A COMPARATIVE STUDY OF NON-PERFORMING LOAN MANAGEMENT OF NEPALESE COMMERCIAL BANKS (WITH REFERENCE TO NIBL AND EBL)

A dissertation submitted to the office of the dean, Faculty Management in partial fulfillment of the requirements for the Master's Degree

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Certification of Authorship

I hereby corroborate that I have researched and submitted the final draft of dissertation entitled "**A Comparative Study of Non-Performing Loan Management of Nepalese Commercial Banks (With Reference To NIBL and EBL)".** The work of this dissertation has not been submitted previously for the purpose of conferral of any degrees nor it has been proposed and presented as part of requirements for any other academic purposes.

The assistance and cooperation that I have received during this research work has been acknowledged. In addition, I declare that all information sources and literature used are cited in the references section of the dissertation.

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Report of Research Committee

Mr. Sujan Adhikari has defended research proposal entitled "**A Comparative Study of Non-Performing Loan Management of Nepalese Commercial Banks (With Reference To NIBL and EBL)**" successfully. The research committee has registered the dissertation for further progress. It is recommended to carry out the work as per suggestions and guidance of supervisor Dr. Gangaram Biswakarma and submit the thesis for evaluation and viva voce examination.

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Approval Sheet

We have examined the dissertation entitled "**A Comparative Study of Non-Performing Loan Management of Nepalese Commercial Banks (With Reference To NIBL and EBL)".** Presented by Mr. Sujan Adhikari for the degree of Master of Business Studies. We hereby certify that the dissertation is acceptable for the award of degree.

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Sujan Adhikari

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ABBERVIATIONS

ABBS	Anywhere Branch Banking System
AM	Arithmetic Mean
CV	Coefficient of Variation
EBL	Everest Bank Limited
i.e	That is
LC	Latter of credit
LLP	Loan Loss Provision
Ltd.	Limited
NBL	Nabil Bank Limited
NIBL	Nepal Investment Bank Limited
No.	Number
NPA	Non-Performing Asset
NPL	Non Performing Loan
NRB	Nepal Rastra Bank
PE	Probable Error
r	Correlation Coefficient
ROA	Return of Assets
ROE	Return on Equity
Rs.	Rupees
S.N	Serial Number
SD	Standard Deviation
T.U.	Tribhuvan University

ABSTRACT

The study was conducted with the aim of studying Non-performing loan of commercial bank in Nepal. The study was conducted with reference to Nepal Investment Bank.ltd and Everest Bank .ltd. The main focus of study was to analyze the NPL ratio, trend of NPL ratio, and to investigate the impact of NPL on profitability of commercial bank. NPL is major concern for the commercial bank because the default of loan and interest has resulted major threat to the income of the bank. If the NPL is not managed soon, the commercial cannot escape from the vicious circle of NPL.

Non-performing loan are those loan that has been default in the payment of interest and principle. Loan, which payment of interest and principle is not made for more than 3 months is called non-performing loan. In specific contract the term may differ. The rate of NPL in Nepalese banking sector is alarming.

Descriptive and Comparative research design has been used for the study. Everest Bank ltd. and Nepal Investment Bank ltd. were used as a sample. The secondary data has been used from the annual report of the both bank. The data analysis tool includes ratio analysis, trend analysis, correlation, regression model, and P-value.

The study showed that the NPL ratio was in fluctuating trend. There was increase and downfall of the NPL ratio in this six year period. There was positive and negative correlation between loan and NPL amount. Both are not moving in the same direction. The study showed that there was minimal influence of the NPL on the return on assets. The NPL ratio was insignificant in studying the impact on profitability.

CHAPTER 1

INTRODUCTION

1.1 Background

In Nepal banking sector is flourishing in past few decades. Banks role in the economy of any country is very significant. They play intermediation function in that they collect money from those who have excess and lend it to others who need it for their investment. Availing credit to borrowers is one means by which banks contribute to the growth of economies. Lending represents the heart of the banking industry. Moreover, its contribution to the growth of any country is huge in that they are the main intermediaries between depositors and those in need of fund for their viable projects (creditors) thereby ensure that the money available in economy is always put to good use. Therefore, managing loan in a proper way not only has positive effect on the bank's performance but also on the borrower firms and a country as a whole. Failure to manage loans, which make up the largest share of banks assets, would likely lead to the episode of high level of non -performing loans.

Non-performing loans has been an immense issue among banking organizations and academicians because it can affect the profitability of commercial banks. Nonperforming loans ratio (NPLR) indicates how banks manage their credit risk because it defines the proportion of loan losses amount in relation to total loan amount. At the most general level, a non-performing loan (NPL) is a loan where a borrower is not making repayments in accordance with contractual obligations. In many jurisdictions and for many firms, an NPL is defined as a sum of borrowed money upon which the debtor has not made his or her scheduled payments for at least 90 days (Bholat, et al., 2016).

Commercial bank has flourished the investment in Nepalese economy. Heavy amount of investment is done by commercial bank. They formulate sound investment policies which support for the growth of the economy. It is vital role of bank to manage the loan so that they can invest properly. The major risk from non-performing loan is credit risk, liquidity risk, operating risk, earning risk, reputation risk, solvency risk, and legal risk. Loan occupies the greater portion in the assets side of balance sheet. Loan is the risky assets. The major reason behind non-performing loan is poorly managed loan portfolio. Non-performing loan reduces the liquidity of bank, credit expansion, and growth of the economic activities and along with performance of bank. Non-performing loan can even erode the existing capital (Sherpa, 2016).

NPLs are important because they affect the financial intermediation role of commercial banks which constitutes the banks' main source of their income, and ultimately, the financial stability of an economy (Klein, 2013).

The immediate consequence of large amount of NPLs in the banking system is bank failure as well as economic slowdown. The causes of nonperforming loans are usually attributed to the lack of effective monitoring and supervision on the part of banks, lack of effective lenders' recourse, weaknesses of legal infrastructure, and lack of effective debt recovery strategies (Adhikary, Pant & Dhungana, 2007).

In the aftermath of the global financial crisis, considerable attention has been paid to the accumulation of non-performing loans in the balance sheet of European banks and to its potential negative effects on bank lending to the real economy. Using a dataset composed of bank-specific information and country aggregates, we study the impact of the stock and the flow of non-performing loans on the lending activities of a sample of 75 European banks between 2014 and 2018. In general, higher rates of non-performing loans, together with other variables, are associated with lower growth rates of performing loans. This effect persists across several econometric specifications and is more significant for those banks exhibiting lower growth rates of performing loans. Similarly, our econometric analysis suggests that banks with higher decreases in their rate of non-performing loans tend to lend more to the real economy, an effect which is particularly intense at the right tail of the distribution. The findings of our paper can be useful for policymakers when addressing the resolution of non-performing loans in banks (Serrano, 2020).

As per the rule laid down by Nepal Rastra Bank those loan whose payment has not been received for 3 months or more is treated as NPL. As the over dues goes on provision of 1%, 5%, 25%, 50%, and 100% of loan amount is separated and it is treated as expenses and allocation of loan is reduced from capital. More impact of NPL is that the assets are not able to generate future income. It increases the opportunity loss to the bank. Similarly it increases the economic cost for bank to recover the money. It causes to decrease in employee morale, bank's image, and shareholder expectation (Nepal Rastra Bank, 2015).

Financial institution is an institution which collects funds from the public and places them in financial assets, such as deposits, loans, and bonds, rather than tangible property. To be specific, bank is a financial intermediary accepting deposit and granting loans that offers the widest menu of services of any financial institution. The various functions of banks are carrying out currency exchanges, discounting commercial notes and making business loans, offering deposits services (saving deposits), safekeeping of valuables, supporting government activities like credit, granting consumer loans, financial advising, cash management, offering equipment leasing among others (Rose & Hudgins, 2010).

It is observed that the bank credit depends upon the activity. As economy grows bank credit accelerates while the slow growth of the economic activity or the decline in economic activity results decline in bank credit. Hence it is widely accepted that bank credit exhibits pro-cyclicality (Dash & Kabra, 2010).

The pro-cyclical trend of the bank credit can be explained with the help of many factors. The supplier of the credit (bankers) may feel high credit risk during the slowdown of the economy and may provide fewer score. While during expansionary situation the banks may evaluate credit with high score and may find less risky and there will be higher expansion of credit. Macroeconomic theory tells us that expansionary situation creates optimistic environment and recession or declining phase may generate pessimistic environment in the business (Mankiw, 2011). Hence business people will demand more credit for their investment activities during the expansionary phase of the economy while they may be reluctant to invest and reduce the demand of credit during contractionary phase of the economy (Dash & Kabra, 2010).

Financial institutions are very important in the economic growth of the economy as they help to make easy credit flow and enhance economic activity with increasing investment in productive sectors of the economy (Richard, 2011). Sound financial sector is more important for the economic growth of any country (Rajaraman & Visishtha, 2002). Commercial banks are the major source of credit for business firms and households in many countries (Rose, and Hudgins, 2010). Better performance of these financial institutions play a significant role for the economic prosperity of any country and poor performance of these institutions result the slowdown of economic growth and affects badly to the region of the world. Since “the NPA of banks is an important criterion to assess the financial health of banking sector” (Ahmed, 2010), identification of the potential problem and close monitoring is paramount importance for the better performance of this sector. Banking crisis exists in the country if the nonperforming assets (NPAs) touch 10 percent of GDP. The loss of income from NPAs not only brings down the level of income of the banks but also hinders them from quoting better lending rates (Khan & Bishnoi, 2001).

The success of commercial banks depends on profitability. Loan is the major component of earning assets of commercial banks. However, the profitability will be more if the bank have less non-performing loan. On the other hand if the non-performing loan is high the banks may not be able reap profit instead they may be in loss because the bank need to put reserves for the amount of non-performing loans (Farhan, 2012). The three letters NPA strike terror in banking sector and business circle today. The dreaded NPA rule says simply this: when interest or other due to a bank remains unpaid for more than 90 days, the entire bank loan automatically turns a non performing asset (Barth, Caprio, & Levine, 2004). The recovery of loan has always been problem for banks and financial institution (Goyal & Kaur, 2011). Borio and Lowes estimate that the output loss due to banking crisis was about two-digit percentage of GDP. Downturn of national economy, insider lending, political connection of bank owners, failure of disclosure of vital information by customers and lack of proper skills of the banking staff are found as some of reasons of increase in non-performing loans in and banks by different studies (Bario & Lowe, 2002; Richard, 2011).

Considering these facts it is necessary to control non-performing loans for the economic growth in the country, otherwise the resources can be jammed in unprofitable projects and sectors which not only damages the financial stability but also the economic growth. In order to control the non-performing loans it is necessary to understand the root causes of these non-performing loans in the particular financial sector (Rajaraman & Visishtha, 2002). If we look into the causes of great recession

2007-2009 which damaged not only economy of USA but also economies of many countries of the world find that non-performing loans were one of the main causes of this recession (Richard, 2011).

Non-performing loan carries significant threat to commercial bank as it can erode the capital. NPL management is the top priority of bank. The study is conducted to examine the non-performing loan of commercial bank with reference to NIBL Bank Limited and Everest Bank Limited. There are twenty seven commercial banks and the study is conducted with reference to two banks.

1.2 Statement of the problems

Commercial bank being the financial institutions plays significant role by collecting deposit and lending these fund in the productive sectors as lending and investment. Economic development of the country is directly related to the volume of investment made and return obtained by the bank. Due to lack of experts to analyze the risk and return of investment and maintain optimum portfolio investment problem has become very serious for the least development country like Nepal.

Nepalese commercial banks have been facing the problem of investment in manufacturing sector. The loans are not serviced in time and there is a risk of non-recovery of principle as well, therefore most of commercial banks have switched its portfolio in less risky government securities and non-fund base loan like L/C. This has significant impact in economic growth. This has stopped economic activities in country causing reduction in Gross Domestic Product and declining employment opportunity. It impacts there may be social disorder in the country.

There is increase in the number of commercial bank during the past decade. Different regulatory measure has been made by central bank for the effective performance of the commercial bank. However, actual performances of banks have not been enhanced. The major problem faced by commercial bank these days are competitive environment, limited investment opportunities, inadequate deposits, challenge to maintain authorized capital, non-performing loan and so on. Non-performing loan is increasing in bank’s balance sheet. Granting loan against insufficient deposits, loan against undervalued collateral, ineffective credit monitoring and political pressure to the lender are the major reason behind the increasing non-performing loan. Liquidity risk, credit risk, operation risk, lost investment opportunities are some of the implication of non-performing loan.

The study is conducted to get the answer of the following question

i. What is the trend of NPL, Loan and advances of Everest bank limited and Nepal Investment Bank limited?
ii. What is the impact of non- performing loan on profitability?

1.3 Objective of the study

The major objective of the study is to examine the non-performing loan of Everest Bank limited and Nepal Investment Bank limited. The specific objectives of the study are:

i. To analyze the efficiency of management on loan recovery.
ii. To examine the relationship between total loan and NPL.
iii. To examine the impact of non-performing loan on financial profitability of selected bank.

1.4 Rationale of the study

Commercial bank have huge amount of money invested in loan. Loan compromises heavy chunk in the assets side of bank's balance sheet. The source of revenue is generated from loan's interest. In this regard non-performing loan bring prominent threat to bank. Non-productive loan increases the non-performing loan. There can be high probability of loan loss provision. The possible threat from non-performing is credit risk, liquidity risk, operation risk, and overall effect on financial performance. With this regard, this research is conducted to examine the present issue of non-performing loan in selected bank.

This study will be beneficial to the shareholder, depositor, borrower, and other creditor to identify the productivity of their bank in Everest bank and NIBL Bank. The report will be beneficial to identify the effectiveness of credit department and the selected course of action that bank has undergone to overcome the non-performing loan issues. This report will be helpful for the other organization interested in making these banks as a trading partner. Financial analyst, who is interested in the performance of these banks, would be grateful.

This comparative study will also be helpful to the management of bank to analyze the non-performing assets management and policies of the bank in comparison of these two banks. This study can be helpful in foundation of improved policies. With the help of this report bank can analyze the effectiveness of their credit department. This report could be equally helpful for the central bank for the amendment in policies.

Thus, this study made the management body to visualize the determinants of NPLs. Furthermore, the finding of this study initiates the researcher for further studies. Last but not least, this study serves as a reference for other researchers in related area. Thus, it can minimize the literature gap in the area of study particularly in Nepal.

1.5 Limitation of the study

The limitations of the study are as follows:

i. This study is concerned with non-performing assets of only two banks namely: Nepal Investment Bank Ltd. and Everest Bank Ltd.
ii. The study is basically based on secondary data, articles, publication and journals of the respective banks.
iii. The result of the study may not be thoroughly applied over all types of Commercial banks.

1.6 Chapter plan

Chapter I: Introduction

This first chapter provides the background information of the study, statement of the problem, objectives of the study, significance of the study, and limitation of the study. Therefore, this chapter provides summary of overall study.

Chapter II: Literature review

Review of the literature is very important part of every research. This chapter includes conceptual review, review of previous work, and research gap.

Chapter III: Research methodology

This chapter constitutes the methodology adopted to conduct the study, data analytical techniques, and process. This chapter also contains research design, population and sample, sources of data, data collection methods and statistical tools.

Chapter IV: Result and discussion

This chapter is the major part of the study, which is concerned with presentation, data analysis, interpretation of the data and sum up of results.

Chapter V: Summary and conclusion

Finally, this chapter summarizes the whole research finding and forwards the appropriate recommendations on the basis of the research. The summary of the findings reiterates the measures that are developed, explored from the research, data gathered and analyzed. It presents the data findings in a logical, rational manner to the problem area. Limitations to the study as well as recommendations for future research are also considered

References and appendix have also been incorporated at the end of this thesis.

CHAPTER 2

LITERATURE REVIEW

2.1 Introduction

Non-performing loans has been an immense issue among banking organizations and academicians because it can affect the profitability of commercial banks. Nonperforming loans ratio (NPLR) indicates how banks manage their credit risk because it defines the proportion of loan losses amount in relation to total loan amount. At the most general level, a non-performing loan (NPL) is a loan where a borrower is not making repayments in accordance with contractual obligations. In many jurisdictions and for many firms, an NPL is defined as a sum of borrowed money upon which the debtor has not made his or her scheduled payments for at least 90 days.

One of the most critical risks is the borrower's risk – the risk of non-payment of the disbursed loans and advances. Failure to collect money lent may sometimes results in the Bank's inability to make repayment of the money to the depositors and return to the shareholders and stakeholders. The risk involved is so high that it can bring Bank to a verge of Bankruptcy. The Bankers have the responsibility of safeguarding the interest of the depositors, the shareholders and the society they are serving. If a Bank behaves irresponsibility, the cost borne by the economy will be enormous. Due to their central role in the economy, governments and central Banks try their best to rescue Banks from such situations. Hence to protect the Banks from such situation and protect depositors and shareholders money, central Bank issues various directives and guidelines from time to time with modifications and amendments for the sound regulation of the Banking system.

Financial development in many developing economies like Nepal is still faced by a number of obstacles such as macroeconomic instability, the fragility of stock markets, the limitation of capital markets, and the inefficiency of development and specialized banks. Despite some of these limitations, banking systems in underdeveloped countries remain integral components of the general economic systems and they can be considered as a key element in any development effort.

The level of a credit crunch is usually proxies by the ratio of bank's non - performing loans (NPL), Non - performing loans is also one of the indicators in assessing the performance which function as an intermediary institution . The high level of NPL showed that a low bank health occurs because many non-performing loans in the bank's activities. NPL levels at Commercial Bank Indonesia over the past five years (2009-2013) shows a fairly stable condition. But inversely proportional to the Regional Development Bank (BPD), which NPL,since 2011 has continuously increased. It was reaching 3:49 % in June 2014 and was predicted to continue to rise (Alexandri, & Santoso, 2015).

2.2 Theoretical review

2.2.1 Loan and advance

The term 'loan' refers to the amount borrowed by one person from another. The amount is in the nature of loan and refers to the sum paid to the borrower. 'Advance' on the other hand, is a 'credit facility' granted by bank. Banks grant advances largely for short term purpose.

Loans and Advance section of a bank is very important because the success of this department helps to increase its business. If this section does not properly work, the bank itself may become bankrupt. Bank makes loans and advances mostly to traders, businessmen, and industrialists. Although the nature of credit may differ in terms of security requirement, disbursement provision terms and conditions etc. To ensure secured banking Agrani Bank Limited works closely with its clients, the regulatory authorities, the shareholders, other banks and financial institutions. This bank recently achieved lots of milestones rather than other banks. The credit administration of this bank works very efficiently where loan documentation is performed by the experienced bankers. Presently the management is focusing on reducing Non-performing loans (NPLs) which is a big step of loan recovery. Apart from these, Agrani Bank Limited provides other services and some kinds of value added services for the welfare of the people. However, Loan and Advances is the most important asset as well as the primary sources of earning of a bank which help to improve financial health of a bank. (Rahman, 2019).

Classification of loans/ advances

Pass loans: Loans/advances which have not overdue and which are overdue by a period up to three months. Such loans require provisioning of one per cent of the total loan amount.

Watchlist loans: If the borrower's cash flow cannot support the repayments of the loan, then the loan acquired by the firm should be classified as 'watch list'. Also, loans acquired by firms whose working capital, cash flow or net worth have remained negative for two consecutive years have to be classified as 'watch list', even if the firm is making timely principal and interest payments. In addition, Loans should also be categorized as 'watch list' if the credit obtained by the same borrower from another financial institution turns into non-performing asset. Among others, credit obtained by borrowers, who have missed monthly, quarterly or half-yearly installment payment deadlines, should also be categorized as 'watch list', adds the directive. Five per cent of the total loan amount must be provisioned for such credit.

Sub-standard: Loans/advances which are overdue by a period from three months to a maximum period of six months. Such loans require provisioning of 25 per cent of the total loan amount.

Doubtful: Loans/advances which are overdue by a period from six-months to a maximum period of one year. Such loans require provisioning of 50 percent.

Loss: Loans/advances which are overdue by a period of more than one year. Such loans require provisioning of 100 percent. (www.nrb.com.np)

2.2.2 Non-performing loan

Non-performing loan is the sum of borrowed money upon which the debtor has not made scheduled payment for at least three months. The delay in payment could be either interest or principle and can be both. In the case of bank, loan is the assets of bank because large portion of deposits are utilized in giving loan. Interests from loan are major source of revenue for bank. Irregular loan can be turned into non-performing loan. Hence, those loans that are not effective in giving interest and principal amount back are non-performing loan.

