
# CAUSES OF NON-PERFORMING LOAN (NPL) IN MICROFINANCE SECTOR IN CENTRAL MONROVIA

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**Preface and Acknowledgements**

This research is conducted as a finishing step in completing my honor study at the Lux In Tenebris Scholars Program, University of Liberia. The study accounts for extra curriculum activities and is carried out through 2 semesters.

A great motivation in my work on this research is that to my knowledge, no similar study has previously been conducted. It has made the process very interesting and exciting, but also very challenging. The process has allowed me to test the skills acquired through the three-year honor program, while simultaneously being very educational. Writing the honor research has taught me a lot about conducting research and has enlightened the possibilities and challenges that come with it.

I was prompted to select the research topic base on the common saying "Access Bank money is gina Money" and the way some clients assets are seize, escape their homes and retreat to their home town from the city. The relationship between the interest rate, low GDP and non-performing loan stroke me as very interesting and I was surprised to find out that no one had previously studied this in the microfinance industry in Liberia. It has truly been an exciting and educating process, and I am thankful for the opportunity to work on this subject.

I would like to thank the Almighty God for his knowledge of comprehension. I would also like to thank Dr. Joseph Younn for his contribution on the research topic and his guidance throughout the process. I would further like to thank Dr. Joseph Younn, Associate professor at the University of Liberia, for great advice and guidance in my study, and especially his support and great knowledge in research. Finally I want to thank my family, director and friends who have supported me throughout my education and this final process. I would not have been able to do this without any of them.

**Abstract**

Because of the nonperformance of Access Bank Liberia micro finance loan, it has been a common saying and believes of some Liberians that “Access Bank money is blood money”. Which mean it is an evil money and not profitable. Many of the bank clients of microfinance loan that default assets are seized, some escape their homes and other retreat to their home towns from the city.

Non-Performing loan (NPL) has been a major challenge for the banking industry as a whole. A loan is non-performing when payment of interest and principal pass due date by 90 days or more (IMF 2009).

Microfinance is concern with serving poor customers with low or no collateral. It mission is to offer poor people and small businesses access to financial services. It has been the goal and traditions of every microfinance institutions in the world to help citizens from poverty.

According to the Central Bank of Liberia 2017 Report, the ratio of NPL to total loan in Liberia increase from 11.8% in 2016 to 13.6 percent in 2017. This report shows that Non- performing loans (NPL) is an important problem for Liberian Banks and also a big hurdle in their development. Access Bank Liberia gross loan portfolio in 2016 was 27.7 million and 19.99million in 2017. Its active borrower in 2016 was 12.36% but reduces to 11.1% in 2017. In 2015 and 2016, the bank has to write off 8.42% and 3.27% of its loans.

This paper investigates the causes of non-performing loan in microfinance sector in central Monrovia by using Access Bank as a case study. According to the researcher consideration, there are many factors which are responsible for increasing NPL such as Interest rate, and Low GDP. During this study, time series data were followed over the period of 2016 to 2017. A sample of 60 individuals was selected Consisting of 40 clients, 5 guarantors, 5 ordinary observer of the loan and 10 bank staffs. Questionnaires were used in caring out the investigations. 93% of the interviewee agreed that the interest was high and 88% agreed was one of the factors responsible for the loan failure. 100% also agreed that the country GDP was very low and 86% agreed that Low GDP was one of the factors responsible for the loan failure.

From the investigation, the researcher confirms that High interest rate and low GDP are responsible for NPL in the Microfinance Sector in Central Monrovia. Low GDP is negatively related to the non-performing loan of the micro-finance sector in Central Monrovia. This means the lower the GDP the higher the NPL and vice versa. However, lending interest rate of the micro-finance loans has positive relationship with the NPL of micro-finance sector in Central Monrovia. This means the highest the interest, the higher the NPL and vice versa.

**Keywords:** Non-performing loans (NPL), microfinance institutions (MFI), Interest rate, and Low GDP

**Objective**: This research aims to investigate and come out with a finding about the main Causes of Non-performing loans in the microfinance sector in Central Monrovia with Access Bank Liberia being the case study.

