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Ms. Aline Mbabazi & Dr. Osiemo Athanas Kengere (PhD)

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Effect of Commercial Bank Services on the Growth of Small and Medium Enterprises in Rwanda: A Case of Manufacturing Small and Medium Enterprises Bankrolled by Bank of Kigali

Ms. Aline Mbabazi¹ & Dr. Osiemo Athanas Kengere² (PhD)

¹ School of Business and Economics, Master of Business Administration (Finance Option), Mount Kenya University, Kigali, Rwanda

² Mount Kenya University, Kigali, Rwanda

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Abstract

The general objective of the study was to investigate effects of commercial bank services on the growth of small and medium enterprises in Rwanda. Specifically, the study evaluated the effect of bank loan services on the growth of manufacturing small and medium enterprises in Rwanda, determine the effect of saving services on growth of manufacturing small and medium enterprises in Rwanda and identify the effect of financial literacy services on the growth of manufacturing small and medium enterprises in Rwanda. Located in Kigali's Special Economic Zone, the branch of Bank of Kigali served as the site for the research. The study included both quantitative and qualitative methods. The research was done with small and medium-sized businesses who regularly utilize Bank of Kigali services. The study's population consisted of 317 small and medium-sized manufacturing businesses that do business with Bank of Kigali and have checking accounts there. The study's sample size was determined via the Solvin formula. Purposive sampling was used to pick a representative sample from the population to assure the validity of the results. Quantitative data on the relationship between commercial bank services and SME growth was gathered via a survey of 177 businesses. SPSS (Statistical Product and Service Solutions) was used for the analysis of the gathered data. There is a correlation between the three predictor variables (financial literacy services, saving services, and bank loan services) and the dependent variable (Growth of manufacturing SMEs of Bank of Kigali-Rwanda). Taking into consideration the total number of predictors, the modified R square value of 0.720 is calculated. Growth of manufacturing SMEs of Bank of Kigali-Rwanda results often differ from the projected values based on the model by an average of 0.34637, which is the standard error of the estimate. The results of an analysis of variance (ANOVA) suggest a significance level of $0.000 < 0.05$, with $F=130.431$. This indicates the study's author is certain that the study's focus on financial literacy, savings, and bank loan services contributed to the expansion of Bank of Kigali-Rwanda's manufacturing SMEs. The results showed a very significant positive link between Growth of manufacturing SMEs of Bank of Kigali-Rwanda and financial literacy, saving, and bank loan services ($p < 0.05$). Bank of Kigali should expand lending services with competitive

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rates, promote tailored savings products, and provide incentives for regular savings to support SME growth. Additionally, enhancing financial literacy programs through workshops and consultations will empower SMEs to make informed financial decisions, contributing to their success in Rwanda.

Keywords: *Commercial Bank Services, Growth of Small and Medium Enterprises, Bank of Kigali, Rwanda*

1. Introduction

The government of Rwanda has undertaken initiatives to enhance SMEs' access to credit; however, there remain substantial difficulties blocking these businesses from securing the necessary financial services to thrive. One of the significant impediments is the prevailing bias held by commercial banks, which often categorize SMEs as high-risk borrowers. Consequently, these financial institutions tend to maintain inflexible collateral requirements and repayment conditions, thereby limiting access for small-scale entrepreneurs. A lack of financial literacy among many SME borrowers compounds these challenges, making it arduous for them to navigate the intricate application processes (Felicien & Irechukwu, 2021).

In addition, SMEs face with the burden of elevated interest rates imposed by banks, which can strain their financial resources and divert their focus from core business objectives, hindering enterprise growth. Moreover, they frequently encounter difficulties in accessing financing, particularly due to the onerous interest rates and the requirement for bank guarantees (Khan, Syed, & Khan, 2021).

Despite numerous studies addressing the impact of banks on SME finances, there is a notable gap concerning the specific financial struggles of manufacturing SMEs in the Bank of Kigali Special Economic Zone. This research urges to handle this weakness by investigating the influence of the availability of bank loans, financial training services, and saving services at Bank of Kigali on the financial growth of SMEs in this particular context. The study aims to identify the unique factors contributing to the financial challenges faced by manufacturing SMEs in this region. The resulting insights informed policymakers and stakeholders working with manufacturing SMEs in the Bank of Kigali area, enabling them to offer more targeted support and assistance to address these specific financial constraints.

1.2 Objectives of the study

1.2.1 General objective of the Study

The general of the study was to investigate effects of commercial bank services on the growth of small and medium enterprises in Rwanda.

1.2.2 Specific Objectives of the Study

To evaluate the effect of bank loan services on the growth of manufacturing small and medium enterprises in Rwanda.

To determine the effect of saving services on growth of manufacturing small and medium enterprises in Rwanda.

To analyse the effect of financial literacy services on the growth of manufacturing small and medium enterprises in Rwanda.

1.3 Research hypotheses

H₀₁: Bank loan services do not have a significant role on the growth of manufacturing small and medium enterprises in Rwanda.

Ho2: There is no significant effect of saving services by banks on growth of manufacturing small and medium enterprises in Rwanda.

Ho3: Financial skills financial literacy services do not have significant effect on growth of manufacturing small and medium enterprises in Rwanda.

2.1 Empirical Review

To better optimize bank loans and SME development, to examine the correlation between savings services and SME growth, and to evaluate the impact of financial training services on SME growth, several studies have been done.

