Influence of Group Based Micro-financial Services on Business Performance of Rural Based Micro, Small and Medium Enterprises (MSMEs) in Kagera Region Tanzania

Gosbert B. Kaserwa [aφ*]

[a] Matumaini Mapya NGO, Kagera Region, Tanzania.

Author's contribution

The sole author designed, analysed, interpreted and prepared the manuscript.

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ABSTRACT

As a result of on-going debate among scholars and researchers all over the world on actual influence of group based micro-financial services on rural based borrowers' businesses some people in Kagera region Tanzania have become afraid of applying for such loans from financial institutions. Their worry is hinged on the thinking that such loans might impact negatively on their businesses leading to failure to repay the same loans. The objective of this study was to determine influence of group based micro-financial services (credit) on business performance of rural based MSMEs in Kagera region Tanzania. The Study was guided by the theory of Group Based Micro-financing (GBM) model. It was undertaken in four districts of Kagera region Tanzania. Data were collected using a structured questionnaire from 279 group based borrowers of two commercial banks and two microfinance institutions (MFIs). Multiple Linear Regression Analysis (MLRA) was conducted to estimate the influence of group based micro-financial services on business performance of rural based MSMEs. The study found out that some determinants of micro-financial services variable such as loan disbursement and loan repayment policy had positive and significant influence on business performance of rural based MSMEs. However, loan usage despite that had positive influence its influence was insignificant on business performance of rural based MSMEs. Conclusively, this finding implies that an increase/ improvement in loan disbursement and loan

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φ CEO;
*Corresponding author: E-mail: kagde2002@yahoo.com;

repayment policy are essential for increased business performance and hence compliance to loan repayments. It is thus recommended that because most rural borrowers invest their loans in agriculture micro-financial service providers (lenders) should improve their loan repayment policies and also make timely disbursement of loans so as make them marry with agricultural sessions in rural areas.

Keywords: Micro-financial services; business performance; rural based; MSMEs.

1. INTRODUCTION

The establishment of microfinance institutions (MFIs) all over the world was regarded as a tool for fighting poverty among the poor, both in rural and urban areas ([1]; see also [2,3,4]). Micro-financing poor communities intends to enable the impoverished families sustain livelihoods by meeting basic needs such as better shelters (houses), clothes, food, education for children, etc. In rural areas microfinance is a movement whose goal is a world in which as many poor and near-poor households as possible have permanent access to an appropriate range of high quality micro-financial services, including not just credit but also savings, training, insurance and fund transfers [5].

Financial exclusion among the poor, particularly those in rural areas of countries practiced by commercial banks has increased the number of people borrowing through group based micro-financing (GBM) model all over the world [6]. In the eyes of commercial banks and some other financial institutions (FIs), it is risky to loan poor people especially those engaged in agriculture because are regarded as non-capable of either pledging loan securities or repaying back loans [5]. As a result of aforesaid problems poor people particularly those in rural areas have found themselves entangled in a massive poverty basket due to lack of capital [5,2]. Following an increase of low-income people who were typically excluded from traditional banking systems catalyzed the establishment of group based microfinance services for the poor all over the world [2,5].

1.1 Problem Statement

All over the world, there is on-going debate on influence of group based micro-financial services (MFS) under group based micro-financing (GBM) model on business performance of rural based MSMEs. That is, to date there is no consensus on influence of group based micro-financial services (microcredit) on business performance of rural based MSMEs. Supporters argue that the services influence positively on business performance of rural based MSMEs [5,3]. Their argument is hinged on the fact that the impoverished can easily access collateral free loans that increase their opportunities to engage in income earning businesses and thus improve their livelihoods [7]. On the other hand, critics of these services argue that group based micro-financial services influence negatively on business performance of rural based borrowers [8]. Their argument is hinged on issues related to corruption of banking/ micro-financing systems, unnecessary and time-consuming meetings, too much mandatory loan servicing costs, high and unreasonable transaction costs, unsuccessful attraction of getting deposits, etc. [7]. With these arguments, some rural based borrowers in Kagera region Tanzania have been in dilemma on which side to take. With that thinking they have become afraid of applying for group loans from financial institutions thinking that the loans would impact negatively on their businesses making them fail to pay back the same loans and with interests [9,10]. As a result financial exclusion has significantly increased, fuelling poverty among the rural poor thus ending up by pushing the same people deeper into poverty shackles.