## Introduction

Banks and microfinance entities earn generous profit from the interest of loans and then they provide loans to small businesses, petty trader and poor people. As a result of declining liquidity which lead to high interest and bad condition of macroeconomics which leads to Low GDP, most of the firms and people are unable to pay and defaulting the loans. Default loans are also known as Non-performing loans (NPL), because the given loans no longer "perform". If interest and principle amount past due by 90 days, the advances are measured as NPL. We all know that loans performance is totally related to the business cycle. Rise in NPL is a warning indicator for any banking industry of the world to prevent the banking crisis.

In the case of Access Bank, Central Bank of Liberia annual reports show that NPL ratio is increasing rapidly from 2016 to 2017. The NPLs ratio in 2016 was 11.8% which is about LRD 3,969,285; in 2017 was 13.6% which is about LRD6, 433,445. The increase in NPL which is cause by high interest rate affected dividend payments, and caused low investments resulting due to low GDP.

"Access Bank is facing many problems due to NPL, which are also affecting its growth. Access Bank Liberia wrote off 8.42% of its loan in 2015 and 3.27% in 2016 as bad debt.

"(Masood, 2009), the income of banks fall due to increase in NPL. Debtors have low repaying capacity which is as results of high interest rate and non-economic use of loans. CBL indicates that the capacity of NPL is increasing each year. In 2017, NPL in Liberia increased by about 2% from 3,969,285 LRD to 6,433,447 LRD. To decrease the NPL ratio, it is important to analyze the root causes of bad loans.

The main causes of NPL are high-interest rate and Low GDP. NPL have negative impact on the economy and financial institutions. According to (Hou 2007), the total economy causes & effects bankruptcy in banking sectors is due to increase in NPL.

In the literature of this study, the researcher reveals the root causes of NPL to bankers so that they can overcome all these negative impacts and causes and find the solution to go forward with credit growth expansion plans.

Determinants of NPLs are discussed in theoretical framework which indicates two independent variables (High Interest rate and Low GDP) which have significant negative relationship with GDP and positive relationship with interest rate.

It has been the goal and traditions of every microfinance institutions in the world to help citizens from poverty. The microfinance mission of serving the poor has been diverted to profit maximization. The institutions have been critiqued for maintaining harsh collection practices and charging too much high interest rates to their clients no matter how low the GDP of the country is.

**Literature review**

According to the Central Bank of Liberia 2017 annual report, the issue of non-performing loans (NPLs) remained a major challenge in the banking sector of Liberia.

It has been a common saying and believes of some Liberians that “Access Bank Liberia money is blood Money.” This mean the loan is not profitable. This lead to many of the bank loan being a non-performing loan.

Hennie (2003) defined Non-Performing Loans as those loans which were no longer generating income. It was further supported by Fofack (2005) who defined NPL as those loans for which the principal and/or interest had been left unpaid for at least ninety days.

The microfinance loan which is intended for poor people is now a source for Access bank Liberia to earn generous profit. Its goal of helping in taken Liberian citizens from poverty has been diverted to profit maximization. Access Bank Liberia offers a 6% declining interest rate on its microfinance loan and a 4% interest deduction for disbursement (processing) fees. Base on the research investigation, several Access Bank Liberia loans were place on loan amortization schedules. The results prove that the bank microfinance loan offer for 9 months payment duration results in about 39% accumulated interest rate, 12 months result in about 55% accumulated interest rate, 15 months results in about 72% accumulated interest rate and so on. To derive at the installment payment per month, the bank uses the following code: 0.2034 for 6 months, 0.1470 for 9 months, and 0.1239 for 12 months, etc. The bank multiplies the code by the borrowed amount and requires the client to do the exact payment each month for the entire duration of the loan. For example, if a client borrow 45,000 for 9 months, the bank multiply 45,000 by 0.1470 which will equal an installment payment of 6,615(45,000*0.1470) per month excluding the 1,800 that will be initially deducted for disbursement fees from the 45,000. These interest rates are very high for the poor Liberian citizens taking the loan. When compared this interest with other loan interest rates, it proves that the cost of capital for the poor is higher than others causing many.