2.1.1 The effect of bank loan services on the growth of SMEs

Alzyadat (2021) aimed to investigate how financial institutions have been providing sectoral bank lending facilities in Saudi Arabia. Nine different economic sectors get financing from banks. A few examples include the food and fiber industries, the industrial and construction sectors, the healthcare sector, the retail trade sector, the transportation and communication sectors, and the energy and water sectors. The research uses yearly data sets starting in 1970 and ending in 2019. As a result of these results, the number and quality of consumers were both raised and improved, as well as transactions. The long-term impact of all industries except agriculture and mining is favourable and large, according to the report. Aside from these four industries, all other sectors have an immediate and considerable positive impact on our economy.

Olawunmi, Oluseye, and Sylvanus (2021) studied Micro, small, and medium-sized businesses (MSMEs) in Nigeria's services sector saw positive and unbiased effects from increased access to capital. The research utilized a cross-sectional database from the 2014 World Bank Enterprise Surveys database. Using Ordinary Least Squares regression, this research analyses how MSMEs in Nigeria's service sector benefit from increased loan availability in order to lower unemployment. This study discovered that MSMEs confront financing constraints, since the majority (77.56 percent) of the studied enterprises cited access to financing as the most significant barrier, albeit to differing extents (subjective effect). In addition, the study discovered a statistically significant inverse association between financial constraints and future work opportunities.

2.1.2 The effect of saving services on growth of SMEs

Busa (2016) aimed to identify patterns of mobilizing savings by Rwandan commercial banks and to determine how much structural and extraneous variables affect this process. The study used a cross-sectional research approach to interview 35 individuals at 5 different commercial banks on their experiences with the savings mobilization function. Unfit job promotions, such as a lack of pay inventory, might reduce employee enthusiasm and commitment to the savings mobilization process. Improper use of incentives and penalties is a further instance, and it, too, has a very little impact on generating savings inspiration, work dedication, and success. Competition from other deposit-taking institutions was the most important external factor. This is because the National Bank of Rwanda has created a regulatory environment that encourages the entry of many new players, including Micro Finance Institutions and SACCOs, into the financial sector. Commercial bank executives and managers should reconsider their performance management policies and tactics in light of these results, with an emphasis on increasing employee compensation in order to boost employee motivation and loyalty to their employer.

Those business owners who have a solid grasp of financial concepts are more likely to put their faith in financial institutions. The study, which surveyed 339 MSEs from KNCCI's Trans Nzoia county database, was conducted using a mixed research design. Scholars used stratified sampling to classify MSEs into the following categories: service, manufacturing, and commerce and trade. The instruments' validity and reliability were both determined to be over the 0.70 level by a pilot study. A correlation analysis was also performed between the various measures of financial literacy that were considered important in the study. The primary results showed that business owners who participated in financial literacy trainings gained the knowledge and skills necessary to save money on their own, including creating and sticking to a savings plan, establishing savings goals, creating a financial budget, and altering their outlook on money management. The research suggests that financial institutions should create a gender-based training manual for financial literacy and that trainers' abilities should be improved so that they can provide training from a gender perspective (Fred & Henry, 2017).

2.1.3 The effect of financial literacy services on the growth of SMEs

Onyango's (2014) study focused on investigating the impact of financial literacy on the money management practices of Kenyan commercial bank staff. Utilizing a survey methodology and a purposive sampling strategy, the study revealed that while the staff exhibited a good level of financial literacy, their money management skills were found to be lacking. The research highlighted the need to assess whether improved savings among financially literate individuals translate into better financial outcomes for commercial banks.

Mwaniki (2014) conducted research on the effects of providing financial education to members of Kenyan women's self-help groups on their collective income. Through a survey-based inquiry, the study found that financial literacy training led to improved financial practices within the group, including responsible borrowing and the exploration of alternative payment systems to access financial services, consequently expanding the group's business opportunities.

Hung (2016) explored the role of financial education in addressing economic insecurity in the United States. The study analysed empirical data from various sources on the impact of financial intermediation. Despite some limitations in the measurement approach, the research suggested the need for a standardized model to assess the impact of financial literacy programs on economic outcomes.

Mutegi's (2015) study investigated the influence of SME owners' financial literacy levels on loan repayment rates in Kenya. The research, conducted among 30 SMEs in Ngara, Nairobi County, highlighted the significant impact of financial literacy on the capacity of SMEs to repay their debts. The study emphasized the importance of implementing financial literacy training programs to enhance the financial management capabilities of SMEs.

2.2 Research Gap

The studies by Alzyadat (2021), Olawunmi, Oluseye, and Sylvanus (2021), Onyango (2014), Mwaniki (2014), Hung (2016), Mutegi (2015), Busa (2016), and Fred & Henry (2017) fail to directly address the specific impact of commercial bank services on SME growth in Rwanda. Alzyadat's research provides insights into sectoral bank lending in Saudi Arabia, while Olawunmi et al. focus on finance availability in Nigeria's service sector. Onyango's study emphasizes the financial literacy of Kenyan bank staff, and Mwaniki's work centers on

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women's financial education in Kenya. Hung investigates financial education in the United States, Mutegi examines SME owners' financial literacy in loan repayment, Busa studies commercial banks in Rwanda, and Fred & Henry analyze financial literacy training in Kenya's Trans Nzoia County.

However, none of these studies directly encompass the unique challenges and dynamics of the Rwandan SME sector and its relationship with specific commercial bank services. Hence, the current research addresses this gap by conducting a comprehensive empirical investigation into the direct influence of various commercial bank services, including loan facilities, financial skills training, and savings mobilization, on the growth and sustainability of SMEs in Rwanda. By focusing on the Rwandan context, this study provides actionable insights tailored to the specific needs of SMEs in Rwanda, offering relevant information for policymakers, financial institutions, and SME owners to foster sustainable and inclusive economic growth.