The lack of consensus has created a room for the current study to work on previous study weaknesses so as to come up with a more realistic view on the influence of micro-financial services on business performance of rural based MSMEs in Kagera region, as a case study for Tanzania.

1.2 Justification of the Research

The study has proved it right that group based micro-financial services have significant positive influence on business performance of rural based MSMEs in Kagera region Tanzania. With this statement, it means the study has justified that group based loans from banks and other financial institutions are extensive or important enough to merit attentive influence on business performance of rural based MSMEs.

1.3 Research Objective

The objective of the study was to ascertain influence of group based micro-financial services on business performances of rural based Micro Small and Medium sized Enterprises (MSMEs) in Kagera region, as a case study for Tanzania.

1.4 Research Hypothesis

There is no significant influence of group based micro-financial services on business performance of rural based MSMEs in Kagera region.

1.5 Rationale of the Research

The study findings and recommendations will equip readers, policy and decision makers (Government), development partners, poverty alleviation organizations, etc. with practical information useful for alleviating poverty among community members in Tanzania and all over the world. Also, the study will put forward relevant research findings for borrowers, particularly those in rural parts of Tanzania for making informed decisions when applying for loans from financial institutions (FIs). Finally, the study has generated researched data and recommendations useful for scholars and future researchers while studying or undertaking group based micro-financing related researches.

1.6 Definition

Group based micro-financial services: With Group based micro-financing model, *"Group based micro-financial service"* is one of the main services of MFIs which refers to small amount of credit (loans) given to poor people in a group at reasonable interest for generating income through self-employment [11]. With the current study *"Group based micro-financial services"* refers to financial services, in form of microcredit, provided by commercial banks and other financial institutions to individuals engaged or intending to engage in income earning businesses (MSMEs) with their group(s) guaranteeing all sanctioned loans.

2. LITERATURE REVIEW

2.1 Conceptual Definitions

Under this section the researcher started by making few conceptual definitions/ meanings of some key terms used in order to enable both the researcher and reader(s) have common understanding whenever they go through this paper.

2.1.1 Group based micro-financing (GBM)

Group based micro-financing model is a fruit of research project undertaken in Bangladesh (1976s) by the Grameen Bank [3,1] (Cull & Morduch, 2017). The model involves the formation of small groups of 3-5 people, who know each other, and who have a common wish of accessing microfinance services from lenders [3] (Cull & Morduch, 2017). The special feature of the model is that loans are made individually to group members but all in a group have the responsibilities of ensuring loans given to individual members are safe, borrowers' businesses are also safe and sanctioned loans are timely repaid [5]. With this study group based micro-financing (GBM) is the model that extends collateral free loan(s) to low income individual group member(s), who are not required to pledge conventional collaterals, with all group members being liable to all received loan(s) and supervising each other's businesses.

2.1.2 Group based micro-financial services

In microfinance sub-sector, the term "Micro-financial services" refers to one of the products of microfinance in form of small loans or microcredit provided to micro, small and medium sized borrowers to support their businesses [6,5]. They are driving force of the socio-economic development of poor people in regard to poverty reduction. With the current study *"Group based micro-financial services"* refers to financial services, in form of microcredit provided by commercial banks and other financial institutions to a group of three to five people running group based MSMEs.

2.1.3 Business performance

Business performance, is closely tied to commercial effectiveness and is determined by the ability of a business to implement optimal organization with the aim of offering products or services that meet the expectations of consumers and customers [12,13]. It is measured by looking at business financial statements, checking customer satisfaction, on average how many new customers the business gets, conducting performance reviews, staying current on the market and assessing one's own

expectations [14]. In regard to this study business performance is measured by looking at borrower increased knowledge, family income and households performance (i.e. increased assets). The current study definition on business performance differs from the traditional ones because it mainly targets the rural based micro and small businesses (MSMEs) to which the traditional ones would not apply.