A study has defined that Non-performing loan is not a single concept and it can be broadly defined. NPL can be classified into three parts such as substandard loan, doubtful loan, and Bad debt according to the time of being default (Choudhury, 2002).

2.2.3 Performing loans

Performing Loans are those loans that repay principal and interest timely to the bank from the cash flow it generates. In other word, performing loan are the productive assets that generate some profits. Loans have the certain time period to return its principal with its interest. If anyone repays loan with its interest on time is known as the performing loan. Different country may have different policy to classify the performing loans. In the context of Nepal, loans that have fallen under 'pass and watchlist' category are treated as performing loan. It is the most profitable assets of banks. Better performing loan are the symbol of success of banks. But many banks are suffering from the non-repayment of loan amount (Choudhury, 2002).

A loan that is not in or near default. According to the International Monetary Fund, a performing loan is any loan in which: interest and principal are less than 90 days overdue; less than 90 days’ worth of interest has been refinanced, capitalized, or delayed by agreement; and continued payment is anticipated. All conditions must be present for a loan to be performing. However, the specific definition is dependent upon the loan's particular terms. In other word, performing loan are the productive assets that generated some profits. Loan have the certain time period to return its principal with its interest. If anyone repays loans with its interest on time, is known as the performing loan. It is the most profitability 11 assets of banks. Its help of repaid growth of banking sector in this fast pace competitive age. Better performing loan are the symbol of success OD banks. (www.imf.com)

2.2.4 Loan loss provision

There is risk associated in every loan. To minimize the risk from possible losses from loan banks have to allocate some fund as loan loss provision. Loan loss provision is the accumulated fund that is provided as a safeguard to cover possible losses. It is the expected accumulated provisioning fund. The amount required for provisioning depends upon the level of NPAs and their quality. The high-quality loan requires low loan loss provision, whereas bad loan requires high loan loss provision. One percent provision of total credit is minimum requirement as every pass/good loan have to be provisioned. However, the ratio of provision may differ from nation to nation. In Nepal, NRB has instructed the BFIs to set aside provision amount of 1 percent for ‘Pass’ loans, 5 percent for ‘Watch List’ loans, 25 percent for ‘Sub-standard’ loans, 50 percent for ‘Doubtful’ loans and 100 percent for ‘Loss’ loans respectively. BFIs were earlier required to classify loans into Pass, Sub-standard, Doubtful, and Loss categories, depending on duration of delay in debt servicing. Now they will have to add one more category -- Watch List. According to new requirements, a lender has to classify loans which have not been serviced for three months as ‘pass’ loans. ‘Watch List’ includes loans which have not been serviced for three months. But ‘Watch List’ includes loans whose principal and interest have not been paid within the repayment period. Non-performing loans not serviced for three to six months will have to be classified as ‘Sub-standard’ loans. Similar, loans not service for six months to one year will have to be classified as ‘Doubtful’ loan. The ‘Loss’ loans are those whose interest and/or installment of principle has not been paid for more than one year. Loan loss provision made for performing loan is called "general loan loss provision" and loan loss provision made for non-performing loan is called "specific loan loss provisioning" (Nepal Rastra Bank, 2015).

2.2.5 Causes of NPA

One of the potential factors responsible for increasing non- performing assets of the commercial banks is lending policy of the banks. Similarly ineffective credit policy, weak monitoring ,lacking of portfolio analysis, shortfall on security, weak credit concentration, mismanagement within the banks, inability to identify borrowers bad intention etc are loopholes in the side of banks and economic and industrial recession, insufficient legal provision for the recovery of dues, inconsistency on government policy, lack of monitoring and supervision from Central Bank, high and conservative provisioning requirement are some external factors responsible increasing NPA of banks (Golcha, 2007).

2.2.6 NPA management

Banking sectors are the backbone of a country. The motto of the commercial Banks is to mobilize the resources by investing the same in a profitable manner. The resources may include capital funds consisting the Shareholders equity, Money deposited by the people, borrowing and profit capitalization. Though the activities of them are guided by some social obligations but some profit has always been desirable for existence.

Internal Effect: Due to NPA the banks have to make loan loss provision from their profit and other sources. That's why the profit of the banks decreases or may occur losses. As a result, share capital also becomes capital erosion and capital inadequacy. If the provision for doubtful debts crosses 5% of the total loan amount, the bank have to pay income tax as profit. So, it has direct effect to the cash flow of bank. As a result, the profit of the bank has affected.

External Effect: When banks accept deposits from the public and provide loan to the operation of business and other purposes. When the loan does not return with its interest, it becomes non-performing assets and banks will not able to return the deposited amount to their customers. It the banks unable to return the deposited amount the banks are loosed public supports and faiths. Not only that much but also, the banks have to take loan at a higher rate to pay deposit, which directly affects the profitability of the banks and which lead the bank bankruptcy and dissolved (Brose, 2016).

2.2.7 General principles of lending

Banker is essentially a dealer in the funds of others and that too funds mostly repayable on demand. Therefore, he follows a cautious policy in the matter of lending and is generally governed by the well-known general principles of sound lending which are discussed below:

1. **Safety**

The main business of banking consists in borrowing various types of deposits such as current, saving and fixed and lending such deposits to needy borrowers in the form of advances and discounting of bills. This obviously implies that safety of such funds should be ensured. Otherwise, the banker will not be in a position to repay his deposits and once the confidence of the depositors is shaken, he cannot carry on the banking business.

If the banker has to ensure safe lending, he has to look to the three C's of the borrower namely Character, Capacity and Capital. Character of the borrower is important because that determines his willingness to repay the loan. His capital and capacity to run the business successfully determines his capacity to pay. The safety of the loan depends on both his capacity to repay and willingness to repay.

Normally the banks lend up to 70 to 72 % of their deposits, because a portion of the deposits are required to meet the withdrawals by customers. His endeavor is of course to lend as much of the deposits as possible, without which he will not be in a position to meet his interest obligations and the maintenance of establishment. Therefore, he has to lend with a view to earn interest but lend it safe (Choudhary, 2002).

2. Liquidity

By liquidity is meant the readiness with which the bank can convert the assets into cash. as the banker's deposits are subject to the legal obligation of being repayable on demand and at short notice, he must ensure liquidity also while lending, so that in times of needs, he will be able to convert the assets into cash.

There is yet another reason for paying attention to the liquidity factor. The cost of borrowing from Reserve Bank depends on the net liquidity ratio, which is the ratio calculated by taking the proportion of specified net liquidity assets of the borrowing bank, to the bank's aggregate demand and time liabilities.

In fact, if one looks at the banker's balance sheet, he finds the assets arranged in the order of liquidity. Cash is the most liquid assets and it appears as the first item. Banker can ensure high liquidity by keeping all deposits in the form of cash only. In such a case as pointed out earlier, he will not be in a position to meet the interest obligations and expenditure of the establishment. From experience, he has learnt that he can safely lend out a substantial portion of the funds. But while lending he should try to ensure liquidity, i.e., in times of need, he must be able to obtain repayment of the money within a reasonably short time. Liquidity also implies that the assets can be sold without any loss. Thus, the concept of liquidity has twin aspects namely quick sale ability or convertibility of the assets and to risk of loss in such conversion (Shrivastava, 2015).

3. Profitability

Commercial banks have obtained funds from shareholders and naturally if dividend is to be paid on such shares it can only be paid by earning profits. Even in the case of public sector banks although they are service motivated, they will have to justify their existence by earning profits. This is not possible unless the funds are employed profitably. From out of the revenue earned the banker has to pay interest on deposits, salary to the staff, meet other establishment expense, build-up reserves and the balance must permit the payment of dividend to shareholders. However, the banker will not give under importance to this aspect because a particular will not give undue importance to this aspect because a particular customer may offer a higher rate of interest but an advance made to him result in a bad debt. Therefore, for the sake of profitability, the other two principles, liquidity and safety cannot be sacrificed.

4. The purpose of the loan

Baker should enquire the purpose for which it was taken. If an advance is given for productive purpose, in all probability, it will be repaid. Thus, safety is ensured. If an advance is made for speculative purpose, the banker may come to grief. Similarly advances made for wasteful expenditure on social functions etc. are unproductive in nature and as a rule banks avoid such advances. But it is very difficult for the bank to ensure that the advance has been used for the purpose for which it was taken. A person may take a loan obviously for a productive use, but may spend it on speculation. In recent years there is scrutiny of some of the account, as a follow-up measure to see that the end, use of credit is not for some other purpose (Nsobilla, 2016).

4. Diversification of loans

The familiar saying is 'Do not put all the eggs in the same basket'. Banker should try to diversify loans as far as possible, so that he may minimize his risk in lending. If the banker lends only to one industry or only too few big firms or concentrates in a certain geographical area, the risk is great. He should diversify lending, so that he may not be affected by the failure of one industry, or the few big borrowers. Where lending is done only in one area, it may be affected by political upheaval or natural calamities.

2.2.8 Review of studies

Review of NRB directives

Directive No 2. Provision relating to classification of loan/advances and loan losses

Having exercised the powers conferred by Section 79 of the Nepal Rastra Bank Act, 2002, the following Directives have been issued with regard to classification of credit/advances and provisions to be made for its possible loss by the institutions obtaining licenses from this Bank to carry out financial transactions.

1. Classification of loans/advances:

Entire loans and advances extended by a licensed institution have to be classified as follows based on expiry of the deadline of repayment of the principal and interest of such loans/advances: -

(a) Pass: Loans/advances which have not overdue and which are overdue by a period up to three months.

(b) Watch list: Loans/advances which have not overdue and which are overdue by period up to three months and it includes loans whose principal and interest have not been paid within the repayment period.

(c) Sub-standard: Loans/advances which are overdue by a period from three months to a maximum period of six months.

(d) Doubtful: Loans/advances which are overdue by a period from six-months to a maximum period of one year.

(e) Loss: Loans/advances which are overdue by a period of more than one year.

The Loan which are in Pass, Watch list class and which have been rescheduled/ restructured are called as the Performing loan and the Sub-standard, Doubtful and Loss categories are called non-performing loan.

Note: Loans/advances also include bills purchased and discounted.

2. Additional provisions relating to pass loans:

1) The following loans may be included in the pass loan: -

(a) Loans/advances extended against the collateral of gold and silver;

(b) Loans/advances of fixed receipts 46

(c) Loans/advances of Government of Nepal securities and loans/advances made against the collateral of Nepal Rastra Bank bonds;

Provided that the cases of the loans/advances against the fixed receipts or Government of Nepal securities or Nepal Rastra Bank bond as the additional collateral, such loans and advances shall also have to be classified in accordance with the directive referred to into Point No. 1 above.

2) The working capital loan having the deadline of up to one year for repayment may be included in the pass loan class. In case the interest to be received from the loans of working capital nature is not regular, such loans have to be classified on the basis of the duration of interest to be due.

3. Additional provisions relating to loss loans:

In case there seem any of the following discrepancies in any of the following loans, whether or not the deadline for repayment of which is expired, such loans and advances has to be categorized as the loss loan:

(a) The market price of the collateral cannot secure the loans;

(b) The debtor is bankrupt or has been declared to be bankrupt;

(c) The debtor disappears or is not identified;

(d) In case non fund-based facilities such as purchased or discounted bills and L/C and guarantee which have been converted into fund-based loan, are not recovered within ninety days from the date of their conversion into loan;

(e) Loan is misused;

(f) Expiry of six months of the date of auction process after the loan could not be recovered or a case is pending at a count under the recovery process;

(g) Providing loan to a debtor who has been enlisted in the black-list of Credit Information Bureau Ltd;

(h) The Project/business is not in a condition to be operated or project or business is not in operation;

(i) The credit card loan is not written off within 90 days from the date of expiry of the deadline;

(j) While converting the L/C, guarantee and other possible liabilities into a fund-based loan under the regular process, if the said loan is not recovered within 90 days; and

(k) In case of expiry of the deadline of a trust-receipt loan.

Note: For the purpose of clause No. 3(e) of these Directives, "misuse" means non-use of the amount of the loan for the purpose for which it has is taken; the project is not in operation; the amount accrued from the concerned project or business is not used in repayment of the loan but in other activities; and the word also includes the loan which is proved to have been misused by a supervisor in the course of inspection or supervision or by an auditor in the course of auditing.

4. Provision to be maintained for loan loss

For the loans and bills purchase classified according to these Directives, the following loan loss provision shall be maintained based on the remaining amount of principal:

Table 2.1

Loan classification

Loan Classification	Provision for Loan Loss
Pass	1%
Watch list	5%
Sub-standard	25%
Doubtful loan	50%
Bad debt	100%

5. Conditions for adjustment in loan loss provision

No loan loss provision shall be allowed for adjustment except in the following conditions:

a) In case the loan is written off.

b) In the event where repayment of loan is in installment or in partial basis, the loan loss provision made to the extent of the loan so repaid may be written back and adjusted while maintaining loan loss provision according to loan classification; and

c) In the event of the loan is reclassified after loan rescheduling and restructuring, if the repayment of the principal and interest of the loan so rescheduled and restructured is regular for a consecutive period of two years.

6. Loss provisions and auction of non-banking assets

a) In case of the non-banking assets accepted by the licensed institution, cent percent loss provisions shall be made from the date of the acceptance.

b) In the case of sale of the non-banking assets, necessary adjustment in the accounts of loss provision maintained for such property shall immediately be made.

c) While accepting collateral security as non-banking assets by licensed institution, the following provisions shall be applicable while selling the non-banking assets so accepted:

   i. While accepting the collateral property of a customer as non-banking assets whose outstanding loan amount is more than 2.5 million, the concerned party shall compulsorily be black-listed.

   ii. Prior to auctioning the non-banking assets in the name of the institution, it shall have to be evaluated by an independent evaluator. No excessive/less evaluation shall be allowed.

   iii. Transparent and clear provisions shall be made with regard to auction sale of collateral security/non-banking assets in Financial Administration Byelaws and sales shall have to be carried out in such a manner to serve interest of the bank or financial institution.

   iv. While accepting the non-banking assets in such a manner, entire property mortgaged as collateral that could not be sold by auction shall have to be accepted and it may not be accepted in part.

   v. The property so accepted shall have to be sold at the earliest to the extent possible. In case it is necessary for own purpose of the licensed institution, the same shall have to be approved by the Board of Directors and information thereof shall be made available to this Bank as well.

2.3 Empirical review

2.3.1 Review of journal and articles

Commercial banks collect deposit from depository customer and provide this money as loan to borrowing customers charging some additional interest. In other words, bank play intermediately role in the economy. Bank does so to convert its liability into assets. Thus, loans and advances are the assets of the bank. Interest income on such loans is the primary source of income of commercial banks. To spread the depositors fund to the borrowers, banks should have to take in consideration safeties of loan and advances at time of lending but not only on profitability. They have to analyze properly and take adequate collateral for the safety purpose as providing loan is a risky business. Banks have to manage the proper portfolio so that the impact of market failure of any sector will affect least. Loans may be of different types such as: Personal loan, home loan, auto loan overdraft, import loan, term loan etc.

Non-Performing Loans (NPLs) are regressed on three sets of factors in terms of credit, banks size induced risk preference and macroeconomic shocks (Nsobilla, 2015). The report concluded based on the empirical results that NPLs have a negative statistically significant influence on the financial performance in the selected banks. This signifies that the greater the NPL, the lower the profit of the selected rural banks. The liquidity risk was not statistically significant. The nonperforming loans and cost-income ratio had a negative influence on financial performance whereas total revenue and loan recovered had a positive effect on financial performance.

An article on the study of non-performing loan and its impact on return on assets of major Indian commercial bank (Brose, 2016). The study concluded on the moderately negative correlation between NPL and ROA. This means that increase in NPL negatively affects the ROA. The study concluded that NPL is more affecting the public sector bank in India. Professor Brose says that effective credit monitoring, complying with the rule of monetary policy, computerization, and maintaining database could be the possible solution to reduce NPL.

Banking sector is an essential part of a nation's economy and represents one of the most important components of a nation's capital. Similarly, the loan portfolio represents an important component of a bank’s total assets. These assets generate huge interest income which is a critical measure of the bank’s financial performance and stability. Therefore, the non-performing loan ratio is a critical tool to measure a bank’s performance. There is recently a growing recognition between macroeconomic indicators, bank-level factors and the non-performing loans (NPLs) ratio. The purpose of this study is to investigate whether there is a significant relationship between macroeconomic indicators, bank-level factors and non-performing loan ratio in Turkey. In this study linear regression models and cointegration analysis are utilized to determine the significant relations between the periods from January 2007 to March 2013. Our empirical results show that debt ratio, loan to asset ratio, real sector confidence index, consumer price index, EURO/Turkish lira rate, USD/Turkish lira rate, money supply change, interest rate, Turkey’s GDP growth, the Euro Zone’s GDP growth and volatility of the Standard & Poor’s 500 stock market index does not have significant effect to explain NPL ratio on multivariate perspective. On the other hand, industrial production index, Istanbul Stock Exchange 100 Index, inefficiency ratio of all banks negatively affect NPL ratio; unemployment rate, return on equity and capital adequacy ratio positively affect NPL ratio (Vatansever, & Hepsen, 2013).

The Banking sector of Bangladesh is trapped in a gridlock of non-performing loans (NPLs) so much so that NPL accounts for 11.60 percent of the total volume of classified loans. This problem has started to be widening with an evil trend of loan embezzlement among the industrial borrowers in our country. Frequent scam series in banking industry is surely a red light and unfortunately the commercial banks are highly surrounded by it. The goal of the study is to analyze the impact of non-performing loan (NPL) on profitability where in this study considered net interest margin (NIM). This paper attempts to find out the time series scenario of non-performing loans (NPLs), its growth, provisions and relation with banks profitability by using some ratios and a linear regression model of econometric technique. The empirical results represent that non-performing loan (NPL) as percentage of total loans on listed banks in Dhaka Stock Exchange (DSE) is very high and they holds more than 50 % of total non-performing loans (NPLs) of the listed 30 banks in Dhaka Stock Exchange (DSE) for year 2008 to 2013. Moreover, it is one of the major factors of influencing banks profitability and it has statistically significant negative impact on net profit margin (NPM) of listed banks for the study periods (Akter & Roy, 2017).

Most banks in Indonesia as emerging market still rely on credit as the main income to finance their operations. But not all loans disbursed by banks are free of risk, some of them have a considerable risk and can threaten the health of the bank.NPL levels at Commercial Bank Indonesia over the past five years 1/1/2009-12/31/2013) shows a stable condition. But inversely proportional happen to the 26 Regional Development Banks (BPD), which NPL, since 2011 has continuously increased. It was reaching 3:49 % in June 2014 and was predicted to continue to rise. This study aims to study the influence of internal and external banks factors on the level of non-performing loans (NPL) in the Regional Development Bank (BPD) in Indonesia. This study is a quantitative research using panel data regression analysis with the study period from 2009 to 2013. The object of this study was 26 banks. Factors examined its effect on the NPL is a measure of a bank (SIZE), the capital adequacy ratio (CAR), the level of bank efficiency (ROA), the growth of gross domestic product (GDP), and the rate of inflation. Estimation model used is panel data models Random Effects Model (REM). The results of this study concluded that the level of efficiency of the bank (ROA) has a positive significant effect on NPL. The result of this study clearly warrant future studies (Alexandri & Santoso, 2015).

Non-Performing Loans (NPLs) are regressed on three sets of factors in terms of credit, banks size induced risk preference and macroeconomic shocks. The panel regression models show the terms of credit variables to be significant. The estimated coefficient on changes in cost of credit because of expectation of higher interest rate is positive. On the contrary, horizon of maturity of credit, better credit culture, and favorable macroeconomic and business conditions decrease the NPLs (Ranjan & Dhal, 2003).

Profit efficiency of large commercial banks is by accounting for non-performing loans. Although non-performing loans are negatively related to banks' profit efficiency, it is not statistically significant (Fan & Shaffer, 2004).

