

Credit Repayment Problem on Business Activities: The Case of Sude Hamda Primary Cooperative, Diksis, Arsi, Oromia, Ethiopia

Tura Kaso Hamo

Department of Agribusiness and Value Chain Management, Ambo University, Box 19, Ambo, Ethiopia

Abstract

In Ethiopia, among other things, lack of credit is one of the fundamental problems hampering production, productivity and income of rural farm households. Since access to institutional finance is very limited, because of the repayment problem the majority of the poor are forced to have a repayment problem. The study was sought to ascertain determinants that affect credit repayment ability and also to investigate the perception of borrowers on credit in the study area. A two stage sampling method was employed to select one out of 8 rural peasant associations and 60 sample households. Structured interview schedule, questionnaires and observation were developed, pre-tested and used for collecting quantitative and qualitative data for the study from the sampled farm households and employees. Descriptive statistics were used for analyzing quantitative data. The output from the study indicates that 23 (38.33%) of the borrowers were non-defaulter, whereas the remaining 37 (61.67%) were defaulter. It was also found out farmers perceived differently to the repayment idea in the study area. Farmers acknowledge that finding a possible solution to those factors contribute to the misuse of borrowed funds and minimize the risk of default and they also recognize the provision of saving services by MFI, while strongly criticizing the isolation of very poor farmers from the group formation. Moreover, the smaller loan size and complicated lending procedures were among the critical problems. Age, Sex of household head, educational level, Experience in credit use from the formal sources, Contact with extension agents, Attitude toward risk and others were highly important in influencing credit repayment ability use as evidenced by the descriptive statistics. Therefore, policy aimed to accelerate agricultural development in the area could be successful if these factors and problems are taken into consideration to improve payment ability of the borrowers.

Keywords: Credit, Repayments, Cooperative, Diksis

1. INTRODUCTION

Background of the study: The economy of Ethiopia is depends on the agricultural sector. The sector is a source of livelihood for the country's over 85% population. It contributes about 50% of the Gross Domestic Product (GDP) and over 90% of foreign exchange earnings for the county (MOFED, 2002). However, it is characterized mainly by subsistence farming systems that generate very low productivity (Belay, 2004). According to CSA (2004), the level and distribution of poverty in Ethiopia is extensive. It shows that about 44 percent of the total population living below poverty line.

In developing countries like Ethiopia where the farming system is at its traditional level and the saving and credit cooperative sectors are at their infant stage, the role of cooperative is significant in terms of their employment generation capacity, quick production response, adaptation to weak infrastructure, use of local resources and as a means of developing indigenous entrepreneurial and managerial skills for a sustained growth need (Aryeetey, 1994 in Fasika and Daniel, 1997).

For small-scale enterprises and cooperative to grow up to medium and large-scale level, the need for formal credit source is indispensable because formal financial sector have the financial capacity to meet their growing credit demand, which the informal sector is incapable to supply. Despite their importance, many of them do not have sufficient access to credit from formal financial institutes. Their major source of finance, especially at the start up stage, is the informal sector (i.e. from friends, relatives, local money lenders, e.t.c.). This poor credit access from formal financial source, based on the experience of some developing countries, arises partly from biased government policy, due to the operational practices and procedures of the formal financial institutions and the internal problems of small scale enterprises themselves. Experiences from the past cooperatives are prone to default. Sometimes they make willful default; managerial ability is poor, they don't keep accounts and it is therefore difficult to monitor their operation by the financial institutions (Asrat, 1989). Solving the major financial constraint of this important sub-sector of the economy is an important step towards achieving the national development objective of a country. For this to succeed, the problem of high default risk associated with them, which made the financial institutes reluctant to extend loan, has to be solved.

Understanding the role the private sector could play to the economic development of the country, under the current government, the previous credit restrictions and discrimination were lifted together with the permission of the entry of private banks in the financial market. However, the majority of potentially viable cooperative members still couldn't get credit access from the formal financial market. High transaction cost, complex bureaucratic lending procedures, elaborate paper work, high collateral requirements and delays are some of the factors which militate against effective utilization of the existing banking facilities (Dejene, 1993). Because of this

only limited number of SSEs could be eligible for credit from the banking sector. In fact, the share of private sector out of the total loan portfolio has increased considerably from 10.77% in 1990 to 54.65% in 1997 (NBE, 1990/91-1996/97). On the other hand, the recent trend in credit operation of banks shows an increase in share of non-performing loans and it is now customary to watch frequent auction notice about the sale of collateral held for bank loan.

Farmers accessibility to formal financial institutions like banks, microfinance, cooperatives and other small business enterprise was very low in Diksis district of East Arsi zone. This was mainly due to shortage of liquid cash and other several factors that prevent them to participate in formal financial institutions in the district. Therefore, it is essential to expand the status of formal credit at large to improve agricultural productivity. So, this research is initiated to identify the major factors that affect credit repayment in one of the district of the zone, Diksis district.

