gathering information from the respondents, the study questionnaire underwent pilot testing to ensure it was reliable and valid. Means and standard deviations (descriptive statistics), as well as correlation and regression analysis, were conducted during the analysis. The regression model that was used is specified under the following specification.

$$FP = \beta_0 + \beta_1 BSD + \epsilon \quad (1)$$

where, FP is stability of sales, BSD is banking sector development (as a function of access to credit, bank deposits, and customer savings), and ϵ is error term.

4.2. Descriptive statistics

The subsequent sections detail the findings of descriptive statistics on banking sector development and financial development.

4.3. Banking sector development

The findings on means and standard deviation of banking sector development were established and summarized as indicated in Table 1.

From Table 1, the value of the average is given as $M=3.06$. This means that overall, the respondents moderately agreed with the statements that they had been provided with under banking sector development. This, therefore, implies that there is average banking sector development in Somalia.

4.4. Financial performance

The findings on the financial performance of the studied SMEs were determined and summarized as shown in Table 2. Table 2 gives the value of average as 3.48, which implies that respondents moderately rated the statements under the financial performance of their SMEs. This means that in the views of the respondents, the financial performance of their SMEs was average.

4.5. Correlation matrix

Correlation analysis was used to predict the relationship between banking sector development indicators and the financial performance of SMEs (stable sales). Table 3 is a breakdown of the findings.

Table 1: Banking sector development

	Mean	Standard deviation
Your SME can easily access credit from commercial banks	2.31	0.675
Your SME uses the credit accessed from commercial banks to invest	3.21	0.907
Commercial banks safeguard the deposits of your SME	3.09	0.893
The SME saves money with commercial banks	3.40	0.881
The SME uses its savings to access credit from commercial banks	3.27	0.798
Average	3.06	0.831

Table 2: Financial performance

	Mean	Standard deviation
Your SME has recorded stable sales	3.46	0.780
The SME has posted an increase in profits	3.49	0.893
Average	3.48	0.837

Table 3: Correlation between financial sector development indicators and stability of sales

		Stable sales	Can easily access credit	Use of credit to invest	Safeguarding the deposits	Saving money	Use of savings to access credit
Stable sales	Pearson correlation	1					
Easily access credit	Pearson correlation	.183	1				
Use of credit to invest	Pearson correlation	.505	.310	1			
Safeguarding the deposits	Pearson correlation	.338	.092		1		
Saving money	Pearson correlation	.389	.215	.335	.056	1	
Use of savings to access credit	Pearson correlation	.329	.118	.141	.004	.255	1

The findings in Table 3 indicate that while the use of credit to invest had a strong and positive correlation with stable sales of the SMEs (r=0.505), the ease of access credit had a weak and positive relationship (r=0.183) while safeguarding the deposits (r=0.338), saving money (r=0.389) and the use of savings to access credit (r=0.329) all had a moderate and positive relationship with the financial performance of the SMEs. Thus, it can be inferred that banking sector development is a positive correlate of the financial performance of SMEs. This

finding is consistent with Hossain et al. (2018), who did a study whose focus was on financial development, accessibility to credit facilities, and the link with the financial performance of SMEs in Bangladesh. It was pointed out that an increase in bank branches would lead to a rise in productivity and, thus, the financial performance of the SMEs, thus creating a positive nexus.

The correlation analysis results on financial sector development indicators and the increase in sales were determined and presented in Table 4.

Table 4: Correlation between financial sector development indicators and increase in profits

		Increase in profits	Can easily access credit	Use of credit to invest	Safeguarding the deposits	Saving money	Use of savings to access credit
Increase in profits	Pearson correlation	1					
Can easily access credit	Pearson correlation	.570	1				
Use of credit to invest	Pearson correlation	.527	.060	1			
Safeguarding the deposits	Pearson correlation	.504	.251	.208	1		
Saving money	Pearson correlation	.502	.652	.252	.424	1	
Use of savings to access credit	Pearson correlation	.508	.006	.437	.127	.211	1

The results in Table 4 show that the ease of accessing credit (r=0.570), use of credit to invest (r=0.527), safeguarding the deposits (r=0.504), saving money (r=0.502), and use of savings to access credit (r=0.508) were all strong and positive correlates of increase in profits among SMEs in Mogadishu. This means that financial sector

development indicators have a positive effect on the financial performance of the SMEs.