Taking into consideration the country very low GDP in 2016 (-1.6%) and 2017 (2.5%), especially unemployment and inflation on goods, services and exchange rate, businesses will find it difficult to prosper. They will also need more time to transact before generating desire profit. Unemployment reduces consumer purchasing power. Inflation reduces sells. Looking at the Law of Demand which states that “the highest the price, the lower the quantity demand, the lower the price; the highest the quantity demand” holding all factors constant, prove that businesses struggles to survive unemployment and inflation. The higher things prices are, the lesser customers purchase leading to a less sells which is unfavorable for businesses. Taking into consideration the very low employment rate of Liberia which implies that many citizens do not have financial strengths to purchase more goods and services, and also the inflation on goods and services make it more difficult for businesses to make actual desire profits within the best time firm. These situations will cause businesses to earn profit over a longer period of time than it should.

Since businesses take longer time to earn profit base on the bad economy (Low GDP) of Liberia, it is rational to make payment of loans borrowed over a longer payment period than shorter payment period. With a short payment period, a client may not be able to generate profit that will amount to its installment payment.

With these said is of no good to many of its client. Access Bank Liberia loan is on a declining interest basic which accumulates more interest as more time is given for payment. It creates a harsh collection for loans, given for a short period. This has caused many of the bank clients to default in their payments. With this harsh collection and high interest, many of the loans cannot perform and therefore making some Liberian to believe that Access Bank Money is a blood money. This means that the money is not profitable. Moreover, the bank usually sugars quote the loan to its client. For example, the bank will give the client a payment schedule but tell them to pay a different amount from what is written on the schedule. The amount is usually written in pen on the same schedule. To look deep into how the bank offer a high interest rate and how it sugar quote the loan, let us take a look at a customer that decided to borrow LRD 400,000.00 from Access bank Liberia. The bank deducted a 4% interest which is LRD 16,000.00 as disbursement fees given the client LRD 384,000.00. The bank has on its payment schedule the monthly payment of 48,226.13 but wrote with pen 49,530.00 as the actual monthly payment. The amount is to be paid for 12 months which is equivalent to LRD 594,360.00. Receiving an amount of LRD 384,000.00 and paying back LRD 594,360.00 mean the client is paying LRD 210,360.00(594,360_384,000) as interest which is about 55% interest rate, proven a very high interest rate which causes many of the loans to fail.

According to 98% of the Access Bank Liberia staffs interview, the reason for which the microfinance loan interest rate is high is the level of risk the bank takes. They argue that they take low collateral or no collateral from client for the loan. This creates a very high risk. Therefore to minimize the risk a high interest is offered to cover up for defaulted amount. They also argue that operational cost for maintaining the loan is high. These explanations show that the bank uses the interest rate as a risk management technique which is not in any way helping the poor they intend to help. In fact, this has cause the cost of capital for the poor to be higher than others and thereby causing them more harm.

Based on researcher investigation of interest rate being one of the major factors that is responsible for Access Bank Liberia NPL in microfinance sector, It is proven from the microfinance paradox that the cost of capital for Access bank microfinance which is intended for poor Liberian citizens is far yearned higher than other loans. Access Bank Liberia uses the declining method of its microfinance loans. From a comparison of loan amortization schedule of Access Bank Liberia to that of BRAC, Access Bank Liberia has the highest interest rate than BRAC, though BRAC also does. The research also proved that Access bank interest rate is two times higher than Nationwide Microfinance Limited in Ghana.

The researcher investigation of Low GDP being one of the major factors of NPL is proven by the Central Bank of Liberia 2017 annual report, which states the GDPs of Liberia were as low as negative 1.6% in 2016 and 2.5% in 2017. The GDP is a broad measurement of a nation's overall economic activity. It is an indicator of the economic health of a country, as well as a gauge of a country's standard of living. These very low GDPs indicate a very low consumer purchasing power, government spending, investment including businesses capital expenditure and a negative net export which is very unfavorable to businesses and also to the settlement of their loans. The result shows no significant relation of Interest rate and Low GDP to NPL. Therefore, concluding that high interest rate and low GDP is responsible for NPL in Microfinance sector.