The issue of the allocation of credit has a profound implication both at the micro and macro level. When credit is allocated poorly, poor investment projects are undertaken and the nations Resources are squandered, it raises costs to successful borrowers, erodes the fund that would be Available for future investment, reduces banks flexibility in redirecting towards alternative activities. No other concern in financial markets has such a profound effect on the performance of lenders. The problem of loan default reduces the lending capacity of a financial institution. It also denies new applicants access to credit as the bank's cash flow management problems augment in direct proportion to the increasing default problem. In other words, it may disturb the normal inflow and outflow of fund a financial institution has to keep staying in sustainable credit market.

The main challenge confronting most of developing country like Ethiopia is improving rural as well as urban living standards. Credit provision is one of the principal components of rural development, which helps to attain rapid and sustainable growth of agriculture. To increase agricultural production and productivity farmers have to use improved agricultural technologies. However, the adoption of modern technologies is relatively expensive and small farmers cannot afford to self finance. As a result, the utilization of agricultural technologies is very low. It is argued that enhanced provision of rural credit would accelerate agricultural production and productivity (Briquette, 2002).

The repayment problem could arise either from the demand side, supply side, and both or other external factors. The supply side problems include change in the structure of the cooperative, change in the lending policy, failure in properly appraising the project document (i.e. in assessing the background of the promoter, technical capability, marketability, financial and economic viability of the project) and lack of responsibility and accountability of the staff members of the cooperative. Concerning Sude Hamda cooperative there has been no significant change introduced on the general lending policy of the cooperative except shifting its attention towards loan collection than loan disbursement, which in fact arisen from severe liquidity problem it has faced.

Therefore the problem on the supply side relies more on implementation of the rules and regulations of the cooperative and on the cooperatives efficiency of making proper credit assessment. The cooperative has employed its screening criteria in order to select projects which it thought are credit worthy as well as in determination of the loan amount. The question here is whether these criteria employed are really the major determinants of the loan repayment performance of projects. The demand side on the other hand, refers to borrower's age, sex, educational level, household size, management capacity, loan utilization, availability of other source of income, bank credit experience, specific situation of the enterprise (i.e. market condition, technical capability, specific location, e.t.c.) while external factors mainly refers to the general economic condition of the country, government policy and weather condition. Furthermore, number of studies has been carried out in different parts of the country using various working methodologies to identify the major factors that affect credit repayment. According to this studies, age of farm household ,sex level of literacy, contacts with extension agent, experience in credit repayment from the cooperative sources, attitude toward risk, physical distance from the cooperative and farmers perception to lending and repayment procedure are identified as the major factors that affect credit repayment(Belay,2000).

It is observed that majority of this studies' center of attention is in identifying the major factors that affect credit repayment but the marginal effect of those variables on the expected value adopted by cooperative members have got little consideration .To the best of my knowledge, no similar studies have been conducted in District.

Therefore, it was extremely worth mentioning at present to identify and analyze the situation of credit repayment in the district to understand the present constraints and opportunity for strategic alleviation of poverty. As a result this study is initiated with the aim of identifying determinant of credit repayment by cooperative members. This study makes an effort to address the following research questions:

What are the factors that are responsible for farmers to defaulting input credit?

What are the major challenges of credit facilitation through cooperatives

The general objective of the study has to assess credit repayment performance that was marketed through Primary Sude Hamda Cooperative in Diksis district.

The specific objectives of the study are:

To identify factors affecting timely credit repayment performance of borrowers
To identify the major challenges of credit repayment through Sude Hamda primary cooperatives.
To assess farmers' perception to the service given by cooperative in the study area.

The study was conducted in one district of Eastern Arsi zone at the household level. Moreover, the scope of the study was restricted to the title of study specifically determinant of credit repayment by SH cooperative member. Because of budget, time and other facilities restrictions. Farmers do not keep records as a result they face recalling problems of past events. Thus, they may probably give wrong information during survey time. In addition, farmers may be suspicious to give the correct information of the income due to fear of thief, income tax and public contribution and the likes. Last but not least, the household may associate the survey with the provision of relief credit.

Study would generate valuable information in the area of credit services that would assist policy makers in designing appropriate policies for interventions and also make some contribution for concerned cooperatives, interested researcher, cooperative societies, government and non-government organization that engaged in the development of cooperative societies, as well as to implement effective quality management system of credit and saving through cooperatives to promote farm households' credit repayment.

2. LITERATURE REVIEW

Concept and Definitions of credit

According to the free online dictionary, Encyclopedia (undated), credit means Faith and it comes from the Latin credit; an agreement, by which something of value—goods, services, or money—is given in exchange for a promise to pay at a later date. Credit is a transaction between two parties in which one, acting as creditor or lender, supplies the other, the debtor or borrower, with money, goods, services, or securities in return for the promise of future payment. As a financial transaction, credit is the purchase of the present use of money with the promise to pay in the future according to a pre-arranged schedule and at a specified cost defined by the interest rate.