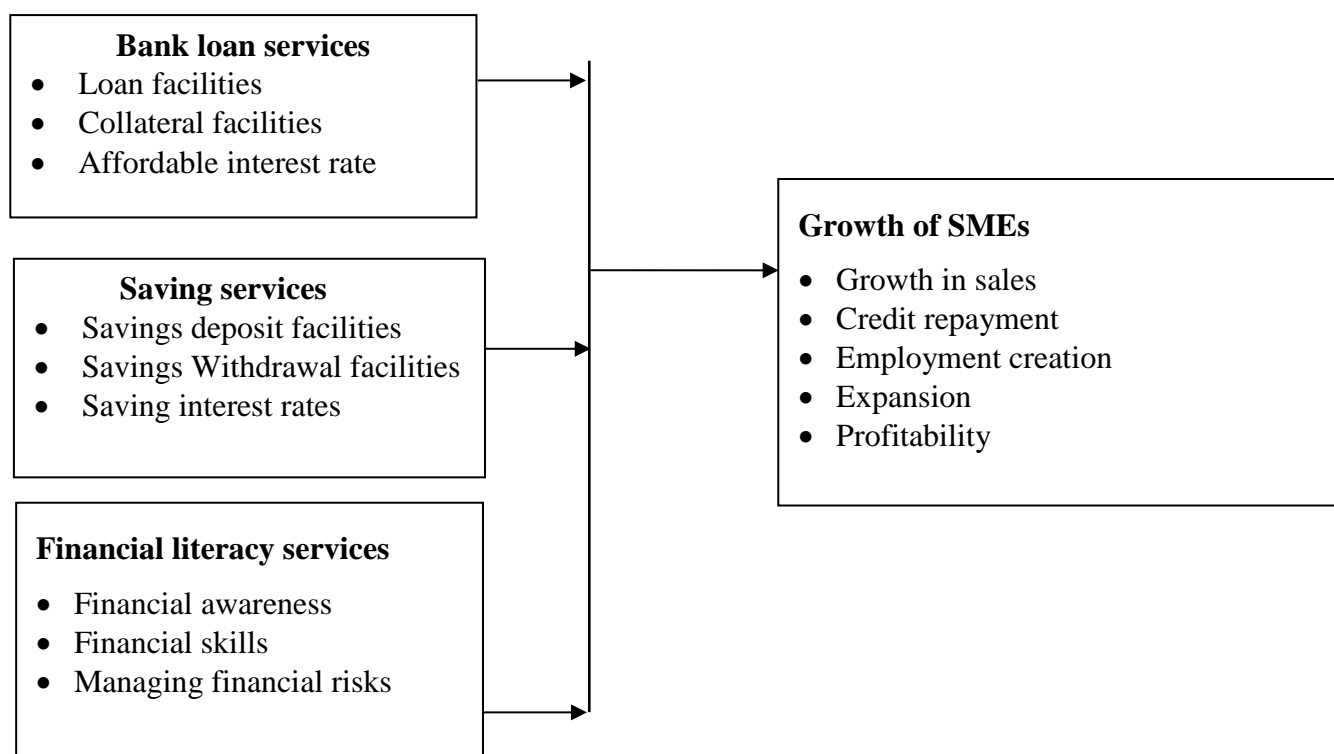
2.3 Conceptual Framework

The The major concepts, variables, and connections in this study are laid out using a conceptual framework. A conceptual framework, therefore, is a plan for structuring ideas with the end goal of achieving certain research aims (Maity, 2019).

Independent variables

Dependent variable

Commercial Bank Services



Source: Researcher (2023)

Figure 2.1: Conceptual Framework

Loan Services: Commercial banks' provision of loans enables SMEs to access capital for business expansion and investment. Collateral facilities minimize risk and enhance the likelihood of loan approval, facilitating SMEs' growth initiatives. Lower interest rates ease

borrowing and debt management, fostering increased investment and business growth. Flexible repayment options facilitate better cash flow management, empowering SMEs to allocate resources for expansion. Saving Services refer to commercial banks offering secure and accessible savings deposits encourage SMEs to save surplus funds for future expansion. Accessible savings enable swift utilization of funds for business growth and quick capital deployment. Higher interest rates on savings incentivize increased savings, directly impacting available investment funds, thus influencing SMEs' growth prospects.

Financial Training Services: Commercial banks enhance SMEs' financial decision-making through education programs, improving resource management and risk mitigation. Strengthened financial skills reduce setbacks, fostering stability for growth-focused endeavors. SME Growth: Increasing sales signify successful business operations and expansion. Timely credit repayment bolsters credibility and enables future funding. Financial performance, including sales growth, profitability, liquidity, efficiency ratios, and job creation, serves as a tangible measure of SME growth and sustainability.

3. Materials and Methods

The research design for this study encompassed both quantitative and qualitative methodologies to comprehensively investigate the influence of commercial banking services on the growth of SMEs in Rwanda. By quantifying numerical data, the quantitative approach facilitated the examination of various factors related to commercial bank services. This method allowed for the use of statistical tools to analyze data trends, frequencies, and percentage distributions, providing a comprehensive understanding of the study's goals. Conversely, qualitative techniques were employed to delve into nuanced insights that might not have been adequately captured through quantitative means, contributing a more holistic understanding of the subject matter.

The study's population consisted of 317 manufacturing SMEs with accounts in the Bank of Kigali's Special Economic Zone Branch. Utilizing a purposive sampling technique, the researcher selected a sample size of 177 SMEs, determined using the Solvin formula. This approach ensured the appropriateness of the sample selection and representation of the study's objectives.