Pre-election has an influencing power in the regulatory side of the financial sector. The Government and Bangladesh Bank appear to be under pressure from certain quarters due to this. This becomes evident with the relaxation of the guidelines issued by Bangladesh Bank on defaulters accessing fresh loans. This is clearly not an easy environment to operate in and specific steps should be taken to prevent the situation from further deteriorating and undermining the banking sector (Wallich, 2006).

A study of non-performing loan and loan loss provisioning of commercial banks with reference to the NIBL Bank, Standard Chartered Bank and Nepal Bank Limited. Objectives are to find out the portion of non-performing loan, relationship between loan loss provision and loan and advances and profitability.

Pointed of the study out the problems of the commercial banks as lack of smooth functioning of economy, different policies and guidelines of NRB, political instability, security problem, poor information system, over liquidity caused by the lack of good lending opportunities, increasing non -performing assets etc (Shrestha, & Chowdhury, 2006).

Non-Performing Loan and Loan Loss Provisioning of Commercial Banks' with reference to Nepal Bank Limited, Rastriya Banijya Bank and NIBL Bank. objectives is to find out and analyze the guidelines and provisions pertaining to loan classification and loan loss provision and level of NPL in commercial bank, and to find out the impact of loan loss provision on the profitability of the commercial banks.

In this study concluded the ineffective credit policy, political pressure to lend non-viable projects, overvaluation of collateral and even without collateral disbursement are the major causes of mounting non- performing assets in government owned banks. Further add lending factors of accumulating NPAs are poor credit appraisal system, ineffective credit monitoring and supervision system, poor security system and recession, willful defaulter etc (Neupane, 2008).

The intermediation role of banks which is vital for the development of any nation can be adversely affected by non-performing loans. This study investigated the macroeconomic determinants of non-performing loans in Nigeria, using time series data for the period 2005 to 2014 collated from Central Bank of Nigeria Statistical Bulletin, Nigeria Deposit Insurance Corporation annual report, World Bank Development Indicators and International Financial Statistics. The choice of the period 2005 to 2014 was premised on the fact that the number of banks in Nigeria was reduced from 89 to 25 in 2005 due to the banking recapitalization exercise initiated by the CBN which led to the consolidation of banks. The dependent variable used in the study was non-performing loan (NPL). Independent variables were gross domestic product growth rate (GDPGR), inflation (INF), lending rate (LR), exchange rate (ER), money supply to gross domestic product (M2GDP), and unemployment rate (UR). The outcome of the regression result showed that GDPGR has a positive relationship with NPL. The result also revealed that INF and ER have a positive relationship with NPL while LR, M2GDP, and UR have a positive and significant relationship with NPL. Of the six macroeconomic variables used in the study, it can be observed that only LR, M2GDP, and UR determine NPL in Nigeria while GDPGR, INF, and ER have a positive relationship with NPL but do not influence or determine NPL in Nigeria. The policy implication of this study is that the monetary authorities should ensure that the lending rate charged on loans by deposit money banks is reasonable to enable borrowers to repay the borrowed fund. Finally, the government should direct its monetary and fiscal policies towards reducing unemployment by creating an enabling environment conducive for business growth through the provision of social and infrastructural facilities (Adeola & Ikpesu, 2017).

Study have two central objectives, compliance of capital adequacy and non-performing loan ratios prudential requirement and analysis on the influence posed by Capital Adequacy, Profitability, and Loan Growth on Non-Performing Loans. Banking sector ratios as reported by the supervisory authority (Bank of Tanzania) were used for the purpose of this study. The banking sector ratios show that commercial banks in Tanzania had strong Capital adequacy ratio greater the 10% required by the Bank of Tanzania. However, the banking sector failed to meet non-performing loans 5% threshold. On the hand, when regression analysis was used to study the influence, it was found that, capital adequacy, profitability posed insignificant influence on non-performing loans whereas loan to asset ratio and interest margin had a significant influence (Malimi, 2017).

Non-Performing Loan Rate is the most important issue for banks to survive. There are lots of factors responsible for this ratio. Some of them belong to firm level issues and some are from macroeconomic measures. However, this study is based on the blend. It considers the Real GDP per Capita, Inflation, and Total Loans as independent variables, and Non-Performing Loan Ratio as dependent variable. Study uses the data of US banking sector from official web sources of US Federal Reserve System. Years from 1985 to 2010 constitute the study period. Employing correlation and regression tests show that research model used is of good statistical health. All the selected independent variables have significant impact on the depended variable; however, values of coefficients are not much high. Banks should control and amend their credit advancement policy with respect to mentioned variables to have lower non-performing loan ratio (Vatansever & Hepsen, 2013).

A study of Non-Performing Assets of Commercial Banks of Nepal" with reference to Nepal Bank Limited, Rastriya Banijya Bank, Nepal Bangladesh Bank, Everest Bank and Standard Chartered Bank Nepal Limited. The main objectives of study are to find out the proportion of non-performing loan and the level of NPAs in total assets total deposit and total lending, evaluate the relationship between loan and loan loss provision, present the trend line of the non-performing assets, loan and advances, loan loss provision of selected commercial bank (Pradhan, 2006).

Improper credit policy and credit appraisal system, lack of supervision and monitoring, economic slowdown, overvaluation of collateral, borrower's misconduct, political pressure to lend for un-creditworthy parties, etc are the major causes of occurring NPAs.

This study concluded that that "Nepalese banks have to remain focused in their efforts to recover their spiraling bad loans, or non-performing assets, to sustain the positive trend of improving asset quality. Better risk management techniques, compliance with the core principles for effective banking supervision, skill building and training and transparency in transaction could be the solution. Removal of non-performing loans from the banking system even through government or quasi government funds at times, is essential. But official assistance should be so structures as to avoid moral hazard. To conclude with, till recent past, corporate borrowers even after defaulting continuously never had any real fear of bank taking any action to recover their dues despite the fact that their entire assets were hypothecated to the banks. This is because there was no legal Act framed to safeguard the real interest of banks. While NPA cannot be eliminated, but can only be contained, it has to be done not a heavy cost of provisioning and increasing the portfolio of credit. Along with recovery fresh inflow of NPA should be brought down at a level much less than the quantum of its exit. If this specific goal is reached, there is an eventual solution for this problem. Good governance is essential for the success in NPA management" (Pradhan, 2006).

Non-performing loans are defined as those financial assets from which banks no longer receive interest and/or installment payments. They referred to as non-performing because the loan ceases to generate income for the bank.

Thesis titled Non-Performing Assets of Nepalese Commercial Banks "With reference to Nabil Bank Ltd, Nepal SBI Bank, Nepal Investment Bank, Nepal Bangladesh Bank and Bank of Kathmandu. His main objectives are to examine the level of nonperforming loan/asset in total assets, total deposit and total lending of Nepalese commercial banks, effects of non-performing loans to return on assets (ROA) &

return on equity (ROE) and following of NRB circulars by commercial banks (Khadka, 2004).

This study concluded that the level of NPL of EBL seems lesser than all other banks. Similarly, Nepal SBI Bank stands at second and Standard Chartered Bank stands at third respectively. The position of NIBL seems quite considerable (unsatisfactory) because the bank has been growing its NPL every year.

Different commercial banks between NPA and ROA and between NPA and ROE indicates that there is inverse relation between NPA and ROA as well as between NPA and ROE. It means the level of NPA effect the return on assets and return in shareholder's equity. Therefore, banks should reduce their level of NPA to increase the ROE and ROA.

A study focused about the determinant of commercial banks' lending practices. Commercial banks constitute a major chunk of total assets in the banking system in Nepal and extension of credit is one of the major functions of banking institutions. If banks are not efficient in their lending behavior, it may not contribute to economic growth. On the other hand, their inefficient and imprudent banking practices may lead to riskier financial instability. The study has also focused about the lending practices and its effectiveness in lowering the non-performing loan (Timilsina, 2017).

Loan occupies the greater portion in the assets side of balance sheet. loan is the risky assets. The major reason behind non-performing loan is poorly managed loan portfolio. Non-performing loan reduces the liquidity of bank, credit expansion, and growth of the economic activities and along with performance of bank. Non-performing loan can even erode the existing capital. (Sherpa, 2016).

‘A Study of Loan Classification and Non- Performing Assets Management of Rastriya Banijya Bank’ (Niraula, 2015) has pointed out the Non- Performing loan as a major problem of Nepalese commercial banks. In this study discloses the factor that the RBB holds the largest portion of Non- Performing loans of the banking sector.

This study concludes that the ineffective credit policies, overvaluation of collateral are the major causes of mounting non-performing assets. Needs to resolve the problems of NPAs by changing the policy and gaining the confidence of borrower to settle loan by way of understanding.

Commercial banks are affected by the vicious circle of non-performing loan. The major factor leading to non- performing loan are improper credit appraisal system, ineffective credit monitoring system, over valuation of collateral and political pressure to lender. Setting up recovery cells, effective laws to recover bad loans, and hiring asset Management Company can be some measure to recover non-performing loan. (Pandey, 2016).

In Nepal, there are not any scientific study regarding the impact of macroeconomic and banks specific variables on non-performing loan. Some studies aimed to evaluate the financial sector reforms adopted after 1990 (Bhetuwal, 2005).

Since this reform has its objective to reduce the pile of non-performing loan by prudent loan appraisal and improved monitoring mechanism it may have some importance for the reduction 28/ Economic Journal of Development Issues Vol. 19 & 20 No. 1-2(2015).

Nepal is also facing banking crisis and some of the bank and financial institutions have already failed during last few years and are in the process of liquidation. Studies show that the failure of banks in Nepal was also the result of the high non-performing assets due to and the result of lending without differentiating markets, products and borrowers' credit worthiness and excessive loan exposure to real estate (Sapkota, 2011).

2.3.2 Review of previous thesis

The strong banking sector is important for flourishing economy. Non-performing assets are one of the major concerns for banks in India. The study is based on secondary data. The paper highlights the trends, status and impact of NPA on PSBs profitability during the period of 7 years i.e. from 2009 to 2015. Several research journals including research papers and articles have been stated by the researchers. Moreover, RBI Reports on Trend and Progress of Banking in India for various years and websites have been referred during the study. The data were analyzed using descriptive statistics; simple regression model and correlation by using SPSS software version 20 and the Return on Assets (ROA), Return on equity (ROE) and Net Interest

Margin (NIM) were used as financial performance variables and NPA as independent variable. The findings and analysis reveal that the NPA impact negatively on public sector bank's financial performance in the period under study (Sharifi & Akhter, 2016).

Indian banking sector has been facing serious problems of raising Non- Performing Assets (NPAs). The NPAs growth has a direct impact on profitability of banks. Non-performing assets are one of the major concerns for scheduled commercial banks in India. The recommendations of Narasimha committee and Verma committee, some steps have been taken to solve the problem of old NPAs in the balance sheets of the banks. It continues to be expressed from every corner that there has rarely been any systematic evaluation of the best way of tackling the problem. There seems to be no unanimity in the proper policies to be followed in resolving this problem. NPAs reflect the performance of banks. A high level of NPAs suggests high probability of a large number of credit defaults that affect the profitability and net-worth of banks and also erodes the value of the asset. NPAs affect the liquidity and profitability, in addition to posing threat on quality of asset and survival of banks. The problem of NPAs is not only affecting the banks but also the whole economy. In fact, high level of NPAs in Indian banks is nothing but a reflection of the state of health of the industry and trade. It is necessary to 17 trim down NPAs to improve the financial health in the banking system. An attempt is made in this paper to understand NPA, the status and trend of NPAs in Indian Scheduled commercial banks, the factors contributing to NPAs, reasons for high impact of NPAs on Scheduled commercial banks in India and recovery of NPAS through various channels (Singh, 2016).

Huge nonperforming loans portfolio erodes the ability of banks to make profits. In the 1990s and beyond many Nigerian banks became weak and highly unprofitable due to excessive nonperforming loans portfolio accumulated by bank promoters and management that led to their demise. Insider dealing was the major cause of large nonperforming loan portfolio in Nigeria, involving over-extension of loans to promoters, directors and significant others that became bad and irrecoverable. To clean up the mess in the banking sector and return the banks to the paths of sound management and profitability, the CBN had to inject about N700bn in a bailout exercise while purging the system of bad and irresponsible management teams (Ugoani, 2016).

Combined Issue of non-performing loan in Nepal. Study shows that lack of ability of the bankers to properly assess the impact of economic indicators on the growth and sustainability of the business, lack of proper knowledge among the bankers for the evaluation of project idea and management of the project and incompetence to properly assess the exit modality as and when necessary were the main internal factors contributing for non-performing loan. During past few decades, many banks both in developed, emerging and developing economies face difficult situation and problems in performance. Such bank failure and financial distress have affected many banks and some of which have closed down by the regulatory authorities (Richard, 2011).

NPA's of Nepalese finance sector. In his views the NPA's of three banks (NBL, RBB, NIDC) are highly discussed and published. After analyzing the report, we can find that these banks had high figures in Non-performing loan and more amounts has been declared as loan loss provision. These banks are still operating the loan account despite having high figures in non-performing loan. It has led negative impact for business venture to operate transaction with these banks. The reason behind NPA's behind for these banks are ineffective credit monitoring and careless for credit policies a study by (Golcha,2007).

This study pointed out the problems of commercial banks as "Escalating level of NPAs has been becoming great problem in banking business in the world. In this context Nepal can't be run off from such situation. The level of NPA in Nepalese banking business is very alarming. It is well known fact that the bank and financial institution in Nepal have been facing the problem of swelling non-performing assets and the issue is becoming more and more unmanageable day by day. He added from different financial reports, newspaper and news, it is understood that total NPA in Nepalese banking system is about 35 billion, while it is very worse in case of two largest commercial banks i.e., Rastriya Banijya Bank (RBB) and Nepal investment bank Limited (NIBL)" (Khadka 2004).

There is about NRs. 16,325 million NPL within the commercial banks of Nepal (NRB, 2012). Though this is about 3 % of the total loan it varies among the banks from 0.6 % to about 7.27 %. The share of non-performing loan to total loan is high (above 5%) in case of government owned banks than the private sector banks. Hence this study aims to find out the macroeconomic (GDP growth rate, Inflation rate & real effective exchange rate) and banks specific determinants (size, loan to asset ratio, total assets, ownership dummy, real interest rate) of non-performing Loans in commercial Banks of Nepal.

2.3.3 Review of research report and other related literature

Williams (2004) followed the methodology of Berger and De Young (1997) and applied it for a sample of European banks over the period 1990-1998. The results show that these banks suffer from bad management and that the most efficient banks do not adopt a skimping behavior. For the other modes of management behaviors the results are statistically weak. The same methodology was applied by Rossi et al. (2005) for a sample of banks operating in Central and Eastern Europe countries over the period 1995-2002. Their results show that there is a negative correlation between non-performing loans and cost efficiency. According to them, negative correlation is due to exogenous factors (business conditions, criminality, etc.) Which are beyond the control of bank management (Bad luck hypothesis). In order to minimize the impact of these external factors, they presented the following recommendations:

Strengthening regulation and bank supervision

Increasing credit portfolio diversification

Promotion of mergers with foreign banks

Improving capitalization in order to increase bank's ability to absorb shocks.

The empirical study was undertaken to explore the determinants of non-performing loans (NPLs) of small and medium enterprises (SMEs) sector held by the commercial banks. Stratified sampling technique was used to collect primary data through well-structured survey questionnaire from credit analysts / bankers of 42 branches of 9 commercial banks, operating in the district of Lahore (Pakistan), for 2014-2015. Selective descriptive analysis and Pearson chi-square technique were used to illustrate and evaluate the significance of different variables affecting NPLs. Branch age, duration of the loan, and credit policy were found to be significant determinants of

NPLs. The study proposes that bank-specific and SME-specific microeconomic variables directly influence NPLs, while macroeconomic factors act as intermediary variables. The results elaborate various origins of NPLs and suggest that they are primarily instigated by the loan sanctioning procedure of the financial institution. The paper also underlines the risk management practices adopted by the bank at branch level to averse the risk of loan default. Empirical investigation of bank-specific microeconomic factors of NPLs with respect to Pakistan's economy is the novelty of the study. Broader strategic policy implications are provided for credit analysts and entrepreneurs (Ikram, Ijaz, & Fiaz, 2016).

This paper presents a systematic literature review of 44 studies on determinants of non-performing loans (NPL) published for the period 1987 to 2017 in 30 peer-reviewed journals. The motivation for this analysis is twofold. First, the NPL-issue is attributed high relevance by policy makers such as the European Central Bank and is currently addressed with a variety of measures. Any policy response requires deep understanding of the underlying determinants. Second, availability of data in the NPL-sector expanded, allowing scholars for more sophisticated research. Presenting novel interpretation, I synthesize the literature according to three broad, yet overlapping themes: macroeconomic events, bank- and loan-specific factors. Using an open coding process, the literature is diligently analyzed in 13 subcategories. The results reveal that the interaction of loan and asset specific events with macroeconomic and bank-specific factors still lacks a deep understanding and deserves for additional empirical research Manz, (2019).

The size of non-performing loans (NPLs) plays a key role in the stability of the banking sector of a country. The factors that explain the NPLs contain very important information for banks. Studies in this regard with respect to developing states such as Pakistan have received little attention. This study aimed to scrutinize the determinants of NPLs observing a case of the banking sector in Pakistan over the period from 2005 to 2017 (Khan, Siddique, & Sarwar, 2020).

2.3.4 Summary of articles and thesis

S.N.	Author/ Year/ Country	Independent variables	Dependent variables	Sample size /method	Findings
1	Wallich, (2006)	GDP, growth rate, inflation, interest rate spread and unemployment .	Non performing loan	Sample size (n=22)	Potential effect of macroeconomic variables on the downfall of loans.
2	Fan and Shaffer, (2004)	Credit risk, liquidity risk and insolvency risk.	ROA and ROE	Sample year (n=10)	The profit efficiency of a sample of large U.S. commercial banks
3	Shrestha and chowdhury, (2006)	Interest rate deregulation, removable of entry barriers, reduction in reserve requirement, easing in credit control and stock market reform.	Financial liberalization index.	Principal component method.	Monitoring the pace of liberalization and evaluating the impact of the policy on various aspects of the economy.
4	Vatansever and Haspsen, (2013)	Industrial production index, inefficiency ratio of all banks, unemployment rate, returns on equity and capital adequacy ratio.	Non performing loan.	Engle-Granger or Augmented Engle-Granger test and Cointegrating Regression Durbin Watson test.	Investigate whether there is a significant relationship between macroeconomic indicators, bank-level factors and non-performing loan ratio in Turkey
5	Nosbilla (2015)	Cost-income ratio, loan recovered, total revenue and liquidity risk.	Non performing loan.	Sample size (n = 6)	Effect of non-performing loans on financial performance and trend of incidence of non-performing loans
6	Alexandri, & Santoso, (2015).	Size of bank, Capital adequacy	Non performing loan.	Sample size (n = 5)	Non Performing Loan: Impact of Internal and

		ratio, return on assets, gross domestics products and inflation.			External Factor
7	Singh, (2016)	Liquidity and profibality	Non performing assets	Sample year (n = 14y)	Ineffective recovery, wilful defaults and Defective lending process are the important factors which are responsible for the rise of npas in banks.
8	Thapa, Phuyal, & Regmi, (2017)	Work life balance, work environment, retention, incentives and rewards, career growth, employer branding, organization culture and retention.	Employee performance	Survey (n =200)	This study made an attempt to find out the most influential factors of employee's performance in commercial banks of Nepal.
9	Sana, Fayaz, & Ullah, (2019)	Deposit to total assets, liability to total assets and size of bank.	Non performing loan.	Sample size (n=22)	It is concluded that npls adversely affect banks performance.
10	Rahaman, & Akhter, (2019)	Bank size, equity, loan, deposit and operating expenses.	ROA	Sample size (n=8)	Empirical results show that bank-size and deposit have significant negative impact on the return on assets (ROA) which is the proxy for Islamic banks' profitability, while equity is found to have positive significant impact

2.4 Research gap

Through the review of literature, it has been found that some research in the related topic and have already been reviewed which helps to this study but no research was found exactly in detail research and analysis of non-performing loans on sample commercial bank .Hence this research had attempted to fill this research gap by taking reference of Everest bank limited and NIBL Bank. This study try to show the present issues, latest information on Bank's NPL and their ratios.

