DOES MICROCREDIT MAKE ANY DIFFERENCE ON BORROWERS’ BUSINESSES? EVIDENCES FROM A SURVEY OF WOMEN OWNED MICROENTERPRISES IN TANZANIA

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ABSTRACT
The objective of this paper is to examine whether participation in microcredit has any effect on the performance of women owned microenterprises in Tanzania. To that end, the article utilized survey data collected by use of questionnaire from a total 217 borrowers and 183 non-borrowers in three major cities in Tanzania including Arusha, Dar es Salaam and Mwanza. The study found out that businesses of borrowers were performing significantly better than those of non-borrowers on total sales revenue and business net worth. Although mean net profit for borrowers was higher than non-borrowers, the difference was not statistically significant. The paper concludes that microcredit is a useful tool to alleviate poverty among women through income generation resulting from their involvement in microenterprise activities. It further calls for concerted efforts by responsible government agencies and commercial banks to scale up outreach of microcredit services to women through, among other initiatives, provision of financial and technical support to member-based savings and credit associations.

Key Words: Microcredit, Microenterprises, Women, Business performance

Introduction
The importance of credit to the performance of women owned microenterprises can be traced back to 1970s in Muhammad Yunus who is the father of microfinance schemes in the world. This is evidenced in Yunus’ own words that "Giving the poor access to credit allows them to immediately put into practice the skills they already know – to weave, husk rice paddy, raise cows, peddle a rickshaw. And the cash they earn is then a tool, a key that unlocks a host of other abilities and allows them to explore their own potential" (Yunus 1999: 140).

However, women entrepreneurs in the developing countries do not have easy access to credit for their entrepreneurial activity (Ibru, 2009; Iganiga, 2008; Iheduru, 2002; Kuzilwa, 2005; Lako, 2007; May, 2007; Okpukpara, 2009). In Tanzania and Ghana, for instance, only about 5 to 6% of the population has access to the banking sector (Basu, et al., 2004). Due to limited access to credit large proportion of women entrepreneurs in Tanzania rely on personal savings.
to start up and propagate their enterprises. This is evidenced in the findings of a study conducted by International Labour Organization (ILO) in 2003 involving 128 women entrepreneurs in Dar es Salaam, Arusha and Zanzibar which revealed that most of the women entrepreneurs (67%) used their personal savings at the start-up stage. The study also found out that 79% of women entrepreneurs used their savings to finance the growth of their enterprises.

Limited access to credit services among women entrepreneurs can be explained by various factors both in the supply and demand sides. From the demand side point of view, there is a claim that formal financial institutions in Tanzania have failed to provide services to low income enterprises’ owners in both urban and rural areas (Rweyemamu et al., 2003). According to these authors, marginalization of microenterprises by commercial banks is caused by demand for conventional collateral, credit rationing, preference for high-income clients and large loans, bureaucratic and lengthy procedures of providing loans keep most of the low income earners outside the boundary of the formal sector financial institutions in developing countries (Rweyemamu et al., 2003). A number of demand side factor that limit women entrepreneurs from accessing credit from formal financial services have been noted. Evidences from empirical studies have indicated that microenterprises owners, especially women, cannot easily borrow from commercial banks due to lack of collaterals which are demanded in the process of asking for financial supports (Aikael, 2007; Nehimbi, 2002; Olomi, 2001).

It might be important to note that marginalization of poor from formal financial mainstream is a common phenomenon in other parts of the world than Tanzania. Various authors have posited that very poor people, just like some of the microenterprises in Tanzania could be, are excluded from accessing credit services especially from banks (Hulme and Mosley, 1996; Navajas et al., 2002; Dataa, 2004). One of the common views among these authors is that the extremely poor people easily dropout of credit programs after failing to keep up with repayment instalments. Other factors that that have been discovered to constrain the poor from gaining access to microcredit include income poverty, unemployment, household poverty and inability to save (May, 2009; Otero, 1999; Porter & Nagarajan, 2005; Roomi & Parrot, 2008).

Given the abovementioned marginalization, the only viable sources of business financing among women entrepreneurs, are credits from micro-finance institutions (MFIs) operating in Tanzania. However, it is worth noting that due to limited financial capacities of most of microfinance institutions (MFIs) operating in Tanzania, not all women operators of microenterprises (MEs) have managed to access microcredit services. This paper emerged out of conviction that microcredit from various sources is an essential input to the performance of women owned microenterprises. As source of capital, microcredit is important in the starting up new microenterprises and in propagating the already existing ones. Without credit, it is assumed; women owned MEs are likely to result into little sales revenue due to insufficient capital. Limited capital among women MEs operators means that their businesses will have limited goods and services to trade on the fact that would, in turn, lead to low profitability.
and eventually inability to invest on fixed assets for the respective businesses.