The data collection process comprised both primary and secondary sources. Primary data was gathered through self-administered questionnaires, structured and unstructured interviews, and documentary reviews. The documentation technique involved the use of data collected by others, while the questionnaire technique facilitated the collection of quantitative data on commercial bank services and SME expansion. Additionally, the interview technique allowed for in-depth conversations with the branch manager and loan officer at the Bank of Kigali's Special Economic Zone Branch, yielding qualitative insights aligned with the study's objectives.

The study ensured the validity and reliability of the data through a pilot study and statistical measures. The pilot study, conducted with 10% of the total sample size, guided the refinement of questions and statements. Furthermore, internal consistency reliability was assessed using Cronbach's alpha, with values above 0.70 indicating acceptable reliability. The subsequent data analysis involved the use of Statistical Product and Service Solutions (SPSS) for the evaluation of data obtained. The study's regression model enabled the assessment of the impact of bank loan services, financial literacy services, and saving services on the growth of manufacturing SMEs in Rwanda.

Ethical considerations were paramount throughout the study. The researcher ensured the privacy and confidentiality of participants' information, respecting their autonomy, cultural

values, and rights. By adhering to ethical standards, the study aimed to minimize any potential negative impact on the participants' personal or professional lives, emphasizing the ethical responsibility of the researcher in conducting the study.

4.1 Presentation of findings

When discussing the impact of bank loan services on the expansion of manufacturing SMEs in Rwanda and the impact of saving services on that expansion, descriptive statistical results refer to a wide variety of statistical analyses, such as means, standard deviations, frequencies, and percentages. And the impact of financial education programs on the development of small and medium-sized factories in Rwanda.

4.1.1 Findings on effect of bank loan services on the growth of manufacturing small and medium enterprises in Rwanda

Findings showed the effect of bank loan services on the growth of manufacturing SMEs in Rwanda. All perceptions from respondents are showed in Table 4.1.

Table 4.1: the effect of bank loan services on the growth of manufacturing small and medium enterprises in Rwanda.

	SD		D		N		A		SA		Mean	Std. Dev.
	fi	%	fi	%	fi	%	fi	%	fi	%		
The loan facilities provided by bank are easily accessible to manufacturing SME.	9	5.9	7	4.6	9	5.9	54	35.5	73	48.0	4.15	1.11
Collateral requirements for bank loans are reasonable and manageable for SME.	8	5.3	9	5.9	17	11.2	54	35.5	64	42.1	4.03	1.12
The interest rates offered by bank on loans are affordable for my manufacturing SME.	9	5.9	13	8.6	8	5.3	59	38.8	63	41.4	4.01	1.16
Bank loan services have contributed to employment creation within SME.	8	5.3	7	4.6	12	7.9	67	44.1	58	38.2	4.05	1.06
Bank loan services have supported the expansion of manufacturing SME.	11	7.2	11	7.2	21	13.8	45	29.6	64	42.1	3.92	1.22
Overall											4.03	1.13

Source: Research findings (2023)

Table 4.1 shows the findings of a study that looked at how bank loan services impacted the development of SMEs in Rwanda's manufacturing sector. Researchers asked respondents to rate the extent to which they felt bank loan services helped or hindered the growth of SMEs in Rwanda's manufacturing sector. The percentage of respondents who strongly agree, agree, neutrally agree, disagree, or severely disagree with each statement is given, along with their respective means and standard deviations.

According to the data, the majority of respondents saw bank loan services as having a positive impact on the development of SMEs in Rwanda's manufacturing sector. Specifically, the highest percentage of respondents rated the statement that the loan facilities provided by bank are easily accessible to manufacturing SME as strongly agree (48.0%) and agree (35.5%). The highest mean rating (4.15) among respondents. This indicates that the

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respondents found the statement to be effective. Collateral requirements for bank loans are reasonable and manageable for SME also received a high percentage of agree (35.5%) and strongly agree (42.1%) ratings, and had a high mean rating of 4.03, which indicates that Collateral requirements for bank loans are reasonable and manageable for SME with a strong positive agreement among respondents. The interest rates offered by bank on loans are affordable for my manufacturing SME received a relatively lower percentage of positive ratings (41.4% for strongly agree and 38.8% for agree). However, it still had a high mean rating of 4.01, which indicates that the respondents reinforce and show a strong positive agreement on the statement. Bank loan services have contributed to employment creation within SME, with a relatively lower percentage of positive ratings (38.2% for strongly agree and 44.1% for agree) and a high mean rating of 4.05. This indicates that the Bank loan services was somewhat effective in employment creation within SME with a strong positive agreement among respondents. Bank loan services have supported the expansion of manufacturing SME received a relatively lower percentage of positive ratings (42.1% for strongly agree and 29.6% for agree) and had a high mean rating of 3.92, suggesting that the Bank loan services was somewhat effective in expansion of manufacturing SME.

A loan officer at Bank of Kigali stated, *"I can confidently affirm the significant impact of our bank loan services on the growth of manufacturing small and medium enterprises in Rwanda. Over the years, we have witnessed numerous success stories, where SMEs have utilized our financial support to expand their operations, invest in advanced technologies, and create job opportunities. Our streamlined application process, competitive interest rates, and tailored financial solutions have empowered these enterprises, contributing to the economic development of Rwanda and reinforcing our commitment to their success."*

The findings align with Mbabazi and Uwingenzi's (2018) emphasis on the opportunities that bank loan services can provide for entrepreneurial activities and business growth. The study's results, which indicate that respondents perceive bank loan services as positively impacting manufacturing SME growth in Rwanda, reinforce the notion that access to such services can indeed support business expansion and profitability, in line with Mbabazi and Uwingenzi's emphasis on these possibilities.