2.1.4 Micro, small and medium sized enterprises (MSMEs)

MSMEs are critical components of many countries' economies because of their contributions to the gross domestic products (GDP) of given countries, provision of job employment opportunities, poverty alleviation among poor families, etc. [15]. The MSME sector is one of the major targets and consumers of microfinance services provided by commercial banks and other financial institutions (Rafiki, 2020). There is no universally accepted definition of MSMEs as different countries define MSMEs differently depending on their levels of development. However, the commonly used criteria in defining MSMEs base on the total number of employees, total investment and sales turnover [16,17]. In Tanzania, MSMEs is defined basing on employment size and capital invested in machinery (NMP, 2017). Micro-enterprise ranges from 1-4 employees with capital investment of under 5 million TZS, small enterprise ranges from 5-49 employees and capital investment of 5-200 million TZS and medium enterprise ranges from 50-99 employees and capital investment of 200-800 million TZS (NMP, 2017). The current study chose to adopt the Tanzania's definition of MSMEs. That was because the current study targeted the rural based borrowers, the majority of whom run backyard microbusinesses, which to a large extent align with the Tanzania's definition of MSMEs.

2.2 Theoretical Literature Review

2.2.1 Group based micro-financing (GBM) model

Group based micro-financing (GBM) model or group lending model emerged, 1970s, as an effective strategy to increase credit access among the poor in developing countries who were routinely ignored by formal lenders and left to borrow from informal money lenders at elevated interest rates [5,18,19] (] Cull &

Morduch, 2017]). The model is categorically identified and differentiated from other models operated by commercial banks and other financial institutions from its major features, namely: Group based lending, collateral free loans and joint-liability [5,20]. Other important features besides group lending are the use of dynamic incentives, regular repayment schedules, mainly targeting women and social programs which, according to some literatures [5,20] play a significant role in contributing to high loans repayment rates. In addition to above stated features the model is hinged on peer monitoring, collateral substitutes, training programs to borrowers, etc.

2.3 Empirical Literature Review

Studies [21,22] undertaken in Tanzania on influence of group based micro-financial services found that the welfare of group based borrower households had improved more compared to those of non or individual based borrowers. That is, household assets, children education and medical treatments of group based borrowers' households were better than those of individual based and/ or non-borrower households [7,3]. Basing on tested variables the influence of group based micro-financial services on economic growth of rural based MSMEs is found and also supported by literatures and researchers as follows:

2.3.1 Influence of group based micro-financial services on MSMEs performance

Asante-Addo et al. [23] and Sekyi & Nkegbe [24] argued that group based micro-financial services enabled the impoverished to easily access collateral free loans that increase their opportunities to engage in income earning businesses and thus improve their family incomes [7]. Furthermore, group based micro-financial services contributed a lot in strengthening social capital among community members, provided opportunities for horizontal learning and experience sharing among group members, solved unemployment challenges, etc. [7,25].

Banerjee & Jackson, [7] argued that micro-financial services provided through group based micro-financing model were a predominant poverty alleviation strategy among the rural poor across several developing countries in Africa, Asia, and Latin America. Rahman & Khan [5] argued that in rural areas group based micro-

financing model was a movement whose goal was "a world in which as many poor and near-poor households as possible had permanent access to an appropriate range of high quality micro-financial services [23,26,25]. Furthermore, Sherwani, Iqubal & Malik [27] and Banerjee & Jackson [7] argued that Group based micro-financial services aimed at uplifting the poor out of poverty. Banerjee & Jackson [7] argued that access to group based micro-financial services in developing countries empowered the poor (especially women and small scale farmers), supported income generating activities, encouraged entrepreneurship spirit, and reduced vulnerability.

2.4 Research Gap

Some past researchers [11,23,28] made general assessment of influence of group based micro-financial services (MFS) on business performance of rural based MSMEs. Their assessments were too general or overlooked the influences of its determinants. Their work did not go deeper to the level of disaggregating the variable in order to determine the influences of both variable and its determinants on business performance of rural based MSMEs. The researchers generally concluded that MFS and its determinants had significant positive influences on business performance of rural based MSMEs. Contrary to those findings, the current study has worked on the same variable (MFS) and its three selected determinants and found that MFS in general, at $P=0.05$, had significant positive influence ($P=012$) on business performance of rural based MSMEs. However, the same study had different findings in regard to determinants. The study revealed that one of the studied determinants, i.e. loan usage, had insignificant positive influence ($P=378$) on business performance of rural based MSMEs in Kagera region.