At this point it is imperative to note that although a number of studies linking credit and performance of enterprises have been conducted in Tanzania, they are inconclusive on what microcredit from various sources can do to the performance of women owned microenterprises. The previous studies (Kuzilwa, 2005; Kayunze et al., 2005; Kessy, 2009), do not adequately address the contribution of microcredit to the performance of those enterprises. Kuzilwa (2005) concentrates on the role of credit for small business success while focusing on only one case of the National Entrepreneurship Development Fund in Tanzania. He neither treats non-recipients of credit nor use business performance measures other than output. Kayunze et al., (2005) concentrate on whether credit improves the wellbeing of the poor or not but they use neither business performance measures nor treat non-recipients of credit for comparison purpose. Kessy (2009) compares the performance of men and women owned enterprises but with specific attention on clients of MFIs only. Just like the previous two studies, Kessy’ study did not do not involve non-beneficiaries of credit for comparison purpose. This study, different from previous ones, makes the comparison of borrowers and non-borrowers from various microcredit schemes as opposed to specific and sometimes subsidised schemes. The study further utilizes three measures of business performance including total sales revenue, net profit and business net worth. The use of three measures was desired so as to maximize the overall validity of the findings.

The objective of this paper is to compare the performance of women owned microenterprises whose owners had access to microcredit from various source and those who did not. In doing so, the paper is guided by the following hypothesis.

\[ H1. \text{The performance of microenterprises whose owners have accessed credit is significantly higher than those whose owners have not.} \]

**Literature Review**

Literature on the role of credit on the performance of poor people’s microenterprises is inconclusive. Essentially, two contradicting schools of thought on what credit can do to poor borrowers like women operators of ME have emerged. The first school subscribes to widely held view that credit, as source of business capital, is the liberating tool that can be used by very poor to fight against poverty (Buckley, 1997; Gatewood et al., 2004; Kuzilwa, 2005; Lakwo, 2007; Martin, 1999; Ojo, 2009; Peter, 2001; World Bank, 2001 and Yunus 2003, 2007). The second school (Adams and Von Pischke, 1992; Mosley and Hulme, 1998) takes quite an opposite stance. The school subscribes to the radical standpoint of the Ohio School on Credit for Economic Development (a group of economists) that credit exacerbates poverty among the very poor. This view is supported by Mahjan (1998) maintaining that credit should not be given to the very poor but to less poor and non-poor who can undertake medium and large scale enterprises.

Studies on the impact of microcredit on the performance of microenterprises have produced mixed findings; some showing that microcredit has positive impact while other show that has
negative impact on various business performance indicators. In this section, I start by presenting evidences of the studies that found out that credit had positive impact of business and later on those studies that concluded otherwise.

A study in Uganda on the impact of three microfinance institutions including FINCA, FOCAAS and PRIDE found out that microcredit clients were likely have more sources of income than non-clients except for the poorest households (Barnes et al, 2001a). Specifically, the study found out that microcredit clients were more likely to have diversified their businesses both horizontally by adding up new products or services to their current business and vertically by starting new business that the non-clients.

Furthermore, a study conducted in southern India found out that microfinance services were helping new businesses to start up (Banerjee, et al., 2009). According to this study “one new microfinance loan in five generated a new business that would not otherwise have been created”. It was also found out that credit beneficiaries increased the purchase of durable goods including television, bicycles and refrigerators and reduced the purchase of non-durable goods or what they called “temptation goods”

A few studies that have been conducted in Tanzania have emerged with findings suggesting that credit has positive impact on the performance of small and microenterprises. Kuzilwa (2005) conducted a study on “The Role of credit for small business success” with a specific focus of the National Entrepreneurship Development Fund in Tanzania. Adopting a combination of case studies with a sample survey of businesses that gained access to credit from a Tanzanian government financial source, the study revealed that access to credit had substantially increased output. Further, the findings indicated that the enterprises whose owners received business training and extension advice performed better than those that did not.

Similarly, a study was conducted to assess whether credit enriches or impoverishes covering Mbeya and Iringa regions in Tanzania and found out that 79.8% of respondents indicated that credit was reducing poverty and therefore enriching (Kayunze et al., 2005). Using t-test, the authors established that the incomes of borrowers had increased significantly after participating in borrowing schemes. The study further showed that borrowers had positive attitudes towards credit meaning that had benefited from the same, the fact that indicate that they would be willing to continue borrowing meaning that such income had been useful in maintaining household welfare.