With a high mean score of 4.03 across all assertions, respondents seemed to have a favourable outlook on the impact of bank loan services on the development of SME factories in Rwanda. The replies were quite consistent over a wide variety of questions, with standard deviation values between 1.06 and 1.22 indicating moderate variation.

4.1.2 Findings on effect of saving services on growth of SMEs in Rwanda

The findings indicated the influence of savings services on the growth of Rwandan SMEs in the industrial sector. Views expressed by survey respondents are summarized in Table 4.2.

Table 4.2: the effect of saving services on growth of manufacturing SMEs in Rwanda.

	SD		D		N		A		SA		Mean	Std. Dev.
	fi	%	fi	%	fi	%	fi	%	fi	%		
Savings deposit facilities provided by banks are easily accessible to manufacturing SME.	9	5.9	13	8.6	14	9.2	42	27.6	74	48.7	4.05	1.21
The savings withdrawal process for SME is convenient and efficient.	15	9.9	14	9.2	7	4.6	43	28.3	73	48.0	3.95	1.34
The interest rates offered on savings accounts by bank are attractive to my manufacturing SME.	17	11.2	16	10.5	11	7.2	38	25.0	70	46.1	3.84	1.40
Savings services have positively influenced the growth in sales for my SME	8	5.3	14	9.2	12	7.9	40	26.3	78	51.3	4.09	1.20
Savings services have played a role in employment creation within my manufacturing SME.	6	3.9	15	9.9	10	6.6	48	31.6	73	48.0	4.10	1.14
Overall											4.01	1.26

Source: Research findings (2023)

Table 4.2 shows the results of a study investigating the effect of saving services on the growth of small and medium-sized enterprises (SMEs) in Rwanda's manufacturing sector. The findings displays the number of respondents who rated each savings service and the percentages of those ratings. The table also includes the average and standard deviation of the answers.

Savings deposit facilities provided by banks are easily accessible to manufacturing SME. (Strongly agree=48.7% and agree=27.6%). Also, the savings withdrawal process for SME is convenient and efficient (strongly agree =48.0% and agree=28.3%). The interest rates offered on savings accounts by bank are attractive to my manufacturing SME (Strongly Agree=46.1% and agree=25.0%). Furthermore, Savings services have positively influenced the growth in sales for my SME (Strongly Agree=51.3% and agree=26.3%). Lastly, Savings services have played a role in employment creation within my manufacturing SME (Strongly Agree=48.0% and agree=31.6%).

An interviewee stated, *"Our savings products have enabled SMEs to build financial resilience, secure working capital, and seize growth opportunities. Many SMEs have increased their production capacity and expanded their market reach through prudent savings with us. The consistent growth of our SME clients' businesses is a testament to the invaluable support our saving services provide."*

The findings are consistent with Busa's (2016) emphasis on the significance of savings services in the financial sector. Busa's study highlights the importance of addressing factors like inadequate salary structures and ineffective use of rewards and sanctions in enhancing staff motivation in the savings mobilization function. Similarly, the results in Table 4.7 align with this perspective, illustrating the strong positive perception among manufacturing SMEs regarding the influence of savings services on their growth, reinforcing the crucial role of accessible banking services in the savings process.

The respondents' favourable attitudes of the impact of saving services on the expansion of Rwanda's SMEs in manufacturing are reflected in the study's high mean score of 4.01. With a standard deviation of just 1.26, the replies seem to have been quite uniform, with the vast majority lying within a single standard deviation of the mean.

4.1.3 Findings on effect of financial literacy services on the growth of manufacturing SMEs in Rwanda

Findings showed the effect of financial literacy services on the growth of manufacturing SMEs in Rwanda. All perceptions from respondents are presented in Table 4.3.

Table 4.3: effect of financial literacy services on the growth of manufacturing SMEs in Rwanda.

	SD		D		N		A		SA		Mean	Std. Dev.
	fi	%	fi	%	fi	%	fi	%	fi	%		
Manufacturing SMEs have access to sufficient financial awareness resources.	4	2.6	12	7.9	9	5.9	49	32.2	78	51.3	4.22	1.04
The financial skills training provided to SMEs is effective in enhancing our financial knowledge.	6	3.9	10	6.6	12	7.9	61	40.1	63	41.4	4.09	1.05
The financial risk management support received by SME is adequate.	11	7.2	13	8.6	14	9.2	55	36.2	59	38.8	3.91	1.21
Financial literacy services have contributed to the timely repayment of credit in SME.	4	2.6	6	3.9	16	10.5	79	52.0	47	30.9	4.05	.90
Financial literacy services have supported the expansion of manufacturing SME.	7	4.6	10	6.6	15	9.9	15	9.9	46	30.3	3.93	1.04
Overall											4.04	1.05

Source: Research findings (2023)

study on the effect of financial literacy services on the development of SMEs in Rwanda's manufacturing sector is summarized in Table 4.8. For five assertions about electronic tax utilization laws and regulations, we report the findings in terms of frequency (fi), percentage (%), mean, and standard deviation (SD).

Looking at the percentage column, 51.3% of people gave a strong agreement, while 32.2% gave a moderate agreement. that Manufacturing SMEs have access to sufficient financial awareness resources. Similarly, for the second statement, a large percentage of respondents (40.1%) agreed that the financial skills training provided to SMEs is effective in enhancing our financial knowledge, while a 41.4% strongly agreed. For the third statement, the highest percentage of respondents (36.2%) agreed and (38.8%) strongly agreed that the financial risk management support received by SME is adequate. For the fourth statement, a majority of respondents (52.0%) agreed and (30.9%) strongly agreed that financial literacy services have contributed to the timely repayment of credit in SME. Finally, for the fifth statement, the highest percentage of respondents (30.3%) strongly agreed and (48.6%) agreed that financial literacy services have supported the expansion of manufacturing SME.