3. RESEARCH METHODOLOGY

This paper discusses on the research methodology that was used by the researcher to capture information required for undertaking the study. Basically, it focuses on research philosophy, study location and population, sample size determination and sampling design. Furthermore, the paper concludes by discussing on data collection, data processing and mean scores interpretation, and finally on data analysis.

3.1 Research Philosophy

The current study used descriptive cross-sectional study to collect information from June to September 2020 which enabled the researcher to accurately and systematically determine the influence of group based micro-financial services on business performance of rural based MSMEs in Kagera region. With this design data were collected through questionnaire made up of independent and dependent variables. After collection of required data the results were analyzed so as to determine the influence of micro-financial services on business performances of rural based MSMEs.

3.2 Study Location and Population

The study was conducted in four districts of Kagera region, namely Bukoba rural, Karagwe, Missenyi and Muleba. The four districts were selected on basis of randomly picking 4 written papers from a basket of 7 representing the study target rural districts of Kagera region. The targeted research population was 2,791 owners of MSMEs who had borrowed under group based micro-financing (GBM) model from commercial banks and other microfinance institutions (MFIs) which were providing group based loans in the past five years prior to this study (i.e. 2015-2019). Two banks, namely CRDB Bank Plc and Mkombozi Commercial Bank were purposefully identified to have operations in Kagera region as at the time of study, they were only two commercial banks providing group based microfinance services with their operations extended to rural parts of Kagera region. On the other hand, FINCA Microfinance Bank and BRAC were also purposefully identified as non-commercial banks with group based microfinance services in both urban and rural parts of Kagera region. Four lists of borrowers from the four mentioned financial institutions were obtained from the studied MFIs' reports.

3.3 Sample Size Determination and Sampling Design

The sample size was determined using Stevens' (1996) formula in equation 1, which was proposed to estimate the minimum sample size for multiple regression analysis. The multiple regression analysis with the largest number of independent variables was used to estimate the sample size. In this case, equation 1 presents how the number of independent variables was computed.

$$N \geq 50 + 8m \qquad (1)$$

Where N = Sample size and m = Number of independent variables. In that respect the minimum sample size for this study was N = 50 + 8 (3) = 74 respondents. However, the actual maximum sample size for this study was 279 respondents accounting for about 10% of the population.

A systematic random sampling method was conducted based on the consolidated list of microcredit borrowers in each district from four institutions. There were four consolidated lists of borrowers. Applying a systematic random sampling method each of the 10th borrower listed in the population was selected to be part of the sample for respective district.

3.4 Data Collection

The study adopted quantitative data collection method from MFIs' borrowers in order to emphasize objective measurements and the statistical, mathematical or numerical analysis of data collected through questionnaires from rural based borrowers in Kagera region. Primary data were collected using questionnaire as the only data collection tool. Self-administered five point Likert Scale questionnaires were distributed to 279 MFIs' borrowers. With the scale, respondents were asked to rate items on a level of agreement, from 1 = Strongly Disagree to 5 = Strongly Agree.

3.5 Data Processing and Mean Scores Interpretation

Data processing and mean scores interpretation involved three determinants of independent micro-financial services (with a total of eighteen items) and three determinants of dependent business performance variable (with a total of twelve items). In that regard, micro-financial services variable had 18 items with its scale measurements and mean scores ranging from 18–90. Business performance had twelve items. Its scale measurements and mean scores ranged from 12–60.

3.6 Data analysis Methods

Variables were described using descriptive statistics where frequencies, percentages, summated ratings, mean, median and mode were used, after which multiple regression analysis was carried out in the general model format presented in equation (2).

$$BP = f (MFS) \qquad (2)$$

Where BP= Business Performance and MFS = Micro-financial Services

BP was an index that was calculated by summing up the three variables of: Borrower increased knowledge (BIK), Borrower increased income (BII) and Borrower increased household performance (BHP). MFS was made up of Loan disbursement (Loandisb), Level usage (Loanusa) and Loan repayment policy (Loanrep). Therefore equation (2) was transformed as shown in equation (3):

$$MFS = f \text{ (Loan disbursement, Loan usage, Loan repayment policy)} \qquad (3)$$