CHAPTER 3

RESEARCH METHODOLOGY

3.1 Introduction

The study is mainly based on the secondary information. The secondary information is collected from almost all the commercial banks that have the data on non-performing loan is available. Hence the secondary data is gathered for 2 out of 27 commercial banks of Nepal. The data for the said banks are collected and analyzed for the period of 2014/15 to 2018/19. The secondary information is collected from the published documents of the commercial banks and Nepal Rastra Bank. The data from Financial Statistics published by Nepal Rastra Bank, Various Economic Survey published by Ministry of Finance and yearly published annual report from selected banks. The research design used for this study is descriptive and comparative research design. It aims to explain the non-performing loan of selected commercial bank. The present facts and figure are collected. It uses the scientific method of collecting, classifying, and analyzing of data. Comparative analysis of selected bank helps to compare the result of two bank.

3.2 Research design

This research lies into descriptive survey research. The data has been collected from annual report of selected banks. The findings have been derived from the data and facts provided by the respondent. The study was based on the trend analysis and statistical test such as mean, standard deviation, regression and t-test etc. The software called Statistical Package for Social Science (SPSS), Microsoft Excel were used to analyze and interpret the data. This software is widely used in the business setting with its easy-to-use user interface and easily available.

3.3 Population and sample

The term 'population' for research means all the member of any well-defined class of people, event or object. It means that the entire group of people, events or things of interest that a researcher wishes to investigate. As this study is about non-performing loan of commercial Banks, all 27 commercial banks of Nepal taken into account as population, out of the total population, following two commercial banks are selected as samples for this study by using judgmental sampling method. The reason behind to select these banks is to leading and similar nature with their establishment and their performance, profile and their NPL ratio. EBL is joint venture Nepali bank and it has been operating with Punjab national bank India, NIBL is better performing Nepali private bank. EBL NPL is better than NIBL. Both banks have good performance in term of profit and market coverage.

i. NIBL (Nepal Investment Bank Limited)
ii. Everest Bank Limited

3.4 Sources of data

The research is mainly based on secondary data which may include Annual reports, semi-annual reports, quarterly economics bulletin, economic survey report, journal of finance, previous research studies, dissertation and articles of the subject various text books and different related websites.

3.5 Data collection procedure and instruments

The data analysis has used statistical tools and financial tools.

Financial tools: The financial tools used in the study are trend analysis and ratio analysis.

A. Ratio Analysis

I. NPL ratio

$$Non-performingloanratio = \frac{Non-performingloan}{loan} * 100\%$$

II. Return on Asses

$$Return\ on\ assets = \frac{Netprofit}{Totalassets} * 100\%$$

III. Return on Equity

$$Return\ on\ equity = \frac{Netprofit}{equity} * 100\%$$

B. Trend analysis is used to show the changes in values of non-performing loan, loan and assets in different time period.

Statistical tools:

I. Arithmetic mean

$$A = \frac{1}{n} * \sum_{i=1}^{n} xi$$

II. Standard Deviation

$$S = \sqrt{\frac{\Sigma (x-\bar{x})^2}{n}}$$

III. Karl Pearson Correlation coefficient is used under statistical tools.

$$r = \frac{n\sum xy - \left(\sum x\right)\left(\sum y\right)}{\sqrt{n\left(\sum x^2\right) - \left(\sum x\right)^2}\sqrt{n\left(\sum y^2\right) - \left(\sum y\right)^2}}$$

The value of 'r' always falls between -1 to +1.

If, r = 0, there is no relation between the variables.

If, r < 0, there is negative relation between the variables.

If, r >0, there is positive relation between the variables.

IV. Regression is the statistical method that is used to predict the value of the dependent variable on the base of the independent variable.

3.6 Data processing procedure and data analysis method

Correlation analysis

Correlation coefficient is the statistical tool that measures the relationship between the variable. The correlation coefficient ranges from -1 to +1. If the value of correlation coefficient is -1, there is perfectly negative relation between the two variables and when the value of correlation coefficient is +1 there is perfect positive relation between the variables. When the value of correlation coefficient is 0 there is no relationship between the variables.

Regression analysis

Regression is the statistical method that is used to predict the value of the dependent variable on the base of the independent variable. This statistic is also successful in determining the relationship between dependent and independent variable. It also allows in quantifying the effect of changes in independent variable in dependent variable.

Statistical Methods used in Regression analysis.

Y= a + bx

Where, y= dependent variable,

a= y-intercept, b= slope of line, and x= independent variable

Bar diagram

Bar diagram are one of the easiest and the most commonly used methods of presenting the numerical data. They present the data by means of bars or rectangle of equal with. The length of bar presents the given figures and with may be of any size.

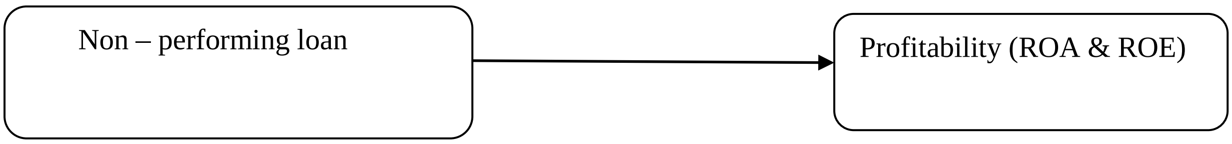
3.7 Conceptual framework

The diagrammatic representation of conceptual framework shows how the variables were related. Loan/advances and loan appraisal system are independent variables; loan default of loan repayment is dependent variable which depends on the occurrences of the said independent variables. The dependent variable of this study was loan default which was influenced by various independent variables.

Figure 3.1

Diagrammatical representation of conceptual framework

Independent variable Dependent variable



Loan policies are believed to influence default of loans to a great extent. Well formulated loan policies are believed to have inversely proportional relationship with loan default. Whereas poor loan policies are believed also to have directly proportional relationship with loan default. Loan appraisal is prepared by credit service official. A credit appraisal deal with the approval of loan to appraisal defines whether the loan will be non-performing or not. Credit department should verify whether the documents given by customer are accurate and confidential. It can be ascertained from the above mentioned that initial loan appraisal includes the core five ingredients of loan appraisal. This comprise of tests on accuracy, collaterals, honesty, capacity and cash flow to determine loan credit worthiness and the probability of loans default.

Return on Equity (ROE) is the measure of a company’s annual return (net income) divided by the value of its total shareholders’ equity, expressed as a percentage (e.g., 12%). Alternatively, ROE can also be derived by dividing the firm’s dividend growth rate by its earnings retention rate (1 – dividend payout ratio). ROE provides a simple metric for evaluating investments return.

Return on assets (ROA) is an indicator of how profitable a company is relative to its total assets. ROA gives a manager, investor, or analyst an idea as to how efficient a company's management is at using its assets to generate earnings. Return on assets is displayed as a percentage. It is a indicator of how well a company utilizes its assets, by determining how profitable a company is relative to its total assets. It is best used when comparing similar companies or comparing a company to its previous performance.

The duty of credit department does not end after granting the loan. The crucial job starts after the loan sanction. The regular monitoring of loan is necessary to prevent the loan from being default. The monitoring can be done both onsite monitoring and off-site monitoring of borrower’s performance. NRB’s policies also influence the loan default practices. The guidelines of NRB regarding statutory liquid ratio, loan classification, Non-performing loans gives the banks direction to perform their bank and thus they can reduce non-performing loan.

Concrete payment plan is necessary to reduce the non-performing loan. Even the bank is negatively influenced by the loan policies and NRB policies, the concrete payment plan can help bank to reduce the loan default. Regular counseling of customer is necessary because they must be timely reminded the loan amount and interest. Similarly, bank can provide career counseling program to the customer so that they are influence to earn more money.

CHAPTER 4

RESULTS AND DISCUSSION

In this chapter raw data collected from various sources are processed and converted into understandable facts and figure using financial and statistical and financial tools supported by figures and diagrams. The processing of data from raw to useful one is called data presentation and using the statistical tools we can do analysis. Major findings and analysis are done in this part.

4.1 Results

4.1.1 Brief profile of selected bank

NIBL

Nepal Investment Bank Ltd. (NIBL), previously Nepal Indosuez Bank Ltd., was established in 1986 as a joint venture between Nepalese and French partners. The French partner (holding 50% of the capital of NIBL) was Credit Agricole Indosuez, a subsidiary of one of the largest banking group in the world.

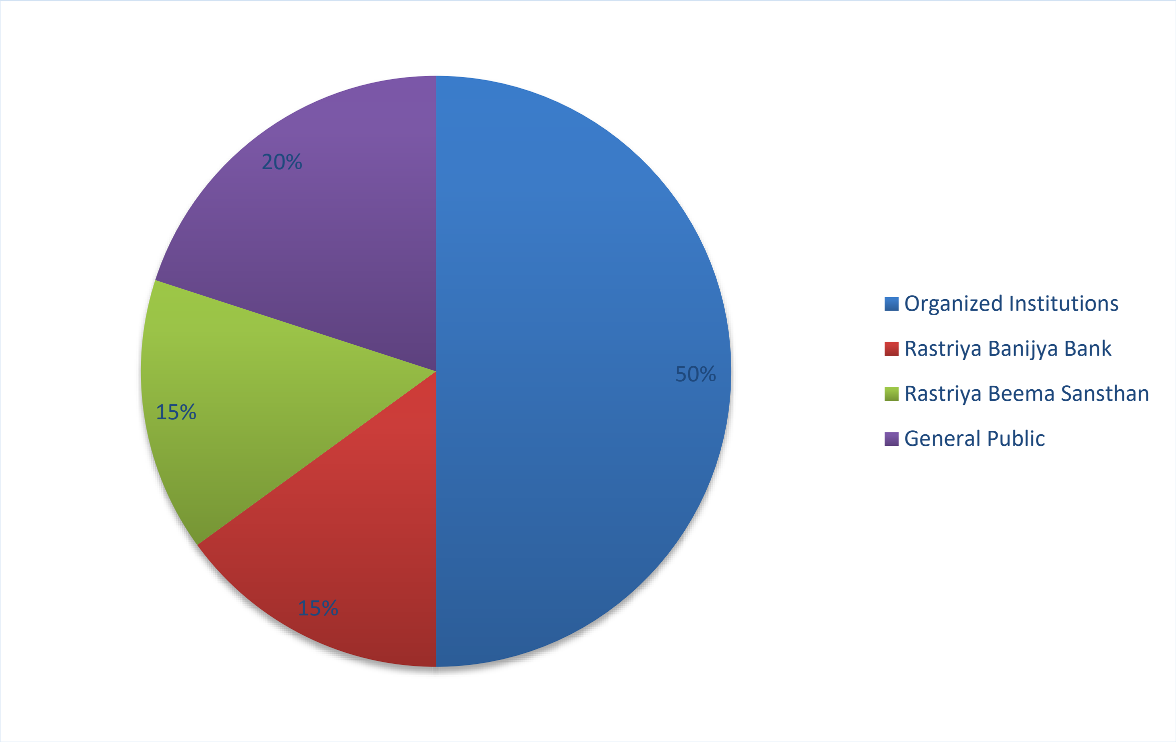
Later a group of Nepalese companies comprising of bankers, professionals, industrialists and businessmen acquired the 50% shareholding of Credit Agricole Indosuez in Nepal Indosuez Bank Ltd., and accordingly the name of the Bank also changed to Nepal Investment Bank Ltd.

At present, the Bank's shareholding pattern is as follows: Promoters - 50%, Rastriya Banijya Bank – 15%, Rastriya Beema Sansthan - 15% and General Public - 20%. With their team of experienced bankers and professionals with proven track record, they, at NIBL believe in offering the best of what our customers look for. NIBL was incorporated with the objective of extending international standard modern banking services to various sectors of the society. Pursuing its objective to be the most preferred provider of financial services in Nepal.

NIBL, as a pioneer in introducing many innovative products and marketing concepts in the domestic banking sector, represents a milestone in the banking history of Nepal as it started an era of modern banking with customer satisfaction measured as a focal objective while doing business. Operations of the bank including day-to-day operations and risk management are managed by highly qualified and experienced management team. Bank is fully equipped with modern technology which includes international standard banking software that supports the E-channels and E-transactions. There are 83 Branches, 127 ATMs, 29 Extension/Revenue collection counter and 59 Branchless banking. The head office is located in Durbar Marg. The ownership structure is explained by the given pie-chart.

Figure 4.1

Ownership structure of NIBL



SOURCE*: Annual Report of Nepal Investment Bank 2018/19*

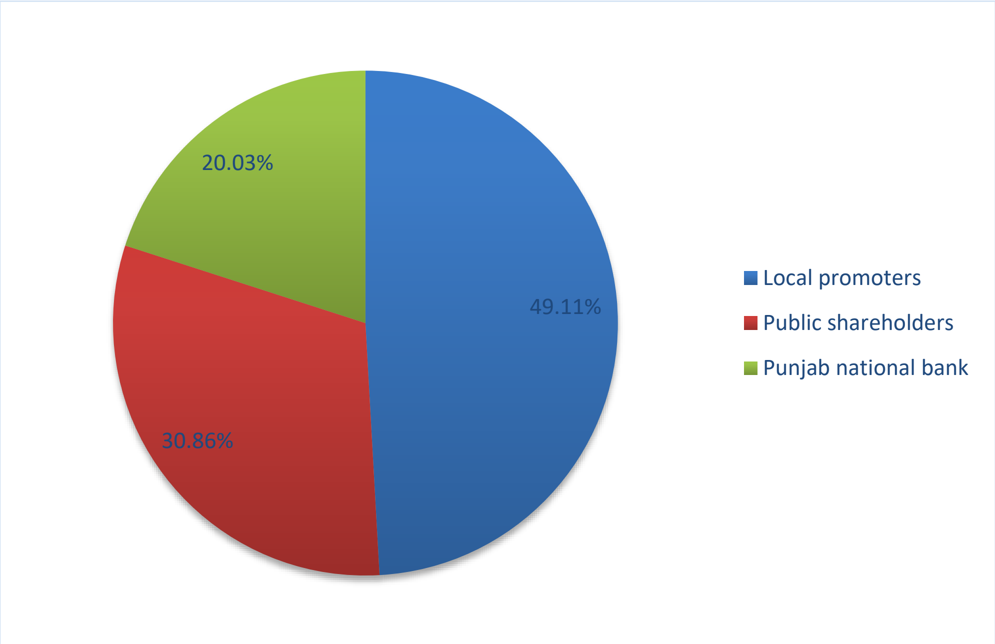
Everest Bank ltd.

Everest Bank Limited (EBL) started its operations in 1994 with a view and objective of extending professionalized and efficient banking services to various segments of the society. The bank is providing customer-friendly services through its Branch Network. As a result, Everest Bank has more than 5 lacs customer today. All the branches of the bank are connected through Anywhere Branch Banking System (ABBS), which enables customers to transact from any branch.

At present, the Bank's shareholding pattern is as follows: Local Promoters – 49.11%, Public shareholders – 30.83% and Punjab national Bank – 20.03%. The bank has been one of the leading banks of the country and has been catering its service to various segments of the society since then. With clients from all walks of life, the bank has helped develop the nation corporately, agriculturally and industrially. With an aim to help Nepalese citizens working abroad, the bank has entered into arrangements with banks and finance companies in different countries, which enable quick remittance of funds by the Nepalese citizens in countries like UAE, Kuwait, Bahrain, Qatar, Saudi Arabia, Malaysia, and Singapore. There are 98 Branches, 130 ATM Counters, 31 Revenue Collection Counters and 3 Extension Counters across the country making it a very efficient and accessible bank for its customers, anytime, anywhere. Branches of bank and head office is located in Lazimpat. The ownership structure is shown in the given pie chart.

Figure 4.2

Ownership structure of Everest bank.ltd



SOURCE: Annual Report of Everest Bank.ltd

4.1.2 Data presentation

a) Non-performing loan ratio

Ratio analysis means one number expressed in another form. A ratio analysis is used as a yardstick to measure the relationship between the two figures.

Non-performing loan to loan and advances

Table 4.1

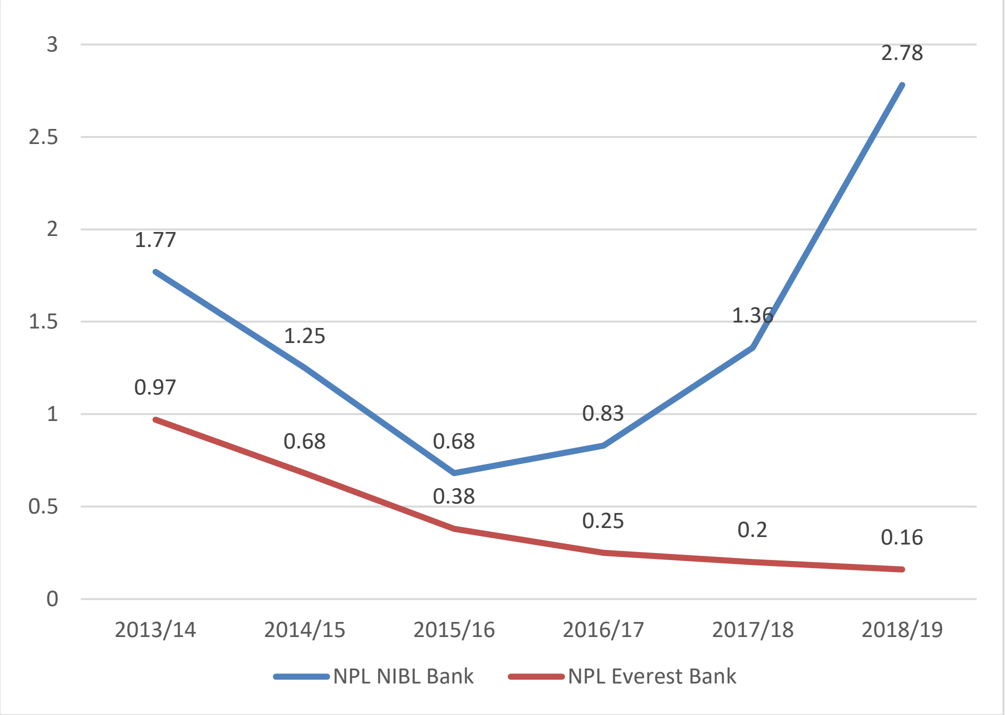
NPL ratio and statistical measure

Year	NPL Nepal Investment Bank	NPL Everest Bank
2013/14	1.77	0.97
2014/15	1.25	0.68
2015/16	0.68	0.38
2016/17	0.83	0.25
2017/18	1.36	0.20
2018/19	2.78	0.16
Mean	1.1445	0.44
S.D	0.761124	0.320687
C.V	56.67295	72.88336

SOURCE: Annual Report of NIBL and EBL

Figure 4.3

Past 6 year trend of NPL ratio



SOURCE : Annual Report of NIBL and EBL

In table 4.1 and figure 4.3 shows the non-performing loan over a Six year. The ratio of NIBL Bank ranges from 1.77% to 2.78%. The highest figure for NPL ratio in the six year was 2.78% in 2018/19. The average of the ratio is 1.445% and standard deviation is 0.7611. The coefficient of variation is 52.67%. Similarly, the NPL ratio of Everest bank ranges from 0.97% to 0.16 % in the six year period. The highest ratio is 0.97 in year 2013/14 and the lowest NPL ratio is 0.16 in 2018/19. The average NPL ratio is 0.44 and standard deviation is 0.3206, and coefficient of variation is 72.8833%.