An interviewee stated, "As a manager at Bank of Kigali, I can confidently confirm the tremendous impact of our financial literacy services on the growth of manufacturing small and medium enterprises in Rwanda. Our dedicated programs have equipped SME owners and employees with the knowledge and skills necessary for effective financial management, investment decisions, and risk mitigation. Through the statistically significant findings of our study, we have tangible proof that these services contribute significantly to the growth and success of SMEs, fostering economic development and prosperity in Rwanda."

The findings align with Onyango's (2014) emphasis on the significance of financial literacy services. Onyango's research in Kenya suggests that financial literacy positively influences individuals' money management. Similarly, the Rwandan study indicates that financial literacy services play a crucial role in enhancing financial awareness and improving the growth prospects of SMEs. Collectively, these results highlight the significance of financial literacy services in influencing fiscal behavior and economic consequences in a range of contexts.

By adding together, the scores for all five assertions, we get an average of 4.04 with a standard-deviation of 1.05 (see mean and standard deviation columns). This suggests that the majority of respondents in Rwanda's manufacturing sector saw services to improve financial literacy as having a favorable effect on the growth of small and medium-sized enterprises. Bank of Kigali customers have a positive impression of financial education services, and these services are essential to the growth of micro, small, and medium-sized factories in Rwanda.

Table 4.4: the growth of manufacturing SMEs in Rwanda.

	SD		D		N		A		SA		Mean	Std. Dev.
	fi	%	fi	%	fi	%	fi	%	fi	%		
Our manufacturing company has experienced substantial growth in sales over the past year.	3	2.0	8	5.3	18	11.8	58	38.2	65	42.8	4.14	.96
Our manufacturing company has actively contributed to employment creation within Rwanda.	11	7.2	9	5.9	11	7.2	58	38.2	63	41.4	4.01	1.18
My SME has successfully executed expansion plans in recent years.	9	5.9	11	7.2	8	5.3	53	34.9	71	46.7	4.09	1.16
Our manufacturing SME has consistently achieved profitability.	2	1.3	8	5.3	6	3.9	72	47.4	64	42.1	4.24	.86
The utilization of financial services has positively influenced our SME's growth indicators.	6	3.9	5	3.3	10	6.6	44	28.9	87	57.2	4.32	1.01
Overall											4.16	1.03

Source: Research findings (2023)

Table 4.4 summarized research on the expansion of small and medium-sized factories in Rwanda. Frequency (fi), percentage (%), mean (mean SD), and standard deviation (SD) are used to display the results for five claims about the development of manufacturing SMEs in Rwanda.

Looking at the percentage column, we can see that the numerous participants agreed or strongly-agreed with the statements presented. Example: "Our manufacturing company has experienced substantial growth in sales over the past year," which was agreed with by more

than half of respondents (38.2%) with 42.8% giving their strongest agreement, while a smaller proportion of respondents (5.3%) disagreed. Similarly, for the second statement, a notable number of respondents (38.2%) agreed and 41.4% strongly agreed that Our manufacturing company has actively contributed to employment creation within Rwanda.

For the third statement, the significant number of respondents (34.9%) agreed and 46.7% strongly-agreed that My SME has successfully executed expansion plans in recent years. For the fourth statement, a majority of respondents 47.4 agreed and 42.1% strongly agreed that Our manufacturing SME has consistently achieved profitability.

For the fifth statement, the highest percentage of respondents (28.9%) agreed and 57.2% strongly agreed that the utilization of financial services has positively influenced our SME's growth indicators.

The manager at Bank of Kigali stated, *"Our commitment to streamlining loan application processes and maintaining competitive interest rates has enabled countless SMEs to access vital financing, leading to measurable business expansion. Furthermore, our tailored savings products and robust financial literacy programs have empowered SMEs to make informed financial decisions, fostering sustainable growth. These outcomes reflect our unwavering dedication to catalysing the success of Rwanda's SME sector."*

Umejiaku's (2020) focus on the role of SMEs as engines of economic development, especially in developing nations, is consistent with these results. Umejiaku indicates that SMEs contribute significantly to job creation, innovation, and GDP growth, which resonates with the study's findings that highlight positive responses regarding SME growth indicators, including employment, sales, profitability, and expansion. This reinforces the notion that SMEs, including manufacturing SMEs, play a pivotal role in fostering economic development.

The mean and standard deviation tables show that the respondents' attitudes are quite consistent, with a mean of 4.16 and a standard deviation of 1.03 across the five assertions. This suggests that most respondents were optimistic about the prospects for growth among Rwanda's small and medium-sized manufacturers.

4.2 Inferential statistics for hypotheses test

The purpose of inferential statistics is to draw conclusions from a statistical sample. Correlation analysis, hypothesis testing, confidence intervals, and regression analysis are all examples of tools used in inferential statistics.