In regard to Micro-financial services (MFS), it was measured using the mean score indices while observing expected variable signs. The measurement results showed that the three determinants (Loan disbursement, Loan usage, Loan repayment policy) of MFS were all moderate and had positive signs. Equation (3) was therefore presented as shown in structural equation (4).

$$BP = f \text{ (Loan disbursement, Loan usage, Loan repayment policy)} \qquad (4)$$

Since Micro-financial services (MFS) was composite structural equation (4) was therefore presented as indicated in equation (5):

$$BP = a + d_1 *Loandisb + d_2 *Loanusa + d_3 *Loanrep \qquad (5)$$

Where Loandisb = Loan disbursement, Loanusa = Loan usage, Loanrep = Loan repayment policy, a = Constant; $d_1 - d_3$= Coefficients; α = Error term

4. RESULTS AND DISCUSSION

4.1 Results

4.1.1 Percentages of agreement for micro-financial services

Pie chart 1 shows the percentages of agreement for group based micro-financial services on business performance of rural based MSMEs. The aim was to find out whether group based

micro-financial services had or had no any influence on business performance of rural based MSMEs in the Kagera region. The table shows that among the three determinants of micro-financial services loan disbursement was the highest and loan repayment policy was the lowest. This means, among the three determinants of micro-financial services loan disbursement had high influence on business performance, followed by loan usage and lastly by loan repayment policy. This is because when loan is timely disbursed to borrowers and/ or disbursed in the same amount as requested the possibility of one implementing his/ her business and recording good results is higher than when loan is delayed or disbursed in less amount than requested.

Furthermore, in general the study results showed that the majority of respondents agreed to have their businesses performance increased after using group based micro-financial services and few of them claimed that their business performance did not improved after using group

based micro-financial services. Basing on the fact that the majority of respondents agreed to have their business performance improved as a result of using group based micro-financial services the implication drawn from these results is that group based micro-financial services variable had positive influence on business performance of rural based MSMEs in Kagera region.

4.1.2 Measures of central tendency for micro-financial services

Table 1 shows the measures of central tendency for group based micro-financial services. The table shows that the total mean, median and mode score indices for overall group based micro-financial services were equally distributed with mean, respectively, which are interpreted moderate. These results ascertained the research objective: *"To examine influence of group based micro-financial services on business performance of rural based MSMEs in Kagera region"*.
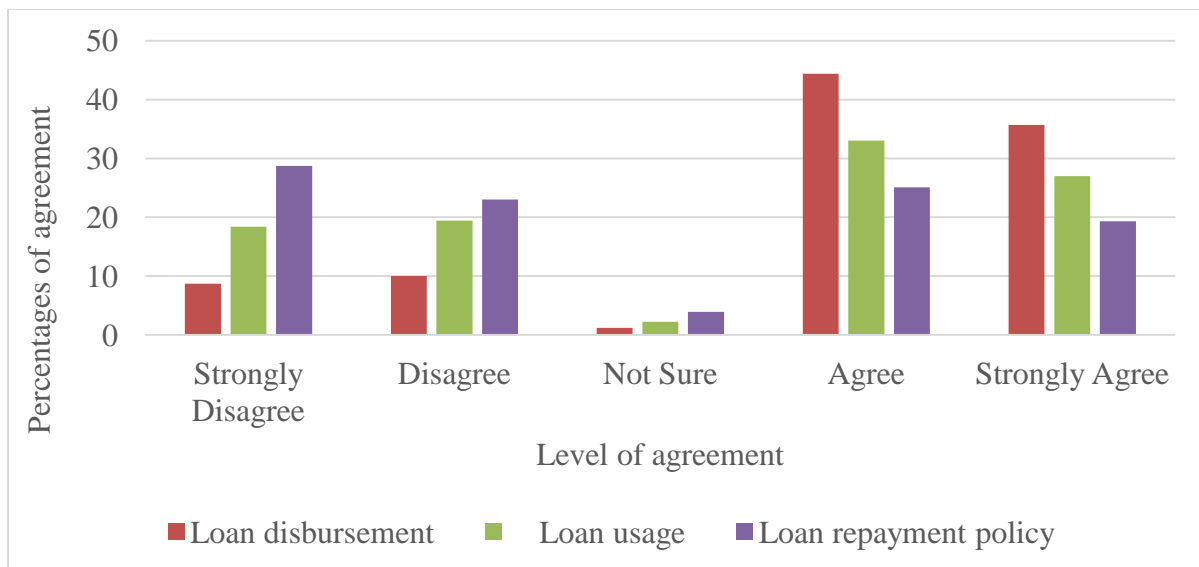
Chart 1. Percentages of agreement for micro-financial services