According to Ellis (2005), formal credit is a sum of money in favor of the person to whom control over it is transferred, and who undertakes to pay it back from the formal financial institutions in a given area. Moreover, Beckman and Forster (2003), defined formal credit as the power or ability to obtain goods or services in exchange for a promise to pay later to the formal credit institutions. Similarly, it is a power or ability to obtain money by the borrowing process, in return for a promise to repay the obligation in the future to formal financial institutions. Financial institutions are private or governmental organizations, which serve the purpose of accumulating funds from savers and channeling them to individual households, and business looking for credit. Financial institutions are composed of deposit-type institutions (bank and non-bank contractual saving institutions), personal and business financial companies, government and quasi-government agencies, and miscellaneous lenders (Greenwald and Associates, 2001 as cited by Sisay, 2008). Aryeetey *et al.* (2002), define informal finance as referring to all transactions, loans and deposits occurring outside the regulation of a central monetary authority. Perceptions affect accessibility of people to formal financial institutions. According to Lindsay & Norman (2003), the concept of perception is better described as one's ultimate experience of the world and typically involves further processing of sensory input. As stated by (Pinaki, 2002), the interpretation of information is called perceptions. As him, perceptions play an important role in decision making of people in general.

Credit in Rural Development

At a certain stage in agricultural development, formal credit clearly does become a strong force for further improvement—when a man with energy and initiative who lacks only the resources for more and more efficient production is enabled by the use of credit to eliminate the one block on his path to improvement. So, financial credit is the most flexible form of transferring economic resources to the poor. One can buy anything that is for sale with cash obtained through credit, free online dictionary, Encyclopedia (undated).

According to the free online dictionary (undated), formal credit transactions have been indispensable to the economic development of the modern world. Formal Credit puts to use property that would otherwise lie idle, thus enabling a country to more fully employ its resources. The presence of credit institutions rests on the readiness of people to trust one another and of courts to enforce business contracts. The principal function of formal credit is to transfer property from those who own it to those who wish to use it, as in the granting of loans by banks to individuals who plan to initiate or expand a business venture. The transfer is temporary and is made for a price, known as interest, which varies with the risk involved and with the demand for, and supply of, credit.

According to Kebede (2002), formal credit makes traditional agriculture more productive through the purchase of farm equipment and other agricultural inputs, the introduction of modern irrigation system and other technological developments. Formal credit can also be used as an instrument for market stability. Rural farmers can build their bargaining power by establishing storage facilities and providing transport system acquired through credit. Formal Credit plays a key role in covering consumption deficits of farm households. This would, enable the farm family to work efficiently in agricultural activities. Formal Credit can further be used as an income transfer

mechanism to remove the inequalities in income distribution among the small, middle, and big farmers. Moreover, formal credit encourages savings and savings held with rural financial institutions that could be channeled to farmers for use in agricultural production. So, it creates employment opportunity for unemployed people.

Formal financial institutions in Ethiopia

The formal sources are financial institutions that are set up legally and engaged in the provision of credit and mobilization of savings. These institutions are regulated and controlled by the National Bank of Ethiopia (NBE). In the Ethiopian context formal financial sector includes National Bank of Ethiopia (NBE), commercial banks (owned by private and public), Development Bank of Ethiopia (DBE), credit and savings cooperative, insurance companies (both public and private) and microfinance institutions (owned by regional governments, NGOs, associations and individuals). During fiscal year 2002/03, the numbers of banks operating were nine, of which three were government owned. The number of insurance companies was also nine, of which one was state owned (NBE, 2004). According to the report, foreign entry in to the financial sector is not allowed until domestic banks attain a certain degree of desired competitiveness and the National Bank's supervisory and regulatory capacity is adequately strengthened.

The numbers of bank branches reached 339, of which 172 or about 51 percent belong to the Commercial Bank of Ethiopia. Despite modest branch expansion, Ethiopia remains as one of the under-banked countries even at sub-Saharan African countries standard. The bank branch to population ratio was 1:20,400 during 2002/03. Similarly, total capital of the banking system reached Birr 2.7 billion, of which about 75 percent was held by government owned banks.

Commercial Bank of Ethiopia accounted for more than 47 percent of total capital of the banking system (excluding NBE). Total branches of insurance companies reached 106 at the end of the fiscal year (2002/03). Yet geographical distribution of bank and insurance branches was highly skewed to major towns and cities. Nearly 42 percent of insurance and 31 percent of bank branches were located in Addis Ababa (NBE, 2004). In addition to banks there are also other formal financial institutions in Ethiopia like; microfinance, cooperatives and etc.

Farmers' Attitude on the Performance of Cooperatives

The cooperative is usually one alternative form of business organization that can offer well/ service to the farmers. If the other business organizations are regarded as dishonest, inefficient or exploitive, farmers will be predisposed to use the cooperative (Chukwu, 1990). On the other hand if the other business organizations are offering good/ service efficiently, honestly and at fair price, the farmers more likely to be less interested in the cooperative. According to Klein *et al.* (1997), the performance of the cooperative will also affect the possibilities of having more farmers as member. If the cooperative is seen as inefficient, its functionaries corrupt and not prepared to listen to its members, the prospective members (farmers) will not have a good attitude towards the cooperative. Cooperatives cannot be free of risks as they undertake speculative business activities (Chukwu, 1990).

For example, in Ethiopia in addition to input marketing, agricultural cooperatives purchase teff, coffee and other farm produces from the farmers in the harvesting season speculating that the price rises in the latter seasons. These risks are usually high for the average cooperative farmers who in most cases belong to the lower economic class of the society. Furthermore, decision making in the agricultural cooperative is known to be traditionally relatively low, whereas speculative business activities require flexible and speedy action. If there is repeated loss in the cooperative, farmers will be disappointed with performance and be less interested in the cooperative.