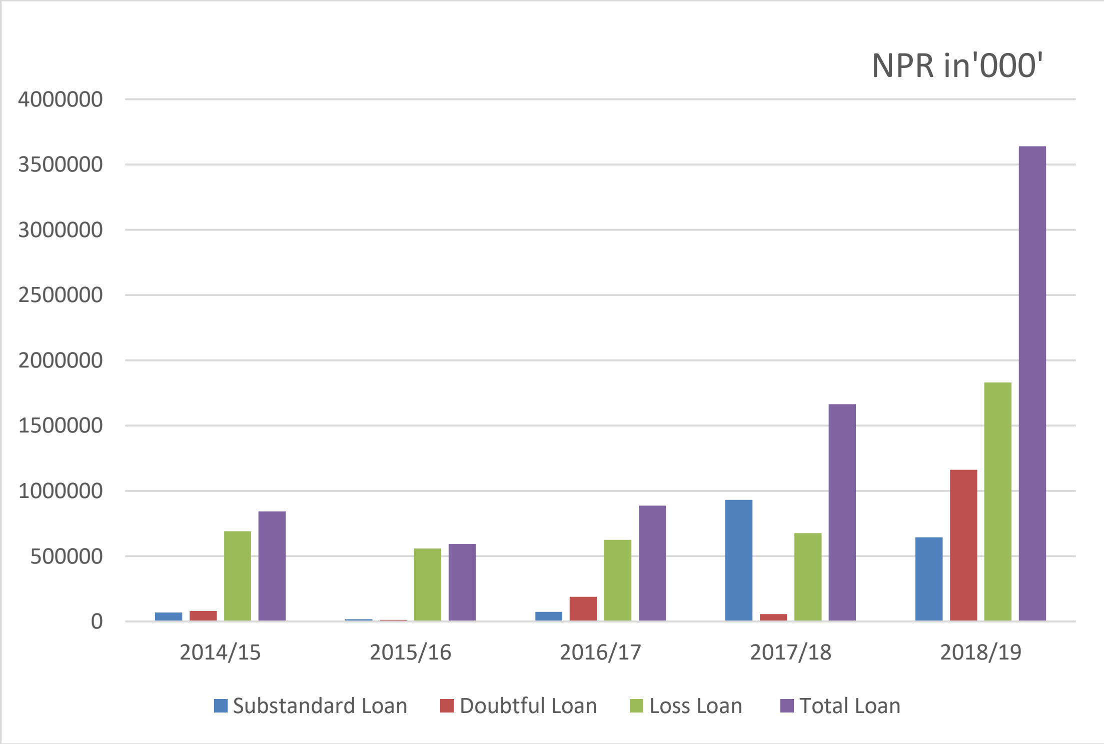
b) Classification of non-performing loan

Non-performing loan is classified into substandard loan, doubtful debt, and loss loan as per the time of being loan. The classification of NPL of NIBL and Everest bank in five-year period is shown with the help of given figure.

Substandard loan is the portion of the loan which payment has not been made for one quarter. Doubtful loan is the portion of the loan whose payment has not been made for six months. Loss loan is the portion of loan whose payment has not been made for 1 month.

Figure 4.4

Classification of NPL of Nepal Investment Bank .ltd

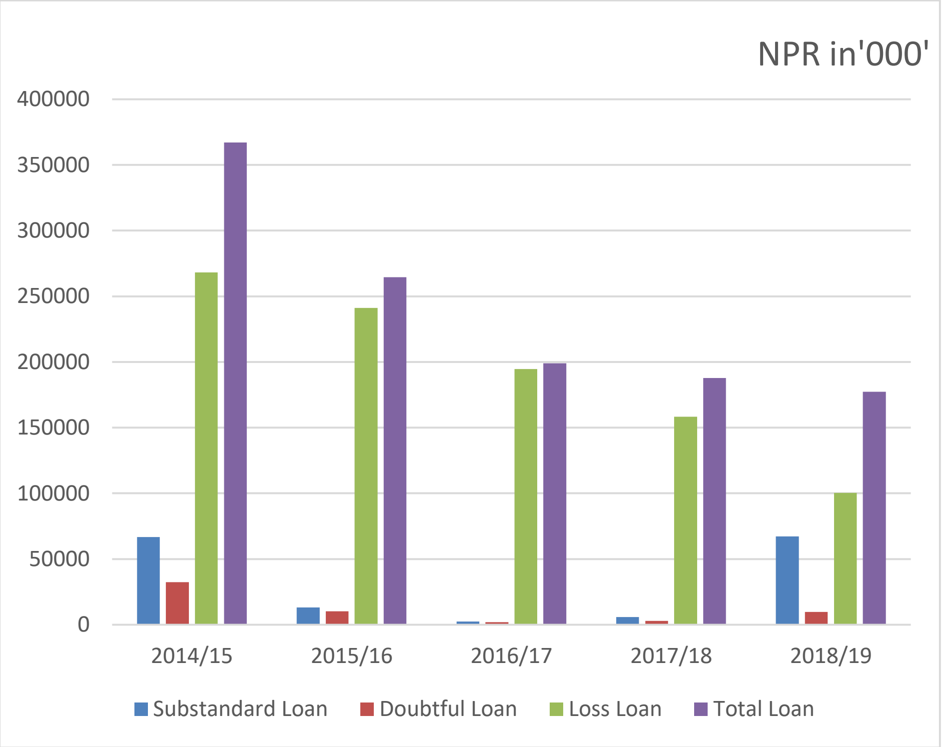


SOURCE: *Annual Report of Nepal Investment Bank*

In figure 4.4, The horizontal axis represents the time period. The total NPL is highest in the year 2018/19 and lowest in the year 2015/16. Loan loss compromise the greater proportion of total NPL. In figure 5, NPL is classified into substandard loan, doubtful loan, and loan loss. Analyzing the classification of NIBL bank we found that major portion of NPL include loan loss. In 2015/16, the amount of NPL is less. Highest amount of loan loss and substandard loan also has significant figure. In 2016/17, the amount of NPL has increased. The major portion of NPL includes loan loss and substandard figure is also high. In 2017/18, the amount of NPL increased and substandard loan has highest figure. Doubtful loan figure has decreased in comparison to 2016/17. In 2018/19, NPL again increases.NPL has highest figure in this year. Loan loss covers highest portion and doubtful debt has also been seen in significant amount. But substandard loan has decreased in comparision to 2017/18.

Figure 4.5

Classification of NPL of Everest Bank.ltd



SOURCE*: Annual Report of Everest Bank.ltd*

In figure 4.5, NPL classification of Everest bank has been done. Analyzing the classification of Everest bank we found that major portion of NPL include loan loss. In 2014/15, the amount of NPL and loan loss has highest. Highest amount of doubtful loan. In 2015/16, the amount of NPL, loan loss, doubtful loan and substandard loan has decreased. The major portion of NPL includes loan loss and substandard figure is also high. In 2016/17, the amount of NPL decreased and loan loss has also decreased. In 2017/18, NPL is again decreases along with loan loss.In 2018/19, the NPL amount has again decreased. Substandard loan has highest figure. Doubtful loan has been in significant high comparision too previous year. But loan loss has decreased.

c) Correlation analysis

Correlation coefficient is the statistical tool that measures the relationship between the variable. The correlation coefficient ranges from -1 to +1. If the value of correlation coefficient is -1, there is perfectly negative relation between the two variables and when the value of correlation coefficient is +1 there is perfect positive relation between the variables. When the value of correlation coefficient is 0 there is no relationship between the variables.

Correlation between non-performing loan and loan

Loan given to the customer is the major assets of bank. The portion of the loan that has become default in payment either principle or interest amount is non-performing loan. The relationship between loan and loan indicates the volume of non-performing loan from the total credit granted. The correlation study is conducted to know the relationship between loan and non-performing loan. It helps to know whether with the increase in loan amount, NPL is increasing or not. Similarly T-test helps to signifies whether the relationships between them are significant or not. Here r indicates coefficient of correlation, r^2 indicates coefficient of determination and t-tab is the value of t at 5% level of significance under two tailed test.

Table 4.2

Correlation analysis of loan and NPL

Bank	R	r^2	t-cal	P-value	Result
NIBL	0.74647	0.9980	39.2	0.1472	Insignificant
EBL	-0.86571	0.564	1.97	0.05786	Significant

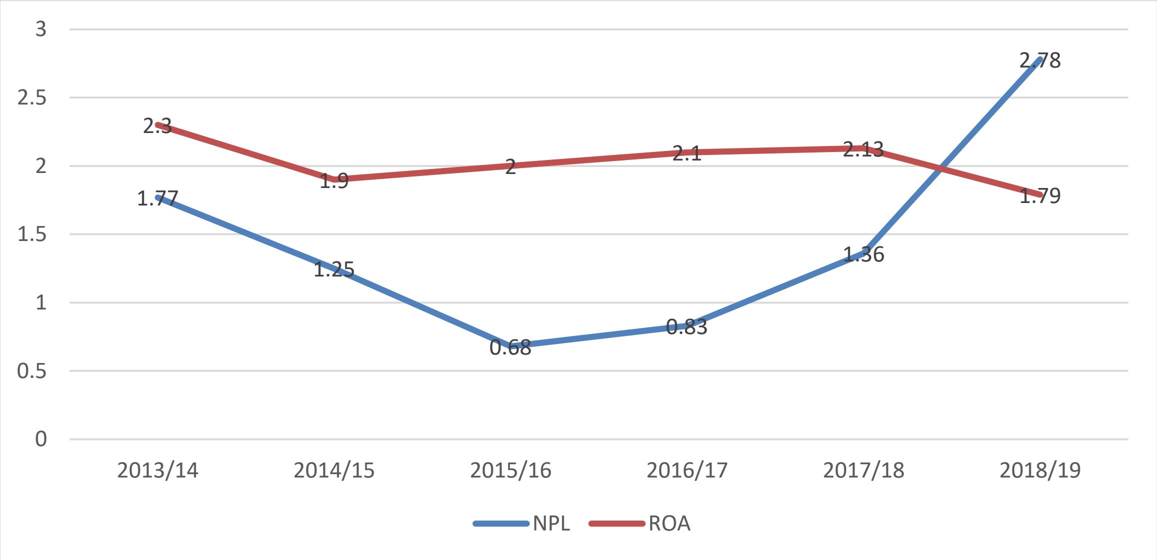
The correlation coefficient 0.74677 and -0.86571 indicates that there is positive and negative relation between the loan and non-performing loan. With the increase in loan, the non-performing loan also increases for NIBL but in the case of EBL increases in loan the non-performing loan does not increases. In the case of NIBL, the calculated value of P is greater than level of significance. This indicates that there is insignificant relationship between loan and non-performing loan. Similarly, in the case of Everest bank, the calculated value of P is less than level of significance. This indicates there is significant relationship between loan and non-performing loan of Everest bank.

d) Impact of NPL on profitability

The impact of NPL on profitability is calculated by using regression model. Return on assets is the ability of the firm to utilize the total assets to earn the net profit. Return on equity is the ability of the firm to utilize the total equity to earn net profit. It shows the total return to the investors. Both ratios measure the profitability of the organization.

Figure 4.6

Past trend of NPL and ROA of Nepal Investment Bank Ltd.

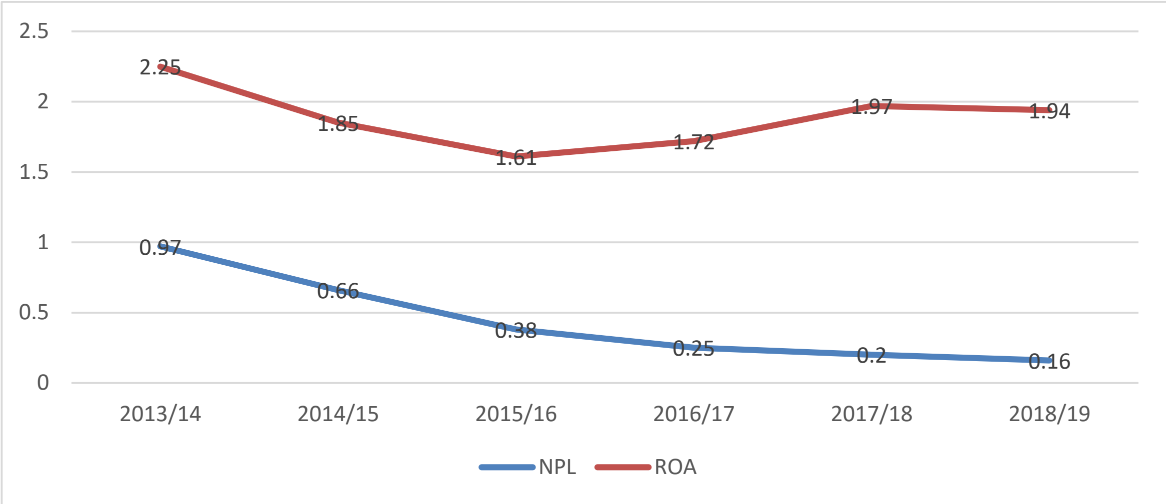


SOURCE*: Annual Report of Nepal Investment Bank*

In figure 4.6 shows the impact on non-performing loan on profitability in different year. The trend of Nepal Investment bank ranges from 2.3% to 1.79%. The highest figure of the profitability 2.3% in 2013/14.

Figure 4.7

Past Trend of NPL and ROA of Everest Bank.ltd.

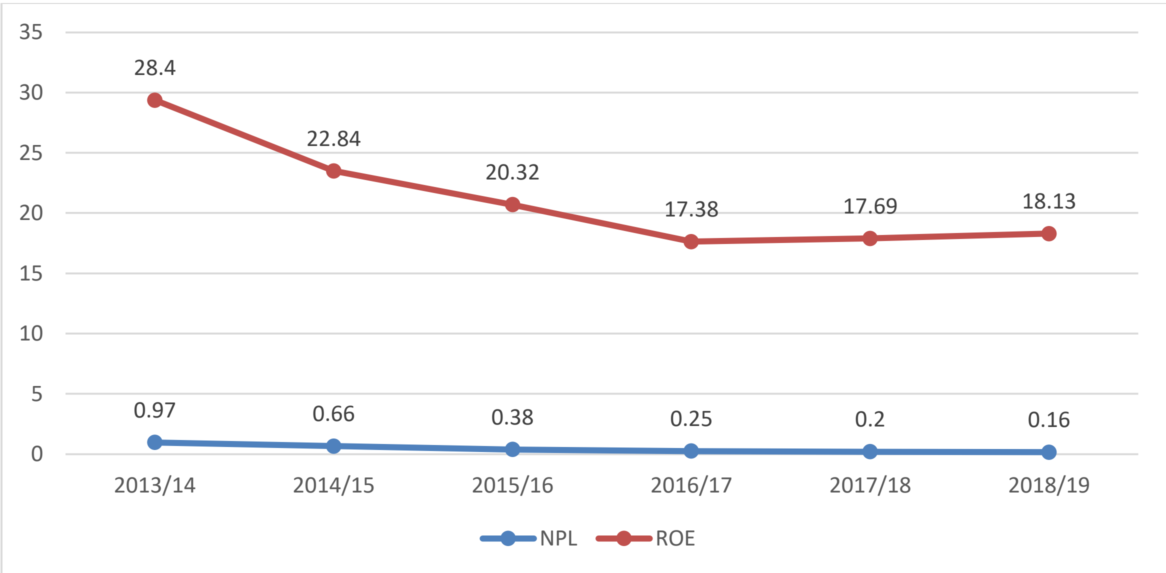


SOURCE*: Annual Report of Everest Bank.ltd*

In figure 4.7 shows the impact on non-performing loan on profitability in different years. The trend of EBL ranges from 2.25% to 1.94%. The highest figure of the profitability 2.25% in 2014.

Figure 4.8

Past Trend of NPL and ROE of Everest Bank.ltd

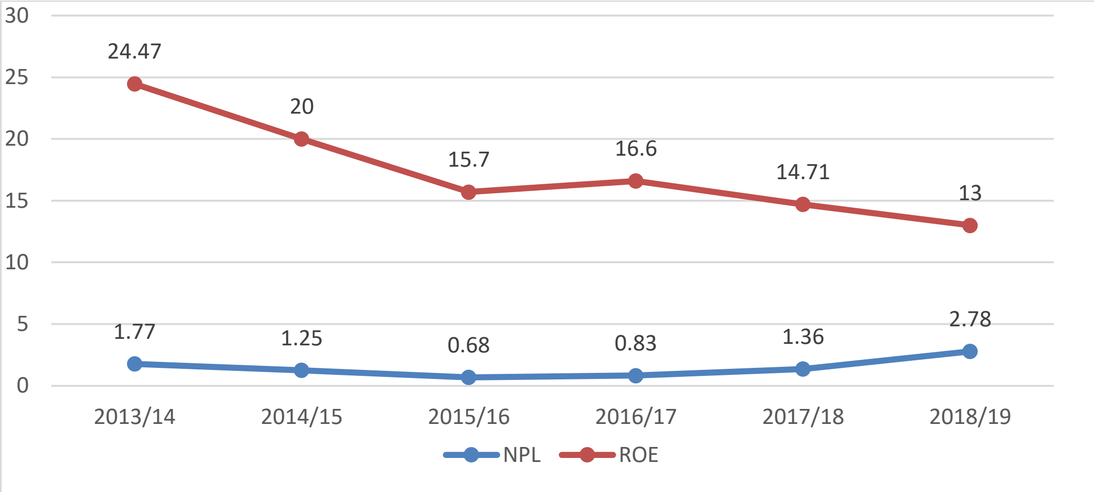


SOURCE*: Annual Report of Everest Bank.ltd*

In figure 4.8 shows the impact on non-performing loan on equity in different years. The trend of EBL ranges from 28.4% to 18.13%. The highest figure of equity 28.4% in 2014 where non-performing loan is also high.

Figure 4.9

Past Trend of NPL and ROE of Nepal Investment Bank Ltd



SOURCE*: Annual Report of Nepal Investment Bank*

In figure 4.9 shows the impact on non-performing loan on equity in different year. The trend of Nepal Investment bank ranges from 24.47% to 13%. The highest figure of the profitability 24.47% in 2013/14.

e) Regression analysis

Regression is the statistical method that is used to predict the value of the dependent variable on the base of the independent variable. This statistic is also successful in determining the relationship between dependent and independent variable. It also allows in quantifying the effect of changes in independent variable in dependent variable

Statistical Methods used in Regression analysis:

Y= a + bx

Where, y= dependent variable,

a= y-intercept, b= slope of line, and x= independent variable

Table 4.3

Regression analysis of NPL and ROA

Bank	R	R Square	Standard Error	Intercept	NPL variable	P-value
Nibl	-0.343386	0.117914	0.189553	2.15435	-0.08144	0.505166
Everest	0.552613	0.305381	0.207273	1.721342	0.383314	0.25546

Regression equation of Nepal Investment Bank is, y = 2.15435 – 0.08144x

Regression equation of Everest Bank is, y = 1.721342 + 0.383314x

Regression analysis applied to determine the influence of the non-performing loans ratio on the rate of return on assets. The coefficient of determination r^2 of NIBL and EBL 0.117914 and 0.305381 meaning that 11.79% and 30.53% of the variation in the rate of return on assets are explained by changes in the non-performing loan ratio. R Square of NIBL is low because relation between NPL and ROA insignificant and R Square of EBL is moderate because relation between NPL and ROA significant.

Pool cross section analysis of ROA and NPL of Nepal Investment Bank. Ltd and Everest Bank. Ltd

Pool cross section is statistical method in which the variables of two unit of study are merged to eliminate the error of small sample unit. Here the data of Nepal Investment Bank ltd and Everest Bank ltd are merged to make the 12 unit of period and regression analysis is done.

Table 4.4

Pool Cross Regression Analysis

R	R square	Standard error	Intercept	NPL variable	P-value
0.230664	0.053206	0.212038	1.904303	0.062632	0.470741

Regression equation, y = 1.904303 + 0.062632x

Table 4.5

Regression Analysis of NPL and ROE

Bank	R	R square	Standard error	Intercept	NPL variable	P-value
Nibl	-0.129997	0.016899	4.620657	18.44205	-0.71192	0.806102
Everest	0.979921	0.960246	0.949167	15.06854	13.01089	0.000601

Regression equation of Nepal Investment Bank is, y = 18.44205 - 0.71192x

Regression equation of Everest Bank is, y = 15.06854 + 13.01089x

Regression analysis applied to determine the influence of the non-performing loans ratio on the rate of return on equity. The coefficient of determination r^2 of NIBL and EBL 0.016899 and 0.960246 meaning that 1.68% and 96.02% of the variation in the rate of return on equity are explained by changes in the non-performing loan ratio. R Square of NIBL is low because relation between NPL and ROE insignificant and R Square of EBL is high because relation between NPL and ROE significant.

Pool cross section analysis of ROE and NPL of Nepal Investment Bank. Ltd and Everest Bank. Ltd

Pool cross section is statistical method in which the variables of two unit of study are merged to eliminate the error of small sample unit. Here the data of Nepal Investment Bank Ltd and Everest Bank Ltd. are merged to make the 12 unit of period and regression analysis is done.