4.6. Regression results

A regression analysis was conducted to predict the banking sector's development and the financial performance of SMEs. Table 5 is an overview of the

regression model summary. Table 5 shows that credit access ($p < 0.05$), bank deposits ($p < 0.05$), and customer savings ($p < 0.05$) were all significant predictors of stability of sales among the studied SMEs. These findings are in line with Bashiru et al. (2023), who established a positive and significant nexus between financial development and the profitability of banks. The findings further agree with Ozili and Ndah (2021), who noted after processing the gathered information that the link between financial sector development and the profitability of banks was negative but significant. Table 6 is a breakdown of the findings on financial sector development indicators and increases in profits. The findings in Table 6 show that credit access ($p < 0.05$), bank deposits ($p < 0.05$), and customer savings ($p < 0.05$) were all significant

predictors of increase in profits among the studied SMEs. These findings agree with Doan and Bui (2021), who established evidence that financial sector development and corporate performance are positively linked with each other. Hossain et al. (2018) observed that expanding the branch operations of the banks would lead to a rise in competition among banking institutions in finding sound borrowers, and this reduces the credit default risk. The study further pointed out that an increase in bank branches would lead to a rise in productivity and, thus, the financial performance of the SMEs, thus creating a positive nexus. Lerskullawat (2017) noted that banking sector development with regard to the development of capital, increased liquidity, and banking activities contribute towards the weakening of the monetary via lending channel.

Table 5: Regression results predicting financial sector development indicators on stable sales

Model	R	R square	Adjusted R square	Standard error of the estimate	Change statistics				
					R Square change	F change	df1	df2	Sig. F change
1	.799	.639	.630	.95655	.639	72.561	1	41	.000
2	.838	.702	.687	.88043	.063	8.396	1	40	.006
3	.838	.702	.679	.89079	.001	.075	1	39	.786
Model	Unstandardized coefficients			Standardized coefficients			t	Sig.	
	B	Standard error	Beta						
1	(Constant)	14.034	4.110			3.415	.001		
	Credit access	1.791	.210	.799		8.518	.000		
2	(Constant)	7.878	4.339			1.816	.077		
	Credit access	.804	.392	.359		2.054	.047		
	Bank deposits	.674	.233	.506		2.898	.006		
3	(Constant)	8.113	4.472			1.814	.077		
	Credit access	.811	.397	.362		2.044	.048		
	Bank deposits	.643	.261	.483		2.458	.019		
	Customer savings	.864	.201	.776		4.297	.000		

Table 6: financial sector development indicators and increase in profits

Model	R	R square	Adjusted R square	Standard error of the estimate	Change statistics				
					R square change	F change	df1	df2	Sig. F change
1	.393	.154	.134	1.49535	.154	7.486	1	41	.009
2	.590	.348	.316	1.32924	.194	11.887	1	40	.001
3	.597	.356	.307	1.33754	.008	.505	1	39	.481
4	.812	.659	.623	.98649	.302	33.696	1	38	.000
5	.859	.738	.703	.87621	.079	11.167	1	37	.002
Model	Unstandardized coefficients			Standardized coefficients			t	Sig.	
	B	Standard error	Beta						
1	(Constant)	20.429	4.557			4.483	.000		
	Credit access	.542	.198	.393		2.736	.009		
2	(Constant)	18.261	4.100			4.454	.000		
	Credit access	.029	.242	.021		.121	.904		
	Bank deposits	.664	.192	.604		3.448	.001		
3	(Constant)	18.769	4.187			4.483	.000		
	Credit access	.071	.250	.051		.283	.779		
	Bank deposits	.584	.224	.532		2.608	.013		
	Customer savings	.311	.125	.412		2.477	.018		

5. Conclusion

This study set out to determine the relationship between banking sector development and the financial performance of SMEs in Mogadishu. The analysis of the findings indicated that banking sector development is a strong and positive correlate of the financial performance of SMEs. Based on regression results, the study concludes that banking sector development is a significant predictor of the financial performance of SMEs. The study recommends that the Central Bank of Somalia should enact relevant policies and regulations that promote and contribute to the banking sector's development. Besides, policymakers from the Central Bank of

Somalia should enact sound regulations to support and enhance the financial performance of the SMEs.

Compliance with ethical standards

Conflict of interest

The author(s) declared no potential conflicts of interest with respect to the research, authorship, and/or publication of this article.