Empirical studies on the credit repayment performance

Bekele (1995) associated loan default problems to three major factors in Ethiopian context. These are: the inability of borrowers to repay the loan as a result of crop failure for various reasons, the unwillingness of borrowers to repay the loan as a grant or political patronage, and institutional and policy problems. He further argued that the dissolution and malfunctioning of producers' cooperatives contributed a lot to increase loan default. Apart from the dissolution of cooperatives, borrowers were reported to develop wrong attitudes of expecting debt rescheduling or write-off and of regarding loans as government grants.

The study by Mulat *et al.* (1997) emphasized that administrative measures that were applied to enforce repayment can also be harsh and ignored farmers' circumstances. For instance, collection of payments that begin immediately after harvest is not convenient to all farmers in all areas. This is associated to the fact that most farmers are forced to bring their produce to the market at the same time (in order to pay their fertilizer debts, taxes, etc.), and as a result, supply exceeds demand, and prices fall sharply. The system does not accommodate the interest of farmers who are willing to incur additional interest costs by delaying crop sales as price rise later in the year. According to a study made by Bekele *et al.* (2005), the socio-economic factors influencing repayment of agricultural input loan in Ethiopia using the logistic method of analysis were the amount of loan taken by households, total livestock holding, timeliness of input supply, off-farm income by member of the household, yield

loss and grain production were became significant variables.

Belay (1998) in a case study at Alemegena District (Ethiopia) found out a significant positive relationship of livestock ownership and loan repayment performance of farmers. Accordingly, animal production was found to be important source of cash income during sharp fall of crop prices. Also, Bekele (1995) in his Ethiopian case study using logit model revealed that value of total livestock holding has positive impact on loan repayment performance of smallholder farmers. According to the study, farmers who owned more livestock were able to repay their loans even when their crops failed due to natural disaster. The study undertaken by Zemen (2005) revealed that there were four important factors which affect the borrowers' timely repayment of their debts in Amhara region by using Linear Discriminate Analysis. According to his findings, the variables that differentiated the sample borrowers into non-defaulters and defaulters were the size of cultivated land, the loan diversion behavior, membership condition and the amount of other credit borrowed during the study period.

3. RESEARCH METHODOLOGY

Description of the Study Area. Diksis district is one of the administrative units located in Arsi zone .East Arsi zone is located in the eastern part of Oromia national regional between 31E12'42E43 and 7⁰N30'8C⁰ 30⁰.Diksis district is found in northern part of Arsi zone, The district shared boulder line with Dodota, Sire and Jaju districts in the north, Lode hetosa district in the west, Robe district in the west and Sude district in the east. It is divided in 14 kebeles.The district extends 200 Kms and 79 Kms from the capital city of Ethiopia, Addis Ababa and capital city of the zone, Asella town respectively.

The total population of the district was estimated to be 98115 of which 48983 are male and 49132 are female .Among others there are two major local languages spoken, which are divided by geographic location and ethnic group in the study area visa-avis Afan Oromo and Amharic. Agro-climatic condition of the district divided into two. High land (90) and mid land (10). The district is widely known by its production of best barley, wheat, teff ,more over linseed, Niger seed maize ,beans ,pea are also growing .Being in the high land and midland it had best climate and convenient topography which is very suitable for sheep ,and cattle production(DWoreda,2012)

Sampling method

The primary data that was used in this study was collected mainly from borrowers of the cooperative members covering six (6) peasant associations in Diksis district of East Arsi zone. To determine the sample households, a two stage stratified random sampling procedure was used. In the first stage the PAs would be stratified into more or less homogeneous categories of agro –ecological zones; namely, lowland, midland and highlands. Then, the 3, 2 and 1 peasant associations were selected randomly from highland, midland and lowlands respectively. In the second stage, 60 representative farm households including office employees was selected for an interview from the selected PAs at the rate of 10 sample households from each PAs randomly. So, the total sample size to represent the population was 60. The interviewers interview interviewees one times during February1- 18, 2012.

Sources and Method of Data Collection

The study use both primary and secondary sources of data. Primary data was collected from the selected peasant associations and relevant secondary data from concerned institutions and administrative bodies like different publications of government office, i.e. from Diksis district saving and credit institution and from other concerned offices. In addition, secondary data was also collected from plan and economic development and from cooperative association.

The primary data was collected from a sample of rural borrowers and responsible person that participate in saving and credit cooperative found in the district, through formal survey using semi-structured questionnaire. Before embarking on the actual survey, a pre-test was conducted covering at least three households, one from each agro-ecological zone. Pre-test was done to identify difficulty or unwanted question, the reaction of the respondents to the questioner and to check the appropriateness of the questioner.

Method of data analysis

The farm household information was analyzed using descriptive statistics. The Statistics that were used were carefully to have good information on determinant of credit repayment by SH cooperative member in the district. More ever, descriptive statistics like mean, percentage and tabular analysis were employed where ever they were convenient in the study to examine the determinant of credit repayment by cooperative.