Table 4.6

Pool Cross Regression of NPL and ROE

R	R square	Standard error	Intercept	NPL variable	P value
-0.150609	0.022683	4.549595	19.91732	-0.86365	0.640343

Here, Regression Equation is, y = 19.91732 – 0.863665x

4.1.3 Data analysis

i. From Table 4.1, The NPL ratio is in fluctuating trend. The NPL ratio of both bank are in fluctuating trend. The NPL ratio of NIBL was 1.77% in 2013/14 and it falls to 1.25% in 20114/15 and it again falls back to 0.68% in 2015/16 but it rises to continuously for three years and in 2018/19 it was highest 2.78%. The highest NPL is encountered in the year 2018/19. Likely, there is also fluctuation in the NPL ratio of Everest bank. The NPL ratio was 0.97% in year 2013/14 and it fall back to 0.16% in 2018/19. The highest NPL is encountered in year 2013/14. Comparing the NPL of both banks, Nepal Investment bank has more NPL than EBL. Having low NPL than NIBL suggest that EBL is efficient in managing the NPL. NIBL needs to work hard and develop effective strategies to reduce NPL ratio.

ii. The average NPL ratio of Nepal investment bank in past six year is 1.445% and similarly average NPL ratio of Everest bank is 0.44%. Comparing this, Everest bank seems to have better performance, as higher the ratio means higher risk. Similarly the coefficient of variation of NPL of NIBL and Everest bank are 56.67295 and 72.88336 respectively. This shows that Everest bank has more fluctuation in NPL than NIBL. Having less NPL ratio Everest seems to have sound credit policy and loan appraisal system.

iii. From Table 4.2, The correlation analysis gives an idea of the strengths and direction of a linear relationship between the independent variables and movement of the dependent variable. The correlation coefficient between NPL and loan of NIBL bank is 0.74647. It indicates that there is positive relationship between NPL loan and loan. With the rise in loan, NPL also rises. The coefficient of determination is 0.55721. The value of calculated p is greater than level of significance, which indicates that at 5%level of significance, the relation between loan and NPL is insignificant.

iv. From Table 4.2, the correlation coefficient between NPL and loan of Everest bank is -0.86571. It indicates that there is negative relationship between NPL loan and loan. With the rise in loan, NPL does not rises. The coefficient of determination is 0.74946. The value of calculated p is less than level of significance, which indicates that at 5%level of significance, the relation between loan and NPL is significant.

v. From Table 4.3, the correlation coefficient between NPL and ROA is negative -0.3433. It indicates that there is negative correlation between NPL and ROA. It suggests that NPL and ROA are not moving in the same direction. The value of R square is 0.117914. It suggests that only 11.79% of the variance in ROA is defined by NPL. This shows there is insignificance amount of influence in

ROA. Adjusted R square is more accurate to the sample. The standard error in the table suggests that variability in the predicted ROA value and actual ROA value. The standard error is 0.189, which that there could be more difference in the actual and predicted value of R. The significance value of ‘p-value’ is 0.505166 which is higher than the value of alpha (0.05). It suggests that is insignificant relation between ROA and NPL. NPL is not able to predict the value of ROA. Similarly, the value of y-intercept is 2.154 which mean that the average value of ROA will be 2.154% if NPL equals to zero. The slope of regression equation is -0.0814 which indicates that with every unit change in NPL leads to decrease in ROA by 0.08144.

vi. In the case of Everst bank, the value of R= 0.552613 means that the correlation coefficient between NPL and ROA is 0.5526 It indicates that there is positive correlation between NPL and ROA. It suggests that NPL and ROA are moving in the same direction. The value of R square is 0.305381. It suggests that only 30.53% of the variance in ROA is defined by NPL. This shows there is significance amount of influence in ROA. The standard error in the table suggests that variability in the predicted ROA value and actual ROA value. The standard error is 0.207273 which that there could be more difference in the actual and predicted ROA. The significance P-value is 0.25546 which is higher than the value of alpha (0.05). It suggests that is insignificant relation between ROA and NPL. NPL is not able to predict the value of ROA. Similarly, the value of y-intercept is 1.721342 which means that the average value of ROA will be 1.72% if NPL equals to zero. The slope of 0.383314 explains that the expected change in ROA is 0.3833 for the per unit change in NPL.

vii. From Table 4.4, the value of R = 0.0230664 indicates that there is positive correlation between ROA and NPL. When NPL and ROA are moving in the same direction. The coefficient of determination is 0.053206 which indicates that 5.32% variability in ROA is determined NPL. The intercept is 1.904303 which indicate that when NPL zero the value of ROA will be 1.904303. The slope of regression equation is 0.062632 which explains that the expected change in ROA is 0.06263 for the per unit change in NPL .The value of P is 0.470741 which is higher than value of alpha 0.05 which indicates that the relation between ROA and NPL is insignificant.

viii. From Table 4.5, the value of R = - 0.129997, indicates that there is negative correlation between ROE and NPL. When NPL is increasing ROE is decreasing and when NPL is decreasing ROE is increasing. The coefficient of determination is -0.13, which indicates that the variability in ROE is not determined by NPL. The intercept is 18.44205, which indicate that when NPL zero the value of ROE will be 18.44. The slope of regression equation is -0.71192 which indicates that with every unit change in NPL leads to decrease in ROE by 0.71192. The value of P is 0.806102 which is more than value of alpha 0.05 which indicates that the relation between ROE and NPL is insignificant.

ix. From Table 4.5, the value of R = 0.979921, indicates that there is positive correlation between ROE and NPL. NPL and ROE are moving in the same direction. The coefficient of determination is 0.960246, which indicates that the 96.60% variability in ROE is determined by NPL. The intercept is 15.06854, which indicate that when NPL zero the value of ROE will be 15.06854. The slope of regression equation is 13.01089 which explains that the expected change in ROE is 13.01089 for the per unit change in NPL. The value of P is 0.000601 which is less than value of alpha 0.05 which indicates that the relation between ROE and NPL is significant.

x. From Table 4.6, the value of R = - 0.150609, indicates that there is negative correlation between ROE and NPL. When NPL is increasing ROE is decreasing and when NPL is decreasing ROE is increasing. The coefficient of determination is 0.022683, which indicates that the variability in ROE is not determined by NPL. The intercept is 19.91732, which indicate that when NPL zero the value of ROE will be 19.91732. The slope of regression equation is -0.86365 which indicates that with every unit change in NPL leads to decrease in ROE by 0.86365. The value of P is 0.600343 which is more than value of alpha 0.05 which indicates that the relation between ROE and NPL is insignificant.

4.1.4 Major findings

The study is successful to find the major issues related with the study. The major focus of the study was NPL. Non-performing loan carries significant threat to commercial bank as it can erode the capital. NPL management is the top priority of bank. The study was conducted to examine the non-performing loan of commercial bank with reference to NIBL Bank and Everest Bank Limited.

The analysis of the data has helped to come to the major conclusion. Analysis of the data using different statistical and financial tools is done. The study shows that the NPL ratio is in fluctuating trend. There is increase and downfall of the NPL ratio in this six year period. There is positive correlation between loan and NPL amount. Both are moving in the same direction. The least square method used in forecasting NPL amount in five year period shows that the amount of NPL is increasing with every unit increase in the year. Similarly, the Regression model used for the studying the impact of NPL on profitability of bank shows that there is minimal influence of the NPL on the return on assets. The NPL ratio is insignificant is studying the impact on profitability.
The major findings are summarized in the given table:

Table 4.7

Summary of Major findings

SN	Issues	Findings
1.	Trend of NPL	1. The value of NPL is in fluctuating trend in six year period. Major fluctuation is seen in Nepal Investment Bank.ltd than Everest Bank.ltd. 2. The value of NPL is more of NIBL than Everest Bank. This shows that Everest Bank.ltd have sound credit policy and loan appraisal system. 3. In the classification of NPL the amount of loan loss has big amount. Doubtful and substandard loan has also significant amount. This shows that the default loan is more for period greater than 1 year.
2	Correlation Between loan	**1.** The correlation between loan and

	and NPL	NPL of NIBL are positive and EBL are negative. It indicates that there is a positive and negative relationship between loans. **2.** The relation between loan and NPL of NIBL is insignificant as the calculated value of p is greater than alpha value. **3.** The relation between loan and NPL of Everest bank is significant as the calculated value of p is less than the alpha value.
3.	Impact of NPL on Profitability	1. In the single unit analysis, there is positive and negative correlation between NPL and ROA. It indicates that both are not moving in the same direction. 2. The relation between NPL and ROA is insignificant. It suggest that only independent variable NPL cannot define ROA 3. The impact of NPL on ROA is determined by the slope of 0.062632. 4. The value of ROA will be 1.904303 when the value of NPL is equal to zero. 5. To eliminate the error of sample, point cross method is used. The correlation between NPL and ROA is found positive. The relation between the ROA and NPL is found insignificant. 6. In the single unit analysis there is also positive and negative correlation between NPL and ROE. ROE of EBL

		is positive and relation between them is significant. In the case of NIBL is insignificant. 7. To eliminate the error of sample, point cross method is used. The correlation between NPL and ROE is found negative. The relation between the ROA and NPL is found insignificant 8. The impact of NPL on ROE is determined by the slope of -0.86365. 9. The value of ROE will be 19.91732 if the value of NPL equals to zero.

As this study was carried out with 27 commercial banks of Nepal having aims to explain non-performing loan of selected commercial banks, the researcher used scientific methods, of classifying and analyzing data.

Some of the results of the study are found matched with the findings of previous studies. For example, correlation between loan and NPL of banks are positive as in the research of (Shrestha, & Chowdhury, 2006). This study helps to find out there is increasing trend of NPL in commercial bank. This finding is supported by (Golcha, 2007). There is positive relation between NPL and loan. Loan and advances and NPL are moving in the same direction. The finding is consistence with the research of (Khadka, 2004). Another finding that this research revealed supports the previous research carried out by (Sherpa, 2016) is commercial banks are giving their whole effort in managing non-performing loan. As there is increasing trend of NPL, there is possibility of major threat to commercial banks.

4.2 Discussion

The study focuses on the study of non-performing loan with reference to Nabil bank ltd and Everest bank ltd. For this purpose, descriptive, analytical, and comparative research design is used. Secondary data has been used for analysis. Data are collected from annual report, journals and related thesis article. The data collected from different sources are presented table, graphs, and figures. Statistical and financial tools are used for data analysis. The data of five consecutive years have been taken for analysis. The study overall examines the non-performing loan of commercial bank.

(Khadka, 2004) concluded that the level of NPL of EBL seems lesser than all other banks. Similarly, Nepal SBI Bank stands at second and Standard Chartered Bank stands at third respectively. The position of NIBL seems quite considerable (unsatisfactory) because the bank has been growing its NPL every year.

The existence of significant NPA levels prior to the FSRP program pointed to fragility in the domestic financial system. The reduction in NPA levels of NBL and RBB as well as commercial banking sector as a whole can be taken as one of the success measures of FSRP process among others such as formulation of different acts, strengthening regulation and supervision of financial institutions at NRB and movement towards compliance of Basel II accord among others. He examined the development of the Nepalese financial system and concluded that despite significant financial deepening in the context of financial liberalization and integration with the external economy, there is still scope for geographically balanced financial development and finally suggested for the need of formulation of a master plan to strengthen the Nepalese financial system (Maskay, 2009).

This study helps to find out there is increasing trend of NPL in commercial bank. This finding is supported by (Golcha, 2007). There is positive relation between NPL and loan. Loan and advances and NPL are moving in the same direction. The finding is consistence with the research of (Khadka, 2004). Another finding that this research revealed supports the previous research carried out by (Sherpa, 2010) is commercial banks are giving their whole effort in managing non-performing loan.

In previous studies the value of NPL and loan is increases in alarming rate but now past five-year fiscal year loan increases as NPL decreases shown by this study. Different commercial banks between NPA and ROA and between NPA and ROE indicates that there is inverse relation between NPA and ROA as well as between NPA and ROE. It means the level of NPA effect the return on assets and return in shareholder's equity. Therefore, banks should reduce their level of NPA to increase the ROE and ROA.

CHAPTER 5

SUMMARY AND CONCLUSION

The study is carried out to explore the impact of NPL on ROA and ROE. It has widespread implications for loan sanctioning procedure of the financial institutions. The issue of NPLs has always remained an issue of great importance for the banking sector literature. Prior studies examined various external factors of the banks which proved to have enormous effect on the quantum of NPLs. Conversely, this study aimed at exploring the bank specific procedural aspects which ultimately affects the level of NPLs

The previous chapter data analysis been carried out accordingly to assist in finding of the study. This part contains the brief overview of the introduction, review of related methodology, findings of the study which assists in drawing the inferences from the findings that will lead to certain conclusions and generalizations.

5.1 Summary

Non-performing loan (NPL) is major problem in banking industry. It has play major role for making profit and bank success or failure. The study has examined the effects of non-performing loan on profitability of commercial banks in Nepal with pane data collected from two commercial banks of six years from 2013/14 to 2018/19 period with the total observations twelve. The correlation, multiple regression and bar diagram model has been used to analysis of the data. The pooled ordinary least square model, fixed effect model and descriptive effect model has effect has been employed to analyzed profitability. The profitability measure by return on equity (ROE) and return on assets (ROA) taken as dependent variable whereas non-performing loan (NPL) is independent variable. The result revealed that the NPL have significant negatively associated with ROE and positively associated with (ROA). The study concluded that among study variable NPL and SIZE have major role to determine profitability. However, the effect of non-performing loan on profitability very strong. The bankers have sincerely take for the over 90 day's dues. It rational effect of national economy too.

5.2 Conclusion

One of the major bank assets is loan and advances to the customer. Effective management of loan portfolio is challenging task for a banker. The reason behind NPL is not the inadequate amount of deposits from customer, but poorly managed loan portfolio. Ineffective credit appraisal and change in the credit policy results in the heavy amount of non-performing loan.

Banking sector plays an important role in the economic development of a country. This is mostly pronounced in the realm of financial sector. The increasing trend of NPL in Nepalese sector is creating the less efficiency in the operation of bank. Inadequate credit policy, political pressure, carelessness of customer is some of the reason behind the growing NPL.

The study conducted in NPL analysis helps to find out that there is increasing trend of NPL in commercial bank. The NPL is increasing with higher amount. It is necessary for a bank to take prompt action. The study also shows that there is positive relation between loan and NPL. With the increase in loan and advances, NPL is also increasing. NPL and ROA are also in increasing trend. Classification of NPL can be done in doubtful, substandard and loan loss. Loan loss amount consist of heavy figure. Substandard and doubtful debt also have significant amount.

NPL's impact can be seen both on balance sheet and income statement. With the increase in NPL, certain portion of this regarded as a loan loss provision. Loan loss provision is deducted as expenses from operating income. It cause in decrease in the net profit in the bank. Similarly allowance for loan is deducted from the capital. If the trend of NPL goes on increasing in no time existing capital can erode.

Commercial bank is trying to control the NPL by following various major. All the commercial bank complies with the rules and regulation, principles of Basel committee on banking and supervision. Credit and monitoring department is regulated for the pre and post monitoring of credits. Credit officer are accountable by all the credit related documents. Security documents, General Documents, Credit appraisal Report, Collateral valuation report are necessary documents required. Timely monitoring of these documents is necessary.

Commercial bank should give their whole effort in managing the non-performing loan. As there is increasing trend of NPL, there is possibility of major threat to commercial bank. The positive relation between NPL and loan shows that bank should be cautious enough in giving loan. They should make necessary documentation and verification so that the loan will be performing. With the increase in loan, the NPL ratio should be decreased. NPL ratio can be decreased by two ways. Decreasing NPL in given loan can decrease NPL ratio. Similarly, increasing loan and given NPL can decrease NPL ratio. Bank should be able to decrease NPL and increase loan and advances.

Major conclusion from the study can be listed in the following points:

i. The ratio analysis of NPL ratio shows, there is fluctuation in the value of NPL. The reason behind the fluctuation in NPL ratio is increase in loan amount. The NPL ratio has decreased in the recent years.

ii. There is positive relation between NPL and loan. Loan and advances and NPL are moving in the same direction. When the loan and advances increases, NPL also increases. When the loan and advances decreases, NPL also decreases.

iii. NPL and ROA are tested using the regression analysis. The positive value of coefficient indicates that both are moving in the same direction. There is significant relation between NPL and ROA.

iv. NPL and ROE are tested using the regression analysis. The negative value of coefficient indicates that both are moving in the opposite direction. There is insignificant relation between NPL and ROE.

v. Classification of NPL is done into substandard loan, doubtful loan, and loan loss. Loan loss covers the major portion of NPL. Substandard and Doubtful debt also covers the significant amount of NPL.

vi. Commercial banks are giving their whole effort in managing the non-performing loan. As there is increasing trend of NPL, there is possibility of major threat to commercial bank. The positive relation between NPL and loan shows that bank should be cautious enough in giving loan. They should make necessary documentation and verification so that the loan will be performing.

vii. All the commercial bank complies with the rules and regulation, principles of Basel committee on banking and supervision. Credit and monitoring department is regulated for the pre and post monitoring of credits. Credit officer are accountable by all the credit related documents. Security documents, General Documents, Credit appraisal Report, Collateral valuation report are necessary documents required. Timely monitoring of these documents is necessary.

5.3 Implication

Based on the study and findings, following points can be recommended as an action implication.

i. To become successful bank, banker must be able to utilize the deposit effectively. Loan and assets compromise of major assets of bank. It is the risky assets of bank but the profitability generated from these assets are higher. It is necessary for a bank to make their loan as performing assets. Liberal lending policies is necessary for a bank to increase the loan and decrease the non-performing loan.

ii. The positive relation between NPL and loan shows that bank should be cautious enough in giving loan. They should make necessary documentation and verification so that the loan is performing. With the increase in loan, the NPL ratio should be decreased. NPL ratio can be decreased by two ways. Decreasing NPL in given loan can decrease NPL ratio. Similarly, increasing loan and given NPL can decrease NPL ratio. Bank should be able to decrease NPL and increase loan and advances.

iii. Bank should review the credit department operation. The staffs need to train and the system of checking and analyzing the loan portfolio should be revised. Any error found in the system operation need to be managed immediately.

iv. Bank should be sensitive to the external movement such as change in interest rates, exchange rate changes, changes in the policy of NRB, inflation, and other business cycles.

v. The major reason behind the NPL is insufficient collateral, poor credit appraisal. Collateral valuation document should be monitored time and again. If the loan amount exceeds to the loaning power, it should be recommended to the immediate supervisor. Lending policy should be revised time and again. The acts such as pledge and lien need to be done.

vi. The major reason behind NPL is carelessness from the side of customer. Customer is not using the loan amount for the same purpose that has been borrowed. In rural area, people are taking agriculture loan and utilizing the money in marriage, education, and so on. In doing so people are not able to pay the loan back, as their source of income has not been flourished. This problem can be sort out by giving proper guidance to the customer in utilizing the loan amount. Small seminar can be conducted by the bank in making people aware of investing and utilizing the fund.

vii. Credit intelligence bureau need to be sound. Timely delivering of information and managed information system is necessary for bank to track the detail information about loan and default loan. Credit department system should be sound and healthy.

viii. Legal mandatory requirement should be maintained by bank. Proper classification of loan, loan should be extended within the capital and deposit limit. Liquidity ratio should be maintained.

5.3.1 Implication for further research

i. This study only reveals the trend of non-performing loan few selected commercial banks only. Further researches can be carried out using large sampling to other developmental banks too.

ii. As this study is limited to the analysis of secondary data future researches can be done using primary data which may yield different result.

iii. Many researches can be done on importance of NPL for commercial banks.

iv. As this study covers commercial banks in Nepal, it doesn’t consider financial institutions and other sectors to provide a more broad-based analysis. It is also recommended to research NPL of other financial institution of Nepal except commercial banks.

References

Adeola, O., & Ikpesu, F. (2017). Macroeconomic determinants of non-performing loans in nigeria: an empirical analysis. *The journal of developing areas*, *51*(2), 31-43.

Adhikary, D. K., Pant, R., & Dhungana, B. R. (2007). *Study on financial sector reform in Nepal*. Prepared for south Asian network of economic institutes (SANEI). Institute of development Economics. Quaid –i-Azam University, Islamabad, Pakistan.

Ahmed, J. Ud-Din. (2010). An empirical estimation of loan recovery and asset quality of commercial banks. *The north eastern hill university (NEHU) indian journal,* 8(1).