Another study conducted in Tanzania sought to find out the effect of microfinance services on enterprise performance questioning whether gender had any influence (Kessy, 2009). The survey involved 255 micro and small enterprises (MSEs) supported by loan from MFIs from four regions of Dar es Salaam, Mwanza, Arusha and Mbeya in Tanzania. Using three performance measures including sales revenue, number of employees and assets level were for comparison, they revealed that the female owned enterprises demonstrated a slightly lower level of growth compared to enterprises owned by male. Particularly, the study showed that male owned enterprises have higher level of assets, sales revenue and number of
employees compared to female owned enterprises.

However, a number of studies have shown that participation in microcredit scheme has no impact on the business wealth. A study conducted in Ghana covering four districts found out that the longer a client stayed in a microcredit scheme the worse their business profit became (Nanor, 2008). In this view, repeated participation in credit cycles would make the profit less profitable. Simply put, the higher the frequency of borrowing the lower the profit from the business. Similar evidences are reported in Madagascar where microcredit did not enhance business growth among clients but rather made those businesses worse than those of non-clients (Gubert and Raubaud, 2005). Furthermore, a study conducted in Zimbabwe with the purpose of determining the impact of microcredit from ZAMBUKO Trust indicated that participation in a microcredit program did not have an impact on the value of fixed assets in clients’ businesses (Barnes et al. 2001b).

**Research Material and Methods**

**Research Design**

This study, which was a sample survey by approach, adopted a quasi-experimental research design. Particularly, the study employed what Kothari (2004) calls “after-only with comparison group”. Using this design, the effect of microcredit on the performance of business was measured by comparing performance of women recipients of credit (treatment group) with non-recipients of credit (comparison group). Both the beneficiaries and non-beneficiaries of microcredit schemes shared similar characteristics in terms of types of businesses they were engaged in, size of businesses, location from which businesses operated as well as value worth of their businesses.

**Sampling Procedure and Sample Size**

Study population for this study were women owners of microenterprises in Tanzania. The study focused on the three major cities in Tanzania namely Dar es Salaam, Arusha and Mwanza. Selection of these cities was on merit that they had large number of microfinance institutions, and of course, of women borrowers. Sample selection involved a combination of purposive and simple random sampling techniques. The wards, which were the entry points, were purposively selected with the help of cities’ Business Directors. At ward level, the researcher randomly selected women operators of various types of microenterprises. This random selection was carefully made so as to make sure that both borrowers and non-borrowers were involved. The researcher made sure that respondents from both groups shared similar characteristics including, but not limited to, type of businesses, locations from where they operated businesses and size of businesses. Similarity in those two groups was treated as a pre-condition for carrying out group comparison. In sum, this paper utilized survey data collected from 400 respondents including 217 borrowers and 183 non-borrowers.
Data Collection

Data were collected by use of structured questionnaire. The questionnaire was self-administered so as to avoid language barriers or misinterpretations. In the first place, the questionnaire sought to collect information on whether respondent had obtained microcredit from any of the sources in the previous five years. Here the researcher would tick ‘yes’ if respondent had obtained credit and ‘no’ if not. Secondly, the questionnaire required respondents to indicate the specific source of credit. Thirdly, the questionnaire posed a question to seek information on whether respondents had used part of the borrowed money for other purposes than financing of businesses. This question was followed by another one on the amount of the final loan used to finance other household needs. Fourthly, the questionnaire sought information on business performance among both the borrowers and non-borrowers. To this end, three business performance indicators namely total sales revenue, net profit and business net worth were used. Data on each of those three business performance measures were collected as follows.

In this study, total sales were considered to be total revenue obtained from business per month. Information on the sales was collected by one question requiring the entrepreneur to state the total sales on specific period of time including the previous day, the previous week or the previous month. These three reporting options were provided with due realization that some of the operators of microenterprises did not keep written business records and therefore would face recall problems if they had to give weekly or monthly reports. The weekly and monthly options were specifically meant for those who kept written records. All of the reported sales were converted to monthly sales by multiplying sales per day or week by total number of days for which the business operated in the reference month.