4. RESULTS AND DISCUSSIONS

This chapter present and discusses the result of the analysis that has been conducted to address specific objectives of the research. The first section presents the general characteristics of the sample farm households. The major factors that affect member's credit repayment are presented in second section. In the third section, farmer's perceptions to the loan repayment policy were analyzed. Finally, section four; estimate the possible solution to

those factors that affect credit repayment ability.

General characteristics of sample farm households

Credit repayment by farm households' of cooperative member was influenced by various demographic, economic and socio-cultural characteristics of households. to the context of this study is measured in terms of defaulter and non-defaulter for the purpose of the simplicity of the findings. These variables are briefly analyzed by the following tables:

In terms of gender composition 13% are females while the rest 87% are male borrowers. The mean loan-rationing ratio is larger for males while the mean loan recovery rate is less than female borrowers. The proportion of defaulters is 61.5% for females and 69.7% for males.

The respondent's lowest age is 18 while the highest is 69, the mean age is 46. The proportion of defaulters is highest in the age range of 40-49 and 50-59, and lowest for youngest age group. The table above depicts that both the mean loan rationing ratio and loan recovery rate decreases with age except the last age group where there is a slight increment implying that the screening criteria in this case match with the loan repayment behavior of borrowers.

Table1; Characteristics of Sample Borrowers

Sex	Number (%)	Percentage of defaulter	LRR		CRR	
			Mean	Std.dev.	Mean	Std.dev
Male	89	69.7	0.60	0.67	0.65	0.23
Female	13	61.5	0.65	0.40	0.53	0.26
Age group of household						
18-29	22	18	0.89	0.16	0.70	0.27
30-39	10	56.5	.84	1.06	0.60	0.28
40-49	10	73.7	47	0.41	0.63	0.21
50-58	10	72	47	0.41	0.59	0.26
<60	8	21	.66	0.51	0.65	0.20
Education level of household						
Illiterate	8	50	0.66	0.39	0.41	0.29
R&write	13	53.6	0.73	0.39	0.58	0.30
Primary	15	75	0.41	0.44	0.67	0.23
secondary	18	69.4	0.68	0.88	0.69	0.21
Tertiary	6	46.2	0.69	0.45	0.51	0.18
Experience of household						
Less than 1	13	100	0.10	0.13	0.72	0.13
1-2	35	74	0.49	0.43	0.69	0.24
3-5	27	50	0.88	0.95	0.58	0.24
>6	27	51	0.67	0.42	0.58	0.25

Source: Own computation from survey result, 2012

The majority of the sample respondents (70.6%) have attended either primary or secondary education. In terms of default rate, high proportion of defaulters is exhibited among borrowers who have attended primary education (i.e even lower than the illiterate ones). The mean value of credit rationing ratio increased with the level of education except tertiary level where they are not favored despite their higher educational level. Loan recovery, on the other hand, indicates some irregularity where both educated as well as uneducated borrowers (except those who attended primary education) have exhibited similar repayment. Although there is no as such significant variation between the educational groups, highest portion of defaulters is exhibited among those who attended primary education while is the lowest for those attended tertiary level.

12.7% of the cases didn't engage in similar business activity before the loan, 35% have 1-2 years experience, 27% have 3-5 years experience and the rest 27 have more than 6 years of relevant experience. The proportion of defaulters is highest for borrowers who have no experience. The mean loan recovery rate increases with an increase in level of experience while the mean loan rationing ratio for the different category of experience decrease with an increase in the level of experience indicating that the loan rationing criteria employed here goes in contrary to the loan repayment behavior of borrowers .Thus, the cooperative wrongly disfavored credit worthy experienced borrowers. The relation between recovery rate and experience complies with the hypothesis that more experienced borrowers have better repayment capacity since they acquire more knowledge on how to run a profitable business.

Credit and Credit Repayment

Table 2, Loan and Loan Repayment Characteristics of the cooperative

Variables	Percentage	Percentage of defaulter	LRR		CRR	
			Mean	Std.dev	mean	Std.dev
Purpose of loan						
1.working capital	45	68.9	0.47	0.43	0.54	0.22
2.fixed investments	44	62.2	0.075	0.81	0.74	0.22
3.both	11	61.5	0.67	0.34	0.60	0.21
Loan diversion						
Diverted	26	84.6	0.36	0.41	0.60	0.23
Not diverted	76	59.2	0.68	0.68	0.64	0.24
Source income						
Other source income	55	56.1	0.74	0.73	0.68	0.24
No other source in	45	77.8	0.41	0.41	0.58	0.23

Source: own computation from survey result, 2012

For 45% of the respondents, the loan was extended for working capital purpose, for 44% of the cases for fixed investment (i.e. to for purchase of machinery, equipment, furniture or vehicle depending up on the type of project) and the rest 11% for both working capital and fixed investment. Less repayment was recorded on borrowers who took loan for working capital purpose relative to others reflected by average recovery rate of 47.5% compared with 70.5% of investment loans.

With respect to loan utilization 26 borrowers (25.5%) have diverted the loan for any other purpose while the rest 76 borrowers (74.5%) utilized it for the intended purpose. Those who diverted the loan are clearly found to be defaulters although the cooperative didn't make much distinction between the two groups in lending decision.