Akter, R., & Roy, J. K. (2017). The impacts of non-performing loan on profitability: An empirical study on banking sector of Dhaka stock exchange. *International journal of economics and finance*, *9*(3), 126-132.

Alexandri, M. B., & Santoso, T. I. (2015). Non-performing loan: Impact of internal and external factor (Evidence in Indonesia). *International journal of humanities and social science invention*, *4*(1), 87-91.

Barth, (2004). Bank regulation and supervision: what works best? *Journal of Financial intermediation*, *13*(2), 205-248.

Bharat, S.B. Khattri, B, Khadka, K. (2016). *Determinants of non-performing loan: case of nepalese commercial banks*. Kathmandu. Retrieved From https://www.academia.edu

Bhattarai, S. (2015). Determinants of non-performing loan in Nepalese commercial banks. *Economic journal of development issues, 20(19),* 22-38.

Bhetuwal, K.R. (2005). *Assessing the effectiveness of financial sector reforms in Nepal*. Faculty of Arts. Vadodara: Maharaja Sayajirao University of Baroda,

Bholat, D., Lastra, R. M., Markose, S. M., Miglionico, A., & Sen, K. (2016). Non-performing loans: *Regulatory and accounting treatments of assets*.

Borio, C., & Lowe, P. (2002). *Assessing the risk of banking crisis*. BIS Quarterly Review, 43 – 54

Brose, P.N. (2016). The study of Effect of Non-Performing Assets (NPAs) on Return on Assets (ROA) of Major Indian Commercial Bank. Pune: *International journal in management and social science*. Retrieved From ttps://www.academia.edu

Chhetri, D.B. (2007). *Non-performing assets: need for rationalization. Kathmandu: nepal rastra samachar*. Retrieve from https://www.nrb.org.np

Chaudhary, I. (2002). A study of non-performing assets of commercial banks and its recovery in India. *International journal of research and analytical reviews*, *5*(2), 1365-1373.

Dash, M. K., & Kabra, G. (2010). The determinants of non-performing assets in Indian commercial bank: An econometric study. *Middle eastern finance and economics*, 7, 94-106. Extracted from http://www.swatee.org/swatee-in-Media

Everest Bank Limited. (2006 to 2016). *Annual report.* Kathmandu: Retrieved From https://www.everestbank.com.np/

Fan, L., & Shaffer, S. (2004). Efficiency versus risk in large domestic US banks. *Managerial finance*.

Farhan, M., Sattar, A., Chaudhary, A.H., & Khalil, F. (2012). Economic determinants of non-performing loans: Perception of Pakistani bankers. *European journal of business management* 4 (12), 87-99

Golcha, H. (2007). NPAs at Nepalese Finance Sector .Kathmandu. New Business Age: *Abhiyan publication pvt.ltd*., Nepal.

Ikram, A., Su, Q., Ijaz, F., & Fiaz, M. (2016). Determinants of non-performing loans: An empirical investigation of bank-specific microeconomic factors. *Journal of applied business research (JABR)*, *32*(6), 1723-1736.

Kaur, K., & Goyal, B. (2011). Non-performing assets of public and private sector banks (a comparative study). *South asian journal of marketing & management research, 1*(3), 54-72.

Khadka, Dinesh Kumar (2004). *Non-performing assets of nepalese commercial banks*. An Unpublished Master Degree Thesis Submitted to Shanker Dev Campus, Kathmandu, T.U

Khan, M. A., Siddique, A., & Sarwar, Z. (2020). Determinants of non-performing loans in the banking sector in developing state. *Asian journal of accounting research*, *5*(1), 135-145.

Khan, M. Y., & Bishnoi, T.R. (2001). Banking crisis and financial reforms: Lessons for India. *Chartered secretary, 75(4)*, (44 – 48)

Klein, N. (2013). Non-Performing Loans in CESEE. *Determinants and impact on macroeconomic performance*, International Monetary Fund, (72), 1-27.

Malimi, K. (2017). The influence of capital adequacy, profitability, and loan growth on non-performing loans a case of Tanzanian banking sector. *International journal of economics, business and management studies*, *4*(1), 38-49.

Mankiw, N. G. (2011). An Exploration of Optimal Stabilization Policy. *Brookings papers on economic activity*, *2011*(1), 209-249.

Manz, F. (2019). Determinants of non-performing loans: What do we know? A systematic review and avenues for future research. *Management review quarterly*, *69*(4), 351-389.

Maskay, N. M., & Subedi, S. R. (2009). Development of Nepalese Financial System: *Need for the formulation of a master plan*. Economic Review, *21*, 31-51

Nabil Bank Limited. (2006 to 2016). *Annual report. Kathmandu*: Author. Retrieved From https://www.nabilbank.com.np

Nepal Rastra Bank. (2015). *Unified directives 2015*. Kathmandu. Retrieved from https://www.nrb.org.np

Neupane, B. P., (2009). Profibality Determinants of Nepalese Commercial Banks. *Press academia procedia, 12*(1), 40-45.

Nsobilla, T. (2016).*The effect of non-performing loan on the financial performance of selected bank in GHANA*. Retrieve From https://www.academia.edu

Pandey, U.R. (2016). *A study on non-performing loan of commercial banks*. An Unpublished Master Degree Thesis, Submitted to Faculty of Management, Shanker Dev Campus, T.U. Kathmandu.

Peter, S. R. and Hydgins, S.C. (2015).*Bank management and financial service*s: McGraw Hill Publication India.

Pradhan, Kumar (2006). *A study on non-performing assets of commercial banks in nepal.* An Unpublished Master Degree Thesis Submitted to Shanker Dev Campus, Kathmandu, T.U

Pradhan, R. S., & Shrestha, R. (2016). Impact of bank specific and macroeconomic variables on the performance of commercial banks of Nepal. *Available at SSRN 2793530*.

Rahaman, & Akhter, (2019). Bank-specific factors influencing profitability of Islamic banks in Bangladesh. *Journal of business and technology (dhaka)*, *10*(1), 21-36.

Rajan, R., & Dhal, S. C. (2003). Non-performing loans and terms of credit of public sector banks in India: An empirical assessment. *Reserve bank of india occasional papers*, *24*(3), 81-121.

Rajaraman, I., & Vashistha, G. (2002).Non-performing loans of Indian public sector banks – Some panel results. *Economic & political weekly*, 37, 429-435.

Richard, E. (2011). Factors that cause Non-performing loans in commercial banks in Tanzania and strategies to resolve them. *Journal of management policy and practice*, 12(7), 50-58.

Rose, P.S., & Hudgins, S.C. (2010) *Bank management and financial services*. India, Delhi: Tata McGraw-Hill Education Private Limited.

Sana, A., Fayaz, M., & Ullah, R. (2019). Linking Non-Performing Loans with Organizational Performance: Evidence from Banking Sector of Pakistan. *Global economics review, 4*(4), 35-44.

Sapkota, C. (2011). Nepalese banking crisis explained. *Journal of institute of chartered accounts of nepal, 13*(4), 16-20.

Serrano, A. S. (2020). The impact of non-performing loans on bank lending in Europe: An empirical analysis. *The north american journal of economics and finance*, 101312.

Sharifi, O., & Akhter, J. (2016). Performance of banking through credit deposit ratio in public sector banks in India. *International journal of research in management & technology, 6*(4), 14-18.

Sherpa, P.D. (2016). *A study on non-performing loan management of commercial banks.*An Unpublished Master Degree Thesis, Submitted to Faculty of Management, ShankerDev Campus, T.U. Kathmandu

Shrestha, M. B., & Chowdhury, K. (2006). *Financial liberalization index for nepal. 41*

Singh, V. R. (2016). A Study of Non-Performing Assets of Commercial Banks and it's recovery in India. *Annual research journal of scms, pune, 4*, 110-125.

Srivastava, V. (2015). *A study on non-performing assets of indian bank*. Delhi. Retrieve from https://www.academia.edu

Thapa, M., Phuyal, R. K., & Regmi, R. R. (2017). Determinants of Employee Performance in Commercial Banks of Nepal. *Advances in economics and business management (AEBM)*, *4*(8), 540-544.

Timilsina, N. (2017). *Determinant of bank lending*. Kathmandu: Nepal Rastra Samachar. Retrieve from https://www.nrb.org.np.

Ugoani, J. (2016). Nonperforming loans portfolio and its effect on bank profitability in Nigeria. *Independent journal of management & production, 7*(2).

Vatansever, M., & Hepsen, A. (2013). Determining impacts on non-performing loan ratio in Turkey. *Journal of finance and investment analysis*, *2*(4), 119-129.

Wallich, C. I. (2006). Status of Non-Performing Loans in Banking Sector in Bangladesh, *(4)*1.

APPENDICES

APPENDIX 1

Calculation of Mean, Standard Deviation, and Coefficient of Variation

Year	NPL Nepal Investment Bank	NPL Everest Bank
2013/14	1.77	0.97
2014/15	1.25	0.68
2015/16	0.68	0.38
2016/17	0.83	0.25
2017/18	1.36	0.20
2018/19	2.78	0.16
Mean	1.1445	0.44
S.D	0.761124	0.320687
C.V	56.67295	72.88336

APPENDIX 2

Classification of NPL of Nepal Investment Bank.ltd

NPL	2015	2016	2017	2018	2019
Substandard	68586	19151	74058	931982	645594
Doubtful	82712	13610	188405	56283	1163547
Loan loss	692834	560230	625697	676962	1831860
Total NPL	844132	592991	888160	1665227	3641001

APPENDIX 3

Classification of NPL of Everest Bank.ltd

NPL	2015	2016	2017	2018	2019
Substandard	66626	13186	2490	5881	67205
Doubtful	32271	10210	1849	2912	9648
loan loss	268268	241026	194566	158363	100405
Total NPL	367165	264422	198905	187716	177258

APPENDIX 4

Calculation of Correlation between Loan and NPL of Everest Bank.ltd

Year	loan(x)	NPL(y)	x2	y2	Xy
2014/15	54482	367	2968288324	134689	19994894
2015/16	67955	264	4617882025	69696	17940120
2016/17	77287	198	5973280369	39204	15302826
2017/18	94069	187	8848976761	34969	17590903
2018/19	111695	177	12475773030	31329	19770015

SUMMARY OUTPUT

Regression Statistics	
Multiple R	-0.865719
R Square	0.749469
Adjusted R Square	0.665959
Standard Error	45.90821
Observations	5

ANOVA

	df	*SS*	*MS*	*F*	*Significance F*
Regression	1	18914.51	18914.51	8.974584	0.057864
Residual	3	6322.691	2107.564		
Total	4	25237.2			

	Coefficients	*Standard Error*	*t Stat*	*P-value*
Intercept	487.9906	85.74212	5.691375	0.010753
X Variable 1	-0.00308	0.001027	-2.99576	0.057864

APPENDIX 5

Calculation of Correlation of NPL and loan of Nepal Investment Bank.ltd

Year	loan(x)	NPL(y)	X^2	Y^2	xy
2014/15	66219	884	4384955961	781456	58537596
2015/16	85461	592	7303582521	350464	50592912
2016/17	104624	888	10946181380	788544	92906112
2017/18	120825	1665	14598680630	2772225	18023625
2018/19	127141	3641	16164833880	13256881	462920381

SUMMARY OUTPUT

Regression Statistics	
Multiple R	0.74647
R Square	0.557218
Adjusted R Square	0.409624
Standard Error	959.455
Observations	5

ANOVA

	df	*SS*	*MS*	*F*	*Significance F*
Regression	1	3475408	3475408	3.775345	0.147275
Residual	3	2761662	920553.9		
Total	4	6237070			

	Coefficients	*Standard Error*	*t Stat*	*P-value*
Intercept	-2204.17	1967.143	-1.12049	0.344115
X Variable 1	0.036986	0.019035	1.943025	0.147275

APPENDIX 6

Regression Analysis of NPL and ROA of Nepal Investment Bank. ltd

Year	NPL	ROA
2013/14	1.77	2.3
2014/15	1.25	1.9
2015/16	0.68	2
2016/17	0.83	2.1
2017/18	1.36	2.13
2018/19	2.78	1.79

SUMMARY OUTPUT

Regression Statistics	
Multiple R	-0.343386
R Square	0.117914
Adjusted R Square	-0.10261
Standard Error	0.189553
Observations	6

ANOVA

	df	*SS*	*MS*	*F*	*Significance F*
Regression	1	0.019212	0.019212	0.534705	0.505166
Residual	4	0.143721	0.03593		
Total	5	0.162933			

	Coefficients	*Standard Error*	*t Stat*	*P-value*	*Lower 95%*	*Upper 95%*
Intercept	2.15435	0.178576	12.06406	0.000271	1.658544	2.650156
X Variable 1	-0.08144	0.111376	-0.73123	0.505166	-0.39067	0.227786

APPENDIX 7

Regression Analysis of NPL and ROA of Everest Bank.ltd

fiscal year	NPL	ROA
2013/14	0.97	2.25
2014/15	0.68	1.85
2015/16	0.38	1.61
2016/17	0.25	1.72
2017/18	0.2	1.97
2018/19	0.16	1.94

SUMMARY OUTPUT

Regression Statistics	
Multiple R	0.552613
R Square	0.305381
Adjusted R Square	0.131726
Standard Error	0.207273
Observations	6

ANOVA

	df	*SS*	*MS*	*F*	*Significance F*
Regression	1	0.075551	0.075551	1.758549	0.25546
Residual	4	0.171849	0.042962		
Total	5	0.2474			

	Coefficients	*Standard Error*	*t Stat*	*P-value*	*Lower 95%*	*Upper 95%*
Intercept	1.721342	0.152761	11.2682	0.000353	1.297209	2.145475
X Variable 1	0.383314	0.289053	1.326103	0.25546	-0.41923	1.185853

APPENDIX 8

Point cross regression analysis of NPL and ROA

YEAR	SN	NPL	ROA
2013/14	1	1.77	2.3
2014/15	2	0.25	1.9
2015/16	3	0.68	2
2016/17	4	0.83	2.1
2017/18	5	1.36	2.13
2018/19	6	2.78	1.79
2013/14	7	0.97	2.25
2014/15	8	0.687	1.85
2015/16	9	0.38	1.61
2016/17	10	0.25	1.72
2017/18	11	0.2	1.97
2018/19	12	0.16	1.94

SUMMARY OUTPUT

Regression Statistics	
Multiple R	0.2306637
R Square	0.0532058
Adjusted R Square	-0.0414737
Standard Error	0.212038
Observations	12

ANOVA

	df	*SS*	*MS*	*F*
Regression	1	0.025266	0.025266	0.561957
Residual	10	0.449601	0.04496	
Total	11	0.474867		

	Coefficients	*Standard Error*	*t Stat*	*P-value*	*Upper 95.0%*
Intercept	1.9043029	0.099737	19.09323	3.38E-09	2.126531
X Variable 1	0.0626317	0.083549	0.749638	0.470741	0.248791

APPENDIX9

Regression Analysis of ROE and NPL of Nepal Investment Bank.ltd

Year	NPL	ROE
2013/14	1.77	24.47
2014/15	1.25	20
2015/16	0.68	15.7
2016/17	0.83	16.6
2017/18	1.36	14.71
2018/19	2.78	13

SUMMARY OUTPUT

Regression Statistics	
Multiple R	-0.129997
R Square	0.016899
Adjusted R Square	-0.22888
Standard Error	4.620657
Observations	6

ANOVA

	df	*SS*	*MS*	*F*	*Significance F*
Regression	1	1.46804	1.46804	0.06875	0.806102
Residual	4	85.4018	21.3504		
Total	5	86.8699			

	Coefficients	*Standard Error*	*t Stat*	*P-value*	*Lower 95%*	*Upper 95%*
Intercept	18.44205	4.35307	4.23655	0.0133	6.355983	30.5281
X Variable 1	-0.71192	2.71495	-0.2622	0.80610	-8.2498	6.82601

APENDIX 10

Regression Analysis of ROE and NPL of Everest Bank.ltd

Year	NPL	ROE
2013/14	0.97	28.4
2014/15	0.68	22.84
2015/16	0.38	20.32
2016/17	0.25	17.38
2017/18	0.2	17.69
2018/19	0.16	18.13

SUMMARY OUTPUT

Regression Statistics	
Multiple R	0.979921
R Square	0.960246
Adjusted R Square	0.950307
Standard Error	0.949167
Observations	6

ANOVA

	df	*SS*	*MS*	*F*	*Significance F*
Regression	1	87.04546	87.04546	96.61862	0.000601
Residual	4	3.603672	0.900918		
Total	5	90.64913			

	Coefficients	*Standard Error*	*t Stat*	*P-value*	*Lower 95%*	*Upper 95%*
Intercept	15.06854	0.699539	21.54067	2.75E-05	13.12631	17.01077
X Variable 1	13.01089	1.323661	9.829477	0.000601	9.33582	16.68596

APPENDIX 11

Point Cross Analysis of ROE and NPL

Year	S.N	NPL	ROE
2013/14	1	1.77	24.47
2014/15	2	1.25	20
2015/16	3	0.68	15.7
2016/17	4	0.83	16.6
2017/18	5	1.36	14.71
2018/19	6	2.78	13
2013/14	7	0.97	28.4
2014/15	8	0.68	22.84
2015/16	9	0.38	20.32
2016/17	10	0.25	17.38
2017/18	11	0.2	17.69
2018/19	12	0.16	18.13

SUMMARY OUTPUT

Regression Statistics	
Multiple R	-0.150609
R Square	0.022683
Adjusted R Square	-0.07505
Standard Error	4.549595
Observations	12

ANOVA

	df	*SS*	*MS*	*F*	*Significance F*
Regression	1	4.804124	4.804124	0.232097	0.640343
Residual	10	206.9881	20.69881		
Total	11	211.7923			

	Coefficients	*Standard Error*	*t Stat*	*P-value*	*Lower 95%*	*Upper 95%*
Intercept	19.91732	2.14001	9.307117	3.06E-06	15.14908	24.68556
X Variable 1	-0.86365	1.792677	-0.48176	0.640343	-4.85798	3.130686

A COMPARATIVE STUDY OF NON-PERFORMING LOAN MANAGEMENT OF NEPALESE COMMERCIAL BANKS (WITH REFERENCE TO NIBL AND EBL)

A dissertation proposal submitted to the office of the dean, Faculty Management in partial fulfillment of the requirements for the Master's Degree

By

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1. Background of the study

In Nepal banking sector is flourishing in past few decades. Banks role in the economy of any country is very significant. They play intermediation function in that they collect money from those who have excess and lend it to others who need it for their investment. Availing credit to borrowers is one means by which banks contribute to the growth of economies. Lending represents the heart of the banking industry. Moreover, its contribution to the growth of any country is huge in that they are the main intermediaries between depositors and those in need of fund for their viable projects (creditors) thereby ensure that the money available in economy is always put to good use. Therefore, managing loan in a proper way not only has positive effect on the bank's performance but also on the borrower firms and a country as a whole. Failure to manage loans, which make up the largest share of banks assets, would likely lead to the episode of high level of non -performing loans.

Financial institution is an institution which collects funds from the public and places them in financial assets, such as deposits, loans, and bonds, rather than tangible property. To be specific, bank is a financial intermediary accepting deposit and granting loans that offers the widest menu of services of any financial institution. The various functions of banks are carrying out currency exchanges, discounting commercial notes and making business loans, offering deposits services (saving deposits), safekeeping of valuables, supporting government activities like credit, granting consumer loans, financial advising, cash management, offering equipment leasing among others (Rose & Hudgins, 2010).

Non-performing loans has been an immense issue among banking organizations and academicians because it can affect the profitability of commercial banks. Nonperforming loans ratio (NPLR) indicates how banks manage their credit risk because it defines the proportion of loan losses amount in relation to total loan amount. At the most general level, a non-performing loan (NPL) is a loan where a borrower is not making repayments in accordance with contractual obligations. In many jurisdictions and for many firms, an NPL is defined as a sum of borrowed money upon which the debtor has not made his or her scheduled payments for at least 90 days (Bholat, et al., 2016).