Net profit was defined as sum of sales revenue less total business and operating cost in the previous month plus value of output consumed by the entrepreneur or her household plus value of output given away (Daniels, 1999:4). The operating costs were calculated from a list of costs and the amount spent on each per day/week/month. Information on sales was collected using a single question “what were your sales in the last day/week/month?” This question was obtained from AIMS (Assessment of Impact of Microfinance Studies) questionnaire (Cohen, 1999:63). Net profit was calculated using the following formula.

\[
\text{Net Profit} = \text{Sales} - [\text{business costs} + \text{other operating costs}] + \text{output consumed by entrepreneur or her household} + \text{output given away}.
\]

Business net worth was considered to be the sum of fixed and current assets only. Human asset and human and/or social assets were left out because of the difficulties of measuring them among women owners of microenterprises. Thus business net worth was calculated using the following equation.

\[
\text{Business net worth} = \text{Current asset} + \text{Fixed assets}
\]
The current assets involved inventory of finished goods (for manufacturing businesses), raw materials, cash, deposit/checking accounts, account receivables and loans. The value of loan was given a negative sign (-) because this was something the proprietor had to pay off from her earnings. The fixed assets included the monetary values of utilities, machinery, equipment and tools.

**Data Analysis**

Descriptive data analysis was carried out to show the proportion of respondents who had received credit and those who had not. This technique was also used to analyze data on the sources and utilization of credit. Independent t-test analysis was used to compare mean business performance between borrowers and non-borrowers. In this test, the three aforementioned business performance indicators namely total sales revenue, business net worth and net profit were used as test variables. The business operators’ borrowing status (1 = Yes and 2 = No) were used as group variable.

**Research Findings**

**Sources of Credit**

Out of 400 respondents who were involved in this study, 217 (54.3%) had received credit while 183 (45.8%) had not. Those who had accessed credit had borrowed from six sources; both formal and informal. The detailed findings are provided in Figure 1 below.

![Figure 1: % distribution of borrowers by source of credit (n = 217)](image)

The findings revealed that women borrowers had obtained credit from various formal and informal lenders. Out of 217 borrowers, 106 (48.8%) had obtained credit from Microfinance Institutions (MFIs), 38 (17.5%) from individual money lenders, 33 (15.2%) from banks and 27 (12.4%) from SACCOS. Other 10 (4.6%) had obtained credit from VICOBAs and 3 (1.4%)
from suppliers.

**Utilization of Credit**

Borrowers were asked to indicate whether they had used part of the borrowed money to finance other household requirements than the businesses. The study found out that out of 217 borrowers, 79 (36.4%) had used part or all of the borrowed money to finance other household requirement than business.

The proportion of utilization of borrowed money to finance business (for which the borrowing was intended) varied widely from 0 to 100%. The study found out that 14 (6.5%) of all borrowers had used all of the borrowed money to finance other household requirement than business. This means that what went to the business was zero amount of the borrowed sum. On the other hand the findings revealed that 136 (62.7%) had used all of the borrowed money (i.e.100%) to finance their businesses. The mean amount of loan used in business was 79.7%.

Further analysis, where proportion of loan used in business was put into five categories, revealed that about two thirds of borrowers [141 (65%)] had used 81 to 100% of the borrowed amount to finance business. Among the rest, 15 (6.9%) of borrowers had used 0 to 20% in the business, 15 (6.9%) had used 21 to 40%, 26 (12.0%) had used 41 to 60% while other 20 (9.2%) had used 61 to 80%. Figure 2 provides below the details.

![Figure 2: Proportion of loan used to finance business (n=217)](image_url)

**Credit and business performance**

Under this section, this study endeavoured to show whether participation in microcredit scheme made any difference in the performance of women owned businesses. This was done by comparing business performance of borrowers and non-borrowers on the three indicators namely total sales revenue, net profit and business net worth.
The findings in Figure 3 show that the businesses of borrowers were performing better than those of non-borrowers in all three indicators of business performance including total sales, net profit and business net worth. The mean sales revenue for borrowers was TZS 1,363,645 compared to TZS 1,103,961 per month for non-borrowers. Accordingly, the findings show that mean net profit for borrowers was TZS 568,154 compared to TZS 486,205 per month for non-borrowers. Accordingly, the net value of business (business net worth) for borrowers was TZS 641,432 compared to TZS 504,690 for non-borrowers. The mean differences between borrowers and non-borrowers on total sales, net profit and business net worth were TZS 259,684, TZS 81,949 and TZS 136,743 respectively.

Independent t-test for comparison of mean was carried out to see if there was significant difference between borrowers and non-borrowers. The results were as presented on Table 1 below.