According to Mr. Munib Badar and Ms. Atiya Javaid, GDP represent the country's growth. There is an inverse relationship between NPL and GDP. If we follow expenditure approach then GDP can be measured through all consumptions of private & public investment. Low GDP means lack of investment, decline in production, less export, unemployment and inflation increases. According to Munib Badar & Atiya Yasmin Javid, interest rate is a service charge by a lender to the person who borrows credit for the purpose of using an asset. It sets by the state bank according to the fluctuations in the inflationary rate. Analyst said that they use six month Treasury bill rates in the replacement of interest rate as commercial banks usually use for the settlement of loan prices. They also argue that interest rate is directly related to non-performing loan, means Non-performing loans increases as interest rate increases. According to Salman Qadir NPLs are increasing in all fields but mostly in the agriculture sector. He argues that in the light of present situation which shows the continuous increment in NPL, the banks are facing the problem of recession due to the lower repayment of loans and declining yield on lending which is cause by bad microeconomic (Low GDP), high interest rate and poor credit appraisal.

To overcome this situation, the banks should follow the effective and appropriate procedure to monitor credit financing activities and should adopt advanced policies to examine the credit worthiness of the applicant at the time of approving loans.

Moh Benny and Teguhlman argues that GDP is considered to be the most effective and main indicator to examine the economic development in a country. An inverse & significant relationship is found between the GDP and NPL. It means that if the GDP will increase then NPL will decrease. Whenever a country starts developing economically, which can be examined through the increment in GDP growth rate, and then as a result it also increases the capability of the borrower's to repay their loans to the banks. On the other hand, when a country's development comes in a declining position economically then it automatically decreases the debtor's ability to pay off their liabilities.

Abdul Ghafoor Awan, Nasir Nadeem and Falak Sher Malghani said, French bank research find all significant determinants of agriculture loans defaults which is long time of loans, liquidity, profitability. This study sorts the elements of loans default of agriculture sector in district Kasur of Punjab Province. It indicates that high interest rate, credit timing, and miss-utilization of agriculture loans are the major reasons of delay in payment.

Roland Beck, Petr Jakubik and Anamaria Piloiu said (February 2013) in the report of interest rates,

Non-performing loans increases due to the increase in debt services. In countries, where the infrastructure is targeted by the inflation, increase in interest rate to some extent increase in non-performing loans. Loan borrowing adversely affects due to high interest rate, that's why it also rendered as realizable element. Therefore, lending rates are somewhat effected by the policy rate set by the state bank, we also use swift monetary policy to control the fluctuation in exchange rate and inflation.

Atta-ul-Haq, Danish Ijaz, M. Akram and Javaid Iqbal argue that NPL becomes high because of lack plans to deal with risk, unwillingness of borrowers, exhausted loans services and risk increase due to the high

loans size. In 1980, ineffective policies for loans recovery in Italy market were one of major reason of NPL. The relationship badly affected the credit control policies, as the banks were not following the proper investigation process before the sanction of loans.

Hennie (2003) defined Non-Performing Loans as those loans which were no longer generating income. It was further supported by Fofack (2005) who defined NPL as those loans for which the principal and/or interest had been left unpaid for at least ninety days.

Using dynamic panel data for 75 countries, Beck, Jakubik and Piloiu (2012) showed that, real GDP growth, share prices, exchange rate, and lending interest rate significantly affected NPL ratio. GDP was found to be most influential to NPL. NPL ratio found to be inversely related to stock returns especially for countries with large stock market relative to GDP. Saba, Kauser and Azeem (2012) used the data of US banking sector from 1985 to 2010. Employing correlation and regression tests, they showed that real GDP per capita, inflation and total loan had significant impact on Non-performing loan ratio.

Jimenez and Saurina (2005) analyzed the Spanish banking sector from 1984 to 2003. They found significant impact of GDP growth, high real interest rate and lenient credit term on NPL. Louzis, Vouldis and Metaxas (2010) used dynamic panel data method to examine the determinants of non-performing loans in the Greek banking sector, separately for consumer loans, business loans and mortgage loans. The study showed that NPL in the Greek banking system could be explained mainly through macroeconomic variables 58 *Journal of Business and Technology (Dhaka)*

like GDP, unemployment, interest rates and management quality. Among loan tended to be (NPL), mortgage loan showed the least responsive to macroeconomic variables.