References

Abusharbeh MT (2017). The impact of banking sector development on economic growth: Empirical analysis from

- Palestinian economy. *Journal of Emerging Issues in Economics, Finance and Banking*, 6(2): 2306-2316.
- Adan AOS and Kising'u TM (2018). Factors influencing micro and small business enterprises' performance in Mogadishu, Somalia. *Strategic Journal of Business Change Management*, 5(1): 496-516. <https://doi.org/10.61426/sjbc.v5i1.635>
- Ademosu A (2022). The impact of the financial system and its channels on SMES' access to financing: A Nigerian perspective. Ph.D. Dissertation, Georgia State University, Atlanta, USA.
- Akerlof GA (1970). The market for lemons: Qualitative uncertainty and the market mechanism. *Quarterly Journal of Economics*, 84(3): 488-500. <https://doi.org/10.2307/1879431>
- Bashiru S, Bunyaminu A, Yakubu IN, Al-Faryan MAS, Mac Carthy J, and Nyamekye KA (2023). Quantifying the Link between financial development and bank profitability. *Theoretical Economics Letters*, 13(2): 284-296. <https://doi.org/10.4236/tel.2023.132018>
- Bayar Y, Borozan D, and Gavriletea MD (2021). Banking sector stability and economic growth in post-transition European Union countries. *International Journal of Finance and Economics*, 26(1): 949-961. <https://doi.org/10.1002/ijfe.1829>
- Bayar Y, Dan Gavriletea M, Estes J, and Oana Pinte M (2023). Impact of banking sector development and environment on population health: evidence from EU transition countries. *Economic Research-Ekonomika Istraživanja*, 36(1): 2076140. <https://doi.org/10.1080/1331677X.2022.2076140>
- Buculescu MM (2013). Harmonization process in defining small and medium-sized enterprises. Arguments for a quantitative definition versus a qualitative one. *Theoretical and Applied Economics*, 20(9): 103-114.
- Cave J, Chaudhuri K, and Kumbhakar SC (2020). Do banking sector and stock market development matter for economic growth? *Empirical Economics*, 59: 1513-1535. <https://doi.org/10.1007/s00181-019-01692-7>
- Creswell JW and Creswell JD (2017). *Research design: Qualitative, quantitative, and mixed methods approaches*. Sage Publications, Thousand Oaks, USA.
- Dar IA and Mishra M (2020). Dimensional impact of social capital on financial performance of SMEs. *The Journal of Entrepreneurship*, 29(1): 38-52. <https://doi.org/10.1177/0971355719893499>
- Demetriades P and Fielding D (2012). Information, institutions, and banking sector development in West Africa. *Economic Inquiry*, 50(3): 739-753. <https://doi.org/10.1111/j.1465-7295.2011.00376.x>
- Doan TTT and Bui TN (2021). The impact of financial development on corporate performance: Theory and evidence. *International Journal of Financial Research*, 12(1): 214-219. <https://doi.org/10.5430/ijfr.v12n1p214>
- Hossain M, Yoshino N, and Taghizadeh-Hesary F (2018). Local financial development, access to credit and SMEs' performance: Evidence from Bangladesh (No. 906). ADBI Working Paper Series, Asian Development Bank Institute (ADBI), Tokyo, Japan.
- Le TTH, Le TD, Tran TD, Duong, QN, Dao LKO, and Do TTN (2021). Banking sector depth and economic growth: Empirical evidence from Vietnam. *The Journal of Asian Finance, Economics and Business*, 8(3): 751-761.
- Lerskullawat A (2017). Effects of banking sector and capital market development on the bank lending channel of monetary policy: An ASEAN country case study. *Kasetsart Journal of Social Sciences*, 38(1): 9-17. <https://doi.org/10.1016/j.kjss.2016.10.001>
- Mhadhbi K, Terzi C, and Bouchrika A (2020). Banking sector development and economic growth in developing countries: A bootstrap panel Granger causality analysis. *Empirical Economics*, 58(6): 2817-2836. <https://doi.org/10.1007/s00181-019-01670-z>
- Ozili PK and Ndah H (2021). Impact of financial development on bank profitability. *Journal of Economic and Administrative Sciences*. <https://doi.org/10.1108/JEAS-07-2021-0140>
- Pacheco LM (2019). Internationalization effects on financial performance: The case of Portuguese industrial SMEs. *Journal of Small Business Strategy*, 29(3): 97-116.
- Rothschild M and Stiglitz J (1970). Increasing risk: A definition. *Journal of Economic Theory*, 2: 225-243. [https://doi.org/10.1016/0022-0531\(70\)90038-4](https://doi.org/10.1016/0022-0531(70)90038-4)
- Spence M (1973). Job market signaling. *The Quarterly Journal of Economics*, 87(3): 355-374. <https://doi.org/10.2307/1882010>
- Talom FSG and Tengeh RK (2019). The impact of mobile money on the financial performance of the SMEs in Douala, Cameroon. *Sustainability*, 12(1): 183. <https://doi.org/10.3390/su12010183>