### Table 1: Results for independent t-test for equality of means

<table>
<thead>
<tr>
<th></th>
<th>F</th>
<th>Sig.</th>
<th>T</th>
<th>Df</th>
<th>Sig. (2-tailed)</th>
<th>Mean Difference</th>
<th>Std. Error Difference</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total sales</td>
<td>1.92</td>
<td>0.17</td>
<td>2.92</td>
<td>398</td>
<td>0.004</td>
<td>259683.79</td>
<td>89075.82</td>
</tr>
<tr>
<td>Net profit</td>
<td>2.77</td>
<td>0.1</td>
<td>1.75</td>
<td>398</td>
<td>0.081</td>
<td>81948.85</td>
<td>46828.53</td>
</tr>
<tr>
<td>Business net worth</td>
<td>0.03</td>
<td>0.87</td>
<td>2.04</td>
<td>398</td>
<td>0.042</td>
<td>136742.5</td>
<td>66993.93</td>
</tr>
</tbody>
</table>
The results on Table 1 show that mean sales revenue for borrowers was statistically significant higher ($M = 1363644.58$, $SD = 909594.345$) than that of non-borrowers ($M = 1103960.79$, $SD = 954909.391$), $t$ (398) = 2.92, $p = 0.004$. Accordingly, business net worth for borrowers was significantly higher ($M = 641432.12$, $SD = 648230.191$) than for non-borrowers ($M = 504689.62$, $SD = 689702.474$), $t$ (398) = 2.04, $p = 0.042$.

However, the study found out that there was no statistically significant difference in net profit for borrowers ($M = 568153.98$, $SD = 506477.648$) and that of non-borrowers ($M = 486205.13$, $SD = 414298.241$), $t$ (398) = 1.75, $p = 0.081$.

The findings show that borrowers’ businesses performed significantly better than those of non-borrowers in terms of total sales revenue and on business net worth. It is also shown that although mean net profit for borrowers was higher than that of non-borrowers, the difference was not significant. In essence therefore, the findings support the hypothesis that “the performance of microenterprises whose owners have accessed credit is significantly higher than those whose owners have not”

**Discussion of Findings**

The findings revealed that borrowers’ businesses performed significantly better than those of non-borrowers in terms of total sales and net business worth but not on net profit. Better performance in terms of sales and net business net worth had been reported in a number of previous studies as well (Kessy, 2009). However, the finding do not support findings of a previous study conducted in Zimbabwe’s ZAMBUKO Trust which revealed that access to microcredit had not impact on the ownership of fixed assets for the business (Barnes et al., 2001b). On the aspect of net profit, the study contradicts other previous studies that have established that businesses of borrowers were significantly higher than those of non-borrowers. Those studies include one by Olufonso et al., (2010) in South Africa and two others by Nanor, (2008) in Ghana and by Gubert and Raubaud (2005) in Madagascar.

Looking at these findings the question is; why positive and significant effect on sales and business net worth but not profit? When women owners of microenterprises got hold of borrowed money, the first thing they did, other than smoothening their household consumption, was to restock their businesses. By restocking the businesses it means that they would have more goods to trade on and this explains why they had significantly higher sales than non-borrowers. Accordingly, borrowers got lump sums that they could immediately use to purchase productive business assets than the non-borrowers who struggled to make gradual savings from little profit they got. However, when it comes to profit things became different. Although borrowers had relatively high sales, they too had to incur high costs of frequent repayment including transportation, meals and paying for the defaulters under group lending schemes. Given these costs, their monthly profit tended not to differ significantly from those of non-borrowers.
Conclusion and Recommendations

The findings have shown that the businesses of borrowers were performing better than those of non-borrowers in terms of total sales revenue, net profit and business net worth. The position of this paper, as opposed to many other previous studies, is that participation in microenterprise schemes has positive impact on the participants’ businesses. I would also logically conclude that microcredit, especially given to women business operators, does contribute to poverty alleviation through an additional income, which can be used to finance a wide range of household expenditure. Microfinance, whose one of its approach involves, issuing small loans called microcredit, is not an “illusion” as contended by Bateman and Chang (2009) nor “the world of make believe” as concluded by Lont and Hospes (2004).

In line with the above findings, discussion and conclusion, this paper makes the following recommendations. First, since the findings have proved that microcredit has positive effect on microenterprises’ performance, the Government of Tanzania may, through its specific microcredit schemes like Women Development Fund, Women’s Bank, SIDO and others, scale up the outreach of microcredit services to women. Broad coverage by microcredit will result in mass eradication of poverty through the informal sector which accommodates a significantly large number of women in the country. Second, the findings have shown that about 18% of women borrowers had obtained money from local money lenders. This is a proof that the formal supply side is either overburdened or is not accessible. The government of Tanzania through the Ministry of Agriculture Food Security and Cooperatives may design training programs to enable women operators of microenterprises form member-based savings and credit societies. The author of this article anticipates that this is the only effective way to curb the ever growing number of individual money lenders who normally charge superficially high interest rates.

References