Analyzing 22 advanced economies during the period 1996-2008 J. Glen and C. Mondragón-Vélez (2011) showed that, the developments of loan loss provisions are driven mainly by the business cycle measured by real GDP growth and lending rate. Using a vector auto-regression model to analyze data from 1982 to 1996 Keeton (1999) showed rapid credit growth associated with lower credit standards, contributed to higher loan losses in the US.

Hippolyte Fofack (2005) found a strong causality between non-performing loans and, economic growth, real exchange rate appreciation, real interest rate, net interest margins and interbank loans. He used pseudo panel-based model for the data of several Sub-Saharan African countries. The relationship between NPL and ownership structure of commercial banks in Taiwan was analyzed by Hu et al (2006) using a panel data-set covering the period 1996-1999. The study showed that an increase in the private shareholding induces more non-performing loans manipulated by corrupt private owners. Their study also showed that bank size was negatively related to NPL rate. Using panel regression analysis Rajan and Dhal (2003) reported that terms of credit, bank size and macroeconomic conditions had significant impact on the NPL of commercial banks in India. Espinoza and Prasad (2010) showed that lower economic growth and higher interest rates led to an increase in NPL. Using dynamic panel data over 1995-2008 of around 80 banks in the Gulf Cooperation Council countries, the study found a positive relationship between lagged credit growth and NPL. Nkusu (2011) found significant relationship between the quality of banks‟ loan portfolio and macro-financial vulnerabilities. The study showed that, a sharp increase in NPL triggered long-lived tailwinds that crippled macroeconomic performance from several fronts. Rodolphe Blavy and Marcos Souto (2009) found domestic and external macro-financial variables to be closely associated with banking soundness in the Mexican banking system. At the aggregate level, high external volatility and domestic interest rates were associated with higher expected default probability. Jarmo Pesola (2005) analyzed the panel data from 1980s to 2002 to show that high customer indebtedness combined with adverse macroeconomic surprise shocks to income and real interest rates cause distress in banking sector. Preap Sreynich & Phok Rathak said, Low growth rate of GDP and lending interest rate of microfinance loan, return on asset and inflation are responsible for NPL.

**Scope of the study**

This research focuses on the cause of loan defaults in the microfinance sector in central Monrovia, with a case study on Access Bank. Factors that dangerously affect the Non-performing loans are deeply discussed in this report, which are macroeconomic indicators and they are Low GDP and High Interest rate.

☐Therefore, it will be helpful for those bankers who are supervising Non-performing loans cases, taking decisions who are likely to be in favor of lender or who are not, and computing credit risk.

☐☐This study will be useful for the policy makers to test policies on NPL under highlighted elements.

☐☐This report will also be useful for other researchers of Non-performing loans and general readers too

☐☐This study will help the Central bank of Liberia to pay attention to microfinance institutions

**Significance of the study**

In 2016, NPL reached the amount of LRD 3,969,285 and in 2017, NPL increased to LRD 6,433,447from October 2016 to October 2017. This study will help the CBL, credit managers, risk manager and bank supervisors to know which direction to focus in reducing NPL.

□□In banking and Microfinance industry, prosperous economic scenario is one of the main reasons of profitability. When all macroeconomic indicators stand on a better position specifically, then interest rate and inflation also remains under control.

□□On the other side, in order to control NPLs, banks and microfinance institutions' credit computation, security practices and supervision should be improved.

□□Banks should not give loans against high risk security.

□□Loans should be approved on the ground of ambitious skills, credit competency of the lender, as a substitute of adjusting debt to equity ratio.