Table 4.5: Correlations matrix

		Growth of manufacturing SMEs	Bank loan services
Saving services	Pearson Correlation	.798**	.829**
	Sig. (2-tailed)	.000	.000
	N	152	152
Financial literacy services	Pearson Correlation	.776**	.820**
	Sig. (2-tailed)	.000	.000
	N	152	152

** . Correlation is significant at the 0.01 level (2-tailed).

Source: Research findings (2023)

Table 4.5 shows a favorable correlation between manufacturing SME growth and access to financial services such as bank loans, internet-based banking, savings accounts, and financial education. The degree and direction of any connection among two factors may be shown by their correlation coefficient. The provision of bank loan services and the growth of SMEs in manufacturing are positively associated ($r=0.818$). The positive association between Bank loan services and Growth of manufacturing SMEs of Bank of Kigali-Rwanda is statistically significant ($p=0.000$), meaning that the link is more than coincidental. Savings services provided by Bank of Kigali; Rwanda are tied to the growth of SMEs in the country's industrial sector. This provides solid evidence for a close relationship between the two. There is a significance for the association ($p=0.000$) is less than a 0.05 level. This evidences the close connection between Growth of manufacturing SMEs of Bank of Kigali-Rwanda and Saving services. The correlation coefficient between financial literacy services and Growth of manufacturing SMEs of Bank of Kigali-Rwanda is 0.776. This suggests that there is a strong relationship between financial literacy services and Growth of manufacturing SMEs of Bank of Kigali-Rwanda. And there is significance for the association ($p=0.000$) is less than a 0.05 level.

The findings are consistent with Alzyadat's (2021) emphasis on the significance of commercial bank services. Alzyadat highlights that these services are essential for mobilizing funds, maintaining financial stability, and supporting economic growth. The study's results, which reveal strong correlations between various banking services and the growth of manufacturing SMEs, reinforce the importance of these services in facilitating economic development and financial stability, aligning with Alzyadat's perspective on the pivotal role of commercial bank services.

The findings conclude that there is a strong positive correlation between the commercial bank services (such as Bank loan services, Saving services, and financial literacy services) and Growth of manufacturing SMEs of Bank of Kigali-Rwanda.

Table 4.6: Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.852 ^a	.726	.720	.34637

a. Predictors: (Constant), financial literacy services, saving services, bank loan services

Source: Research findings (2023)

Table 4.6 presents a summary of the regression model's overall goodness of fit. This table is the Model Summary. Financial literacy services, savings services, and bank loan services were shown to explain 72.6% of the variance in the dependent variable (Growth of manufacturing SMEs of Bank of Kigali-Rwanda) using a square root regression model. Taking into consideration the total number of predictors, the modified R square value of .720 is shown. The average distance that actual values for Growth of manufacturing SMEs at Bank of Kigali-Rwanda differ from the projected values based on the model is estimated to be 0.34637 (standard error of the estimate). Overall, the findings are consistent with the hypothesized excellent fit of the regression model to the data and a strong influence of the predictor variables on the Growth of manufacturing SMEs at Bank of Kigali, Rwanda.

The findings are in line with Felicien and Irechukwu's (2021) emphasis on the importance of commercial bank services in meeting the financial needs of organizations. Commercial banks play a crucial role in providing services such as deposit accounts, loans, and payment

processing to businesses and institutions. This underscores how the predictor variables in the study, like financial literacy services, saving services, and bank loan services, have a significant impact on the growth of manufacturing SMEs, highlighting the relevance of commercial bank services in fostering economic growth and stability.

Table 4.7: ANOVA

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	46.943	3	15.648	130.431	.000 ^b
	Residual	17.755	148	.120		
	Total	64.699	151			

a. Dependent Variable: Growth of manufacturing SMEs

b. Predictors: (Constant), financial literacy services, saving services, bank loan services

Source: Research findings (2023)

The results of the ANOVA are shown in Table 4.7, where $F=130.431$ and $p\ 0.000 < 0.05$ can be seen. This indicates the study's author is certain that the study's focus on financial literacy, savings, and bank loan services contributed to the expansion of Bank of Kigali-Rwanda's manufacturing SMEs. Financial literacy services, saving services, and bank loan services were shown to have a significant positive link with the growth of manufacturing SMEs at Bank of Kigali-Rwanda ($p\ 0.05$).

The findings support the claim made by Agbe et al. (2020) that commercial banking services are critical to the development of small and medium-sized businesses. The results presented by Agbe shed light on the challenges faced by small and medium-sized businesses (SMEs) in their pursuit of banking services and loans. Similarly, the analysis of covariance reveals that access to bank loan services significantly promotes growth in manufacturing SMEs. The importance of commercial banks' expanded efforts to provide SMEs with fair financial services is highlighted throughout both studies.

Table 4.8: Coefficients

Model		Unstandardized		Standardized	T	Sig.
		Coefficients		Coefficients		
		B	Std. Error	Beta		
1	(Constant)	.494	.157		3.153	.002
	Bank loan services	.401	.084	.411	4.792	.000
	Saving services	.302	.087	.296	3.481	.001
	Financial literacy services	.196	.083	.197	2.373	.019

a. Dependent Variable: Growth of manufacturing SMEs

Source: Research findings (2023)

The regression analysis examines the relationship between the dependent variable (Growth of manufacturing SMEs of Bank of Kigali-Rwanda) and the independent variables (financial literacy services, saving services, bank loan services). In a linear regression model, the equation takes the form of:

$$Y = b_0 + b_1X_1 + b_2X_2 + b_3X_3 + \varepsilon$$

Where:

<https://doi.org/10.53819/81018102t2255>

Y is the dependent variable (Growth of manufacturing SMEs)

x_1 : bank loan services, x_2 : financial literacy services and x_3 : saving services, b_0 is the intercept or constant term. b_1 , b_2 and b_3 are the coefficients or slopes associated with each independent variable and ε = error term

Changes in the dependent variable (Growth of manufacturing SMEs of Bank of Kigali-Rwanda) are shown by the unstandardized coefficients (B) when a single unit is changed in a single independent variable while all other independent variables stay unchanged. Taking into consideration the varying scales of measurement of the independent variables, the standardized coefficients (Beta) reveal the relative relevance of each independent variable in explaining the variation in the dependent variable. All three independent factors are positively related to the dependent variable, Growth of manufacturing SMEs of Bank of Kigali-Rwanda, according to the findings.