55% of the respondents have other source of income other than the farm while the rest 44% relied solely on the farm for their livelihood. Those who have other alternative income source are found to be better payers with 74.8% recovery rate as opposed to 41% of the other group. Almost all except one respondent didn't have proper financial recording system hence couldn't able to capture the profit or loss of their farm. However according to their response, the income from the farm alone for 75 borrowers (73.5% of the cases) is not enough to cover the loan repayment.

Borrowers Response on the Determinants of loan repayment performance

Table 3, Determinants of loan repayment performance and intensity of loan recovery

S.No	Factors	Responses			
		Yes		No	
		N	%	N	%
1	Age	35	58.33	25	41.67
2	Sex	36	60	24	40
3	Literacy level	51	85	9	15
4	Lack of experience	45	75	15	25
5	Attitude toward risks	53	88.33	7	11.67
6	Farmers perception to lending procedures	48	80	12	20
7	Contact with extension agent	45	75	15	25
8	Availability of other source of income	29	48.33	31	51.67
9	Repayment Period	32	52	28	48
10	Family size	39	75	11	25

Source: Own computation from survey result, 2012

Age of household is the major factor that affects credit repayment abilities of the borrowers. According to perception made by borrowers of cooperative and other respondents in the study area, farmers with lower age, have better repayment performance to cooperative and other formal financial institution and non-defaulter than other age group. As indicated in the table above of the sample households 58.33% of the respondents were responded that age of farmers' is a major factor that affects timely repayment of credit. Therefore, the implication shows that farmers with higher age have good performance of credit repayment.

Sex of households is also another factor that affects credit repayment. Moreover, male have mobility, participate in different meetings, and have more exposure to external information than female borrowers. Besides of this, in the table above, of the sample borrowers' about 60% of sample borrowers' respond that age of a borrowers' was a major factor that affects credit repayment. So, it is concluded that sex of a borrowers' is another major factor that affect credit repayment in the study area.

Farmers who can read and write have more exposure to the external environment and accumulate knowledge. The more educated the household head the more credit he or she uses for consumption and other purpose. Besides of this, of the sample borrowers 85% of them respond that education was also another major factor that affects credit repayment in the district. They responses that farmers who can read and write have better credit repayment performance in the study area so, it is concluded that education is a major factors that affect credit repayment.

The numbers of years the borrowers' uses credit from the cooperative sources have also significant effect on its 'payment in the study area. Farmers having more experience have higher tendency towards credit repayment .Due to this, of the sample boorrowers75% of responded that having experience in using credit from formal cooperative was a required solution and absence of this was a major constraint that affects credit performance. Therefore, it is concluded that lack of experience is another major factor that affect credit repayment.

Family size influenced significantly the loan repayment performance of the households each additional labor force increases the probability of being non-defaulter. The result from table shows that households with larger family size avail more labor force for production purpose, so that the probability of defaulting is less. Therefore, families with sufficient labor force would be expected to be non-defaulters and families with inadequate labor force are expected to default.

Examining the expected possible solution to some of the major factors that affect smallholder farmers access to formal credit

In order to examine the possible solution to some of the major factors that affect smallholder farmers access to formal credit, the researcher was prepare certain questions in advance in the form of formal questionnaires. Then, from the responses made by households together with the researcher's analytical ability the following result were analyzed as the table given below.

Table 4, Borrowers Perception in estimating expected possible solutions

S/NO	The estimated possible solutions	Responses			
		Yes		No	
		N	%	N	%
1	Educating all un educated borrowers were the possible solution	58	96.67	2	3.33
2	Encouraging the minors and other disadvantage group were a possible solution	55	91.67	5	8.33
3	Encouraging family planning were preferable solution	29	48.33	31	51.67
4	Enhancing debtor to be frequently contact with extension agents were a possible solution	35	58.33	25	41.67
5	Helping them during the risky period in terms of insurance and other mechanisms were a possible solution	38	63.33	22	36.67
6	Reducing interest rate were possible solution	40	66.67	20	33.33

Source: Source: own computation from survey result, 2012

Education is the major factors that affect credit repayment performance. Therefore, educating uneducated borrowers about the benefit of time value of money and giving discount for timely payer debtor are the estimated possible solution to enhance credit repayment.

Besides of this, from the sample 96.67% of the borrowers and employees of various formal financial institutions responses that educating uneducated borrowers are an estimated possible solution to enhance their repayment. So, it is concluded that educating uneducated borrowers are the prime possible solution to reduce defaulting in the study area.

Sex was another major factor that limits successful repayment of credit performance. Women and other minorities do not have equal insight in accessing to the service given by financial institution in past years. This was due to negative perception to those minors in the society. However, majority of the household responds that empowering the minors is a possible solution to enhance borrowing and paying perceptions and feeling to credit repayment performance. Moreover, as indicated in the table above, of the sample borrowers 91.67% of the respondent's responses that, empowering the minor is an expected possible solution to enhance borrowers credit performance in the study area. So, it is concluded that empowering the women and other minors is the possible solution to enhance loan repayment.