**Theoretical Framework**

The dependent variable is Non-performing loans, which is the element of interest, in which the difference is tried to be described by the two independent variables of (1) GDP (Inflation, Exchange rate) (2) Interest rate. Interest rate is the price charged, shows as a proportion of principal amount, by creditor to a person who borrows credit for the purpose of using asset. The schematic diagram shows that interest rate affects the NPL. Interest rate and NPL has a positive relationship. Thus, whenever the policy maker increases the interest rate, people purchasing power decreases due to inflation. Because of inflation public can't repay their allowances that are owed. This is why NPL increases due to high interest rate. Thus the higher the interest rate, the higher the chances of NPL. GDP represents the total market worth of all things produced and services rendered in any country for a specific period of time. NPL and GDP (Inflation, Exchange rate etc.) has an inverse relationship. NPL increases as much as GDP goes down due to the shortage of investment, low production, inflation, and corruption. If production is less, it minimizes our export, and increases the import of our country due to how inflation will increase; our value of currency will depreciate. High inflation and declined value of currency will result high exchange rate. Thus, all these factors cause of lowering GDP because of this NPL rises. These are vice versa

**Methodology**

This research focuses on the microfinance sector of Liberia which are performing lending activities and handling NPL. Access Bank Liberia was use as a case study. 60 People was selected randomly as a sample among the whole population of Access Bank Liberia clients, staff and others. The sample consisted of 40 clients, 10 bank staffs, 5 guarantors, and 5 ordinary observers of the loans.

## Hypotheses

H1: There is a negative significant relationship b/w GDP and NPL.

H2: There is a positive significant relationship b/w Interest rate and NPL.

We collected secondary data from authentic websites, articles, researches and primary data through survey filled up questionnaires. There were four key questions asked to check that, *Is the NPL dependent on Interest rate and low GDP as independent variables?* Those questions were: Do you think Access Bank Liberia interest is high? Do you think it is one of the reasons why people default in payment? Do you think the GDP of Liberia is low? Do you think it's one of the reasons why people default the loan payment? The analysis shows the relationship between dependent variable and independent variable.

## Interpretations

For the investigation of interest rate, out of the 60 people selected, 56 persons agreed that Access Bank Liberia interest rate was high and 53 agreed that the high interest rate is one of the reasons why people default. This mean that about 93% agreed that the interest was high and 88% agreed that the high interest rate is one of the factors that causes clients to default while 12% deferred.

For the investigation of interest rate, out of the 60 people selected, 60 persons agreed that the Country GDP is very Low and 52 persons agreed that Low GDP is one of the factors that causes the bank client to default. This means that 100% agreed that the country GDP is very low and about 86% agreed that low GDP is one of the factors that causes clients to default while 14% deferred.

Through the very high acceptance percentages, the researcher hypothesis is proven to be acceptable.

## Conclusion

NPL is harmful for the economy of the whole world. Therefore, it is very important to analyze the root causes of loan defaults. As per the researcher belief, if we analyze the root causes of non-performing loans then we can modify our strategies to control non-performing loans. Through the research, it has been concluded that the null hypothesis of Low GDP and interest rate have been accepted which show that all these have no significant relationship with NPL. Through this study, we have discussed the causes of NPL in Microfinance sector so the banks and microfinance institutions can get a clear idea from this research to control the non-performing loans.

Recommendations

1. Borrowers bear losses and could not return loans on time due to lack of business management knowledge, so banks should contribute business counseling services to them.

2. Centralized banking system should be followed in which the central bank of Liberia should provide all the banks, the information of those borrowers who has poor credit history & has defaulted loans.

3. Mostly loans default due to borrower's concern of high interest rate. Therefore the Central Bank of Liberia should regulate commercial banks to charge low rate of interest to the borrowers.

4. The banks and microfinance institutions should hire specialized persons on merit basis to deal with credit risk efficiently.

5. The Banks and microfinance institutions should conduct training programs to enhance the credit knowledge of credit staff.

6. The Central Bank of Liberia should paid attention to microfinance institutions lending interest rate by setting a scope and actively supervising it.

7. Access Bank Liberia should find another strategy to minimize its risk of default instead of high interest rate.

**Limitations of the study**

As I am a student during this research, I faced many constraints like shortage of time, we had to arrange the finance by ourselves to complete this research in a good way and with real factors and data. To collect the primary data, we selected some Access Bank Liberia staffs to fill the questionnaires. Another constraint was that the bankers were not willing to disclose their bank's information for the research due to some security reasons so we had to make a lot of efforts to convince the bankers for providing actual information and tried to satisfy them, that this information the researcher need mainly for academic purpose and it will not be misused by us.

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