Table 1. Measures of central tendency for micro-financial services

Variable	Measures of central tendency				
	Mean	Median	Mode	Min.	Max.
Loan disbursement	23.3	23	22	14	30
Loan usage	19.9	20	19	12	30
Loan repayment policy	17.01	17	16.8	6	28
Total	**60.14**	**59**	**58**	**44**	**79**

Source: Study findings (2020)
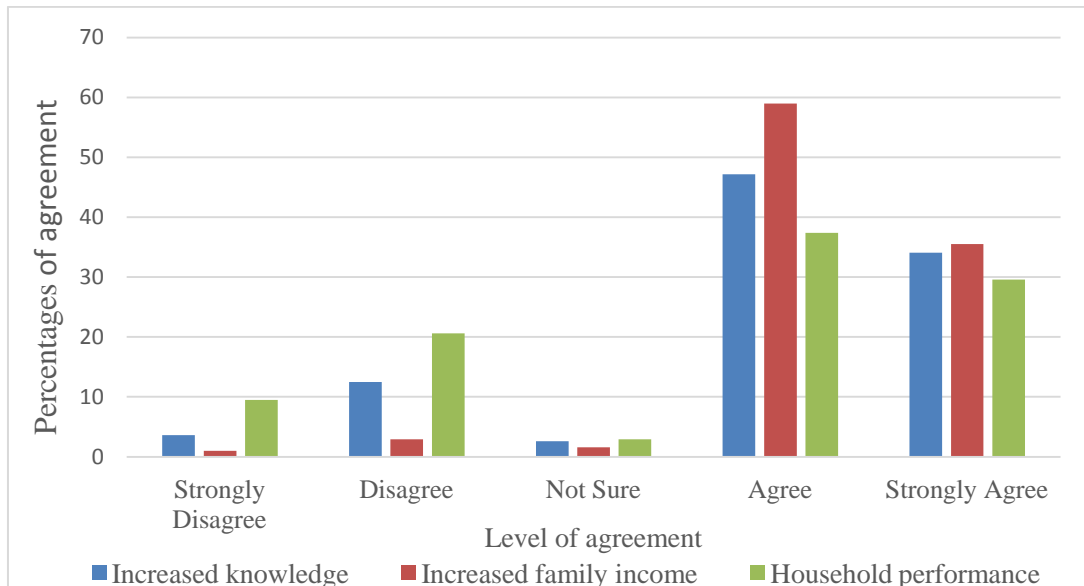
4.1.3 MSME's business performance

Pie chart 2 shows the percentages of agreement for business performance. In regard to business performance the majority of respondents agreed to have increased knowledge, family income and household performance (assets) as a result of using group based loans. From the study, among the three determinants of business performance variable *increased family income* ranked high, meaning that, family income was highly influenced by micro-financial services. This is because the majority of borrowers measure their business performance by looking at income and profit made by businesses. The fact that the majority of respondents agreed to have increased knowledge, family income and household performance (i.e. increased assets) as a result of engaging in group based businesses the implication drawn from these results are that group based micro-financial services had influence on business performance of rural based MSMEs in Kagera region.

Table 2 shows the measures of central tendency for business performance. The table shows that the total mean, median and mode score indices for overall business performance were equally distributed with mean, respectively, which are interpreted as moderate. These results ascertained the research objective: *"To determine the influence of group based micro-financial services on business performances of rural based MSMEs in Kagera region."*

4.1.4 Correlation analysis for aggregated micro-financial services variable

Table 3 shows the correlation between the independent group based micro-financial services and dependent business performance. Group based micro-financial services variable had positive correlation with business performance variable as shown in the table. This indicates that when micro-financial services increased the business performance of rural based MSMEs in Kagera region increased as well, and vice versa. That was because the variable reduced the costs incurred by borrowers to run their businesses.