Borrowers' contacts with extension agents have significant impact on credit repayment, there are possibilities of acquiring more information about the benefit of the service in bringing sustainable economic development. Due to this, sample respondents', more than 58.33% of the borrowers perceived that, enhancing contact with various extension agents is an expected possible solution. So, it is concluded that, having a good relation and contact with various extension agent is another major possible solution to enhance and advice borrowers.

Vulnerability to the risk is also another major factor that affects credit repayment abilities. More ever, since majority of agricultural products are risky, which are vulnerable to certain risks that happen suddenly? As a result of this, of the sample borrowers more than 63.33% of the borrowers were responds that it is an expected possible solution if households were helped in terms of insurance and other means in risky time. The implication shows that helping household during risky time is a significant possible solution to credit repayment.

CONCLUSIONS AND RECOMMENDATIONS

Conclusions

For cooperative members to develop and to keep up its contribution to the country's economic development, the need of financial support from financial source is indispensable. This is because these enterprises require relatively larger loan amount, which the informal sector is incapable to supply. The cooperative sector have been reluctant to extend loan to SSEs, on the one hand, they are unable to fulfill the bank's lending requirements and on the other hand, banks consider them as they involve high credit risk.

For the financial institute to run a profitable business venture and for small-scale enterprises to continue getting a sustainable source of finance, borrowers have to keep on paying in accordance with loan repayment schedule. For the lending cooperative under consideration (i.e. SH), there is a series problem of loan default, which significantly eroded the bank's liquidity position. It is with the intention of identifying the factors behind the loan default problem and evaluating the effectiveness and efficiency of loan rationing technology of the financial institute that this study is conducted. The evidences of descriptive analysis show that loan diversion is found to be one of the major determinants adversely affecting the loan recovery rate. Loan diversion itself is found to be influenced by the size of loan, grace period, and form of disbursement and credit experience of the borrower. Increasing the loan size increases the loan diversion rate. Having long grace period, previous credit experience and releasing loan in kind are found to reduce the probability of loan diversion.

Borrowers who have other alternative income source are found to show better loan repayment record. Similarly, business experience in related economic activity and education are found to be significantly and positively while repayment period and sex are negatively associated with loan repayment rate. Borrowers who have extensive experience in related activity and educated ones shows better repayment record while male borrowers and credit with long repayment period show poor repayment record.

Another variable that significantly affect loan repayment status of borrowers is the type of activity that the promoter is engaged in. Borrowers who involved in agricultural sector are found to be relatively defaulters as compared with other sectors. This complies with the hypothesis that agricultural projects are more subjected to risk and uncertainty. With regards to the loan rationing mechanism, collateral is found to be the major device for credit rationing purpose. Borrowers with high value of collateral are clearly favored by the lending institute. Similarly projects with long repayment period are favored by the bank, as reflected by the positive and significant association with loan rationing ratio.

Projects with higher equity share as a ratio of total investment and borrowers who are relatively educated and acquired extensive experience in related economic activities are not favored by the lending institute. It may not be a deliberate action of the lender but due to biasedness towards collateral as main screening device, which rationed educated and experienced borrowers who don't have sufficient security to be offered. The main reason behind the success story of cooperative lies on the active participation of the beneficiaries themselves in screening and enforcement process so that the adverse and moral hazard problems are minimized.

RECOMMENDATION

Based on the findings of the study mentioned earlier, the following policy recommendations are forwarded:

- It has been asserted that loan diversion is one major determinant adversely affecting the loan repayment rate of borrowers. So it preferable if the borrowers not diversify their credit to other.
- Borrowers engaged in agricultural activities are relatively found to be defaulters as compared with other sectors. This emanates from the sector's vulnerability to risk and uncertainty. The default problem associated with these projects is market failure. In this regard government's role is imperative to stabilize the grain price.
- There is significant association between education and loan recovery rate seems to suggest the need for training to small scale entrepreneurs so as to develop their entrepreneurship and managerial capacity. Further the loan size should also be limited in such a way as to fit with the managerial capacity of borrowers.
- Projects with longer repayment period are found to be defaulters reflected by negative and significant relation. This leads to suggest that repayment period should be set in accordance with the financial viability of the project, loan size and market situation.
- Borrowers dependency on credit has to be eliminated by developing saving culture in the rural communities