Commercial bank has flourished the investment in Nepalese economy. Heavy amount of investment is done by commercial bank. They formulate sound investment policies which support for the growth of the economy. It is vital role of bank to manage the loan so that they can invest properly. The major risk from non-performing loan is credit risk, liquidity risk, operating risk, earning risk, reputation risk, solvency risk, and legal risk. Loan occupies the greater portion in the assets side of balance sheet. Loan is the risky assets. The major reason behind non-performing loan is poorly managed loan portfolio. Non-performing loan reduces the liquidity of bank, credit expansion, and growth of the economic activities and along with performance of bank. Non-performing loan can even erode the existing capital (Sherpa, 2016).
NPLs are important because they affect the financial intermediation role of commercial banks which constitutes the banks' main source of their income, and ultimately, the financial stability of an economy (Klein, 2013).

As per the rule laid down by Nepal Rastra Bank those loan whose payment has not been received for 3 months or more is treated as NPL. As the over dues goes on provision of 1%, 5%, 25%, 50%, and 100% of loan amount is separated and it is treated as expenses and allocation of loan is reduced from capital. More impact of NPL is that the assets are not able to generate future income. It increases the opportunity loss to the bank. Similarly it increases the economic cost for bank to recover the money. It causes to decrease in employee morale, bank's image, and shareholder expectation (Nepal Rastra Bank, 2015).

2. Problem statement

Commercial bank being the financial institutions plays significant role by collecting deposit and lending these fund in the productive sectors as lending and investment. Economic development of the country is directly related to the volume of investment made and return obtained by the bank. Due to lack of experts to analyze the risk and return of investment and maintain optimum portfolio investment problem has become very serious for the least development country like Nepal.

Nepalese commercial banks have been facing the problem of investment in manufacturing sector. The loans are not serviced in time and there is a risk of non-recovery of principle as well, therefore most of commercial banks have switched its portfolio in less risky government securities and non-fund base loan like L/C. This has significant impact in economic growth. This has stopped economic activities in country causing reduction in Gross Domestic Product and declining employment opportunity. It impacts there may be social disorder in the country.

NPLs affect the bank's liquidity and profitability which are the main components for the overall efficiency of the bank. An increase in NPLs provision diminishes income. Again, mismatch of maturities between asset and liability create liquidity risk for the banks that deteriorate bank's overall credit rating including its image (Badar and Yasmin, 2013). Therefore, the determinants of NPLs should be given a due consideration because of its adverse effect on survival of banks. The adverse effect of NPLs is attributable to bank managers' adverse selection of its borrowers (Brownbridge, 1998). NPLs are determined by different factors such as level of GDP, inflation, unemployment, volume of deposit, return on equity, return on asset, capital adequacy, total loan, liquidity, bank size, excessive lending, interest rate and credit growth. These factors are studied by different researchers in different countries (Mileris(2012), Tomak(2013), Ahmad and Bashir(2013), Shingjerji(2013) and etc.). Though, there are a number of studies that are conducted at a global level to examine the determinants ofNPLs, most of the studies were made with reference to developed countries like Italy, Spain, Greece, Europe and USA and the like. This means, they do not explain the issues for emerging market particularly for Ethiopian case.

There is increase in the number of commercial bank during the past decade. Different regulatory measure has been made by central bank for the effective performance of the commercial bank. However, actual performances of banks have not been enhanced. The major problem faced by commercial bank these days are competitive environment, limited investment opportunities, inadequate deposits, challenge to maintain authorized capital, non-performing loan and so on. Non-performing loan is increasing in bank’s balance sheet. Granting loan against insufficient deposits, loan against undervalued collateral, ineffective credit monitoring and political pressure to the lender are the major reason behind the increasing non-performing loan. Liquidity risk, credit risk, operation risk, lost investment opportunities are some of the implication of non-performing loan.

The study is conducted to get the answer of the following question

i. What is the trend of NPL, Loan and advances of Everest bank limited and Nepal Investment Bank limited?
ii. What is the impact of non- performing loan on profitability?

3. Objectives of study

The major objective of the study is to examine the non-performing loan of Everest Bank limited and Nepal Investment Bank limited. The specific objectives of the study are:

i. To analyze the efficiency of management on loan recovery.
ii. To examine the relationship between total loan and NPL.
iii. To examine the impact of non-performing loan on financial profitability of selected bank.

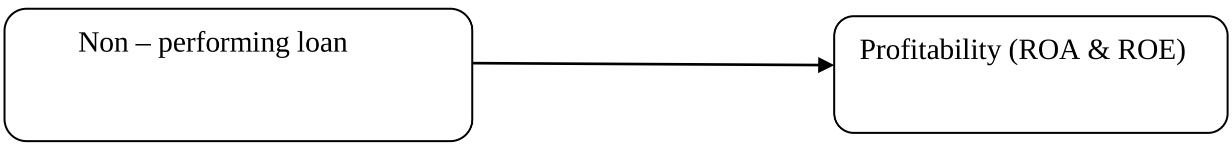
4. Conceptual framework

The diagrammatic representation of conceptual framework shows how the variables were related. Loan/advances and loan appraisal system are independent variables; loan default of loan repayment is dependent variable which depends on the occurrences of the said independent variables. The dependent variable of this study was loan default which was influenced by various independent variables.

Figure 2.1

Diagrammatical representation of conceptual framework

Independent variable Dependent variable



Loan policies are believed to influence default of loans to a great extent. Well formulated loan policies are believed to have inversely proportional relationship with loan default. Whereas poor loan policies are believed also to have directly proportional relationship with loan default. Loan appraisal is prepared by credit service official. A credit appraisal deal with the approval of loan to appraisal defines whether the loan will be non-performing or not. Credit department should verify whether the documents given by customer are accurate and confidential. It can be ascertained from the above mentioned that initial loan appraisal includes the core five ingredients of loan appraisal. This comprise of tests on accuracy, collaterals, honesty, capacity and cash flow to determine loan credit worthiness and the probability of loans default.

Return on Equity (ROE) is the measure of a company's annual return (net income) divided by the value of its total shareholders' equity, expressed as a percentage (e.g., 12%). Alternatively, ROE can also be derived by dividing the firm's dividend growth rate by its earnings retention rate (1 – dividend payout ratio). ROE provides a simple metric for evaluating investments return.

Return on assets (ROA) is an indicator of how profitable a company is relative to its total assets. ROA gives a manager, investor, or analyst an idea as to how efficient a company's management is at using its assets to generate earnings. Return on assets is displayed as a percentage. It is a indicator of how well a company utilizes its assets, by determining how profitable a company is relative to its total assets. It is best used when comparing similar companies or comparing a company to its previous performance.

5. Rationale of the study

Commercial bank have huge amount of money invested in loan. Loan compromises heavy chunk in the assets side of bank's balance sheet. The source of revenue is generated from loan's interest. In this regard non-performing loan bring prominent threat to bank. Non-productive loan increases the non-performing loan. There can be high probability of loan loss provision. The possible threat from non-performing is credit risk, liquidity risk, operation risk, and overall effect on financial performance. With this regard, this research is conducted to examine the present issue of non-performing loan in selected bank.

This study will be beneficial to the shareholder, depositor, borrower, and other creditor to identify the productivity of their bank in Everest bank and NIBL Bank. The report will be beneficial to identify the effectiveness of credit department and the selected course of action that bank has undergone to overcome the non-performing loan issues. This report will be helpful for the other organization interested in making these banks as a trading partner. Financial analyst, who is interested in the performance of these banks, would be grateful.

This comparative study will also be helpful to the management of bank to analyze the non-performing assets management and policies of the bank in comparison of these two banks. This study can be helpful in foundation of improved policies. With the help of this report bank can analyze the effectiveness of their credit department. This report could be equally helpful for the central bank for the amendment in policies.

Thus, this study made the management body to visualize the determinants of NPLs. Furthermore, the finding of this study initiates the researcher for further studies. Last but not least, this study serves as a reference for other researchers in related area. Thus, it can minimize the literature gap in the area of study particularly in Nepal.

6. Limitations of the study

This thesis is adjusted to fit its objectives of examining the determinants of NPLs of commercial banks in Nepal within the limits of specified time and possibility. The researcher decided to limit this study to the commercial banks found in Nepal. The limitations of the study are as follows:

i. This study is concerned with non-performing assets of only two banks namely: Nepal Investment Bank Ltd. and Everest Bank Ltd.
ii. The study is basically based on secondary data, articles, publication and journals of the respective banks.
iii. The result of the study may not be thoroughly applied over all types of Commercial banks.
iv. The study covers only five years period, i.e. from FY 2014/15 to 2018/19.
v. The study confines to select only few corporations.

7. Literature review

Non-Performing Loans (NPLs) are regressed on three sets of factors in terms of credit, banks size induced risk preference and macroeconomic shocks (Nsobilla, 2015). The report concluded based on the empirical results that NPLs have a negative statistically significant influence on the financial performance in the selected banks. This signifies that the greater the NPL, the lower the profit of the selected rural banks. The liquidity risk was not statistically significant. The nonperforming loans and cost-income ratio had a negative influence on financial performance whereas total revenue and loan recovered had a positive effect on financial performance.

An article on the study of non-performing loan and its impact on return on assets of major Indian commercial bank (Brose, 2016). The study concluded on the moderately negative correlation between NPL and ROA. This means that increase in NPL negatively affects the ROA. The study concluded that NPL is more affecting the public sector bank in India. Professor Brose says that effective credit monitoring, complying with the rule of monetary policy, computerization, and maintaining database could be the possible solution to reduce NPL.

Banking sector is an essential part of a nation's economy and represents one of the most important components of a nation's capital. Similarly, the loan portfolio represents an important component of a bank’s total assets. These assets generate huge interest income which is a critical measure of the bank’s financial performance and stability. Therefore, the non-performing loan ratio is a critical tool to measure a bank’s performance. There is recently a growing recognition between macroeconomic indicators, bank-level factors and the non-performing loans (NPLs) ratio. The purpose of this study is to investigate whether there is a significant relationship between macroeconomic indicators, bank-level factors and non-performing loan ratio in Turkey. In this study linear regression models and co integration analysis are utilized to determine the significant relations between the periods from January 2007 to March 2013. Our empirical results show that debt ratio, loan to asset ratio, real sector confidence index, consumer price index, EURO/Turkish lira rate, USD/Turkish lira rate, money supply change, interest rate, Turkey’s GDP growth, the Euro Zone’s GDP growth and volatility of the Standard & Poor’s 500 stock market index does not have significant effect to explain NPL ratio on multivariate perspective. On the other hand, industrial production index, Istanbul Stock Exchange 100 Index, inefficiency ratio of all banks negatively affect NPL ratio; unemployment rate, return on equity and capital adequacy ratio positively affect NPL ratio (Vatansever, & Hepsen, 2013).

The Banking sector of Bangladesh is trapped in a gridlock of non-performing loans (NPLs) so much so that NPL accounts for 11.60 percent of the total volume of classified loans. This problem has started to be widening with an evil trend of loan embezzlement among the industrial borrowers in our country. Frequent scam series in banking industry is surely a red light and unfortunately the commercial banks are highly surrounded by it. The goal of the study is to analyze the impact of non-performing loan (NPL) on profitability where in this study considered net interest margin (NIM). This paper attempts to find out the time series scenario of non-performing loans (NPLs), its growth, provisions and relation with banks profitability by using some ratios and a linear regression model of econometric technique. The empirical results represent that non-performing loan (NPL) as percentage of total loans on listed banks in Dhaka Stock Exchange (DSE) is very high and they holds more than 50 % of total non-performing loans (NPLs) of the listed 30 banks in Dhaka Stock Exchange (DSE) for year 2008 to 2013. Moreover, it is one of the major factors of influencing banks profitability and it has statistically significant negative impact on net profit margin (NPM) of listed banks for the study periods (Akter & Roy, 2017).

This study has two central objectives, compliance of capital adequacy and non-performing loan ratios prudential requirement and analysis on the influence posed by Capital Adequacy, Profitability, and Loan Growth on Non-Performing Loans. Banking sector ratios as reported by the supervisory authority (Bank of Tanzania) were used for the purpose of this study. The banking sector ratios show that commercial banks in Tanzania had strong Capital adequacy ratio greater the 10% required by the Bank of Tanzania. However, the banking sector failed to meet non-performing loans 5% threshold. On the hand, when regression analysis was used to study the influence, it was found that, capital adequacy, profitability posed insignificant influence on non-performing loans whereas loan to asset ratio and interest margin had a significant influence (Malimi, 2017).

8. Research methodology

The study is mainly based on the secondary information. The secondary information is collected from almost all the commercial banks that have the data on non-performing loan is available. Hence the secondary data is gathered for 2 out of 27 commercial banks of Nepal. The data for the said banks are collected and analyzed for the period of 2014/15 to 2018/19. The secondary information is collected from the published documents of the commercial banks and Nepal Rastra Bank. The data from Financial Statistics published by Nepal Rastra Bank, Various Economic Survey published by Ministry of Finance and yearly published annual report from selected banks. The research design used for this study is descriptive and comparative research design. It aims to explain the non-performing loan of selected commercial bank. The present facts and figure are collected. It uses the scientific method of collecting, classifying, and analyzing of data. Comparative analysis of selected bank helps to compare the result of two bank.

8.1 Research design

This research lies into descriptive survey research. The data has been collected from annual report of selected banks. The findings have been derived from the data and facts provided by the respondent. The study was based on the trend analysis and statistical test such as mean, standard deviation, regression and t-test etc. The software called Statistical Package for Social Science (SPSS), Microsoft Excel were used to analyze and interpret the data. This software is widely used in the business setting with its easy-to-use user interface and easily available..

8.2 Population, sample and sampling procedure

The term 'population' for research means all the member of any well-defined class of people, event or object. It means that the entire group of people, events or things of interest that a researcher wishes to investigate. As this study is about non-performing loan of commercial Banks, all 27 commercial banks of Nepal taken into account as population, out of the total population, following two commercial banks are selected as samples for this study by using judgmental sampling method. The reason behind to select these banks is to leading and similar nature with their establishment and their performance, profile and their NPL ratio. EBL is joint venture Nepali bank and it has been operating with Punjab national bank India, NIBL is better performing Nepali private bank. EBL NPL is better than NIBL. Both banks have good performance in term of profit and market coverage.

i. NIBL (Nepal Investment Bank Limited)
ii. Everest Bank Limited

8.3 Nature and sources of data

The research is mainly based on secondary data which may include Annual reports, semi-annual reports, quarterly economics bulletin, economic survey report, journal of finance, previous research studies, dissertation and articles of the subject various text books and different related websites.

8.4 Data collection procedure and instruments

The data analysis has used statistical tools and financial tools.

Financial tools: The financial tools used in the study are trend analysis and ratio analysis.

A. Ratio Analysis

i. NPL ratio

$$Non-performingloanratio = \frac{Non-performingloan}{loan} * 100\%$$

ii. Return on Asses

$$Return\ on\ assets = \frac{Netprofit}{Totalassets} * 100\%$$

iii. Return on Equity

$$Return\ on\ equity = \frac{Netprofit}{equity} * 100\%$$

B. Trend analysis is used to show the changes in values of non-performing loan, loan and assets in different time period.

Statistical tools:

i. Arithmetic mean

$$A = \frac{1}{n} * \sum_{i=1}^{n} xi$$

ii. Standard Deviation

$$S = \sqrt{\frac{\Sigma\,(x-\bar{x})^2}{n}}$$

iii. Karl Pearson Correlation coefficient is used under statistical tools.

$$r = \frac{n\sum xy - (\sum x)(\sum y)}{\sqrt{n(\sum x^2) - (\sum x)^2}\sqrt{n(\sum y^2) - (\sum y)^2}}$$

The value of ‘r’ always falls between -1 to +1.

If, r = 0, there is no relation between the variables.

If, r < 0, there is negative relation between the variables.

If, r >0, there is positive relation between the variables.

iv. Regression is the statistical method that is used to predict the value of the dependent variable on the base of the independent variable.

8.5 Data processing procedure and data analysis method

Correlation analysis

Correlation coefficient is the statistical tool that measures the relationship between the variable. The correlation coefficient ranges from -1 to +1. If the value of correlation coefficient is -1, there is perfectly negative relation between the two variables and when the value of correlation coefficient is +1 there is perfect positive relation between the variables. When the value of correlation coefficient is 0 there is no relationship between the variables.

Regression analysis

Regression is the statistical method that is used to predict the value of the dependent variable on the base of the independent variable. This statistic is also successful in determining the relationship between dependent and independent variable. It also allows in quantifying the effect of changes in independent variable in dependent variable.

Statistical Methods used in Regression analysis.

$Y = a + bx$

Where, y= dependent variable,

a= y-intercept, b= slope of line, and x= independent variable

Bar diagram

Bar diagram are one of the easiest and the most commonly used methods of presenting the numerical data. They present the data by means of bars or rectangle of equal with. The length of bar presents the given figures and with may be of any size

9. Chapter plan

Chapter I: Introduction

This first chapter provides the background information of the study, statement of the problem, objectives of the study, significance of the study, and limitation of the study. Therefore, this chapter provides summary of overall study.

Chapter II: Literature review

Review of the literature is very important part of every research. This chapter includes conceptual review, review of previous work, and research gap.

Chapter III: Research methodology

This chapter constitutes the methodology adopted to conduct the study, data analytical techniques, and process. This chapter also contains research design, population and sample, sources of data, data collection methods and statistical tools.

Chapter IV: Result and discussion

This chapter is the major part of the study, which is concerned with presentation, data analysis, interpretation of the data and sum up of results.

Chapter V: Summary and conclusion

Finally, this chapter summarizes the whole research finding and forwards the appropriate recommendations on the basis of the research. The summary of the findings reiterates the measures that are developed, explored from the research, data gathered and analyzed. It presents the data findings in a logical, rational manner to the problem area. Limitations to the study as well as recommendations for future research are also considered.

References

Ahmad, F., & Bashir, T. (2013). Explanatory power of macroeconomic variables as determinants of non-performing loans: Evidence form Pakistan. *World applied sciences journal*, *22*(2), 243-255.

Akter, R., & Roy, J. K. (2017). The impacts of non-performing loan on profitability: An empirical study on banking sector of Dhaka stock exchange. *International journal of economics and finance*, *9*(3), 126-132

Badar, M., Javid, A. Y., & Zulfiquar, S. (2013). Impact of macroeconomic forces on nonperforming loans: An empirical study of commercial banks in Pakistan. *wseas Transactions on business and economics*, *10*(1), 40-48.

Bholat, D., Lastra, R. M., Markose, S. M., Miglionico, A., & Sen, K. (2016). Non-performing loans: *Regulatory and accounting treatments of assets*.

Brose, P.N.(2016). The study of Effect of Non-Performing Assets (NPAs) on Return on Assets (ROA) of Major Indian Commercial Bank. Pune: *International journal in management and social science*. Retrieved From ttps://www.academia.edu

Klein, N. (2013). Non-Performing Loans in CESEE. *Determinants and impact on macroeconomic performance*, International Monetary Fund, (72), 1-27.

Malimi, K. (2017). The influence of capital adequacy, profitability, and loan growth on non-performing loans a case of Tanzanian banking sector. *International journal of economics, business and management studies*, *4*(1), 38-49.

Mileris, R. (2012). Macroeconomic determinants of loan portfolio credit risk in banks. *Engineering economics*, *23*(5), 496-504.

Nepal Rastra Bank. (2015). *Unified directives 2015*. Kathmandu. Retrieved from https://www.nrb.org.np

Nsobilla, T. (2016).*The effect of non-performing loan on the financial performance of selected bank in GHANA*. Retrieve From https://www.academia.edu

Rose, P.S., & Hudgins, S.C. (2010) *Bank management and financial services*. India, Delhi: Tata McGraw-Hill Education Private Limited.

Sherpa, P.D. (2016). *A study on non-performing loan management of commercial banks.* An Unpublished Master Degree Thesis, Submitted to Faculty of Management, ShankerDev Campus, T.U. Kathmandu

Shingjerji Ali (2013): Impact of Bank Specific Variables on the Nonperforming loans ratio in Albanian Banking System, *Journal of finance and accounting*: (*4*)7.

Tomak, S. (2013). Determinants of commercial banks' lending behavior: Evidence from Turkey. *Asian journal of empirical research*, *3*(8), 933-943.

Vatansever, M., & Hepsen, A. (2013). Determining impacts on non-performing loan ratio in Turkey. *Journal of finance and investment analysis*, *2*(4), 119-129.