Chart 2. Percentages of agreement for business performance

Table 2. Measures of central tendency for MSMEs business performance

		Business performance	Micro-financial services
Pearson correlation	Business performance	1	.343**
	Micro-financial services	.343**	1

Source: Study findings (2020)

Table 3. Correlation matrix for micro-financial services and business performance

	Loan disbursement	Loan usage	Loan repayment policy
Business performance	.318[**]	.174[**]	.217[**]
Loan disbursement	1	.175[**]	.115
Loan usage	.175[**]	1	.180[**]
Loan repayment policy	.115	.180[**]	1

Source: Study findings (2020)

4.1.5 Correlation matrix for disaggregated micro-financial services variable

Table 4 shows the correlation of micro-financial services variable determinants and business performance. From the table some determinants like loan disbursement and training on skills acquisition had the highest and lowest positive correlations with business performance, respectively. That means, when loan disbursement increased the business performance increased as well, and vice versa. That was because this determinant and the rest two brought *down* the costs borne by borrowers hence the same borrowers would like to have much of them in order to increase their businesses performance.

4.1.6 Model summary

Table 5 shows a model summary that the R^2 is 0.627. The fact that the study R^2 is 0.627 indicates that 63% of the variability observed in the target variable were explained by the input variables.

4.1.7 Regression analysis for aggregated variables

Table 6 shows the regression analysis for aggregated micro-financial services variable. From the table the resulted values were as presented for micro-financial services. Group based micro-financial services variable had positive influence on business performance and its influence was significant at *P = 0.05.* For that reason the null hypothesis (H_0): *There is no significant influence of group based micro-financial services on business performance of rural based MSMEs in Kagera region* was not accepted because at *P = 0.05* the data did not provide sufficient statistical evidences to accept the null hypotheses*.* Instead, the alternative hypothesis (H_1) was accepted.

Table 4. Correlation matrix for disaggregated micro-financial service variables

Variable	Measures of central tendency				
	Mean	Median	Mode	Min.	Max.
Increased knowledge	15.84	16	16	10	20
Increased family income	17.01	17	16	8	20
Household performance	21.42	22	22	14	27
Total	**54.26**	**54**	**55**	**40**	**64**

Source: Study findings (2020)

Table 5. Model summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	0.792[a]	0.627	0.620	2.35535

Source: Study findings (2020)

Table 6. Regression coefficient for aggregated micro-financial services

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	18.817	3.060		6.150	.000
	Micro-financial services	.111	.043	.147	2.589	.012

Source: Study findings (2020)

Table 7. Regression coefficients of disaggregated predictor variables

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	**Std. Error**	**Beta**		
(Constant)	17.071	3.218		5.305	.000
Loan disbursement	.292	.107	.152	2.729	.007
Loan usage	.074	.084	.049	.884	.378
Loan repayment policy	.131	.066	.105	1.972	.050

Source: Study findings (2020)

4.1.8 Magnitude (Coefficient) of group based micro-financial services

The magnitude (coefficient) of group based micro-financial services variable was $\beta_1 = 0.147$ (see Table 6). That means, at the level of significance of 0.05 a unit increase in group based micro-financial services increased the business performance by 0.147 units. These results imply that, in general, the influence of group based micro-financial services variable, though positive, had influence of about 14.7% on business performance of rural based MSMEs in Kagera region. Such influence could be felt by borrowers, however, not as big as expected.

4.1.9 Regression coefficients of disaggregated micro-financial service variables

In regard to magnitude (coefficient) for disaggregated micro-financial services variable Table 7 shows that *loan usage* recorded the lowest magnitude and *loan disbursement* recorded the highest magnitude among the studied determinants of group based micro-financial services variable. The magnitude for *loan usage* and *loan disbursement* were $\beta = 0.049$ and $\beta = 0.152$, respectively. That means, at the level of significance of $P = 0.05$ a unit increase in loan usage increased the business performance by 0.049 units. On the other hand, a unit increase in loan disbursement increased the business performance by 0.152 units. The implication drawn from these results is that loan usage, had the lowest positive influence of about 4.9% on business performance of rural based MSMEs in Kagera region. Such influence could hardly be felt by borrowers as compared with other studied determinants of micro-financial services variable. On the other hand, loan disbursement had the highest positive influence of about 15.2% among the studied determinants of micro-financial services variable. Such influence could be felt by borrowers as compared with other studied determinants.