6. REFERENCES

- Adeyemo, Remi, ²Loan Delinquency in Multi-Purpose Cooperative Union in Kawara State, Nigeria², *Savings and Development*, Vol. VII, No. 3, 1984, pp. 267-274.
- Agu Cletus C., ²Analysis of the Determinants of the Nigerian Banking System's Profits and Profitability Performance², *Savings and Development*, Vol. XVI, No. 4, 1992, pp. 353-371.
- Alemayehu Geda, The Structure and Performance of Ethiopia's Financial Sector in the Pre and Post Reform Period: With Special Focus on Banking, in Alemayehu Geda and Birhanu Nega (ed.). *The Ethiopian Economy: Performance and Evaluation: Proceedings of the Eighth Annual Conference on the Ethiopian Economy*, 1999, pp.133-162.
- Andualem Tegegne, Small Scale Enterprise and Entrepreneurship Development in Ethiopia Concepts, Definitions and Major Issues, In Wolday Amha, G.H.R Chipande
- Arene C.J., ²Loan Repayment and Technical Assistance Among Small Holder Maize Farmers in Nigeria², *African Review of Money, Finance and Banking*, No.1, 1992, pp.63-73.
- Assefa Admassie, A Study of the Factors that Affect the Use of Agricultural Credit Among Peasant Farmers in Ethiopia: The Case of Two Districts, Masters Thesis, 1987.
- Braverman Avighay, ²Rural Credit Markets and Institutions in Developing Countries: Lessons for Policy Analysis from Practice and Modern Theory², *World Bank Development*, Vol. 14, No.10/11, 1986.
- Fry Maxwell, *Money Interest and Banking in Economic Development*, Second Edition, the John Hopkins University Press, 1995.
- Ghatak Maitreesh and Guinnane Timothy w., ²The Economics of Lending with Joint Liability: Theory and Practice², *Journal of Development Economics*, Vol. 60, 1999 pp.195-228.
- Goodhart C.A.E., *The Central Bank and the Financial System*, Macmillan Press Limited 1995.
- Gujarati, Damodar N., *Basic Econometrics*, Third Edition, McGraw Hill Book Company, New York, 1995.
- Hoff Karla and Joseph E. Stiglitz, ²Imperfect Information and Rural credit Markets: Puzzles and Policy Perspectives², *The World Bank Economic Review*, vol. 4, No.3, 1990 pp.235-250.
- Incoom S.E., *Money and Financial System in a Developing Economy*, The Tema Press of the Ghana Publishing Corporation, 1992.
- Itana Ayana, Credit Policy, Financial Institutions and Private Investment in Ethiopia, Proceedings of the Third Annual Conference on the Ethiopian Economy, 1994.
- Jaffee Dwight, and Joseph Stiglitz, Credit Rationing, in *Handbook of Monetary Economics*, Vol. II, Ed. By Benjamin M. Friedman and Frank H. Hahn, North Holland (Amsterdam), 1990.
- Johnston Jack and Di Nardo John, *Econometric Methods*, Fourth Edition, Mc Graw Hill International Editions, 1997.
- Kashuliza, A., ²Loan Repayment and Its Determinants in Small Holder Agriculture: a Case Study in the Southern Highlands of Tanzania², *East African Economic Review*, Vol. 9, No.1, 1993 pp.219-228.
- Mengistu Bediye, Determinants of Industrial Loan Repayment in Ethiopia: The Case of Manufacturing Firms in Addis Ababa, Proceedings of the Eighth Annual Conference on the Ethiopian Economy, 1999 pp. 117-132.
- National Bank of Ethiopia (NBE), Annual Reports, 1960/61-1998/99 and Unpublished Data
- Olomola Ade s. and Mabawonku, A.F., ²Lending to Small Holders by the Nigerian Agricultural and Cooperative Bank: The Role and Determinants of Transaction Costs², *East African Economic Review*, Vol. 9, No.1, 1993, pp. 185-193.
- Oyatoya E.T.O., ²An Economic Appraisal of Small Farmers Credit Schemes: A Cost Study of Western Nigeria , *Savings and Development*, vol. VII, No.3, 1983, pp. 279-91.
- Padmanabhan, K.P., ²Hedging Loan Delinquency in Rural Credit Projects: Lessons from Indian Experience², *Savings and Development*, Vol. V, No. 4, 1981, pp.263-270.
- Pehlivan Hatice, Financial Liberalization and Bank Lending Behavior in Turkey, *Savings and Development Quarterly Review*, Vol. XX, No.2, 1996.
- Schumpeter J.A., *The Theory of Economic Development*, Oxford University press, 1933.
- Tefera Zewdu, Micro-Finance and the Poor: The Case of Dedebit Credit and Saving Institution (DECSI) in Tigray, Masters Thesis, 2000
- Vigano Laura, ²A Credit Scoring Model for Development Banks: An African Case Study², *Savings and Development*, Vol. XVII, No. 4, 1993, pp.441-482.
- Zeller Manfred, ²Determinants of Repayment Performance in Credit Groups, The Role of Program Design, Intergroup Risk Pooling and Social Cohesion², *Economic Development and Cultural Change*, Vol. 46, no. 3, 1998.

ACKNOWLEDGEMENTS

First and foremost let me praise and honor to Allah for the opportunity and capacity given to me to realize my aspiration.

This is part of my B.Sc study and I would like to extend my deepest thanks to Adama Science and Technology University, Asella School of Agriculture Department of Agri-business Management and Marketing for funding tuition fee and my research. It is a great pleasure to extend my appreciation to my advisor Bashir Butta Dale (M.Sc.) for his unreserved help, advice, directing, insight guidance, critical review of my senior research project. Many thanks are extended to the local administrations and communities in the study areas for their enthusiasm in sharing knowledge and experiences with regards to study..

In addition, I am very indebted to all my teachers, collegians, for their impressive support especially Yassin Fanos, Ziyad Rube for their guidance in my campus life. Finally, I extend my gratitude to all of my family for their invaluable sacrifice in every perspective until this time.