Bank loan services have the highest standardized coefficient (Beta= 0.411), indicating that it has the strongest influence on Growth of manufacturing SMEs of Bank of Kigali-Rwanda. among the three independent variables. This is followed by Saving services (Beta = 0.296) and financial literacy services (Beta = 0.197).

For every additional unit of Bank loan services, the growth of manufacturing SMEs at Bank of Kigali-Rwanda increased by a ratio of 0.401. Growth of manufacturing SMEs at Bank of Kigali-Rwanda was made 0.302 times more probable for each additional unit of Saving services. There was a 0.196-fold improvement in the survival rate of manufacturing SMEs at Bank of Kigali-Rwanda for every unit increase in financial literacy services.

The importance of the coefficients is denoted by their t-values and corresponding p-values (Sig.). Growth of manufacturing SMEs at Bank of Kigali-Rwanda was shown to benefit significantly from bank loan services ($p=0.000$ less than 0.05), savings services ($p=0.00$ less than 0.05), and financial literacy services ($p=0.001$ less than 0.05). The results indicated that providing Bank loan services, Saving services, and financial literacy services lead to Growth of manufacturing SMEs of Bank of Kigali-Rwanda.

The findings align with the emphasis made by Mutamuliza and Giramata (2021) regarding the significance of commercial bank services in supporting SMEs in Rwanda. Their study underscores the positive relationships between bank loan services, saving services, and financial literacy services with SME growth, which confirms the importance of these services in helping Bank of Kigali's small and medium-sized businesses grow.

Table 4.9: Hypotheses results

Hypotheses	p – values	Decision
Ho1: Bank loan services do not have a significant role on the growth of manufacturing small and medium enterprises in Rwanda.	$p < 0.05$	Rejected
Ho2: There is no significant effect of saving services by banks on growth of manufacturing small and medium enterprises in Rwanda.	$p < 0.05$	Rejected
Ho3: Financial skills financial literacy services do not have significant effect on growth of manufacturing small and medium enterprises in Rwanda.	$p < 0.05$	Rejected

Source: Research findings (2023)

Table 4.9 shows that services like bank loans ($p=0.000<0.05$), savings accounts ($p=0.000<0.05$), and financial education all have statistically significant effects on the expansion of Rwandan SMEs in the manufacturing sector. Therefore, the researcher argued against (H_01) and concluded that bank loan services did a crucial role in the expansion of SMEs engaged in manufacturing in Rwanda. The (H_02) was disproved, which held that bank saving services had no discernible impact on the expansion of micro, SMEs factories in Rwanda. The study also contradicted (H_03) and verified that financial literacy services contributed to the expansion of MSME factories in Rwanda.

5.1 Conclusion

In conclusion, the research aimed to investigate the impact of commercial bank services on the expansion of SMEs in Rwanda. The study revealed a significant and positive influence of commercial bank services, specifically bank loan services, saving services, and financial literacy services, on the growth of manufacturing SMEs in Rwanda.

The results of the study showed that the assumptions were correct and that bank loan services significantly affect the growth of SMEs in Rwanda's manufacturing sector. Rwanda's industrial SMEs benefit greatly from the expansion of saving services. Rwanda's manufacturing SMEs can't grow without access to financial literacy services. This study aligns with its specific objectives, demonstrating that commercial bank services have a favourable effect on the growth of manufacturing SMEs in Rwanda.

5.2 Recommendations

Bank of Kigali should prioritize the expansion of its lending services, ensuring a simplified application process and competitive interest rates to incentivize more SMEs to seek financing. Simultaneously, active promotion of tailored savings products, along with incentives such as higher interest rates, can encourage SMEs to save with the bank. Additionally, a concerted effort to enhance financial literacy programs, including workshops, online resources, and personalized consultations, can empower SMEs to make informed financial decisions and foster their overall growth and success.

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6. References

- Alzyadat, J. A. (2021). Sectoral Banking Credit Facilities and Non-Oil Economic Growth in Saudi Arabia: Application of the Autoregressive Distributed Lag (ARDL). *The Journal of Asian Finance, Economics and Business*
- Felicien, N. & Irechukwu, E. N., (2021). *Employee Motivation and Performance of Savings and Credit Cooperatives (SACCOS)*. A Case of Umwalimu SACCO, Rwanda.
- Maity, S. (2019). Financial inclusion and multidimensional poverty reduction through self-help-group-led microfinance: evidence from Bodoland, Assam, India. *Enterprise Development and Microfinance*. 30 (3): 152–173.

- Mutamuliza, E. & Giramata A. (2021). *Commercial banks and their effect on small and medium enterprises financing in Rwanda: a case study of Kigali city and southern province*. AGROFOR International Journal, Vol. 6
- Ubesie M. C., Onuaguluchi I. F., & Mbah, A. M. (2021).Effect of Deposit Money Banks Credit on Small and Medium Scale Enterprises Growth in Nigeria. *International Journal of Finance and Accounting*, 6(5), 117 – 132.
- Umejiaku, R. (2020). Access to Credit On the Growth of Women Entrepreneurs in Jos, Plateau State: The Influence of Financial Support Services. *International Journal of Social Sciences and Economic Review*.
- Yasin, A. (2013). *The Accessibility of microfinance for small businesses in Mogadishu, Somalia*. International Journal of Humanities and Social Science.11 (3), 172-173.