4.2 Discussion

Under this section the paper discusses and compares the results under the current study with those of previous researchers/ studies covered under literature review. The paper tries to give out implications of the findings to the theories concerned as follows:

4.2.1 Influence of group based micro-financial services (MFS) on business performance of rural based MSMEs

The current study has confirmed that group based micro-financial services was moderate and had significant positive influence on business performance (BP) at P = 0.05. That means, as the variable increased the business performance of rural based MSMEs in Kagera region increased as well, and vice versa. Additionally, the study confirmed that the majority of borrowers increased businesses performance by comparing the percentages and means of responses from respondents who agreed against those who disagreed to have increased knowledge, family income and household assets after using group based loans.

The current study findings to a large extent concur with those of Asante-Addo et al. [23]; Banerjee & Jackson [7]; Chen et al. (2017) and Sharma et al. [11] who argued that provision of micro-financial services to the poor up-lifted them out of poverty. That, micro-financial services positively influenced on business performance of rural based MSMEs and that were predominant poverty alleviation strategies ([7]; see also Asante-Addo et al., [23]). In support of the same argument, Banerjee & Jackson, [7]; Chen et al., 2017 and Sanda [29] argued that credit and motivational factors significantly influenced positively towards good performance of enterprises.

5. CONCLUSION AND RECOMMENDA-TIONS

5.1 Conclusion

Conclusively, the study has confirmed that group based micro-financial services (MFS) was moderate and had significant positive influence on business performance (BP) of rural based MSMEs in Kagera region Tanzania. Finally, the study has confirmed that the majority of borrowers increased their businesses performance by comparing the percentages and means of responses from respondents who agreed against those who disagreed to have increased knowledge, family income and household assets after using group based loans thus ascertaining the research objective.

5.2 Implication and Contributions of the Study

5.2.1 Implication

Through continuous provision of group based micro-financial services Tanzania has witnessed significant changes in living condition among the rural poor in Kagera region and other parts of the country. The implication drawn from the changes in the lives of poor people in Tanzania group based micro-financial services (MFS) is regarded as a panacea to most rural poor with no securities to pledge for loans from commercial banks and other financial institutions. This is because such rural borrowers can easily access collateral free loans and engage in income earning activities hence improve their family incomes. Basing on this the MFS play an important role in financial sub-sector and economic development of Tanzania, particularly in rural areas.

5.2.2 Contribution of the research

In regard to contribution(s) of this research, the current study has made two meaningful contributions by creating new knowledge based on the previous available knowledge in regard to actual influence of group based micro-financial services on business performance of rural based MSMEs: (i) That is, contrary to some literatures and past researchers' findings the study has revealed that loan usage has insignificant influence on business performance of rural based MSMEs. This is because borrowers in rural areas need be assured of *timely loan*

disbursement and *friendly loan repayment policies.* (ii) Past researchers measured business performance of rural based MSMEs using traditional methods (indicators) such as business financial statements, checking customer satisfaction, on average how many new customers the business gets, conducting performance reviews, staying current on the market and assessing customer expectations [14]. These indicators do not apply in rural areas due to the nature (size) of businesses undertaken. Basing on this the current study has introduced a new method of measuring business performance of rural based MSMEs by looking at borrower increased knowledge, income and household performance (i.e. increased assets). This is because most income generating activities undertaken by rural borrowers are so simple (micro and small sized) to the extent of not requiring complicated traditional indicators in order to determine their performances.

5.3 Recommendation

As a result of undertaking this study the following are areas for future research:

In order to draw inference on the actual influence of group based micro-financial services on business performance of rural based MSMEs: (i) A study undertaken with rural based microcredit borrowers should be compared with the one undertaken with urban based microcredit borrowers, as a control. (ii) A study undertaken with group based microcredit borrowers should be compared with the one undertaken with individual based microcredit borrowers, as a control. This is because the possibility of drawing false inference on the influence of group based micro-financial services on businesses performance of rural based MSMEs is high if at all it is not compared with others of the same nature.

COMPETING INTERESTS

Author has declared that no competing interests exist.

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